EFFECTIVE IMPLEMENTATION OF CREDIT POLICY IN NEPALESE COMMERCIAL BANKS

(A Study of Nabil, NIC, Everest and Nepal Bangladesh Bank Ltd.)

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RECOMMENDATION

This is to certify that the project work

Submitted By**:**
Suman Silwal

Entitled:
"EFFECTIVE IMPLEMENTATION OF CREDIT POLICY IN NEPALESE COMMERCIAL BANKS
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has been prepared as approved by this Department in the prescribed format of Faculty of Management. This project work is forwarded for examination.

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DECLARATION

I hereby declare that the work reported in this Project entitled, **"Effective Implementation of Credit Policy in Nepalese Commercial Banks (A Study of Nabil, NIC, Everest and Nepal Bangladesh Bank Ltd.)"** has submitted to Faculty of Management, Tribhuvan University is my Original work. It is done in the form of partial fulfillment for the Master of Business Studies (M.B.S) under the supervision and guidance of Prof. Dr. Bihari Binod Pokharel, Head of Research Department, Nepal Commerce Campus and Mr. Dipesh Bhatta of Nepal Commerce Campus.

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Suman Silwal

EXECUTIVE SUMMARY

Current ratio of the banks under study is meeting the universal standard principle of current ratio i.e. 2:1, in an average. Mean of the current ratio of NABIL, EBL, NICBL and NBBL is 2.19, 2.37, 2.12 and 1.87 respectively. NIC bank and NABIL bank have less consistency in its current ratio with S.D of 0.39 and 0.37 respectively as compared to other sample banks. Looking at the above ratios, we can say that NABIL bank, Everest Bank, NIC Bank has maintained the standard but NB Bank has relatively low in the standard of the ratio. We can say the low liquidity position means that the bank is not getting the good opportunity to invest in the profitable sector and holding the amount. In utilizing current assets in terms of loan and advances, EBL has more consistency compared to other banks as it has lowest CV of 0.09 and similarly, NABIL, NICBL and NBBL has the C.V of 0.21, 0.24 and 0.12 respectively. It is observed that there is high variance in the ratio of NICBL and NBBL as the ratio swings heavily during the study period. The highest ratio of 1.24 of NABIL bank is the highest ratio among the above sampled banks. Utilization of deposit to loan and advances of NABIL bank is lowest among the sample banks. Higher ratio between loan and advances to deposit indicates that the bank is mobilizing high volume of deposit into loan and advances, which results in the positive contribution to profitability. Contradictorily, high ratio between loan and advances to deposit brings the bank in the liquidity risk. The lowest ratio of loan and advances to deposit is 0.60 of NABIL Bank in the year 2003 and highest ratio is 0.97 of NB Bank in the year 2007. The C.V of EBL bank is lowest i.e. 0.023 among the sampled bank so it has high level of consistency.

Likewise, it is observed that the NBBL has highest CV i.e. 0.15, which reveals the greater disparity in the ratio. It is found that the fixed deposit to loan and advances ratio are being efficiently and properly utilized by the Everest and NIC bank. Similarly, the trend of lending from the fixed deposit of NB bank is decreasing remarkably. The five year ratio of total lending to fixed deposit shows the average lending of the NABIL bank is lowest among other banks. Though the lending from the fixed deposit is safe, NABIL bank is lending only the fewer portions. NIC bank, Everest bank and NB bank have utilized the benefit of the fixed deposit. So they have utilized high portion of the fixed deposit i.e. 0.53, 0.46, 0.40 respectively to the loan and advance. Additionally, NABIL and NB bank have high CVs of 0.20 and 0.43,

which reveals that the pattern of lending from the fixed deposit is fluctuating more. From the ratio of lending to saving deposit, it is revealed that NB bank has low consistency which fluctuates in the high ratio. It also means that NABIL bank is utilizing its saving deposit properly than Everest Bank, NB Bank and NIC Bank. The average ratio of investments from the saving deposit of NABIL bank is 0.96, which is the highest among the average ratio of other banks. Everest bank and NB bank have average ratio of 0.72, 0.75 respectively. But NIC bank seems to be the conservative bank which invests only 0.64 from the saving deposit.

The C.V of the NABIL Bank is lowest of 0.052 among other sampled banks, showing highest consistency. The C.V of the Everest bank and NIC bank has 0.09 and 0.08 respectively. From the ratio of lending to current deposit, it is found that NABIL bank has highest ratio of investment from the current deposit. In the average of five years sample, it has invested 0.31 to the total Loan and advances. Other sample banks EBL, NICBL and NBBL has invested the lowest portion from the current deposit i.e. 0.15, 0.08 and 0.15 respectively. The C.V of the NB bank has the lowest of 0.08 and has the highest consistency. But C.V of NIC bank is 0.33 showing the lowest consistency among the sample banks. The ratio of Non-Performing Loan to Total Loan is in decreasing trend except that of NB Bank. The ratio of NABIL Bank is 5.54% in the year 2003 and came down to 1.12% in the year 2007.

Similarly, the ratio of EBL is 2.20% in the year 2003 and came significantly down to 0.76% in the year 2007. In the same trend, NIC bank is good enough in reducing the ratio from 6.66% of year 2003 to 1.10% of year 2007. But NB bank's ratio is deviating largely in the study period from 10.81% of year 2004 to 35.13% of year 2007. Comparing among the sample banks, EBL has the lowest average ratio i.e. 1.50%, which reveals banks effectiveness and efficiency in the process of credit administration and recovery. Similarly NABIL, NIC has the average ratio of 2.52% and 3.61% respectively. However NB Bank's average ratio stands out to be 17.99%, which is remarkably high showing management's inefficiency and ineffectiveness. Comparing the ratio with the industry average ratio, the average ratio of all banks seems to be lower than that of the industry average. But when we look at the data of individual years, the ratio of NB bank is even higher than the industry average in the year 2005 and 2007. EBL has maintained the smooth trend of NPL to total loan ratio

i.e. 0.55, which further exhibits the less fluctuation of the ratio during the study period. Similarly NABIL and NICBL have standard deviation of 1.93 and 2.05 respectively, showing the moderate fluctuation in the above ratio. But standard deviation of NBBL is 10.09, even higher than that of industry i.e.7.42, which shows higher fluctuation in the ratio of NPL to total gross loan. From the ratio of Loan Loss Provision to Non Performing Loan, it is found that EBL, NABIL and NICBL seem to be the effective and efficient in the process of credit administration and recovery. In the other hand NBBL is relatively weaker in the management and administration of advancing of loan. It is observed that the ratio of Loan Loss Provision to Non Performing Loan is found in between of 3.92 of EBL being highest and 0.70 of NBBL being least. The ratio of NABIL Bank is 0.80 in the year 2003 and gone up to 2.00 in the year 2007. Similarly, the ratio of EBL was 1.27 in the year 2003 and gone significantly up to 3.92 in the year 2007. In the same trend, the ratio of NIC bank was 1.13 in the year 2003 and gone slightly up to 1.86 in year 2007. But NB bank's ratio is deviating largely in the study period from 0.70 of year 2003 to 3.21 of year 2006 and again down to 1.13 in the year 2007.

The trend of interest income to loan and advances ratio is decreasing, which shows the rate of yield is decreasing with the time. In the year 2003, NABIL is having 12.55% of yield, which lows down to 9.99 in the year 2007. Similarly, the yield of EBL was 10.30% in 2003 but decreases to 8.11 while coming to year 2007. Likewise, NICBL also maintained the same trend of decreasing, from 10.61% of 2003 to 7.95% of 2007. But we can notice relatively different trend of the ratio of NBBL, which was 12.74% in 2003 decreases to 9.11 in year 2005 again increases to 10.90 in year 2007. Further, NABIL and NBBL are found to be the higher yield gaining organization compared to EBL and NICBL. The average ratio of NABIL, NBBL is 10.78 and 10.67 respectively, whereas the average ratio of EBL and NICBL is 9.44 and 9.26 respectively. Hence, NICBL is found to be the lowest yield generating organization from its performing assets. From the ratio of net profit to loan and advances, it is observed that the NABIL bank is making highest net profitability ratio as compared to other sample banks. In the year 2003, NABIL is having 5.13% of yield, which reduces down to 4.24 in the year 2007. Similarly, the yield of EBL was 1.86% in 2003 and increases to 2.10 while coming to year 2007. Likewise, NICBL also maintained the same trend and the ratio remained 1.91% in the year 2003 gone up to 2.32 in the year

2005 but again downs to 1.73% by the year 2007. But we can notice relatively different trend of the ratio of NBBL, which was 15.62% in 2003 decreased to -21.19 in 2006 again increased to 6.30 in year 2007. The average ratio of NABIL, EBL is 4.84 and 2.16 respectively, whereas the average ratio of NICBL and NBBL is 1.85 and -1.44 respectively. Hence, NBBL is found to be the negative yield generating organization. From the analysis of sector wise loan & advances, it is noticed that productions, constructions, wholesaler & retailers, transportation, communication & public services are the few sectors which consumes higher portion of the lending of commercial banks.

Up to the mid July 2007 NABIL banks has invested total of 15903 million, Everest Bank has total lending of 14100 million, NIC bank has the lending of 9128.7 million and NBBL has lending of 9159 million. All sampled banks have invested their major portion in the production sector. The NIC banks have made the highest portions in production sector of 38.5%. NBBL and NABIL bank have also investment of 36.39%, 35.85% respectively in the production sector. Everest bank has also invested major portion of lending in production sector of 23.54%. We can say the NIC bank, NBBL and NABIL bank are more constrained in the production sector but Everest bank has slightly diversified the investment in other sectors. EBL is the only one bank which has invested its fund to the local government of 0.17% out of the total lending. It shows that the ratio of investment in this sector is too low comparative to other sector. From the analysis of security wise loan & advances, it is noticed that there are different types of securities that the bank keeps in the custody at the time granting the loan. Looking at the figure and ratios, we found that all the banks prefer assets guarantee as the best secured. First choice and priority in taking security of NABIL is assets guarantee as it contributes 70.54% out of total security. The second prior security for the NABIL bank is on bills guarantee i.e. 16.51%. On bills guarantee includes domestic bills, foreign bills, import bill, letter of credit, export bill, against export bill and other foreign bills. Banks usually reject the gold and silver as the securities because calculation of the actual market value of gold is difficult and the value of these securities keeps in fluctuating all the time. Everest bank has accepted highest percentage of assets guarantee as the best securities i.e. 90.43%, and lowest of gold and non-government securities. Similarly NIC bank and NB bank have also invested 86.88% and 76.76% respectively against the security of assets guarantee.

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ABBREVIATIONS

ABBS	:	Anywhere Branch Banking System
ATM	:	Automatic Teller Machine
B.S	:	Bikram Sambat
C.V	:	Coefficient of Variance
CB	:	Commercial Bank
CT Loan	:	Calcutta Transit Loan
EBL	:	Everest Bank Limited
EMI	:	Equal Monthly Installment
FD	:	Fixed Deposit
FDBP	:	Foreign Document Bills Purchase
FDR	:	Fixed Deposit Receipt
FY	:	Fiscal Year
GDP	:	Gross Domestic Product
GNP	:	Gross National Product
ICC	:	International Chamber of Commerce
IMF	:	International Monetary Fund
INGOs	:	International Non Government Organizations
JVBs	:	Joint Ventures Banks
L/C	:	Letter of Credit
NABIL	:	NABIL Bank Ltd
NB	:	Nepal Bangladesh Bank
NGOs	:	Non Government Organizations
NIC	:	Nepal Industrial and Commercial Bank
NIDC	:	Nepal Industrial Development Corporation
NPA	:	Non Performing Assets
NPR	:	Nepalese Rupee
NRB	:	Nepal Rastra Bank
OD	:	Over Draft
OMO	:	Open Market Operation
PAD	:	Payment Against Document
PCR	:	Project Completion Report
PIS	:	Project Information Sheet
PNB	:	Punjab National Bank
RBB	:	Rastrya Banijaya Bank
S.D	:	Standard Deviation
SAARC	:	South Asian Association for Regional Co-operation
TL	:	Term Loan
TR Loan	:	Trust Receipt Loan
UAE	:	United Arab Emirates
UCPDC	:	Uniform Customs and Practice for Documentary Credits

CHAPTER – ONE
INTRODUCTION

1.1 Background of the Study

Unification of Nepal began from 1799 B.S by the initiation of Prithivi Narayan Shah, successively continued by his successor. Forceful geographical integration process set the foundation of Modern Nepal but it causes the economic slowdown and downward development while relatively comparing the developmental pace of western and eastern globe. Right from the date, many economic activities and plan were taken again it was worthless as we are confronting today with deep crisis. The understated and undervalued poor country Nepal in the interpretation and eyes of international alliances though she stands in the strategic position shaped with varied characteristics like agro-based economy, high rate of population growth, low rate of capital investment, depends upon foreign aid and unequal distribution of national income, rich in water and natural resources.

History of Nepal as begins from Gopal dynasty; economic development should be traced out in the precise manner from the time onwards. During Gopal, Mahispal, Kirat, lichhivi, Malla regime, Nepal was self-reliant country with economic boom up. During that time, though there was the existence of money system, mainly as population and transactions were in small size, barter system was in existence and people adopted more cooperative practices. Mutual lending of some goods in return of goods which are commonly understood as the ‘Paichho’ in local terms was more popular. Credit practice was in existence during that time in the personal level than in the institutional level.

The successor of Shah Dynasty mainly involved in the extension of political map of Nepal. They also involved in the war with China and India which then ruled by British East India Company. Due to which economic acceleration was not focused. Similarly, because of the internal clash and other reasons, Rule of Shah Dynasty became weaker and Janga Bd. Rana en-cashed this opportunity and captured the total power in his hand which imprisoned Nepali and Nepal for around 104 years. There

was no remarkable growth of industry and trade along with finance. The un-ruled and despotic ruling of Rana regime resulted nothing by their action for nation and citizen. But again due to the changes appeared in the world, mainly, involvement of many countries in the war either internal or external inspired them to set some of the foundations of industry though for their personal stake.

Nepal was the country of closed economy before 2007 B.S but later changed this policy introducing Nepal in the international arena. After the 2007 B.S. to the date, Nepal has been adopting the Mixed Economic Policy. At present, foreign direct investment is promoted in almost all sector/ sub-sector of the economy, including the development, operation and management of infrastructure like road, transportation and hydroelectricity, of which the nation has immerse potentiality.

Nepal, in early 1950s, began the process of economic and social development despite of the lack of modern institutions and infrastructures. Budgetary system was introduced in 1952 AD. In the same year, a separate ministry for Planning and Development was established for uplifting the nation.

Economic stabilization program, adopted in 2042 BS with the assistance of International Monetary Fund (IMF), can be taken as the beginning of economic liberalization in Nepal. Structural adjustment program brought in 2044 BS with the structural adjustment facility from IMF can be considered as the continuation of same policy. After the restoration of multiparty system, the first elected government (2047 BS) encouraged the process of globalization. In order to accelerate the process of economic liberalization and globalization, the government enforced the foreign Investment and Technology Transfer Act 2049 and Foreign Investment and one window policy 2049 B.S.

Similarly the government enforced ‘Industrial Enterprises Act 2049’, formulated new ‘Industrial Policy 2049’ and ‘Commercial Policy 2049’. The policies include one window provision for internal and foreign investors, non-nationalization of new industries, implementation of full convertibility of Nepalese currency on current account etc. Non requirement of license for the establishment of the industries other than having social cost was another aspect of the policy.

In the similar way, the government enforced the 'Privatization Act 2050' including its regulations and guidelines. The government developed various criteria for promoting private sector organizations. They include management contract, partial privatization, and lease contract, asset selling and selling of shares. In case, the public enterprises are to be privatized, the government has the policy of selling 5% of shares to the employees of enterprise, 25% to the general public and management shares to the competent party or individuals.

Those policies have certainly contributed in the initial stage of globalization of Nepal. Their effectiveness can be measured in near future in terms of economy generating issues and enhancing overall Gross National Product (GNP) and Gross Domestic Product (GDP) of the country. Since last decade, there has been a considerable growth in service sector activities in Nepal, including a sharp increase in banking, insurance, transportation, airlines, finance companies, co-operatives societies, hydro power centers etc.

For all round development of the country, a higher economic growth is necessary. Nepal has a policy to obtain higher economic growth by broadening and strengthening stability and fiscal discipline. Developmental activities are focused in the rural areas through the participatory development and rural empowerment process.

Financial institutions are considered as the catalyst to the economic growth and development of a country. Banking is a vehicle for the mobilization of economy's financial resources and extension of credit to the business and service enterprise.

Commercial banks are the heart of the financial system. They hold the deposit of individual, government establishment and business units. They make funds available through their lending and investing activities to borrower, individual, business firms and government establishment. In doing so, they assist both the flow of goods and services from the producers to consumers and the financial activities of the government. They provide a large portion of medium of exchange and they are the media through which monetary policy is affected. These facts show that the commercial banking system of a nation is very important to the functioning of its economy.

1.2 Statement of Problems

When government introduced the liberalization policy, many banks, financial institution and other institution are established rapidly. These days many commercial banks, development banks and financial institution are operating their works to assist in the process of economic development in the country. Due to the high competition among these financial institutions, complications are faced in fund mobilization and investment practice. So, it raised the problems of proper fund mobilization activities, which may play the vital role in ensuring banking success and economic development of the nation.

Nepal could never cultivate a culture of “National priority, sincerity and commitment”. Often times economists, industrialists and even politicians think that the economic policies pursued by the post political regime have been the culprit of less development, they may be true but who is to be blamed for this? There were evaluations, studies and experts' recommendation for the corrections of our economic policies. They are not unique to Nepal but a general solution followed by every one. There have been positive results and even miracles in certain countries of the Asian – Pacific region, and Korea Singapore, Thailand, Taiwan and New Indonesia and Malaysia. Indo-Chinese nations will shortly follow this. Why Nepal has been only exception to this? Even Bangladesh and Bhutan are going ahead.

In summary, the major reasons of Nepalese problem of non - industrialization is the part of economic failure and misuse of resources without proper utilization. Nepal primarily being agricultural country, its base of industrialization also lies on agriculture. The first sets of industries established are all agro industries. Therefore, it would not be out of context to mention agro industry playing a major role in this process.

Agriculture has still been the dominating sector in Nepal with around 54.25% share of GDP and it being the major source for raw materials. A cursory view at Nepali industries that occupy around 9.56% of GDP delineates agro-industry as a major contributing sector. Out of 2,987 total industrial establishments, there were 572 industries classified as Agro industries in Fiscal Year 2005/06 (tentatively around

23.71%). This is further confirmed by the fact that joint venture banks and Nepal Industrial Development Corporation (NIDC) are major industrial financing institutions in the country, holds around 36% of the total portfolio directly under Agro- sector.

To solve such type of problems the investment policy of banks should be effective. The purpose of the study is to analyze and examine how far the present investment policy and procedure of joint venture banks is effective in encouraging the entrepreneurs to invest in different industrial and business sectors in different regions. In this regard however experience of banks reveals not encouraging relationship between investment policy and industrial development of the country.

The present problems related to the credit policy are:

a. What is the position of lending and advancing of sample commercial bank?
b. What is the future prospectus of credit in Nepal?
c. What problems are facing by commercial bank in availing lending service?
d. What types of major lending products are prescribed by consumer?

1.3 Objectives of the Study

The objectives of this study are:

1. To study the relationship between deposits and lending
2. To study the classification, provision for loan and advances and its effect in profitability.
3. To examine the sector wise and security wise lending
4. To identify and analyze the problems and prospects of lending practice of Nepalese commercial bank.

1.4 Significance of the Study

In this present era, joint venture bank are going a wide popularity through their efficient management and professional service and playing an eminent role in the economy. Considering the economic structure of the country, the banks do not have sufficient investment opportunities. Rapidly increasing financial institutions are creating threats to the joint venture banks. In this context, the study would analyze strengths, weaknesses, opportunities, and threats of selected joint venture bank. The

research will be helpful for joint venture banks to formulate strategies to face the increasing competitions. Beside it also helps to identify the importance of shareholder, policy formulators academically professional and outside investors. So, an independent study in this sector will help people find their way to the solution for their investment.

The Significance of the study can be written as the following manner:

a. By the helps of this study, general public can know the lending activities and situation of the Nepalese commercial banks.
b. It is also beneficial for the government while formulating policy and rules regarding the credit policy.
c. The study of credit policy would provide information to the management of the concerned banks that would be helpful to take corrective actions in the banks activities.
d. This study provides valuable information that is necessary for the management of the banks, shareholders, general public and related parties.

1.5 Limitations of the study

The present study is not free from the limitations. The limitations of this study are as follows;

- This study is based on secondary data. Accuracy depends upon the data collection and as provided by the banks.
- The analysis period of research covers only five years. (FY 2003/2004 to FY 2007/2008)
- The study mainly focuses on the loan & advances and doesn't cover other banking services and facilities provided by the banks.
- In this study only limited financial and statistical tools and techniques of credit analysis is used.
- This study has been carried out for the partial fulfillment of master's degree faculty of management of TU. So the time and resources are major limitation of the study.
- Only 4 commercial banks among 25 have been selected as sample for the study. Due to the small sample size, it may not fully represent complete banking credit concept as a whole.

1.6 Organization of the Study

The report will be presented in three chapters, Introduction, Data Presentation and Analysis, Conclusion and Recommendations.

1.7 Research Methodology

Research methodology is a research method used to meet specific objectives. It is a systematic way to find out the probable solutions. It includes research design, sample design, period of study, sources of data and collection procedure, data processing and terms methods, and tools techniques, theories to analyze and interpret.

1.7.1 Research Design

Research design is the plan, structure and strategy of investigation conceived, the plan is the overall schemes or program of the research. It includes an outline of what the investigator will do from writing the hypotheses and their operational implications to the final analysis of data. The structure of the research is more specific. It is the outline, the scheme, the paradigm of the operation of the variables. When we draw diagrams that outline the variables and their relation and juxtaposition, we build structural schemes for accomplishing operational research purpose. In other words, strategy implies how the research objectives will be reached and how the problems encountered in the research will be tackled.

1.7.2 Population and Sample

The entire number of commercial banks functioning in Nepal is the population of this study. It was tried to blend sample on a hierarchy of most successful to the almost failure banks. In other words, Nabil bank was taken as one of the sample because it is a most successful and pioneer in the banking field of Nepal. Similarly Everest bank and NIC bank were included in the sample as they are rapidly growing and moderate ranked banks. Finally NB bank was taken as one of the sample to analyze and compare the reasons for failure with other successful sample banks. For the analysis of credit policy and its implementation four banks are taken as the sample namely,

1. Nabil Bank ltd.
2. Everest Bank ltd.
3. NIC Bank ltd.
4. Nepal Bangladesh Bank Ltd.

1.7.3 Sources of Data

The data for this research has been collected form the following different sources

- Publications and annual reports of Sample Banks (up to fiscal year).
- Textbooks of related subject.
- Published documents, Bulletins of Nepal Rastra Bank.
- Research and thesis reports submitted by different researchers
- Web sites, etc.

1.7.4 Data Analysis Tools

Relevant statistical tools and financial tools are used to find out the best appropriate outcomes as per designed objectives of the present study. The present research has used mix of following tools in the analysis.

1.7.4.1 Statistical Tools

Brief explanations of the statistical tools used in this study are given below.

Arithmetic Mean (Mean)

The simple or arithmetic average in which all the observations are treated equally, is the sum of all the individual numbers divided by the number of observations.

$$\text{Mean } \left(\overline{X}\right) = \frac{X_1 + X_2 + X_3 \ldots\ldots\ldots X_n}{n}$$

Where $\overline{X}$ = mean

X_1, X_2, X_3 to X_n are given set of observations up to the period n

n = number of items observed.

Standard Deviation

In order to indicate the variability of the individual observations, standard deviation is used in this study. Standard deviation measures the dispersion or variability around the mean. The equation for the computation of the standard deviation $(\pm)$ is

$$\pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}}$$

$\overline{X}$ = The average (mean)

X_n = The individual observation

n = Total number of observation

Coefficient of Variation (CV)

Coefficient of variation (CV) is used to adjust for such difference in scale. It is a relative measure of dispersion and is defined as the ratio of the standard deviation divided by the mean. That is,

$$CV = \frac{\pm}{\bar{X}}$$

It is usual for the risk/return model. It shows the return per unit of risk.

1.7.4.2 Financial Tools

Financial ratios are computed and interpreted from two perspectives. They are complied for a number of years to perceive trends, which is usually known as time-series analysis. Next, they are compared at a given time for sample banks, known as cross-sectional analysis. Some of the selected tools are explained as below.

Current Ratio

Current ratio is the ratio of current assets to current liabilities. It is a measure of liquidity.

$$\text{Current Ratio} = \frac{Current\ \ Assets}{Current\ \ Liabilities}$$

Current assets include normally those assets of a firm, which are converted into cash within one year. These assets of a firm includes cash, bank balance, investment in treasury bills, discounts, overdrafts, short term advances loans, foreign currency loan, bills for collection, customer acceptance, stock, receivable and prepaid expenses.

Similarly current liabilities include those liabilities of a firm which are paid within one year, like current payments, cash margin, current deposits, saving deposits, inter bank reconciliation accounts, bills payable, provision for overdraft, accrued expenses, bills for collection, customer acceptance, outstanding expenses, dividend payable, and provision for taxation. Although there is no hard and fast rule for measuring this ratio, conventionally a CR ratio of 2:1 is considered satisfactory.

1.8 Review of Literature

Review of literature includes the whole study and review of those books, articles and thesis, which are related to our research. It provides the information about the research. By the detail study of literature, we can come to know up to how the

researchers have researched. And what are the things remain to be researched. To make a research effective, the research must be new in the field of research. And without reviewing previous thesis, one can't know what is new? So as to know subject researched and remains to research, review of literature is so important like an investigation of disease before treatment in medical science. It includes related books, articles, journals, and thesis. The textual matters would help the researcher to support the area of research in order to explore the relevant and true facts for the reporting purpose. Actually, it is the best guideline for the research work.

1.8.1 Conceptual Review

This section is developed to discuss briefly about the theoretical frame work, which are closely related to the research work:

1.8.1.1 Bank Lending : An Outline

There are two main types of credit that are available with the Nepalese commercial banks. One type of credit/loan is linked to a specific item like home loans, mortgages, personal loan, shop loans, vehicle loan, education loan, etc. The second type of loan, which is known as revolving credit, means that the client always has access to the amount of the line of credit that remains unspent. And every time s/he pay off some of the outstanding amount, that proportion of his/her credit limit becomes available for spending again.

Term and Demand Loans are normally repaid in regular installments over an agreed period of time. The amount of installments may be variable or fixed repayments of approximately equal amounts. In case of revolving credit facility, the client has an option to pay off the outstanding amount within the expiry date of that facility.

In order to cover the lending risk and to make a profit on their money, lenders generally charge interest on loans and revolving credit. With fixed repayment loans, the amount of interest is worked out in advance and added into the repayments. There is often a penalty if the customer wants to repay the outstanding amount earlier than agreed. With revolving credit, customer can repay as much or as little as s/he wanted, at any point.

1.8.1.2 Bank Credit/Lending Policies

The principal reason banks are charted by state and federal authorities is to make loans to their customers. Banks are expected to support their local communities with an adequate supply of credit for all the Intimate business and consumer financial needs and to price that credit reasonably in line with competitively determined interest rates. Indeed, making loans is the principal economic function of banks-to fund consumption and investment spending by businesses, Individuals and units of government. How well a bank performs its lending function has a great deal to do with the economic health of its region, because bank loans "support the growth of new businesses and jobs within the bank's trade territory and promote economic vitality. Moreover, bank loans often seem to convey positive information to the marketplace about a borrower's credit quality, enabling a borrower to obtain more and perhaps somewhat cheaper funds from other sources. (Rose, June 1983:52, no.3)

1.8.1.3 Type, Nature and Feature of Loans

This report mainly focuses on the Lending Practice and Procedure of Everest Bank Ltd., Nabil Bank, NB Bank ltd and NIC Bank. So, it is rational to present the type, nature and feature of loan provided these Banks as the researcher has consulted from the books, information provided by the officers of the concern Bank

Term Loan

Term loan is money lent to the borrowers in a lump sum. Term Loans are generally granted to finance capital expenditure, i.e. for acquisition of land, building and plant & machinery, required for setting up a new industrial undertaking or expansion/diversification of an existing one and also for acquisition of movable fixed assets. Term Loans are also given for modernization, renovation etc. to improve the product quality or increase the productivity and profitability.

Generally subsequent debt in the loan account is not allowed except by way of interest, incidental charges, insurance premiums, expenses incurred for the protection of the security. Term loans are generally granted for long period to finance fixed assets and are repayable on installments over the period of loan.

Term Loans are normally granted for periods varying from 3 to 5 years and in exceptional cases beyond 5 years. The exact period for which a particular loan is sanctioned depends on the circumstances of the case.

The basic difference between short-term facilities and term loans is that short-term facilities are granted to meet the gap in the working capital and are intended to be liquidated by realization of assets, whereas term loans are given for acquisition of fixed assets and have to be liquidated from the surplus cash generated out of earnings. They are not intended to be paid out of the sale of the fixed assets given as security for the loan. This makes it necessary to adopt a different approach in examining the application of the borrowers for term credits.

Project Loan

Project loan is granted to customers on the basis of the nature of the project. The financial institution asks the borrower to invest certain portion to the project from their equity and the rest will be financed as project loan. The debt equity ration in case of project loan is generally 60:40. The project loan includes the term loan and working capital loan required by the project.

Working Capital Loan

Working capital is the difference between current assets and current liabilities. This type of loan is granted to the customer to meet their working capital gap. Working capital can be divided into fixed working capital and variable working capital. Fixed working capital is financed by way of short-term loan while variable working capital is financed by overdraft.

Loan against Fixed Deposit Receipt

Fixed deposits are kept for a specified period by the depositor. If a depositor needs money before its maturity, he/she can obtain loan against the security of such deposits. Generally financial institutions allow up 90% of the fixed deposits as loans.

Before an advances is allowed against fixed deposit/recurring deposit/other deposit as security, a letter of pledge/lien signed by the depositor along with original fixed deposit receipt/recurring deposit/other deposit duly discharged is normally required by the institutions.

Priority/ Deprived Sector Loan

Commercial banks are required to extend advances to priority sector and deprived sector. Out of the total credit facility of the commercial bank, 12% must be extend towards priority sector loan including deprived sector. Loan granted to agricultural sector and service sector up to Rs. 2 Millions and cottage industry up to Rs 2.5 Millions (for single borrowers) falls in the priority sector. Institutional credit to Agricultural Development Bank and Rural Development Banks also fall in this category. Similarly, advance for the purchase of Captive Generators and Export Credit up to Rs. 5.00 Millions are also considered as priority sector loan. Deprive Sector Loan include: -

- Advances to the poor/ weak/deprived people unto Rs. 30,000.00 for income generation or employment oriented schemes.
- Institutional credit to Rural Development Banks.
- Loans to NGOs those are permitted to carry on banking transaction for lending less than Rs. 30,000.00

Overdraft

Overdraft facility is a kind of working capital loan. This facility is allowed in current accounts. Overdraft is an agreement by which the banker allows the customers to draw over and above the current account balance. The borrower can not exceed the limit sanctioned to him. In this account, the balance will be fluctuating because of withdrawal and repayment of money by the borrower. Interest on overdraft is charged on debit balance on daily basis. Overdraft is generally granted to the businessmen for the fulfillment of their short term needs. This type of loan is renewed every year if necessary.

Cash Credit

Cash credit is similar to the overdraft amount by which the consumer is allowed to overdraw his account. The borrower may operate the account within stipulated limit and when required. Cash credit is provided against the pledge or hypothecation of stock in trade, goods, machinery, land and building etc.

Bridge-Gap Loan

If a term loan is approved to some customers and the approving institution can not disburse the facility because of incompletion of legal and other formalities, In this situation customer may ask as bridge gap loan.

Import Financing

Opening Import L/C for the procurement of raw material for the production of finished goods as stipulated by the export L/C are made the financing is normally made in the following way:

Payment against Documents (PAD)

In Letter of Credit transaction, when the document arrives at the bank, principally the L/C opening bank should make the payment of the value to the reimbursing bank. In this situation bank make payment by booking the loan. This type of loan can be treated as forced loan. If the buyer is not able to make the settlement in the due date of the LC, bank makes the payment by financing forces loans. The period of this loan is too short.

CT (Calcutta Transit) Loan

This loan is also just like the PAD but this loan is not treated as force loan. In case of the raw material procurement form the foreign country, transit may be through Calcutta, India. In this case bank make the payment of value, the document, financing CT loan called Calcutta Transit Loan. The period of the loan is until the raw material arrives up to customs points.

TR Loan (Trust Receipt Loan)

Trust Receipt Loan is the major loan in the import financing. If the payment of the import LC's are made, the financing is normally booked under Trust Receipt Loan. Each TR loan is settled normally from the export proceeds or by cash deposits by the client if it matures before export. Each TR loan has normally three months of maturity.

1.8.1.4 Credit Principles, Policy and Practice

During the study, it is become familiar about the credit principle, policy and practice of the banks. To reveal the essential aspect of this chapter, researcher has taken some empirical principle developed and expressed by the experts, NRB Directives and other evidence, which will help to make the clear concept to this chapter.

Mr Sudir Karki, financial expert giving his view about the credit policy that:

- Quality of credit is more important than exploiting new opportunities
- Every loan should have two ways out that are not related and exist from the beginning.
- Successful completion of the transaction, Realizing Assets/ Drawing on the borrower's resources.
- The character of the borrower in the case of corporations, the management and shareholders must be free of any doubt as to their integrity.
- Banks that associate with people of less than acceptable character damage their own image and reputation for beyond the profit obtained on the transaction.
- Where security is obtained a professional and impartial view of its value and marketability must be obtained.
- Do not let poor attention to detail and Loan Administration spoils an otherwise sound loan.
- If the loan is to be guaranteed, be sure that the guarantor's interest is served as well as the borrower's
- See where the bank's money is going to be spent.
- Think first for the bank. Risk increases when credit principles are violated.

1.8.1.5 Directives Relating Loan Loss Provision

A bank should identify and recognize impairment in a loan or a collective assessed group of loans when it is probable that the bank will not be able to collect, or there is no longer reasonable assurance that the bank will collect all amount due accruing to the contractual term of the loan agreement. The impairment should be recognized by reducing the carrying amount of loans through and allowance or charge off and charging the income statement in the period in which the impairment occurs. A Bank should measure an impaired loan at its estimated revocable. A bank should adopt a sound system for managing credit risk. To be able to prudently value loans and to

determine appropriate allowances, it is particularly important that banks have a system in place, where established by the institution itself or by the supervisor, to ratable classify all loans on the basis of risk. A credit risk classification system may include categories or designation that refers to varying the degree of credit deterioration such as substandard loans, designation that refers to varying the degree of credit deterioration such as substandard loans, doubtful loans and irrecoverable loans. A classification system typically takes into account the borrower's current financial condition and paying capacity, the current value and reliability of collateral and other factors that affect the prospects for collection of principle and interest. Hence, Bank should maintain reserve of fund as loan loss provision against the loan disbursed. Nepal Rastra Bank has issued the directive relating the provision of loan loss. We have many examples that most of the banks are taken into liquidation due to bad debt or not repayment of the loan by the borrowers. Hence, to relief from this situation NRB has issued the directives by which commercial bank should make some provision against the loan disbursed by them. For this purpose loan categorized as follow and required the certain percentage of reserve in accordance with the classification. Now, let us discuss the classification of loan and percentage required to maintain the provision as directive issued by the NRB.

1. Pass (Performing Loan)

All Loans and Advances the principal of which are not past due or past due for a period up to three months is included in this category. These are classified and defined as Performing Loans.

2. Substandard

All loans and advances the principal of which are past due for a period of more than 3 months and up to 6 months shall be included in this category.

3. Doubtful debt

All loans and advances the principal of which are past due for a period of more than 6 months and up to 1 year shall be included in this category.

1.8.1.6 Loan Loss Provision

NRB issued Directive No. 2 dated 15th March 2001 as revised by their circular dated 14th September 2001 wherein fresh guidelines given for the classification of Loans & Advances including bills purchased and discounted. The required loan loss provisioning on the basis of classification of outstanding credit shall be as follows:

Classification of Loan	**Loss Provisioning**
Pass	1%
Rescheduled/Restructured	12.5%
Substandard	25%
Doubtful	50%
Loss	100%
Only Against Personal Guarantee	Additional 20%

1.8.1.7 Credit Policy and Flow of Credit

Looking at the credit policy of the bank the bank usually flow credit in the three sector

- **Industry Sector:** This sector includes manufacturers of the industrial goods and consumers goods.
- **Trading Sector:** This sector deals with the purchased and sales of finished goods which can be directly consume for the final use or it may be the industrial raw material for the manufacturing industry.
- **Consumer financing:** This type of policy focuses the investment of the bank to the individual citizen to the different sector.

1.8.1.8 Procedure for Application, Appraisal, Sanction / Disbursement of Loan

The various steps involved in the loan appraisal, approval and disbursement process are set out below:

Business plan

A borrower interested in taking a loan should approach the Marketing and Planning Division at the bank and make an application by filling out the project information

sheet available with the above division regional offices. In this the prospective borrower has to furnish the flowing:

–Technical details;

–Proposed financial structure;

-Expected raw material requirement and

–Certain legal information relevant to the proposed project.

The project information sheet (PIS) is to be submitted along with a project feasibility report and documents certifying the legal status of the company.

Processing of Business Plan

In the event of processing of business plan at the branch, the plan is scrutinized by the branch officials related to credit department. They prepare the loan proposal, which includes the feasibility of the plan.

At the central office business plan along with the loan proposal submitted by the branch well recommended by branch in-charge /credit in-charge is scrutinized by a project screening committee headed by the general manager and consisting of deputy general managers' sectoral division chiefs and chiefs of the bank.

1.8.1.9 Loan Application

In the event of processing the loan application at the office, the application is forwarded by the credit department to the concerned sectoral division. Each sectoral division is entrusted with the following functions:

The concerned scrotal division appraises the project, and decides its viability on the basis of technical and financial soundness of the loan proposal, the marketability of the products as well as the proposal credit worthiness of the applicant borrower. Once the viability of the project is ascertained, the credit division at central office takes a decision as of whether the project will be financed solely by concerned bank or by a consortium formed with some other banks.

Age Criteria for co-applicant is 21 years at the time of application received and not older than 75 years at loan maturity. Subsequent to appraisal an appraisal report is tabled before the sanctioning authority for final decision and approval.

1.8.1.10 Loan Sanction

Upon proper scrutiny of the loan appraisal the sanctioning authority approves the proposal and prepares a loan sanction letter. The sanction letter spells out the details of the loan, the amount and its purpose, the manner of disbursement the securities to be pledged against the loan (usually, the entire fixed assets of the project are pledged; extra collateral is taken for working capital loan is for those term loans which are intended to finance a movable assets like machinery) the repayment schedule, and other terms and conditions of financing.

Upon receipt of the approval from sanctioning authority at the branch the credit department issues a credit facility offer letter to the borrower. This letter spells out the details of the loan, the amount and its purpose, details of charges, the manner of disbursement the securities to be pledged against the loan and other terms and conditions to be implemented by the bank and the borrower.

The loan documentation charged charge by the banks is

- NPR 1,500 upto NPR 1 million loan
- NPR 3,000 upto NPR 10 million loan
- NPR 5,000 above NPR 10 million loan

If the borrower is satisfied with the offer the borrower signs the offer letter and the agreement is made. Upon acceptance of the offer of the bank the borrower is required to adhere to the terms and conditions stipulated in the offer letter.

1.8.1.11 Execution of Legal Formalities

When the memo is approved from the top level, some legal formalities are obtained before sanction of loam. The legal formalities are obtained in accordance to the nature of securities and loan. Now, let us discuss about the type of securities and methods of execution.

Moveable securities

Moveable securities include Current Assets, Business Stock, Merchandise Items, Shares, Debentures, Government Bond, Treasury Bills, Fixed Deposits Receipts, Vehicles under Hire Purchase and Export Documents.

Immovable Securities

Immovable Securities are fixed properties such as land, land and building, heavy plant and machines installed within factory premised. Such types of security can not be replaced from one place to other place therefore it is called immovable securities.

So the way of charging according to various types of movable and immovable securities is different. Generally the major way of charging are as mentioned below:

Mortgage

The fixed properties of immovable properties are taken as a security by way of mortgage. Mortgage formality shall be done by preparing mortgage deed. Required information are carried out from Title Deed and from valuation report. Mortgage is the transfer of an interest in specific immovable property for the purpose of securing bank's finance. There are two kinds mortgage as mentioned below:

Equitable Mortgage

Equitable Mortgage is an agreement, express or implied where the interest of property shall pass to the bank as security for a debt due or to become due. It is created by a simple deposit of original title deed with an intent letter of property owner.

Legal Mortgage

In legal Mortgage the property owner transfer his legal title in favor of bank under "Dristi Bandhak" where the bank gets legal estate in the property and he will endow with all sorts of right and remedies if required.

Pledge

Various types of merchandise items and the business stocks can be considered as security for short term credit facilities by way of pledge arrangement. In this arrangement, bank has effective control over the security and the customer cannot allow transacting over the security before clearing dues outstanding. Furthermore,

various types of Government Bond, Treasury Bills and Development Bonds where the lien from the issuing authority is not possible (as observed from the present practice) is also considerable as a pledge item to provide bank advances to its customers. In this situation customers are required to simply pledge the certificates to the bank and bank will make necessary arrangement.

Hypothecation

Banks can make hypothecation fixed assets and current assets of their customers for the purpose of availing loans and advances against the security of the same. Hypothecation documents duly signed by authorized person of Loan company. Goods under hypothecation is under control of customers itself and he is allowed to do the transaction on goods solely, however he is also required to adjust the liability created against hypothecation according to change in the level of stocks/ goods. Under hypothecation there is also an arrangement by which bank can convert the hypothecated item into pledge, if required.

Lien

Various types of documents security such as share certificates of listed company, Fixed Deposit receipt of different banks and other negotiable instruments can also be considered as a security for loans and advances under lien arrangement of the same. It can be done with request to issuing authority by making lien over the same under permission of owner of such documents. The owner of such documents will provide such documents. The owner of such documents will provide such certificates duly discharge in favor of bank along with letter of lien signed by him.

Hire Purchase

Hire Purchase transaction is a king of bailment where the hirer pays money in consideration of the use of goods yet the ownership continues to remain with the bank and who gives the commodities/ goods on hire purchase finance.

After being finalized to grant the loan, bank obtained/ executed various documents to make legally liable to lone for repayment of sanctioned loan. This process is called documentation. Since, different documents are required to be executed accordance to the nature of loan, normally following documents are necessary.

- Promissory Note

- Letter of Request
- Letter of Continuity
- It is filled up for the continue use of those facilities as provided.
- Letter of Arrangement
- Letter of Arrangement is the commitment to the bank by the borrower to arrange the repayment of loan.
- Letter of Disbursement
- Hypothecation of entire current assets and fixed assets.
- Personal guarantee of all the directors and the property owners.
- Mortgage Deed.

Loan Disbursement

Usually, loan is disbursed maintaining a 75:25 loan/equity ratio at any stage of the project. For example, the first disbursement may be made against land and building to the extent of 75%of the total cost of the land and building and the disbursement is made only when the promoter has purchased the land and completed the construction of the building at least up to plinth level through equity financing. Similarly, the bank may disburse loan for the purchase of machinery by opening a letter of credit, ensuring however that out of the total investment, including that to be made for the machinery, 40% is out of once operation are about the start, the concerned sectoral division appoints a team to prepare a project completion report (PCR)

At the time of disbursement of loan bank charged 1% as the service charge of loan amount.

1.8.1.12 Loan Recovery Procedure

After the client enjoys the facility they have to return the fund within the purposed time period. The working capital loan is given for the one-year period and has to renew every year on the renewal request of the client. The repayment schedule of the loan has different method. As mention below:-

- Term loans are granted for a maximum period of 15 years, depending on the nature and debt-servicing ability of the project. And whole amount of principal as well as interest must settle within the given time period.

- Principal dues are payable in monthly installments where as interest is payable quarterly basis.
- A grace period (moratorium) for repayment of principal is granted on the basis of the time required for the project to come in to operation and interest dues during the construction period are capitalized. And this moratorium period up to the 1 year is in the practice of the commercial bank.
- Short-term loans of working capital loans may be granted for a period of 1 to 3 years and are subject to renewal.
- Repayment of interest become due on quarterly basis, as follows:
  - End of Chaitra (Mid April)
  - End of Ashad (Mid July)
  - End of Ashwin (Mid October)
  - End of Poush (Mid January)
- In the event of failure of payment of interest, the interest charged on Ashad (mid-June to mid July) and Paush (Mid December to mid January) will automatically be capitalized after one month and the capitalized interest will carry the same interest rate as on the pertinent loan.
- The payment of the retail lending is based in the EMI (Equal Monthly Installment) basis where the principal and the interest is paid every end if the month. In this method of repayment of the loan the borrower have to pay equal installment every month for the given time period
- If the borrower want to pay the loan before the maturity of the granted loan then the bank charged panel of additional 1% charged form the sanction loan as the premature settlement of the loan. And in generally practice of the commercial banks the prepayment charged are
  - 2% of amount prepaid before 1 year
  - 1% of amount prepaid after 1 year
  - Partial payment allowed after 1 year only
  - Service Charge: 1% of loan amount of loan sanction.

1.8.2 Review of Related Books, Articles and Journal

In this section, effort has been made to examine and review of some related article on different journals, magazines, newspapers and other related books. Commercial

banks, now-a-days, playing a very dominant role for the development of industrial sector, business sector and individual live standard too. Due to open market policy and liberalization policy the establishment and growth of banks has boost the economy of the country.

Banks are currently viewed as catalyst and the key factor in the development of the economy by mobilization of domestic resources. The government in turn is required to regulate their activities and policies such as lending to the private sector, lending to the unemployed people, and creation of entrepreneurship in the society.

Dr. **Mali Ram** in the book "Currency and Banking" defines banking as "banking means accepting deposits for the purpose of lending or investing, the deposits of money from the public, repayable by cheque, drafts, order of otherwise".
The above definition is too narrow and incomplete. However Dr. Mali Ram has tried to make the concept and function of bank to some extent border, since today's banking function cannot be confined only activities as said by the definition.

Dr. **Sunity sharestha** in her article "Lending operation of Commercial bank of Nepal and its impact on GDP" has presented with the objectives to make an analysis of contribution of Commercial Banks, lending to the Gross Domestic Product (GDP) of Nepal. She has set hypothesis that there has been positive impact of lending of commercial banks to the GDP, IN research methodology, she has considered GDP as the dependent variable and various sector of lending are agriculture, industrial, commercial, service and general social sectors as independent variables. A multiple regression techniques have been applied to analyze the contribution.

The multiple analyze has shown that the entire variable except service sector lending has positive impact on GDP. Thus, in conclusion she had accepted the hypothesis i.e. there has been positive impact on GDP and also she has accepted the hypothesis i.e. there has been positive impact by the lending of Commercial banks in various investment (Shrestha, 2055:23-27).

American Institute of Banking defines commercial Banks, as "Commercial Bank is a corporation which accepts demand term loans to business, enterprise, regardless of the scope of its other service."

American Institute of Banking Principal of Bank Operation, USA 1972

Commercial Bank Act 2031 was formulated to facilitate the smooth run of commercial Banks. All the commercial Banks are ones which exchange money, accepts deposits, grants loans and advances.

The Commercial Bank Act 2031 also pointed the function of CBs

Commercial banks provide short-term debts necessary for trade and commerce. They take deposits from the trade and commerce. They take deposits from the public and grant loans in different forms. They purchase and discount the bill of exchange, promissory notes and exchange foreign currencies. They discharge the various functions on behalf of their customers provided that they are paid for their services.

"Banks and financial institutions are the vehicles through which public deposits are mobilized in various development activity i.e. Agricultural, Industry. Trade, Commercial Institution like commercial banks, development banks, financial companies and various micro-financing institution with different model." (Timalsina, 1999: 30)

This thesis mainly focuses on the lending practice and Procedure of Nepalese four commercial banks (i.e. Everest Bank, Nabil Bank, NB Bank And NIC Bank) Hence it is rational to state these articles and reports those may make a clear concept to understand the said topic.

"The investor or whether banks, financial institutions, individuals, private or government sector, most not took the proposal by making decision making without having adequate judgment because sometimes they perform out of norms, related studies, policies and techniques. A project appraisal will best viable only if it has accessed through conscious analysis as well as through thoroughly investment decisions to make its macro and micro level viability effective. (Lamichhane 50th anniversary of NRB, 2063: 125)

He added some test of tips before and after financing:

- Rationality of short fall of funds (requirement of the funds) and goodness of the project proposal.
- The banker also before making any funding should prepare appraisal report by analyzing and assessing the components of project cost and the overall viability.
- The gravity of the capital.
- The banker should try to receive the appropriate financial segments (Loan characteristic) i.e. through overdraft, acceptance facilities, mortgage, and syndicate of through personal efforts.
- The Loan may be secured with the project itself or with clean collateral of on guarantee. The financial task may be facilitated in one currency or number of currencies.
- The interest rate in the loan may be fixed floating or simple calculated or discounted rate based.
- Borrowings and lending activities are based on the rate of cash flow coming from the assets, from financed funds and based also on general strength, security cleanliness and on credit worthiness.
- The borrowers should fulfill some convenience such as to safety the regulation of lenders, to maintain a certain financial rations or to produce essential information on time for the lenders.

"A Loan is Financial Assets resulting from the delivery of cash or to the assets by a lender to a borrower in return for an obligation repay on specified date or dates or on demand."

Usually Loan Comprise:

- Consumer installments, overdrafts and credit card loan.
- Residential mortgages.
- Non personal loans such as commercial loans to business, financial institution, governments and their agencies.
- Direct financing lease
- Other financial arrangements that are in substance loans.

A web site report of **Basel Committee**- A banking supervision committee, the group of ten countries established in 1975 AD. The Base Committee adds "when a bank

becomes a party to the contractual terms comprising a loan and as consequence has legal right to receive principal and interest on the loan, it controls the economic benefits associated with loan. Normally, a bank become a party to the contractual provision that comprise a loan (i.e. acquire legal ownership of the loan) or the date of the advances of funds or repayment to a third party. As a result, a commitment to lend funds neither is nor recognized as an asset on the balance sheet. In certain jurisdictions, the acquisition of legal ownership is viewed more as a process than a discrete event. However providing consideration (the advancement of funds) is typically one of the more important factors constituting ownership."

Khatiwada in 1987 stated that the organized financial system is only a small segment of the overall financial system and in the informal financial system interest rates are neither determined by the free market forces, nor by the authorities but by the monopoly market condition where there exit a few suppliers of credit in relation to a large number of borrowers. Since interest rates are administered and have remained sticky for quite a long period, the statistical relationship between demand for money and the interest has remained insignificant in Nepal (***Khatiwada, 1994, p. 4; S. Poudyal, 1987; G. Sharma, 1987).***

Atreya M. in 2005 describes that the regulatory framework in South Asian Association for Regional Co-operation (SAARC) countries. Author says that the financial systems across the SAARC region show considerable diversity calling the need for harmonization of policies. The author efforts made towards harmonizing the banking policy has explored. The aim his paper is to describe the regulatory framework in SAARC countries.

The author from his academic analysis concluded that the effectiveness of intermediation role played by the banking sector ultimately contributes to the economic development of a country. No. doubt, the monetary and regulatory policies adopted by central banks to regulate and supervise the banks and financial institutions determine the extent of banking sector development. The trend thus far has been towards a more open and liberal policies that help the banking sector grow and flourish. Results visualized are increased competition, internationalization of banking business, economic cooperation and innovation in financial instruments. Banking is

no longer a national phenomenon now. The banking business has crossed the national boundaries and this has created more risks and challenges to the regulatory framework in the SARRC countries and this call the needs for harmonization of banking policies to manage the banking business in this globalizes world.

The establishment of SARRC, economic cooperation initiatives through SAPTA and SAFTA, establishment of SAARC Finance, the concepts of SADB and SAEU are all geared towards building mutual cooperation and development in the SARRC countries. Although some efforts have been made in this direction, more efforts are needed to strengthen the banking environment in SARRC countries. SARRC countries must develop their human resources to make them capable to implement Basel Accord II, strengthened corporate governance system, develop regulatory framework to manage cross-border banking operations, forge partnerships and economic cooperation for better understanding and development and establish system for learning from the rich experience of each other.

1.8.3 Reviews from Previous Thesis

Mr. Ram Krishna Khatiwada (2004) in his thesis entitled, "**Retail Banking an Emerging Trend in India**" has made an effort to analyzing the trend of retail banking product offered by Indian commercial banks and evaluating the contribution in Indian economy. He concluded that there is highly positive correlation co-efficient and co- efficient of determination of above 90% between pre capita GDP and retail banking indicated the direct relationship between them. When one Rs. per capita GDP increase, the retail banking player can enhance its retail banking segment and housing finance segment by Rs.3.26 core and Rs.1.36 core respectively. He finds that the retail banking segment has much low level of NPA then banking industry's NPA. Housing finance segment of the retail banking is the most leading segment. This segment contributes to retail banking by more than 40%. He suggests that there is tremendous upwards potential in this segment. The future of retail banking is dependent on technology facilities reduction in transaction cost and provides the ability to do business involutes. New kinds of management skill are required to mange the retail – landing portfolio.

Mr. Om Bakhati (2006) in his thesis entitled, "**A Comparative Study on Housing Finance of Everest Bank, Nepal Bangladesh Bank limited and Kumari Bank limited.**" concludes that the proportion of housing loan in total loan and advance for all the banks under study is in increasing trend. Among the sample banks, EBL has disbursed higher amount for housing loan. EBL is the pioneer bank in Nepal which initiates the housing loan scheme in Nepal. He suggests that the growth of housing loan depends upon interest rate, so the sample banks are requested to lower down the invest rate and make the procedure of getting loan easy.

Mr. N.M Pradhan (1980) in his thesis entitled, "**A Study on Investment Policy of Nepal Bank ltd**" has emphasized that there is a greater relationship between deposits and loans and advances. He can include that though loan and advance as well as deposits is increasing trend, their increase is not in proportionate manner. Immense increase in deposit had led to little increase in loan and advances due to the increase in the interest rates. His recommendation was to great loan and advances without its lengthy process. He has suggested enhancing banking transactions up to rural sector of the kingdom.

Mr. Ramala Bhattarai (1978) in her thesis entitled "**Lending Policy of Commercial Banks in Nepal**" has made on effort to examine the lending policy of commercial banks. She has concluded that efficient utilization of resources is more important than collection of the same. Lower investment means lower capital formation that hapless economic development of the people and the country. So, she recommended that bank should give emphasis on efficient utilization of resources.

Mr. Jit Bahadur Joshi (1982) in his thesis entitled, "**Lending Policy of Commercial Banks in Nepal**." concludes that commercial banks have collected such resources from people but they are far behind in their utilization. Commercial banks in Nepal are still lazy to play an active role to utilize their resources collected from different sector in accordance with the need of the economy.

Mr. Utam Raj Pant (2006) in his thesis entitled, "**A Study of Commercial Bank Deposit and its Utilization**." He made an attempt to highlight the discrepancy between resource collection and research utilization. He concluded that commercial

banks failure in resource utilization is due to their lending confined to short term only. He recommended the commercial banks to give emphasis also on long and medium term lending for better utilization of the deposit.

Mr. Aryal (2006) in his thesis entitled, "**An Analysis of Retail Leading in Market With Special Reference to Everest Bank limited**" concludes that the to get success in competitive banking environment depositors money must be utilized as loan and advance. The largest items of the bank in the assets sides in loan and advances. If it is neglected, it could be the main causes of liquidity Crisis in the banks and one of the main reasons for a banks failure. He recommended that bank should follow liberal lending policy and invests more and more percentage of total deposit in loan and advances and similarly, maintains more stability in the investment policy.

CHAPTER - TWO
DATA PRESENTATION AND ANALYSIS

2.1 Presentation and Analysis of Data

Present chapter reports the financial and statistical tools, results of sample banks over the sample period through the use of secondary data. It also presents the results of primary data. This study is mostly based on the two aspects. The first part defines the credit policy (Loan Sanction Process) of the bank and the next part defines the implementation of the credit in the different sector. This chapter of thesis also presents the data, facts, figures relating to different aspect of NABIL Bank, NIC Bank, NB Bank and EBL. These available data are tabulated, analyzed and interpreted so that the credit flow of the above bank can be easily understood. Though there are many financial tools but due to some curbs and constraints, only selected tools have been taken to analyze the credit policy of the commercial banks. The types of loans offered by the banking sector have been mentioned in the second chapter as all the banks have identical type of loan in the competitive market. This chapter defines only the credit flow procedure and the different sector of investment.

The second part of the thesis consists of the credit policy implementation. This part describes the credit flow of the bank in the chart and tabular form; later on it is analyzed and interpreted using different measurement tools

2.1.1 Current Ratio / Quick Ratio

It is the ratio of total current assets to total current liabilities calculated by dividing the company's current liabilities. In the service industries like banks doesn't have their stock, so current and quick ratio are same.

$$\text{Current Ratio} = \frac{Current\ \ Assets}{Current\ \ Liabilities}$$

Current assets of commercial banks refers to cash and near cash items like cash and bank balance, money at call and short notice, loans and advances, cash credit, bills discounted, investment, interest receivables, miscellaneous current assets. Similarly current liabilities are fixed deposit, current deposit, call deposit and other deposit of

maturity less than a year, other bill's payable and miscellaneous liabilities. Following table shows the current ratio of NABIL, EBL, NBBL and NICBL

Table No. 2.1

Current Ratio

	NABIL			EBL			NICBL			NBBL		
YEAR	**CA**	**CL**	**Ratio**	**CA**	**CL**	**Ratio**	**CA**	**CL**	**Ratio**	**CA**	**CL**	**Ratio**
2004	10616	3762	2.82	6391	2335	2.74	5024	1990	2.52	9219	4068	2.27
2005	11329	5388	2.1	6750	2902	2.33	5540	2392	2.32	9826	5006	1.96
2006	8819	4147	2.13	8150	3302	2.47	6174	2629	2.35	11171	6148	1.82
2007	13858	6661	2.08	11399	4784	2.38	7983	4450	1.79	11434	6771	1.69
2008	16954	9259	1.83	14227	7364	1.93	9002	5563	1.62	12412	7690	1.61
Mean			2.19			2.37			2.12			1.87
S.D			0.37			0.29			0.39			0.26
C.V			0.17			0.12			0.18			0.14

(Source: Annual Report, Appendix I, II, III, IV)

From the table 2.1, it is noticed that the current ratio of NABIL bank over the study period has been ranged between 1.83 in the year 2008 and 2.82 in year 2004. From the above table, we can see that the change of ratios is in decreasing trend by the change in time. Whereas the ratio of Everest bank is in between 2.74 in year 2004 to 1.93 in year 2007. Similarly, the lowest ratio of NIC bank is 1.62 in the year 2008 and highest ratio is recorded as 2.52 in year 2003. Finally, the ratio of NB Bank is noticed between 2.27 in the year 2003 and 1.61 in the year 2007.

Further, the NIC bank and NABIL bank have less consistency in its current ratio with S.D of 0.39 and 0.37 respectively as compared to other sample banks. Looking at the above ratios, it can be said that the banks are meeting the universal standard principle of current ratio i.e. 2:1, in an average. We can say that NABIL bank, Everest Bank, NIC Bank has maintained the standard but NB Bank has relatively low in the standard of the ratio, so it is difficult to measure the liquidity position. We can say the low liquidity position means that the bank is not getting the good opportunity to invest in the profitable sector and holding the amount.

2.1.2 Loan and Advances to Current Assets Ratio

This ratio measures the relationship between loan and advances to current assets. It shows the banks liquid capacity of lending, discounting and purchasing the bills and loans, cash credit and overdrafts facilities to the customers. In this study loan and advances refers to local and foreign bills discounted and purchased and loans, cash credit and overdraft in local currency as well and inconvertible foreign currency. This ratio is calculated by dividing loans and advances by current assets.

$$\textit{Loan and Advances to Current Assets} = \frac{\text{Loan and Advances}}{\textit{CurrentAssets}}$$

The following table shows the ratios between loan and advances and the current assets of the NABIL Bank, Everest Bank, NIC Bank and NB Bank

Table -2.2

Loan and Advances to Current Assets Ratio

Rs In Million(000000)

	NABIL			EBL			NICBL			NBBL		
Year	**L&A**	**CA**	**Ratio**	**L&A**	**CA**	**Ratio**	**L&A**	**CA**	**Ratio**	**L&A**	**CA**	**Ratio**
2004	8114	10616	0.76	5050	6391	0.79	2563	5024	0.51	7962	9219	0.86
2005	8549	11329	0.75	6096	6750	0.90	3743	5540	0.68	9645	9826	0.98
2006	10947	8819	1.24	7900	8150	0.97	4909	6174	0.80	9627	11171	0.86
2007	13279	13858	0.96	10155	11399	0.89	6659	7983	0.83	8479	11434	0.74
2008	15903	16954	0.94	14100	14227	0.99	9129	9002	1.01	9159	12412	0.74
Mean			0.93			0.91			0.77			0.84
S.D			0.20			0.08			0.19			0.10
C.V			0.21			0.09			0.24			0.12

(Source: Annual Report, Appendix V, VI, VII, VIII)

The above table shows that the loan and advance to current assets ratio of NABIL Bank is highest in the year 2005 i.e. 1.24 and the lowest in the year 2004 is 0.75 whereas EBL has the highest ratio of 0.99 in the year 2007 and lowest of 0.79 in the year 2003. NICBL has highest ratio of 1.01 in the year 2007 and lowest of 0.51 in the year 2003. Similarly, NBBL has ratio between 0.98 and 0.74.

In this way we can observe that there is high variance in the ratio of NICBL and NBBL as the ratio swings heavily during the study period. The highest ratio of 1.24 of NABIL bank is the highest ratio among the above sampled banks.

Among the sampled banks, EBL has more consistency compared to other banks as it has lowest CV of 0.09 and similarly, NABIL, NICBL and NBBL has the C.V of 0.21, 0.24 and 0.12 respectively.

The above table shows that the utilization of current assets in terms of loan and advance of NICBL is relatively low compared among the sample banks. So it should increase the utilization of its current assets in terms of loan and advance

2.1.3 Loan and Advance to Total Deposit Ratio

This ratio measures whether the banks are successfully utilizing outsider's fund in profit generating purpose by extending for credit facilities.

Generally' a high ratio reflects higher efficiency to the utilization of outsiders fund and vice-versa. This ratio is calculated by using following formula.

$$\text{Loan and Advances to Total Deposit Ratio} = \frac{\text{Loan and Advances}}{TotalDeposit}$$

Here, loan and advances refers to total of loan, advance and overdraft and total deposit refers to sum of all kinds of deposit at the bank. The figure of total loan and advances and total deposit is presented in the Table 2.3.

Table - 2.3

Loan and Advances to Total Deposit Ratio

Rs In Million(000000)

	NABIL			EBL			NICBL			NBBL		
Year	**L&A**	**Dep.**	**Ratio**	**L&A**	**Dep.**	**Ratio**	**L&A**	**Dep.**	**Ratio**	**L&A**	**Dep.**	**Ratio**
2004	8114	13438	0.60	5050	6695	0.75	2563	3144	0.82	7962	10584	0.75
2005	8549	14098	0.61	6096	8064	0.76	3743	5146	0.73	9645	12747	0.76
2006	10947	14587	0.75	7900	10098	0.78	4909	6243	0.79	9627	12126	0.79
2007	13279	19348	0.69	10155	13803	0.74	6659	8766	0.76	8479	13015	0.65
2008	15903	23342	0.68	14100	19098	0.74	9129	10068	0.91	9159	9464	0.97
Mean			0.67			0.75			0.80			0.78
S.D			0.06			0.017			0.069			0.12
C.V			0.09			0.023			0.086			0.15

(Source: Annual Report, Appendix IX, X, XI, XII)

Table 2.3 depicts the fact that most of the fund received from the capital surplus unit has been floated in the form of loan and advances to the capital deficit unit. The lowest ratio of loan and advances to deposit is 0.60 of NABIL Bank in the year 2003 and highest ratio is 0.97 of NB Bank in the year 2007.

The C.V of EBL bank is lowest i.e. 0.023 among the sampled bank so it has high level of consistency. Likewise, it can be observed that the NBBL has highest CV i.e. 0.15, which reveals the greater disparity in the ratio.

The table 2.3 shows that the utilization of deposit to loan and advances of NABIL bank is lowest among the sample banks. It will be better for NABIL Bank to increase the portion of loan and advances to earn more interest.

Higher ratio between loan and advances to deposit indicates that the bank is mobilizing high volume of deposit into loan and advances, which results in the positive contribution to profitability. Contradictorily, high ratio between loan and advances to deposit brings the bank in the liquidity risk. There might be the chances, surprisingly, to pay back the customer deposit before maturity. In such cases, higher ratio is less preferred as mobilizing most of the deposit in the form of lending may not meet the liquid obligations, which could occur unexpectedly.

2.1.4 Fixed Deposit (F.D) to Loan and Advances (L&A) Ratio

This ratio of commercial banks indicates, how much of loan and advances are granted against fixed deposit. Fixed deposits are the higher interest rate payable deposits. Hence, commercial bank should utilize the fixed deposits properly. This ratio can be calculated as

$$\textit{Fixed Deposit to Loan and Advance Ratio} = \frac{\text{Fixed Deposit}}{\text{Loan and Advances}}$$

The following table displays the ratio of fixed deposit to loan and advances of NABIL Bank, Everest Bank, NIC bank and NB Bank

Table - 2.4

Fixed Deposit to Loan and Advances Ratio

Rs In Million(000000)

	NABIL BANK			EBL			NIC BANK			NB BANK		
Year	L&A	FD	Ratio	L&A	FD	Ratio	L&A	FD	Ratio	L&A	FD	Ratio
2004	8114	2253	0.28	5050	2803	0.56	2563	1143	0.45	7962	5032	0.63
2005	8549	2311	0.27	6096	2914	0.48	3743	2083	0.56	9645	4876	0.51
2006	10947	2079	0.19	7900	3445	0.44	4909	2931	0.60	9627	3537	0.37
2007	13279	3450	0.26	10155	4298	0.42	6659	4065	0.61	8479	2867	0.34
2008	15903	5435	0.34	14100	5659	0.40	9129	4075	0.45	9159	1578	0.17
Mean			0.27			0.46			0.53			0.40
S.D			0.05			0.06			0.08			0.17
C.V			0.20			0.14			0.15			0.43

(Source: Annual Report, Appendix XIII, XIV, XV, XVI)

The above table shows the total ratio of the fixed deposit to loan and advances. Looking at the average of the five year ratio of total lending from the fixed deposit the average lending of the NABIL bank is lowest among other banks. Cost of deposit is relatively higher for the fixed deposit compared to other sources of deposit. Fixed deposit is termed as safe deposit for the banks because of the predefined maturity. Though the lending from the fixed deposit is safe, NABIL bank is lending only the fewer portions. NIC bank, Everest bank and NB bank have utilized the benefit of the fixed deposit. So they have utilized high portion of the fixed deposit i.e. 0.53, 0.46, 0.40 respectively to the loan and advance. Additionally, NABIL and NB bank have high CVs of 0.20 and 0.43, which reveals that the pattern of lending from the fixed deposit is fluctuating more.

Thus, the above table clearly indicates that the fixed deposit to loan and advances ratio are being efficiently and properly utilized by the Everest and NIC bank. But, NABIL bank requires utilizing the benefit of fixed deposit and invests more the portion of fixed deposit in various productive and profitable sectors. Similarly, the trend of lending from the fixed deposit of NB bank is decreasing remarkably, so, it also needs to keep its eye open to optimize the benefit from fixed deposit.

2.1.5 Saving Deposit (S.D) to Loan and Advance Ratio

This ratio indicates the portion of total saving deposit utilized in loan and advances. Saving deposits are interest paying deposits. So, the banks should utilize them properly. This ratio can be calculated with the help of following formula.

$$\textbf{Saving Deposit to Loan and Advance Ratio} = \frac{\text{Saving Deposit}}{\text{Loan and Advances}}$$

The following table displays the ratio of saving (Plus call) deposit to loan and advances of NABIL Bank, Everest Bank, NIC bank and NB Bank

Table - 2.5

Saving Deposit (with Call) to Loan and Advances Ratio

Rs In Million(000000)

Year	NABIL BANK			EBL			NIC BANK			NB BANK		
	L&A	SD	Ratio	L&A	SD	Ratio	L&A	SD	Ratio	L&A	SD	Ratio
2003	8114	7778	0.96	5050	3186	0.63	2563	1700	0.66	7962	4353	0.55
2004	8549	8796	1.03	6096	4296	0.70	3743	2697	0.72	9645	6435	0.67
2005	10947	10368	0.95	7900	5511	0.70	4909	3016	0.61	9627	7246	0.75
2006	13279	12622	0.95	10155	8223	0.81	6659	4257	0.64	8479	8778	1.04
2007	15903	14149	0.89	14100	10597	0.75	9129	5402	0.59	9159	6739	0.74
Mean			0.96			0.72			0.64			0.75
S.D			0.05			0.07			0.05			0.18
C.V			0.052			0.09			0.08			0.24

(Source: Annual Report, Appendix XVII, XVIII, XIX, XX)

Lending from the saving deposit is also a safe lending because this type of deposit is made by the individual who have excess saving from their income. The chance of withdrawal from the saving deposits is also low.

Looking at the above table NABIL bank has invested highest ratio in the year 2004 of 1.03 and lowest of 0.89 in the year 2007. Everest bank has the highest ratio of 0.81 in year 2006 and lowest of 0.63 in 2003. NIC bank has recorded highest ratio of investment of 0.72 in year 2004 and lowest of 0.59 in 2007. Finally, NB bank has the highest ratio of 1.04 in year 2006 and lowest of 0.55 in 2003.

The average ratio of investments from the saving deposit of NABIL bank is 0.96, which is the highest among the average ratio of other banks. Everest bank and NB

bank have average ratio of 0.72, 0.75 respectively. But NIC bank seems to be the conservative bank which invests only 0.64 from the saving deposit.

The C.V of the NABIL Bank is lowest of 0.052 among other sampled banks, so, we can say that it has the highest consistency. The C.V of the Everest bank and NIC bank has 0.09 and 0.08 respectively. From the above calculation we can say NB bank has low consistency which fluctuates in the high ratio. It also means that NABIL bank is utilizing its saving deposit properly than Everest Bank, NB Bank and NIC Bank.

2.1.6 Current Deposit (C.D) to Loan and Advance Ratio

This ratio indicates the portion of total current deposit utilized in loan and advances. Current deposits are non interest paying deposits. So, the banks should utilize them properly at the same time bank have to aware of heavy withdrawal at any time. Here, margin deposit, credit balance in overdraft accounts and other non interest bearing deposits are considered as the total current deposit. This ratio can be calculated with the help of following formula.

Current Deposit to Loan and Advance Ratio: $\frac{\text{Current Deposit}}{\text{Loan and Advances}}$

Following table shows the ratio of current deposit to loan and advances of NABIL Bank, Everest Bank, NIC bank and NB Bank

Table - 2.6

Current Deposit to Loan and Advances Ratio

Rs In Million(000000)

Year	NABIL			EBL			NICBL			NBBL		
	L&A	CD	Ratio	L&A	CD	Ratio	L&A	CD	Ratio	L&A	CD	Ratio
2004	8114	3407	0.42	5050	706	0.14	2563	301	0.12	7962	1163	0.15
2005	8549	2992	0.35	6096	854	0.14	3743	367	0.10	9645	1437	0.15
2006	10947	3141	0.29	7900	1142	0.14	4909	297	0.06	9627	1343	0.14
2007	13279	3276	0.25	10155	1282	0.13	6659	445	0.07	8479	1369	0.16
2008	15903	3758	0.24	14100	2842	0.20	9129	592	0.06	9159	1147	0.13
Mean			0.31			0.15			0.08			0.15
S.D			0.08			0.03			0.03			0.01
C.V			0.24			0.19			0.33			0.08

(Source: Annual Report, Appendix XXI, XXII, XXIII, XXIV)

By interpreting the above data we can see that NABIL bank has utilized the maximum ratio of current deposit. But the nature of current is non interest payable deposit and can be withdrawal from the bank at any time. So, less amount of investment made from the current deposit more it is benefit to the bank. NRB directive has also clearly mentioned the highest ratio of liquidity should be maintained by the banks.

NABIL bank has highest ratio of investment from the current deposit. In the average of five years sample, it has invested 0.31 to the total Loan and advances. Other sample banks EBL, NICBL and NBBL has invested the lowest portion from the current deposit i.e. 0.15, 0.08 and 0.15 respectively. The C.V of the NB bank has the lowest of 0.08 and has the highest consistency. But C.V of NIC bank is 0.33 showing the lowest consistency among the sample banks.

2.1.7 Non Performing Loan (NPL) to Total Gross Loan Ratio

This ratio indicates the quality of assets by showing the portion of non performing loan to total gross loan and advances. It is one of the tools in CAMEL's model for exploring the assets quality of the bank. As per the directives of NRB, non-performing loan consists of the three categories of loans, namely, substandard loan, doubtful loan and loss loan. Similarly, total gross loans means total of loan and advances with bills purchased and discounted before provisioning.

The ratio of Non-Performing loan to total loan is taken as one of the important tool/indicator in identifying the institutions' soundness. NRB, the governing organization of commercial banks, also monitors this ratio closely. This ratio is calculated with the help of following formula.

$$\text{Non Performing Loan to Total Gross Loan} = \frac{\text{Non Performing Loan}}{\text{Total Gross Loan and Advances}}$$

Lower the ratio means the institution is wise enough in credit administration. So as lower as possible of this ratio is desirable by all the stakeholders of the organization.
Following table shows the ratio of non-performing loan to loan and advances of NABIL Bank, Everest Bank, NIC bank, NB Bank and Banking Industry as a whole.

Table - 2.7

Non Performing Loan to Total Gross Loan Ratio (in %)

Rs In Million(000000), Ratio in %

Year	NABIL BANK			EBL			NIC BANK			NB BANK			Industry
	Loan	NPL	%	Loan	NPL	%	Loan	NPL	%	Loan	NPL	%	%
2004	8114	450	5.54	5050	111	2.20	2563	171	6.66	7962	1013	12.73	28.80
2005	8549	287	3.35	6096	105	1.72	3743	147	3.92	9645	1042	10.81	22.77
2006	10947	145	1.32	7900	129	1.63	4909	185	3.78	9627	1833	19.04	18.94
2007	13279	166	1.25	10155	122	1.20	6659	173	2.60	8479	1040	12.27	14.22
2008	15903	178	1.12	14100	107	0.76	9129	100	1.10	9159	3218	35.13	9.65
Mean			2.52			1.50			3.61			17.99	18.88
S.D			1.93			0.55			2.05			10.09	7.42
C.V			0.77			0.36			0.57			0.56	0.39

Source: NRB Quarterly Bulletin 49, Appendix XXV, XXVI, XXVII, XXVIII, XXIX

From the above table, it is observed that the ratio of NPL to total loan is in decreasing trend except that of NB Bank. The ratio of NABIL Bank is 5.54% in the year 2003 and came down to 1.12% in the year 2007. Similarly, the ratio of EBL is 2.20% in the year 2003 and came significantly down to 0.76% in the year 2007. In the same trend, NIC bank is good enough in reducing the ratio from 6.66% of year 2003 to 1.10% of year 2007. But NB bank's ratio is deviating largely in the study period from 10.81% of year 2004 to 35.13% of year 2007 Comparing among the sample banks, EBL has the lowest average ratio i.e. 1.50%, which reveals banks effectiveness and efficiency in the process of credit administration and recovery. Similarly NABIL, NIC has the average ratio of 2.52% and 3.61% respectively. However NB Bank's average ratio stands out to be 17.99%, which is remarkably high showing management's inefficiency and ineffectiveness.

Comparing the ratio with the industry average ratio, the average ratio of all banks seems to be lower than that of the industry average. But when we look at the data of individual years, the ratio of NB bank is even higher than the industry average in the year 2005 and 2007. Taking help of standard deviation to analyze the above data, EBL has maintained the smooth trend of NPL to total loan ratio i.e. 0.55, which further exhibits the less fluctuation of the ratio during the study period. Similarly NABIL and NICBL have standard deviation of 1.93 and 2.05 respectively, showing

the moderate fluctuation in the above ratio. But standard deviation of NBBL is 10.09, even higher than that of industry i.e.7.42, which shows higher fluctuation in the ratio of NPL to total gross loan.

2.1.8 Loan Loss Provision to Non Performing Loan Ratio

To evaluate the quality of assets of commercial banks, the ratio of loan loss provision to non performing loan is used. It is one of the tools in CAMEL's model for exploring the assets quality of the bank. Here, non-performing loan consists of the three categories of loans, namely, substandard loan, doubtful loan and loss loan. Similarly, loan loss provision means total of applicable provision amount in all kinds of loan and advances with bills purchased and discounted.

The ratio of Loan Loss Provision to Non-Performing loan is taken as one of the important tool/indicator in identifying the institutions' soundness. This ratio is calculated with the help of following formula.

$$\text{Loan Loss Provision to Non Performing Loan Ratio} = \frac{\text{Loan Loss Provision}}{\text{Non Performing Loan}}$$

Following table shows the ratio of Loan Loss Provision to Non Performing Loan of NABIL Bank, Everest Bank, NIC bank and NB Bank.

Table - 2.8

Loan Loss Provision (LLP) to Non Performing Loan (NPL) Ratio

Rs In Million(000000)

Year	NABIL			EBL			NICBL			NBBL		
	LLP	NPL	Ratio	LLP	NPL	Ratio	LLP	NPL	Ratio	LLP	NPL	Ratio
2004	358	449.6	0.80	141	111.2	1.27	193	170.7	1.13	714	1013.3	0.70
2005	359	286.7	1.25	212	104.8	2.02	182	146.6	1.24	996	1042.2	0.96
2006	361	144.5	2.50	281	128.8	2.18	198	185.4	1.07	1839	1832.9	1.00
2007	356	166	2.14	335	121.9	2.75	246	173.1	1.42	3336	1040.3	3.21
2008	357	178.3	2.00	419	107	3.92	187	100.3	1.86	3634	3217.6	1.13
Mean			1.74			2.43			1.34			1.40
S.D			0.69			0.99			0.32			1.02
C.V			0.40			0.41			0.24			0.73

(Source: NRB Bulletin 49, Annual Report, Appendix XXXVIII, XXXIX, XL, XLI)

From the above table, it is observed that the ratio of Loan Loss Provision to Non Performing Loan is found in between of 3.92 of EBL being highest and 0.70 of NBBL being least.

The ratio of NABIL Bank is 0.80 in the year 2003 and gone up to 2.00 in the year 2007. Similarly, the ratio of EBL was 1.27 in the year 2003 and gone significantly up to 3.92 in the year 2007. In the same trend, the ratio of NIC bank was 1.13 in the year 2003 and gone slightly up to 1.86 in year 2007. But NB bank's ratio is deviating largely in the study period from 0.70 of year 2003 to 3.21 of year 2006 and again down to 1.13 in the year 2007.

Comparing among the sample banks, EBL, NABIL, and NICBL seems to be the effective and efficient in the process of credit administration and recovery. In the other hand NBBL is relatively weaker in the management and administration of advancing of loan. So, it is recommended to NBBL for the improvement of recovery process and proper management of credit.

2.1.9 Interest Income to Total Loan and Advances Ratio

This ratio indicates the contribution of loan and advances in operating profitability. In other words, this ratio is used to find the average yield of the assets/lending. Here, Interest income refers to the interest yield from performing assets. Similarly, total loan and advances means total of loan and advances with bills purchased and discounted.

The ratio of interest income to total loan and advances is taken as one of the important tool/indicator in identifying the institutions' position. This ratio is calculated with the help of following formula.

$$\text{Interest Income to Loan and Advances Ratio} = \frac{\text{Interest Income}}{\text{Total Loan and Advances}}$$

Higher the ratio means the institution is generating higher rate of yield in its assets, which is desirable by all the stakeholders of the organization.

Following table shows the ratio of interest income to loan and advances of NABIL Bank, Everest Bank, NIC bank and NB Bank.

Table - 2.9

Interest Income to Loan & Advances Ratio

Rs In Million(000000), Ratio in %

	NABIL BANK			EBL			NIC BANK			NB BANK		
Year	L&A	Int Inc	%	L&A	Int Inc	%	L&A	Int Inc	%	L&A	Int Inc	%
2004	8114	1018	12.55	5050	520	10.30	2563	272	10.61	7962	1014	12.74
2005	8549	1002	11.72	6096	657	10.78	3743	363	9.70	9645	1096	11.36
2006	10947	1069	9.77	7900	719	9.10	4909	458	9.33	9627	877	9.11
2007	13279	1310	9.87	10155	903	8.89	6659	580	8.71	8479	785	9.26
2008	15903	1588	9.99	14100	1144	8.11	9129	726	7.95	9159	998	10.90
Mean			10.78			9.44			9.26			10.67
S.D			1.27			1.09			1.00			1.52
C.V			0.12			0.12			0.11			0.14

Source: Annual Reports, Appendix XXX, XXXI, XXXII, XXXIII

From the table 2.9, it is observed that the trend of interest income to loan and advances ratio is decreasing, which shows the rate of yield is decreasing with the time. In the year 2003, NABIL is having 12.55% of yield, which lows down to 9.99 in the year 2007. Similarly, the yield of EBL was 10.30% in 2003 but decreases to 8.11 while coming to year 2007. Likewise, NICBL also maintained the same trend of decreasing, from 10.61% of 2003 to 7.95% of 2007. But we can notice relatively different trend of the ratio of NBBL, which was 12.74% in 2003 decreases to 9.11 in year 2005 again increases to 10.90 in year 2007.

Further, NABIL and NBBL are found to be the higher yield gaining organization compared to EBL and NICBL. The average ratio of NABIL, NBBL is 10.78 and 10.67 respectively, whereas the average ratio of EBL and NICBL is 9.44 and 9.26 respectively. Hence, NICBL is found to be the lowest yield generating organization from its performing assets.

2.1.10 Net Profit to Total Loan and Advances Ratio

This ratio indicates the contribution of loan and advances in profitability. In other words, this ratio is used to find the yield efficiency of the lending. Here, Net Profit

refers to the profit of the year after deducting necessary provision, tax, bonus and other expenses and liabilities. Similarly, total loan and advances means total of loan and advances with bills purchased and discounted.

The ratio of net profit to total loan and advances is taken as the important tool/indicator in identifying the institutions' position. This ratio is calculated with the help of following formula.

$$\text{Net Profit to Loan and Advances Ratio} = \frac{\text{Net Profit}}{\text{Total Loan and Advances}}$$

Higher the ratio means the institution is generating higher yield in its assets, which is desirable by all the stakeholders of the organization.

Following table shows the ratio of net profit to loan and advances of NABIL Bank, Everest Bank, NIC bank and NB Bank.

Table - 2.10

Net Profit (NP) to Loan & Advances (L&A) Ratio

Rs In Million(000000), Ratio in %

Year	NABIL BANK			EBL			NIC BANK			NB BANK		
	L&A	NP	%	L&A	NP	%	L&A	NP	%	L&A	NP	%
2004	8114	416	5.13	5050	94	1.86	2563	49	1.91	7962	1244	15.62
2005	8549	455	5.32	6096	144	2.36	3743	68	1.82	9645	2.64	0.03
2006	10947	519	4.74	7900	168	2.13	4909	114	2.32	9627	(782)	(8.12)
2007	13279	635	4.78	10155	237	2.33	6659	97	1.46	8479	(1,797)	(21.19)
2008	15903	674	4.24	14100	296	2.10	9129	158	1.73	9159	577	6.30
Mean			4.84			2.16			1.85			(1.47)
S.D			0.41			0.20			0.31			14.03
C.V			0.09			0.09			0.17			(9.53)

(Source: Annual Reports, Appendix XXXIV, XXXV, XXXVI, XXXVII)

From the table 2.10, it is observed that the NABIL bank is making highest net profitability ratio as compared to other sample banks. In the year 2003, NABIL is having 5.13% of yield, which reduces down to 4.24 in the year 2007. Similarly, the yield of EBL was 1.86% in 2003 and increases to 2.10 while coming to year 2007. Likewise, NICBL also maintained the same trend and the ratio remained 1.91% in the year 2003 gone up to 2.32 in the year 2005 but again downs to 1.73% by the year

2007. But we can notice relatively different trend of the ratio of NBBL, which was 15.62% in 2003 decreased to -21.19 in 2006 again increased to 6.30 in year 2007.

Further, NABIL and EBL are found to be the higher profit gaining organization compared to others. The average ratio of NABIL, EBL is 4.84 and 2.16 respectively, whereas the average ratio of NICBL and NBBL is 1.85 and -1.44 respectively. Hence, NBBL is found to be the negative yield generating organization.

2.1.11 Sector wise Loan and Advances

There are various sectors in the market that the bank has an opportunity to invest in. Even NRB have issued in its directives that commercial banks have to invest certain percentage in the deprived and priority sector. So that the backward sector will also get the benefit form the financial facility.

The table below shows the sector wise loan and advances and their ratio in percentage out of the total lending.

Table - 2.11

Sector Wise Loan & Advances

Amount in Million(000000)

Sectors	NABIL		EBL		NICBL		NBBL	
	Amount	**%**	**Amount**	**%**	**Amount**	**%**	**Amount**	**%**
Agriculture	54.5	0.34	55.4	0.39	139.7	1.5	47.7	0.52
Mining	13.9	0.09	11.8	0.08	0	0.0	25.5	0.28
Production	5701.5	35.85	3319.1	23.54	3511.1	38.5	3332.9	36.39
Construction	1923.3	12.09	2086.8	14.80	1698.2	18.6	512.9	5.60
Machinery	163.2	1.03	58.8	0.42	2.3	0.0	150.2	1.64
Transpiration	1467.9	9.23	86.5	0.61	0	0.0	76.3	0.83
Public Service	917.7	5.77	964.9	6.84	252	2.8	1072.7	11.71
Wholesalers	2458.5	15.46	4266.2	30.26	1712.8	18.8	1716.3	18.74
Finance	821.1	5.16	466	3.30	647.5	7.1	535.3	5.84
Service Industry	1260.7	7.93	502.9	3.57	368.4	4.0	952.6	10.40
Consumable	84.6	0.53	228	1.62	41.2	0.5	100.8	1.10
Local Govt.	0	0.00	24.1	0.17	0	0.0	0	0.00
Others	1036.1	6.52	2029.7	14.39	755.5	8.3	635.8	6.94
TOTAL	**15903**	**100%**	**14100**	**100%**	**9128.7**	**100%**	**9159**	**100%**

(Source: NRB Quarterly Bulletin mid- July 2007)

From the above table we can see that there are various sectors that the banks are investing. Almost all the sectors the banks are trying to invest their funds. Up to the mid July 2007 NABIL banks has invested total of 15903 million, Everest Bank has total lending of 14100 million, NIC bank has the lending of 9128.7 million and NBBL has lending of 9159 million. So it is difficult to calculate and analysis data amount wise, researcher has tried to interpret according to the percentage into the various sector.

All the above sampled commercial banks have invested their major portion in the production sector. The NIC banks have made the highest portions in production sector of 38.5%. NBBL and NABIL bank have also investment of 36.39%, 35.85% respectively in the production sector. Everest bank has also invested major portion of lending in production sector of 23.54%. We can say the NIC bank, NBBL and NABIL bank are more constrained in the production sector but Everest bank has slightly diversified the investment in other sectors.

EBL is the only one bank which has invested its fund to the local government of 0.17% out of the total lending. It shows that the ratio of investment in this sector is too low comparative to other sector. But we can say that as a private bank has invested to the local government in the Nepalese banking history.

Further, we can conclude the sector wise lending of sampled commercial banks by saying that productions, constructions, wholesaler & retailers, transportation, communication & public services are the few sectors which consumes higher portion of the lending of commercial banks.

2.1.12 Security wise Loan and Advances

None of the banks invest without the security from clients. Holding the security is to assure the bank in the creation of credit transaction. Bank will recover the fund from the security if the client will not pay back the principal and interest in the due course of time.

The table below shows the total lending and their ratio in percentage through holding various type of security.

Table - 2.12

Security Wise Loan & Advances

Amount in Million(000000)

Security	NABIL		EBL		NICBL		NBBL	
	Amount	**%**	**Amount**	**%**	**Amount**	**%**	**Amount**	**%**
Gold	0.0	0.00	0.0	0.00	4.2	0.05	0.0	0.00
Govt. Securities	41.6	0.26	53.3	0.38	0.0	0.00	1.1	0.01
Non govt. security	1.7	0.01	21.3	0.15	506.7	5.55	8.9	0.10
Fixed A/C receipt	334.7	2.11	555.4	3.94	226.1	2.48	123.9	1.35
Assets Guarantee	11218.7	70.54	12750.0	90.43	7931.3	86.88	7030.2	76.76
On Bills G'tee	2626.3	16.51	56.7	0.40	12.7	0.14	1019.3	11.13
Guarantee	589.3	3.71	543.6	3.86	220.2	2.41	944.0	10.31
Credit Card	62.8	0.40	0.0	0.00	0.0	0.00	0.0	0.00
Earthquake victim	0.0	0.00	0.0	0.00	0.0	0.00	0.0	0.00
Others	1028.0	6.46	119.7	0.85	227.5	2.49	31.5	0.34
Total	**15903**	**100%**	**14100**	**100%**	**9128.7**	**100%**	**9159**	**100%**

(Source: NRB Quarterly Bulletin mid- July 2007)

The table 2.12 shows that there are different types of securities that the bank keeps in the custody at the time grating the loan. Looking at the figure and ratios of the commercial bank in the above table we found that all the banks prefer assets guarantee as the best secured securities. The assets securities include land and buildings, machinery tools, furniture & fixtures, vehicle, other fixed assets, rice, raw jute agriculture etc.

First choice and priority in taking security of NABIL is assets guarantee as it contributes 70.54% out of total security. The second prior security for the NABIL bank is on bills guarantee i.e. 16.51%. On bills guarantee includes domestic bills, foreign bills, import bill, letter of credit, export bill, against export bill and other foreign bills. Banks usually reject the gold and silver as the securities because calculation of the actual market value of gold is difficult and the value of these securities keeps in fluctuating all the time.

Everest bank has accepted highest percentage of assets guarantee as the best securities i.e. 90.43%, and lowest of gold and non-government securities. Similarly NIC bank and NB bank have also invested 86.88% and 76.76% respectively against the security of assets guarantee.

2.2 Major Findings of the Study

Researcher has observed the following important findings from the analysis of secondary data, which are listed below.

- Current ratio of the banks under study is meeting the universal standard principle of current ratio i.e. 2:1, in an average.
- Mean of the current ratio of NABIL, EBL, NICBL and NBBL is 2.19, 2.37, 2.12 and 1.87 respectively. NIC bank and NABIL bank have less consistency in its current ratio with S.D of 0.39 and 0.37 respectively as compared to other sample banks. Looking at the above ratios, we can say that NABIL bank, Everest Bank, NIC Bank has maintained the standard but NB Bank has relatively low in the standard of the ratio. We can say the low liquidity position means that the bank is not getting the good opportunity to invest in the profitable sector and holding the amount.
- In utilizing current assets in terms of loan and advances, EBL has more consistency compared to other banks as it has lowest CV of 0.09 and similarly, NABIL, NICBL and NBBL has the C.V of 0.21, 0.24 and 0.12 respectively.
- It is observed that there is high variance in the ratio of NICBL and NBBL as the ratio swings heavily during the study period. The highest ratio of 1.24 of NABIL bank is the highest ratio among the above sampled banks.
- Utilization of deposit to loan and advances of NABIL bank is lowest among the sample banks. Higher ratio between loan and advances to deposit indicates that the bank is mobilizing high volume of deposit into loan and advances, which results in the positive contribution to profitability. Contradictorily, high ratio between loan and advances to deposit brings the bank in the liquidity risk.
- The lowest ratio of loan and advances to deposit is 0.60 of NABIL Bank in the year 2003 and highest ratio is 0.97 of NB Bank in the year 2007. The C.V of EBL bank is lowest i.e. 0.023 among the sampled bank so it has high level

of consistency. Likewise, it is observed that the NBBL has highest CV i.e. 0.15, which reveals the greater disparity in the ratio.

- It is found that the fixed deposit to loan and advances ratio are being efficiently and properly utilized by the Everest and NIC bank. Similarly, the trend of lending from the fixed deposit of NB bank is decreasing remarkably. The five year ratio of total lending to fixed deposit shows the average lending of the NABIL bank is lowest among other banks.
- Though the lending from the fixed deposit is safe, NABIL bank is lending only the fewer portions. NIC bank, Everest bank and NB bank have utilized the benefit of the fixed deposit. So they have utilized high portion of the fixed deposit i.e. 0.53, 0.46, 0.40 respectively to the loan and advance. Additionally, NABIL and NB bank have high CVs of 0.20 and 0.43, which reveals that the pattern of lending from the fixed deposit is fluctuating more.
- From the ratio of lending to saving deposit, it is revealed that NB bank has low consistency which fluctuates in the high ratio. It also means that NABIL bank is utilizing its saving deposit properly than Everest Bank, NB Bank and NIC Bank.
- The average ratio of investments from the saving deposit of NABIL bank is 0.96, which is the highest among the average ratio of other banks. Everest bank and NB bank have average ratio of 0.72, 0.75 respectively. But NIC bank seems to be the conservative bank which invests only 0.64 from the saving deposit. The C.V of the NABIL Bank is lowest of 0.052 among other sampled banks, showing highest consistency. The C.V of the Everest bank and NIC bank has 0.09 and 0.08 respectively.
- From the ratio of lending to current deposit, it is found that NABIL bank has highest ratio of investment from the current deposit. In the average of five years sample, it has invested 0.31 to the total Loan and advances. Other sample banks EBL, NICBL and NBBL has invested the lowest portion from the current deposit i.e. 0.15, 0.08 and 0.15 respectively. The C.V of the NB bank has the lowest of 0.08 and has the highest consistency. But C.V of NIC bank is 0.33 showing the lowest consistency among the sample banks.
- The ratio of Non-Performing Loan to Total Loan is in decreasing trend except that of NB Bank. The ratio of NABIL Bank is 5.54% in the year 2003 and

came down to 1.12% in the year 2007. Similarly, the ratio of EBL is 2.20% in the year 2003 and came significantly down to 0.76% in the year 2007. In the same trend, NIC bank is good enough in reducing the ratio from 6.66% of year 2003 to 1.10% of year 2007. But NB bank's ratio is deviating largely in the study period from 10.81% of year 2004 to 35.13% of year 2007

- Comparing among the sample banks, EBL has the lowest average ratio i.e. 1.50%, which reveals banks effectiveness and efficiency in the process of credit administration and recovery. Similarly NABIL, NIC has the average ratio of 2.52% and 3.61% respectively. However NB Bank's average ratio stands out to be 17.99%, which is remarkably high showing management's inefficiency and ineffectiveness.
- Comparing the ratio with the industry average ratio, the average ratio of all banks seems to be lower than that of the industry average. But when we look at the data of individual years, the ratio of NB bank is even higher than the industry average in the year 2005 and 2007
- EBL has maintained the smooth trend of NPL to total loan ratio i.e. 0.55, which further exhibits the less fluctuation of the ratio during the study period. Similarly NABIL and NICBL have standard deviation of 1.93 and 2.05 respectively, showing the moderate fluctuation in the above ratio. But standard deviation of NBBL is 10.09, even higher than that of industry i.e.7.42, which shows higher fluctuation in the ratio of NPL to total gross loan.
- From the ratio of Loan Loss Provision to Non Performing Loan, it is found that EBL, NABIL and NICBL seem to be the effective and efficient in the process of credit administration and recovery. In the other hand NBBL is relatively weaker in the management and administration of advancing of loan.
- It is observed that the ratio of Loan Loss Provision to Non Performing Loan is found in between of 3.92 of EBL being highest and 0.70 of NBBL being least. The ratio of NABIL Bank is 0.80 in the year 2003 and gone up to 2.00 in the year 2007. Similarly, the ratio of EBL was 1.27 in the year 2003 and gone significantly up to 3.92 in the year 2007. In the same trend, the ratio of NIC bank was 1.13 in the year 2003 and gone slightly up to 1.86 in year 2007. But NB bank's ratio is deviating largely in the study period from 0.70 of year 2003 to 3.21 of year 2006 and again down to 1.13 in the year 2007.

- The trend of interest income to loan and advances ratio is decreasing, which shows the rate of yield is decreasing with the time. In the year 2003, NABIL is having 12.55% of yield, which lows down to 9.99 in the year 2007. Similarly, the yield of EBL was 10.30% in 2003 but decreases to 8.11 while coming to year 2007. Likewise, NICBL also maintained the same trend of decreasing, from 10.61% of 2003 to 7.95% of 2007. But we can notice relatively different trend of the ratio of NBBL, which was 12.74% in 2003 decreases to 9.11 in year 2005 again increases to 10.90 in year 2007.
- Further, NABIL and NBBL are found to be the higher yield gaining organization compared to EBL and NICBL. The average ratio of NABIL, NBBL is 10.78 and 10.67 respectively, whereas the average ratio of EBL and NICBL is 9.44 and 9.26 respectively. Hence, NICBL is found to be the lowest yield generating organization from its performing assets.
- From the ratio of net profit to loan and advances, it is observed that the NABIL bank is making highest net profitability ratio as compared to other sample banks.
- In the year 2003, NABIL is having 5.13% of yield, which reduces down to 4.24 in the year 2007. Similarly, the yield of EBL was 1.86% in 2003 and increases to 2.10 while coming to year 2007. Likewise, NICBL also maintained the same trend and the ratio remained 1.91% in the year 2003 gone up to 2.32 in the year 2005 but again downs to 1.73% by the year 2007. But we can notice relatively different trend of the ratio of NBBL, which was 15.62% in 2003 decreased to -21.19 in 2006 again increased to 6.30 in year 2007. The average ratio of NABIL, EBL is 4.84 and 2.16 respectively, whereas the average ratio of NICBL and NBBL is 1.85 and -1.44 respectively. Hence, NBBL is found to be the negative yield generating organization.
- From the analysis of sector wise loan & advances, it is noticed that productions, constructions, wholesaler & retailers, transportation, communication & public services are the few sectors which consumes higher portion of the lending of commercial banks. Up to the mid July 2007 NABIL banks has invested total of 15903 million, Everest Bank has total lending of 14100 million, NIC bank has the lending of 9128.7 million and NBBL has lending of 9159 million.

- All sampled banks have invested their major portion in the production sector. The NIC banks have made the highest portions in production sector of 38.5%. NBBL and NABIL bank have also investment of 36.39%, 35.85% respectively in the production sector. Everest bank has also invested major portion of lending in production sector of 23.54%. We can say the NIC bank, NBBL and NABIL bank are more constrained in the production sector but Everest bank has slightly diversified the investment in other sectors. EBL is the only one bank which has invested its fund to the local government of 0.17% out of the total lending. It shows that the ratio of investment in this sector is too low comparative to other sector.
- From the analysis of security wise loan & advances, it is noticed that there are different types of securities that the bank keeps in the custody at the time granting the loan. Looking at the figure and ratios, we found that all the banks prefer assets guarantee as the best secured.
- First choice and priority in taking security of NABIL is assets guarantee as it contributes 70.54% out of total security. The second prior security for the NABIL bank is on bills guarantee i.e. 16.51%. On bills guarantee includes domestic bills, foreign bills, import bill, letter of credit, export bill, against export bill and other foreign bills. Banks usually reject the gold and silver as the securities because calculation of the actual market value of gold is difficult and the value of these securities keeps in fluctuating all the time. Everest bank has accepted highest percentage of assets guarantee as the best securities i.e. 90.43%, and lowest of gold and non-government securities. Similarly NIC bank and NB bank have also invested 86.88% and 76.76% respectively against the security of assets guarantee.

CHAPTER - THREE
CONCLUSION AND RECOMMENDATIONS

This chapter is the final chapter of the study. Conclusions and Recommendations are the two heads included in this chapter.

3.1 Conclusion

This study "Credit Policy and Its Implementation in Nepalese Commercial Banks" tried to analyzed and draw out the existing situation of credit / lending procedure, the relationship between deposits and loan and advances, the study of classification of loan and advances, provision for loan and advances and its effect in profitability, examine the utilization of resources in various sectors based on the data provided in the financial statement as well as other concerned information. Present study is successful to explore the findings of the result designed for the study various statistical tools were used as requirements of nature of data. A secondary as well as primary source of information was used for analysis of data. Based on the data analysis and finding of the result, the conclusion can be drawn as:

From this study, the researcher concludes that lending activities in Nepal is remarkably increasing. Bank lending has started playing an important role in economic development of the country. In response to this there have been active efforts within the Nepalese banks to be more focused on the financial products and services.

Again, the researcher found that the Nepalese banks need to remain in the competition in lending, banks will need to operate efficiently, package and deliver products on time, leveraging the multiple channels of delivery such as the internet, mobile banking, e-cash and the ATMs. The future of lending is dependent on technology, marketing and capital employment on the sector. Technology facilitates reduction in transaction cost and provides the ability to do business in volumes. Banks have to prepare themselves to face a soft interest regime. New kinds of management skills are required to manage the lending portfolio. Banks are competing in the lending products

on the basis of product innovation, rationalization of service charges, competitive pricing and simplified procedures for documentation.

Further, researcher has found that the consumer financing and manufacturing sectors are the most secure sector of lending. It is also found that the common security that the bank demands at the time of granting the loan is fixed assets followed by government bond. Low interest rate is the most motivating factor to get the loan in the market followed by promotion & advertisement campaign. Tedious and lengthy legal procedure is the main barrier in the growth of lending and availing credit facilities. Irregular follow up and inspection in the site visit are most important reason that leads to the NPA. Economic and industrial recession is the prime external factors to increase NPA. Bank's first procedure to reduce the NPA is the regular follow up to the client forcing them to pay back all the due amount the second alternative is to rebate the interest amount and forcing to the client to pay the principal amount immediately. Finally, It is noticed that the decision making authority is hold by the top level and rest of the employee is exercise the policy decided by the top management.

3.2 Recommendations

The following recommendations are drawn from the findings and conclusion of the study

1. Lending Procedure should be short

It is found that the bank's procedure in term of lending is too lengthy. Commercial banks are established in the motive of profit earning from secure lending. So these institutions try to gather more and more information and collateral from the borrower which ultimately consumes more time. It is recommended to the bank to go to the short procedure of lending so that the borrower will get the necessary fund on time.

2. Need to grab more benefit from Fixed Deposit

Fixed deposits are that type of deposit which can be withdrawal at the time of maturity only. So, the banks are advice to utilize the maximum benefit from the nature of fixed deposit by investing in the long term loans.

3. Need to Invest Small Entrepreneur Development Program

Talking all in all, it is recommended that transaction of commercial banks has concentrated with big clients, large group of traders, business networks and large industries. Loan should go to those who are economically backward and uplifting the condition of these orphan people. So bank should come forward to increase the number of clients, develop entrepreneurs, and diversify its business with large no to small investors according with investing to small entrepreneur development program.

4. Need to Invest in Productive Area that utilized the Natural Resources

Nepal is rich in natural resources but these resources are not properly utilized due to lack of financial support and technical assistant. Numerous opportunities like electricity, tourism mines etc are unused due to the lack of financial support. So banks have to divert their investment in the natural resources too.

5. Needs to Diversify Lending

Though the banks are establishment to earn the profit but besides profit making it has to invest in those sector where the society is really in need of investment. Analyzing in the previous chapter it is found that most portions of the investment is made in the service or retail sector only. So it is recommended to the bank to invest in other sector too. Over concentration of lending reveals the excessive level of risk. Hence bank should take the steps to diversify its lending. So that risk can be minimized and small borrowers are promoted. Also bank should develop the concept of micro financing. In additional, commercial banks are recommended to the group financing there by diversifying new avenues rather than focusing merely in one sector.

6. Need to reduce spread rate

Since, interest rate charged by the Joint Venture Banks is little higher. The spread rate between the lending to the deposit is 7% to 9%. This higher spread rate doesn't show good image for the commercial bank among the Nepalese people. The interest rate of the commercial banks in the dopiest and lending is not attractive. The interest rate in the deposit is too low and interest rate in the lending is too high. NRB has also mention in its directive that the spread rate should not be higher than 5%.

7. Preference to Support Short Term Lending

Considering the present scenario and risk management, it is justifies that risk can be minimized through short term lending than long term. Hence preference to be given for short trade financing and discouraging long term loan finance and also focusing multiple returnable loan rather than dry as far as possible.

8. Explore the un-banked sectors

Banks should not only concentrate on the city, valley but they also have to find and serve the un-banked areas. Banks should increase effort to cover the wide areas by increasing the branch network as well more geographical coverage. In the new area, bank should make effort to tap these areas consumer by providing the product suitable and reasonable for them rather than copied product.

9. Target the agricultural sector

The world is now facing problem from the scarcity for the food. As a result of which price for food is rising day by day. Fortunately, Nepal is the agricultural country, so the financial players should focus on this part as a corporate social responsibility. To tap these consumer, agriculture related financial product like Agricultural financing, micro credit should be introduced.

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APPENDIX - I

Work sheet for the calculation of Mean, Standard deviation and coefficient of NABIL Bank considering current assets (CA) and current liability (CL)

YEAR	CA	CL	RATIO (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	10,616	3,762	2.82	0.63	0.3969
2005	11,329	5,388	2.10	-0.09	0.0081
2006	8,819	4,147	2.13	-0.06	0.0036
2007	13,858	6,661	2.08	-0.11	0.0121
2008	16,954	9,259	1.83	-0.36	0.1296
Total			**∑ *X* =10.96**		**∑ (*X*- $\overline{X}$)² = 0.5503**

$$\text{Current Ratio} = \frac{Current\ \ Assets}{Current\ \ Liabilities}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{10.96}{5} = \mathbf{2.19}$$

$$\mathbf{(S.D)^{\pm}} = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.5503}{5-1}} = \mathbf{0.37}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.37}{2.19} = \mathbf{0.17}$$

Where,

CA= Current Assets

CL= Current Liability

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-II

Work sheet for the calculation of Mean, Standard deviation and coefficient of Everest Bank considering current assets (CA) and current liability (CL)

YEAR	CA	CL	RATIO (*X*)	$(X-\overline{X})$	$(X-\overline{X})^2$
2004	6,391	2,335	2.74	0.37	0.1369
2005	6,750	2,902	2.33	-0.04	0.0016
2006	8,150	3,302	2.47	0.10	0.0100
2007	11,399	4,784	2.38	0.01	0.0001
2008	14,227	7,364	1.93	-0.44	0.1936
Total			**$\sum X$ =11.85**		**$\sum(X-\overline{X})^2$ = 0.3422**

$$\text{Current Ratio} = \frac{Current\ \ Assets}{Current\ \ Liabilities}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{11.85}{5} = \mathbf{2.37}$$

$$\textbf{(S.D)}^{\pm} = \sqrt{\frac{\sum\left(Xn-\overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.3422}{5-1}} = \mathbf{0.29}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.29}{2.37} = \mathbf{0.12}$$

Where,

CA= Current Assets

CL= Current Liability

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - III

Work sheet for the calculation of Mean, Standard deviation and coefficient of NIC Bank considering current assets (CA) and current liability (CL)

YEAR	CA	CL	RATIO (*X*)	∑ (*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	5,024	1,990	2.52	0.40	0.1600
2005	5,540	2,392	2.32	0.20	0.0400
2006	6,174	2,629	2.35	0.23	0.0529
2007	7,983	4,450	1.79	-0.33	0.1089
2008	9,002	5,563	1.62	-0.50	0.2500
Total			**∑ *X* =10.60**		**∑(*X*- $\overline{X}$)² =0.6118**

$$\text{Current Ratio} = \frac{Current\ \ Assets}{Current\ \ Liabilities}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{10.60}{5} = \mathbf{2.12}$$

$$\mathbf{(S.D)^{\pm}} = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.6118}{5-1}} = \mathbf{0.39}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.39}{2.12} = \mathbf{0.18}$$

Where,

CA= Current Assets

CL= Current Liability

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - IV

Work sheet for the calculation of Mean, Standard deviation and coefficient of NB Bank considering current assets (CA) and current liability (CL)

YEAR	CA	CL	RATIO (*X*)	∑ (*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	9,219	4,068	2.27	0.40	0.1600
2005	9,826	5,006	1.96	0.09	0.0081
2006	11,171	6,148	1.82	-0.05	0.0025
2007	11,434	6,771	1.69	-0.18	0.0324
2008	12,412	7,690	1.61	-0.26	0.0676
Total			**∑ *X* = 9.35**		**∑(*X*- $\overline{X}$)² =0.2706**

$$\text{Current Ratio} = \frac{Current\ \ Assets}{Current\ \ Liabilities}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{9.35}{5} = \mathbf{1.87}$$

$$\textbf{(S.D)}^{\pm} = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.2706}{5-1}} = \mathbf{0.26}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.26}{1.87} = \mathbf{0.14}$$

Where,

CA= Current Assets

CL= Current Liability

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-V

Work sheet for the calculation of Mean, Standard deviation and coefficient of Nabil Bank considering Loan and Advances (LA) and Current Assets (CA)

YEAR	L & A	CA	RATIO (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	8,114	10,616	0.76	-0.17	0.0289
2005	8,549	11,329	0.75	-0.18	0.0324
2006	10,947	8,819	1.24	0.31	0.0961
2007	13,279	13,858	0.96	0.03	0.0009
2008	15,903	16,954	0.94	0.01	0.0001
Total			**∑*X* = 4.65**		**∑(*X*- $\overline{X}$)² = 0.1584**

Loan and Advances to Current Assets= $\frac{\text{Loan and Advances}}{\text{Current Assets}}$

Mean ($\overline{X}$) = $\frac{\sum x}{N} = \frac{4.65}{5}$ = **0.93**

(S.D)± = $\sqrt{\frac{\sum\left(Xn-\overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.1584}{5-1}}$ **= 0.20**

CV = $\frac{\pm}{\overline{X}} = \frac{0.20}{0.93}$ = **0.21**

Where,

CA= Current Assets

L &A=Loan and Advances

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-VI

Work sheet for the calculation of Mean, Standard deviation and coefficient of Everest Bank considering Loan and Advances (LA) and Current Assets (CA)

YEAR	L & A	CA	RATIO (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	5,050	6,391	0.79	-0.12	0.0144
2005	6,096	6,750	0.90	-0.01	0.0001
2006	7,900	8,150	0.97	0.06	0.0036
2007	10,155	11,399	0.89	-0.02	0.0004
2008	14,100	14,227	0.99	0.08	0.0064
Total			**∑ *X* = 4.54**		**∑ (*X*- $\overline{X}$)² = 0.0249**

Loan and Advances to Current Assets= $\frac{\text{Loan and Advances}}{\text{Current Assets}}$

Mean ($\overline{X}$) = $\frac{\sum x}{N}$ = $\frac{4.54}{5}$ = **0.91**

(S.D)$\pm$ = $\sqrt{\frac{\sum\left(Xn-\overline{X}\right)^2}{n-1}}$ = $\sqrt{\frac{0.0249}{5-1}}$ **= 0.08**

CV = $\frac{\pm}{\overline{X}}$ = $\frac{0.08}{0.91}$ = **0.09**

Where,

CA= Current Assets

L &A=Loan and Advances

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-VII

Work sheet for the calculation of Mean, Standard deviation and coefficient of NIC Bank considering Loan and Advances (LA) and Current Assets (CA)

YEAR	L&A	CA	RATIO (*X*)	$(X-\overline{X})$	$(X-\overline{X})^2$
2004	2,563	5,024	0.51	-0.26	0.0676
2005	3,743	5,540	0.68	-0.09	0.0081
2006	4,909	6,174	0.80	0.03	0.0009
2007	6,659	7,983	0.83	0.06	0.0036
2008	9,129	9,002	1.01	0.24	0.0576
Total			**$\sum X$ =3.83**		**$\sum (X-\overline{X})^2$ = 0.1378**

Loan and Advances to Current Assets= $\frac{\text{Loan and Advances}}{\text{Current Assets}}$

Mean ($\overline{X}$) = $\frac{\sum x}{N}$ = $\frac{3.83}{5}$ = **0.77**

(S.D) $\pm = \sqrt{\frac{\sum (Xn-\overline{X})^2}{n-1}} = \sqrt{\frac{0.1378}{5-1}}$ **= 0.19**

CV = $\frac{\pm}{\overline{X}}$ = $\frac{0.19}{0.77}$ = **0.24**

Where,

CA= Current Assets

L &A=Loan and Advances

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-VIII

Work sheet for the calculation of Mean, Standard deviation and coefficient of NB Bank considering Loan and Advances (LA) and Current Assets (CA)

YEAR	L&A	CA	RATIO (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	7,962	9,219	0.86	0.02	0.0004
2005	9,645	9,826	0.98	0.14	0.0196
2006	9,627	11,171	0.86	0.02	0.0004
2007	8,479	11,434	0.74	-0.10	0.0100
2008	9,159	12,412	0.74	-0.10	0.0100
Total			**∑ *X* = 4.18**		**∑ (*X*- $\overline{X}$)² = 0.0404**

Loan and Advances to Current Assets= $\frac{\text{Loan and Advances}}{\text{Current Assets}}$

Mean ($\overline{X}$) = $\frac{\sum x}{N}$ = $\frac{4.18}{5}$ = **0.84**

(S.D)± = $\sqrt{\frac{\sum (Xn - \overline{X})^2}{n-1}}$ = $\sqrt{\frac{0.0404}{5-1}}$ **= 0.10**

CV = $\frac{\pm}{\overline{X}}$ = $\frac{0.10}{0.84}$ = **0.12**

Where,

CA= Current Assets

L &A=Loan and Advances

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - IX

Work sheet for the calculation of Mean, Standard deviation and coefficient of Nabil Bank considering Loan and Advances (L&A) and Total Deposit

YEAR	L&A	Deposit	RATIO (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	8114	13438	0.60	-0.07	0.0049
2005	8549	14098	0.61	-0.06	0.0036
2006	10947	14587	0.75	0.08	0.0064
2007	13279	19348	0.69	0.02	0.0004
2008	15903	23342	0.68	0.01	0.0001
Total			**∑ *X* =3.33**		**∑ (*X*- $\overline{X}$)² = 0.0154**

$$\text{Loan and Advances to Total Deposit} = \frac{\text{Loan and Advances}}{\text{Total Deposit}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{3.33}{5} = \mathbf{0.67}$$

$$\mathbf{(S.D)} \pm = \sqrt{\frac{\sum (Xn - \overline{X})^2}{n-1}} = \sqrt{\frac{0.0154}{5-1}} = \mathbf{0.06}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.06}{0.67} = \mathbf{0.09}$$

Where,

L &A=Loan and Advances

Deposits= Total Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - X

Work sheet for the calculation of Mean, Standard deviation and coefficient of Everest Bank considering Loan and Advances (L&A) and Total Deposit

YEAR	L&A	Deposit	RATIO (*X*)	$(X-\overline{X})$	$(X-\overline{X})^2$
2004	5050	6695	0.75	0.00	0.0000
2005	6096	8064	0.76	0.01	0.0001
2006	7900	10098	0.78	0.03	0.0009
2007	10155	13803	0.74	-0.01	0.0001
2008	14100	19098	0.74	-0.01	0.0001
Total			**$\sum X$ =3.77**		**$\sum (X-\overline{X})^2$ = 0.0012**

$$\text{Loan and Advances to Total Deposit} = \frac{\text{Loan and Advances}}{\text{Total Deposit}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{3.77}{5} = \mathbf{0.75}$$

$$\textbf{(S.D)}\pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.0012}{5-1}} = \mathbf{0.017}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.017}{0.75} = \mathbf{0.023}$$

Where,

L &A=Loan and Advances

Deposits= Total Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XI

Work sheet for the calculation of Mean, Standard deviation and coefficient of NIC Bank considering Loan and Advances (L&A) and Total Deposit

YEAR	L&A	Deposit	RATIO (*X*)	$(X-\bar{X})$	$(X-\bar{X})^2$
2004	2563	3144	0.82	0.02	0.0004
2005	3743	5146	0.73	-0.07	0.0049
2006	4909	6243	0.79	-0.01	0.0001
2007	6659	8766	0.76	-0.04	0.0016
2008	9129	10068	0.91	0.11	0.0121
Total			**$\sum X$ =4.01**		**$\sum (X-\bar{X})^2$ = 0.0191**

$$\text{Loan and Advances to Total Deposit} = \frac{\text{Loan and Advances}}{\text{Total Deposit}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{4.01}{5} = \mathbf{0.80}$$

$$\textbf{(S.D)}\pm = \sqrt{\frac{\sum \left(Xn - \bar{X}\right)^2}{n-1}} = \sqrt{\frac{0.0191}{5-1}} = \mathbf{0.069}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{0.069}{0.80} = \mathbf{0.086}$$

Where,

L &A=Loan and Advances

Deposits= Total Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XII

Work sheet for the calculation of Mean, Standard deviation and coefficient of NB Bank considering Loan and Advances (L&A) and Total Deposit

YEAR	L&A	Deposit	RATIO (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)^2
2004	7962	10584	0.75	-0.03	0.0009
2005	9645	12747	0.76	-0.02	0.0004
2006	9627	12126	0.79	0.01	0.0001
2007	8479	13015	0.65	-0.13	0.0169
2008	9159	9464	0.97	0.19	0.0361
Total			**∑ *X* =3.92**		**∑ (*X*- $\overline{X}$)^2 = 0.0544**

$$\text{Loan and Advances to Total Deposit} = \frac{\text{Loan and Advances}}{\text{Total Deposit}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{3.92}{5} = \mathbf{0.78}$$

$$\textbf{(S.D)}\pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.0544}{5-1}} = \mathbf{0.12}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.12}{0.78} = \mathbf{0.15}$$

Where,

L &A=Loan and Advances

Deposits= Total Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-XIII

Work sheet for the calculation of Mean, Standard deviation and coefficient of Nabil Bank considering Fixed Deposit (FD) to Loan and Advances (L&A)

YEAR	L&A	FD	RATIO (*X*)	$(X-\overline{X})$	$(X-\overline{X})^2$
2004	8113.68	2252.60	0.28	0.01	0.0001
2005	8548.66	2310.60	0.27	0.00	0.0000
2006	10946.74	2078.60	0.19	-0.08	0.0064
2007	13278.78	3450.20	0.26	-0.01	0.0001
2008	15903.00	5435.20	0.34	0.07	0.0049
Total			**$\sum X$ =1.34**		**$\sum (X-\overline{X})^2$ = 0.0115**

$$\text{Fixed Deposit to Loan and Advances} = \frac{\text{Fixed Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{1.34}{5} = \mathbf{0.27}$$

$$\mathbf{(S.D)\pm} = \sqrt{\frac{\sum (Xn - \overline{X})^2}{n-1}} = \sqrt{\frac{0.0115}{5-1}} = \mathbf{0.05}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.05}{0.27} = \mathbf{0.20}$$

Where,

L &A=Loan and Advances

FD= Fixed Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-XIV

Work sheet for the calculation of Mean, Standard deviation and coefficient of Everest Bank considering Fixed Deposit (FD) to Loan and Advances (L&A)

YEAR	L&A	FD	RATIO (*X*)	∑ (*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	5,050	2,803	0.56	0.10	0.0100
2005	6,096	2,914	0.48	0.02	0.0004
2006	7,900	3,445	0.44	-0.02	0.0004
2007	10,155	4,298	0.42	-0.04	0.0016
2008	14,100	5,659	0.40	-0.06	0.0036
Total			**∑ *X* = 2.29**		**∑ (*X*- $\overline{X}$)² = 0.0160**

$$\text{Fixed Deposit to Loan and Advances} = \frac{\text{Fixed Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{2.29}{5} = \mathbf{0.46}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.0160}{5-1}} = \mathbf{0.06}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.06}{0.46} = \mathbf{0.14}$$

Where,

L &A=Loan and Advances

FD= Fixed Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-XV

Work sheet for the calculation of Mean, Standard deviation and coefficient of NIC Bank considering Fixed Deposit (FD) to Loan and Advances (L&A)

YEAR	L&A	FD	RATIO (*X*)	$\sum (X - \bar{X})$	$(X - \bar{X})^2$
2004	2,563	1,143	0.45	-0.09	0.0081
2005	3,743	2,083	0.56	0.03	0.0009
2006	4,909	2,931	0.60	0.07	0.0049
2007	6,659	4,065	0.61	0.08	0.0064
2008	9,129	4,075	0.45	-0.08	0.0064
Total			**$\sum X$ = 2.66**		**$\sum (X - \bar{X})^2$ = 0.0267**

$$\text{Fixed Deposit to Loan and Advances} = \frac{\text{Fixed Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{2.66}{5} = \mathbf{0.53}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum (Xn - \bar{X})^2}{n-1}} = \sqrt{\frac{0.0267}{5-1}} = \mathbf{0.08}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{0.08}{0.53} = \mathbf{0.15}$$

Where,

L &A=Loan and Advances

FD= Fixed Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-XVI

Work sheet for the calculation of Mean, Standard deviation and coefficient of NB Bank considering Fixed Deposit (FD) to Loan and Advances (L&A)

YEAR	L&A	FD	RATIO (*X*)	∑ (*X*- $\overline{X}$)	(*X*- $\overline{X}$)^2
2004	7,962	5,032	0.63	0.23	0.0529
2005	9,645	4,876	0.51	0.10	0.0100
2006	9,627	3,537	0.37	-0.04	0.0016
2007	8,479	2,867	0.34	-0.06	0.0036
2008	9,159	1,578	0.17	-0.23	0.0529
Total			**∑ *X* = 2.02**		**∑ (*X*- $\overline{X}$)^2 = 0.1210**

$$\text{Fixed Deposit to Loan and Advances} = \frac{\text{Fixed Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{2.02}{5} = \mathbf{0.40}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.1210}{5-1}} = \mathbf{0.17}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.17}{0.40} = \mathbf{0.43}$$

Where,

L &A=Loan and Advances

FD= Fixed Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-XVII

Work sheet for the calculation of Mean, Standard deviation and coefficient of Nabil Bank considering Saving Deposit (SD) to Loan and Advances (L&A)

YEAR	L&A	SD	RATIO (*X*)	∑ (*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	8,114	7,778	0.96	0.00	0.0000
2005	8,549	8,796	1.03	0.07	0.0049
2006	10,947	10,368	0.95	-0.01	0.0001
2007	13,279	12,622	0.95	-0.01	0.0001
2008	15,903	14,149	0.89	-0.07	0.0049
Total			**∑ *X* = 4.78**		**∑ (*X*- $\overline{X}$)² = 0.01**

$$\text{Saving Deposit to Loan and Advances} = \frac{\text{Saving Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{4.78}{5} = \mathbf{0.96}$$

$$\textbf{(S.D)}\pm = \sqrt{\frac{\sum\left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.01}{5-1}} = \mathbf{0.05}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.05}{0.96} = \mathbf{0.052}$$

Where,

L &A=Loan and Advances

SD= Fixed Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-XVIII

Work sheet for the calculation of Mean, Standard deviation and coefficient of Everest Bank considering Saving Deposit (SD) to Loan and Advances (L&A)

YEAR	L&A	SD	RATIO (*X*)	$\sum (X - \bar{X})$	$(X - \bar{X})^2$
2004	5,050	3,186	0.63	-0.09	0.0081
2005	6,096	4,296	0.70	-0.02	0.0004
2006	7,900	5,511	0.70	-0.02	0.0004
2007	10,155	8,223	0.81	0.09	0.0081
2008	14,100	10,597	0.75	0.03	0.0009
Total			**$\sum X$ = 3.59**		**$\sum (X - \bar{X})^2$ = 0.0179**

$$\text{Saving Deposit to Loan and Advances} = \frac{\text{Saving Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{3.59}{5} = \mathbf{0.72}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum (Xn - \bar{X})^2}{n-1}} = \sqrt{\frac{0.0179}{5-1}} = \mathbf{0.07}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{0.07}{0.72} = \mathbf{0.09}$$

Where,

L &A=Loan and Advances

SD= Fixed Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XIX

Work sheet for the calculation of Mean, Standard deviation and coefficient of NIC Bank considering Saving Deposit (SD) to Loan and Advances (L&A)

YEAR	L&A	SD	RATIO (*X*)	$(X-\overline{X})$	$(X-\overline{X})^2$
2004	2,563	1,700	0.66	0.02	0.0004
2005	3,743	2,697	0.72	0.08	0.0064
2006	4,909	3,016	0.61	-0.03	0.0009
2007	6,659	4,257	0.64	0.00	0.0000
2008	9,129	5,402	0.59	-0.05	0.0025
Total			**$\sum X$ = 3.22**		**$\sum (X-\overline{X})^2$ = 0.0102**

$$\text{Saving Deposit to Loan and Advances} = \frac{\text{Saving Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{3.22}{5} = \mathbf{0.64}$$

$$\textbf{(S.D)}\pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.0102}{5-1}} = \mathbf{0.05}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.05}{0.64} = \mathbf{0.08}$$

Where,

L &A=Loan and Advances

SD= Fixed Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XX

Work sheet for the calculation of Mean, Standard deviation and coefficient of NB Bank considering Saving Deposit (SD) to Loan and Advances (L&A)

YEAR	L&A	SD	RATIO (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)^2
2004	7,962	4,353	0.55	-0.20	0.0400
2005	9,645	6,435	0.67	-0.08	0.0064
2006	9,627	7,246	0.75	0.00	0.0000
2007	8,479	8,778	1.04	0.29	0.0841
2008	9,159	6,739	0.74	-0.01	0.0001
Total			**∑ *X* = 3.75**		**∑ (*X*- $\overline{X}$)^2 = 0.1306**

$$\text{Saving Deposit to Loan and Advances} = \frac{\text{Saving Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{3.75}{5} = \mathbf{0.75}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.1306}{5-1}} = \mathbf{0.18}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.18}{0.75} = \mathbf{0.24}$$

Where,

L &A=Loan and Advances

SD= Fixed Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXI

Work sheet for the calculation of Mean, Standard deviation and coefficient of Nabil Bank considering Current Deposit (CD) to Loan and Advances (L&A)

YEAR	L&A	CD	RATIO (*X*)	∑ (*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	8,114	3,407	0.42	0.11	0.0121
2005	8,549	2,992	0.35	0.04	0.0016
2006	10,947	3,141	0.29	-0.02	0.0004
2007	13,279	3,276	0.25	-0.06	0.0036
2008	15,903	3,758	0.24	-0.07	0.0049
Total			**∑ *X* =1.55**		**∑ (*X*- $\overline{X}$)² = 0.0226**

$$\text{Current Deposit to Loan and Advances} = \frac{\text{Current Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{1.55}{5} = \mathbf{0.31}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.0226}{5-1}} = \mathbf{0.08}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.08}{0.31} = \mathbf{0.24}$$

Where,

L &A=Loan and Advances

CD= Current Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX-XXII

Work sheet for the calculation of Mean, Standard deviation and coefficient of Everest Bank considering Current Deposit (CD) to Loan and Advances (L&A)

YEAR	L&A	CD	RATIO (*X*)	$\sum (X - \bar{X})$	$(X - \bar{X})^2$
2004	5,050	706	0.14	-0.01	0.0001
2005	6,096	854	0.14	-0.01	0.0001
2006	7,900	1,142	0.14	-0.01	0.0001
2007	10,155	1,282	0.13	-0.02	0.0004
2008	14,100	2,842	0.20	0.05	0.0025
Total			**$\sum X$ =0.75**		**$\sum (X - \bar{X})^2$ = 0.0032**

$$\text{Current Deposit to Loan and Advances} = \frac{\text{Current Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{0.75}{5} = \mathbf{0.15}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \bar{X}\right)^2}{n-1}} = \sqrt{\frac{0.0032}{5-1}} = \mathbf{0.03}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{0.03}{0.15} = \mathbf{0.19}$$

Where,

L &A=Loan and Advances

CD= Current Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXIII

Work sheet for the calculation of Mean, Standard deviation and coefficient of NIC Bank considering Current Deposit (CD) to Loan and Advances (L&A)

YEAR	L&A	CD	RATIO (*X*)	∑ (*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	2,563	301	Int .12	0.04	0.0016
2005	3,743	367	0.10	0.02	0.0004
2006	4,909	297	0.06	-0.02	0.0004
2007	6,659	445	0.07	-0.01	0.0001
2008	9,129	592	0.06	-0.02	0.0004
Total			**∑ *X* = 0.41**		**∑ (*X*- $\overline{X}$)² =0.0029**

$$\text{Current Deposit to Loan and Advances} = \frac{\text{Current Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{0.41}{5} = \mathbf{0.08}$$

$$\mathbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.0029}{5-1}} = \mathbf{0.03}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.03}{0.08} = \mathbf{0.33}$$

Where,

L &A=Loan and Advances

CD= Current Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXIV

Work sheet for the calculation of Mean, Standard deviation and coefficient of NB Bank considering Current Deposit (CD) to Loan and Advances (L&A)

YEAR	L&A	CD	RATIO (*X*)	$\sum (X - \bar{X})$	$(X - \bar{X})^2$
2004	7,962	1,163	0.15	0.00	0.0000
2005	9,645	1,437	0.15	0.00	0.0000
2006	9,627	1,343	0.14	-0.01	0.0001
2007	8,479	1,369	0.16	0.01	0.0001
2008	9,159	1,147	0.13	-0.02	0.0004
Total			**$\sum X$ = 0.73**		**$\sum (X - \bar{X})^2$ =0.0006**

$$\text{Current Deposit to Loan and Advances} = \frac{\text{Current Deposit}}{\text{Loan and Advances}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{0.73}{5} = \mathbf{0.15}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \bar{X}\right)^2}{n-1}} = \sqrt{\frac{0.0006}{5-1}} = \mathbf{0.01}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{0.01}{0.15} = \mathbf{0.08}$$

Where,

L &A=Loan and Advances

CD= Current Deposits

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXV

Work sheet for the calculation of Mean, Standard deviation and coefficient of NABIL Bank considering Non Performing Loan (NPL) to Total Gross Loan (TGL) Ratio

YEAR	L & A	NPL	RATIO in % (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	8114	450	5.55	3.03	9.1809
2005	8549	287	3.36	0.84	0.7056
2006	10947	145	1.32	-1.20	1.4400
2007	13279	166	1.25	-1.27	1.6129
2008	15903	178	1.12	-1.40	1.9600
Total			**∑ *X* = 12.60**		**∑(*X*- $\overline{X}$)² = 14.8994**

$$\text{Non Performing Loan to Total Gross Loan} = \frac{\text{Non Performing Loan}}{\text{Total Gross Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{12.60}{5} = \mathbf{2.52}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{14.8994}{5-1}} = \mathbf{1.93}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{1.93}{2.52} = \mathbf{0.77}$$

Where,

L &A = Loan and Advances

NPL = Non Performing Loan

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXVI

Work sheet for the calculation of Mean, Standard deviation and coefficient of Everest Bank considering Non Performing Loan (NPL) to Total Gross Loan (TGL) Ratio

YEAR	L & A	NPL	RATIO in % (*X*)	($X - \bar{X}$)	$(X - \bar{X})^2$
2004	5050	111	2.20	0.70	0.4900
2005	6096	105	1.72	0.22	0.0484
2006	7900	129	1.63	0.13	0.0169
2007	10155	122	1.20	-0.30	0.0900
2008	14100	107	0.76	-0.74	0.5476
Total			**$\sum X$ = 7.51**		**$\sum(X - \bar{X})^2$ = 1.1929**

$$\text{Non Performing Loan to Total Gross Loan} = \frac{\text{Non Performing Loan}}{\text{Total Gross Loan and Advances}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{7.51}{5} = \mathbf{1.50}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum (Xn - \bar{X})^2}{n-1}} = \sqrt{\frac{1.1929}{5-1}} = \mathbf{0.55}$$

$$\textbf{CV} = \frac{\pm}{\bar{X}} = \frac{0.55}{1.50} = \mathbf{0.36}$$

Where,

L &A=Loan and Advances

NPL = Non Performing Loan

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXVII

Work sheet for the calculation of Mean, Standard deviation and coefficient of NIC Bank considering Non Performing Loan (NPL) to Total Gross Loan (TGL) Ratio

YEAR	L & A	NPL	RATIO in % (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	2563	171	6.67	3.06	9.3636
2005	3743	147	3.93	0.32	0.1024
2006	4909	185	3.77	0.16	0.0256
2007	6659	173	2.60	-1.01	1.0201
2008	9129	100	1.10	-2.51	6.3001
Total			**∑ *X* = 18.07**		**∑(*X*- $\overline{X}$)² = 16.8118**

$$\text{Non Performing Loan to Total Gross Loan} = \frac{\text{Non Performing Loan}}{\text{Total Gross Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{18.07}{5} = \mathbf{3.61}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{16.8118}{5-1}} = \mathbf{2.05}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{2.05}{3.61} = \mathbf{0.57}$$

Where,

L &A=Loan and Advances

NPL = Non Performing Loan

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXVIII

Work sheet for the calculation of Mean, Standard deviation and coefficient of NB Bank considering Non Performing Loan (NPL) to Total Gross Loan (TGL) Ratio

YEAR	L & A	NPL	RATIO in % (*X*)	(*X*- $\bar{X}$)	(*X*- $\bar{X}$)²
2004	7962	1013	12.72	-5.27	27.7729
2005	9645	1042	10.80	-7.19	51.6961
2006	9627	1833	19.04	1.05	1.1025
2007	8479	1040	12.27	-5.72	32.7184
2008	9159	3218	35.13	17.14	293.7796
Total			**∑ *X* = 89.96**		**∑(*X*- $\bar{X}$)² =407.0695**

$$\text{Non Performing Loan to Total Gross Loan} = \frac{\text{Non Performing Loan}}{\text{Total Gross Loan and Advances}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{89.96}{5} = \mathbf{17.99}$$

$$\textbf{(S.D)}\pm = \sqrt{\frac{\sum \left(Xn - \bar{X}\right)^2}{n-1}} = \sqrt{\frac{407.0695}{5-1}} = \mathbf{10.09}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{10.09}{17.99} = \mathbf{0.56}$$

Where,

L &A=Loan and Advances

NPL = Non Performing Loan

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXIX

Work sheet for the calculation of Mean, Standard deviation and coefficient of Banking Industry as a whole considering Non Performing Loan (NPL) to Total Gross Loan (TGL) Ratio

YEAR	L & A	NPL	RATIO in % (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	111,901	32,227	28.80	9.92	98.4064
2005	127,065	28,933	22.77	3.89	15.1321
2006	147,201	27,878	18.94	0.06	0.0036
2007	188,309	26,770	14.22	-4.66	21.7156
2008	229,783	22,183	9.65	-9.23	85.1929
Total			**∑ *X* = 94.38**		**∑(*X*- $\overline{X}$)² =220.4506**

$$\text{Non Performing Loan to Total Gross Loan} = \frac{\text{Non Performing Loan}}{\text{Total Gross Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{94.38}{5} = \mathbf{18.88}$$

$$\textbf{(S.D)}\pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{220.4506}{5-1}} = \mathbf{7.42}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{7.42}{18.88} = \mathbf{0.39}$$

Where,

L &A=Loan and Advances

NPL = Non Performing Loan

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXX

Work sheet for the calculation of Mean, Standard deviation and coefficient of NABIL Bank considering Interest Income (Int. Inc.) to Total Loan and Advances (L&A) Ratio

YEAR	L & A	Int Inc	RATIO in % (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	8114	1018	12.55	1.77	3.1329
2005	8549	1002	11.72	0.94	0.8836
2006	10947	1069	9.77	-1.01	1.0201
2007	13279	1310	9.87	-0.91	0.8281
2008	15903	1588	9.99	-0.79	0.6241
Total			**∑ *X* = 53.90**		**∑(*X*- $\overline{X}$)² = 6.4888**

$$\text{Interest Income to Loan and Advances Ratio} = \frac{\text{Interest Income}}{\text{Total Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{53.90}{5} = \mathbf{10.78}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{6.4888}{5-1}} = \mathbf{1.27}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{1.27}{10.78} = \mathbf{0.12}$$

Where,

L &A=Loan and Advances

Int. Inc = Interest Income

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXXI

Work sheet for the calculation of Mean, Standard deviation and coefficient of Everest Bank considering Interest Income (Int. Inc.) to Total Loan and Advances (L&A) Ratio

YEAR	L & A	Int Inc	RATIO in % (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)^2
2004	5050	520	10.30	0.86	0.7396
2005	6096	657	10.78	1.34	1.7956
2006	7900	719	9.10	-0.34	0.1156
2007	10155	903	8.89	-0.55	0.3025
2008	14100	1144	8.11	-1.33	1.7689
Total			**∑ *X* = 47.18**		**∑(*X*- $\overline{X}$)^2 = 4.7222**

$$\text{Interest Income to Loan and Advances Ratio} = \frac{\text{Interest Income}}{\text{Total Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{47.18}{5} = \mathbf{9.44}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{4.7222}{5-1}} = \mathbf{1.09}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{1.09}{9.44} = \mathbf{0.12}$$

Where,

L &A=Loan and Advances

Int. Inc = Interest Income

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXXII

Work sheet for the calculation of Mean, Standard deviation and coefficient of NIC Bank considering Interest Income (Int. Inc.) to Total Loan and Advances (L&A) Ratio

YEAR	L & A	Int Inc	RATIO in % (*X*)	(*X*- $\bar{X}$)	(*X*- $\bar{X}$)²
2004	2563	272	10.61	1.35	1.8225
2005	3743	363	9.70	0.44	0.1936
2006	4909	458	9.33	0.07	0.0049
2007	6659	580	8.71	-0.55	0.3025
2008	9129	726	7.95	-1.31	1.7161
Total			**∑ *X* = 46.30**		**∑(*X*- $\bar{X}$)² = 4.0396**

Interest Income to Loan and Advances Ratio = $\frac{\text{Interest Income}}{\text{Total Loan and Advances}}$

Mean ($\bar{X}$) = $\frac{\sum x}{N}$ = $\frac{46.30}{5}$ = **9.26**

(S.D) $\pm = \sqrt{\frac{\sum (Xn - \bar{X})^2}{n-1}} = \sqrt{\frac{4.0396}{5-1}}$ **= 1.00**

CV = $\frac{\pm}{\bar{X}}$ = $\frac{1.00}{9.26}$ = **0.11**

Where,

L &A=Loan and Advances

Int. Inc = Interest Income

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXXIII

Work sheet for the calculation of Mean, Standard deviation and coefficient of NB Bank considering Interest Income (Int. Inc.) to Total Loan and Advances (L&A) Ratio

YEAR	L & A	Int Inc	RATIO in % (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	7962	1014	12.74	2.07	4.2849
2005	9645	1096	11.36	0.69	0.4761
2006	9627	877	9.11	-1.56	2.4336
2007	8479	785	9.26	-1.41	1.9881
2008	9159	998	10.90	0.23	0.0529
Total			**∑ *X* = 53.37**		**∑(*X*- $\overline{X}$)² = 9.2356**

$$\text{Interest Income to Loan and Advances Ratio} = \frac{\text{Interest Income}}{\text{Total Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{53.37}{5} = \mathbf{10.67}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{9.2356}{5-1}} = \mathbf{1.52}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{1.52}{10.67} = \mathbf{0.14}$$

Where,

L &A=Loan and Advances

Int. Inc = Interest Income

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXXIV

Work sheet for the calculation of Mean, Standard deviation and coefficient of NABIL Bank considering Net Profit (NP) to Total Loan and Advances (L&A) Ratio

YEAR	L & A	N.P.	RATIO in % (*X*)	$(X-\bar{X})$	$(X-\bar{X})^2$
2004	8114	416	5.13	0.29	0.0841
2005	8549	455	5.32	0.48	0.2304
2006	10947	519	4.74	-0.10	0.0100
2007	13279	635	4.78	-0.06	0.0036
2008	15903	674	4.24	-0.60	0.3600
Total			**$\sum X$ = 24.21**		**$\sum(X-\bar{X})^2$ = 0.6881**

$$\text{Net Profit to Loan and Advances Ratio} = \frac{\text{Net Profit}}{\text{Total Loan and Advances}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{24.21}{5} = \mathbf{4.84}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum\left(Xn-\bar{X}\right)^2}{n-1}} = \sqrt{\frac{0.6881}{5-1}} = \mathbf{0.41}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{0.41}{4.84} = \mathbf{0.09}$$

Where,

L &A=Loan and Advances

N.P = Net Profit

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXXV

Work sheet for the calculation of Mean, Standard deviation and coefficient of Everest Bank considering Net Profit (NP) to Total Loan and Advances (L&A) Ratio

YEAR	L & A	N.P.	RATIO in % (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)^2
2004	5050	94	1.86	-0.30	0.0900
2005	6096	144	2.36	0.20	0.0400
2006	7900	168	2.13	-0.03	0.0009
2007	10155	237	2.33	0.17	0.0289
2008	14100	296	2.10	-0.06	0.0036
Total			**∑ *X* = 10.78**		**∑(*X*- $\overline{X}$)^2 = 0.1634**

$$\text{Net Profit to Loan and Advances Ratio} = \frac{\text{Net Profit}}{\text{Total Loan and Advances}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{10.78}{5} = \mathbf{2.16}$$

$$\textbf{(S.D)}\pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{0.1634}{5-1}} = \mathbf{0.20}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.20}{2.16} = \mathbf{0.09}$$

Where,

L &A=Loan and Advances

N.P = Net Profit

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXXVI

Work sheet for the calculation of Mean, Standard deviation and coefficient of NIC Bank considering Net Profit (NP) to Total Loan and Advances (L&A) Ratio

YEAR	L & A	N.P.	RATIO in % (*X*)	$(X-\bar{X})$	$(X-\bar{X})^2$
2004	2563	49	1.91	0.06	0.0036
2005	3743	68	1.82	-0.03	0.0009
2006	4909	114	2.32	0.47	0.2209
2007	6659	97	1.46	-0.39	0.1521
2008	9129	158	1.73	-0.12	0.0144
Total			**$\sum X$ = 9.24**		**$\sum(X-\bar{X})^2$ = 0.3919**

$$\text{Net Profit to Loan and Advances Ratio} = \frac{\text{Net Profit}}{\text{Total Loan and Advances}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{9.24}{5} = \mathbf{1.85}$$

$$\textbf{(S.D)}\pm = \sqrt{\frac{\sum\left(Xn-\bar{X}\right)^2}{n-1}} = \sqrt{\frac{0.3919}{5-1}} = \mathbf{0.31}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{0.31}{1.85} = \mathbf{0.17}$$

Where,

L &A=Loan and Advances

N.P = Net Profit

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX - XXXVII

Work sheet for the calculation of Mean, Standard deviation and coefficient of NB Bank considering Net Profit (NP) to Total Loan and Advances (L&A) Ratio

YEAR	L & A	N.P.	RATIO in % (*X*)	$(X-\bar{X})$	$(X-\bar{X})^2$
2004	7962	1244	15.62	17.09	292.07
2005	9645	2.64	0.03	1.50	2.25
2006	9627	(782)	(8.12)	(6.65)	44.22
2007	8479	(1,797)	(21.19)	(19.72)	388.88
2008	9159	577	6.30	7.77	60.37
Total			**$\sum X$ = (7.36)**		**$\sum(X-\bar{X})^2$ = 787.79**

$$\text{Net Profit to Loan and Advances Ratio} = \frac{\text{Net Profit}}{\text{Total Loan and Advances}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{-7.36}{5} = \mathbf{-1.47}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum\left(Xn-\bar{X}\right)^2}{n-1}} = \sqrt{\frac{787.79}{5-1}} = \mathbf{14.03}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{14.03}{-1.47} = \mathbf{-9.53}$$

Where,

L &A=Loan and Advances

N.P = Net Profit

S.D= Standard Deviation

C.V= Coefficient of Variance

APPENDIX – XXXVIII

Work sheet for the calculation of Mean, Standard deviation and coefficient of NABIL Bank considering Loan Loss Provision (LLP) to Non Performing Loan (NPL) Ratio

YEAR	LLP	NPL	RATIO (*X*)	($X - \bar{X}$)	($X - \bar{X}$)^2
2004	358	449.63	0.80	-0.94	0.8826
2005	359	286.68	1.25	-0.49	0.2374
2006	361	144.51	2.50	0.76	0.5755
2007	356	165.98	2.14	0.41	0.1643
2008	357	178.30	2.00	0.26	0.0690
Total			**$\sum X$ = 8.70**		**$\sum(X - \bar{X})^2$ = 1.9288**

$$\text{Loan Loss Provision to Non Performing Loan Ratio} = \frac{\text{Loan Loss Provision}}{\text{Non Performing Loan}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{8.70}{5} = \mathbf{1.74}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum (Xn - \bar{X})^2}{n-1}} = \sqrt{\frac{1.9288}{5-1}} = \mathbf{0.69}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{0.69}{1.74} = \mathbf{0.40}$$

Where,

LLP = Loan Loss Provision

NPL = Non Performing Loan

S.D = Standard Deviation

C.V = Coefficient of Variance

APPENDIX – XXXIX

Work sheet for the calculation of Mean, Standard deviation and coefficient of Everest Bank considering Loan Loss Provision (LLP) to Non Performing Loan (NPL) Ratio

YEAR	LLP	NPL	RATIO (*X*)	(*X*- $\overline{X}$)	(*X*- $\overline{X}$)²
2004	141	111.19	1.27	-1.16	1.3411
2005	212	104.76	2.02	-0.40	0.1635
2006	281	128.81	2.18	-0.25	0.0608
2007	335	121.85	2.75	0.32	0.1032
2008	419	107.00	3.92	1.49	2.2136
Total			**∑ *X* = 12.14**		**∑(*X*- $\overline{X}$)² = 3.8822**

$$\text{Loan Loss Provision to Non Performing Loan Ratio} = \frac{\text{Loan Loss Provision}}{\text{Non Performing Loan}}$$

$$\text{Mean } (\overline{X}) = \frac{\sum x}{N} = \frac{12.14}{5} = \mathbf{2.43}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum \left(Xn - \overline{X}\right)^2}{n-1}} = \sqrt{\frac{3.8822}{5-1}} = \mathbf{0.99}$$

$$\mathbf{CV} = \frac{\pm}{\overline{X}} = \frac{0.99}{2.43} = \mathbf{0.41}$$

Where,

LLP = Loan Loss Provision

NPL = Non Performing Loan

S.D = Standard Deviation

C.V = Coefficient of Variance

APPENDIX – XL

Work sheet for the calculation of Mean, Standard deviation and coefficient of NIC Bank considering Loan Loss Provision (LLP) to Non Performing Loan (NPL) Ratio

YEAR	LLP	NPL	RATIO (*X*)	($X - \bar{X}$)	($X - \bar{X}$)²
2004	193	170.69	1.13	-0.21	0.0462
2005	182	146.59	1.24	-0.10	0.0107
2006	198	185.43	1.07	-0.28	0.0768
2007	246	173.09	1.42	0.08	0.0058
2008	187	100.30	1.86	0.52	0.2698
Total			**$\sum X$ = 6.72**		**$\sum(X - \bar{X})^2$ = 0.4093**

$$\text{Loan Loss Provision to Non Performing Loan Ratio} = \frac{\text{Loan Loss Provision}}{\text{Non Performing Loan}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{6.72}{5} = \mathbf{1.34}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum (Xn - \bar{X})^2}{n-1}} = \sqrt{\frac{0.4093}{5-1}} = \mathbf{0.32}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{0.32}{1.34} = \mathbf{0.24}$$

Where,

LLP = Loan Loss Provision

NPL = Non Performing Loan

S.D = Standard Deviation

C.V = Coefficient of Variance

APPENDIX – XLI

Work sheet for the calculation of Mean, Standard deviation and coefficient of NB Bank considering Loan Loss Provision (LLP) to Non Performing Loan (NPL) Ratio

YEAR	LLP	NPL	RATIO (*X*)	($X - \bar{X}$)	$(X - \bar{X})^2$
2004	714	1,013	0.70	-0.70	0.4886
2005	996	1,042	0.96	-0.44	0.1965
2006	1,839	1,833	1.00	-0.40	0.1566
2007	3,336	1,040	3.21	1.81	3.2675
2008	3,634	3,218	1.13	-0.27	0.0727
Total			**$\sum X$ = 7.00**		**$\sum(X - \bar{X})^2$ = 4.1819**

$$\text{Loan Loss Provision to Non Performing Loan Ratio} = \frac{\text{Loan Loss Provision}}{\text{Non Performing Loan}}$$

$$\text{Mean } (\bar{X}) = \frac{\sum x}{N} = \frac{7.00}{5} = \mathbf{1.40}$$

$$\textbf{(S.D)} \pm = \sqrt{\frac{\sum (Xn - \bar{X})^2}{n-1}} = \sqrt{\frac{4.1819}{5-1}} = \mathbf{1.02}$$

$$\mathbf{CV} = \frac{\pm}{\bar{X}} = \frac{1.02}{1.40} = \mathbf{0.73}$$

Where,

LLP = Loan Loss Provision

NPL = Non Performing Loan

S.D = Standard Deviation

C.V = Coefficient of Variance