INVESTMENT PRACTICES ANALYSIS OF MAJOR COMMERCIAL BANKS (With reference to Nepal Investment Bank Limited, Himalayan Bank Limited, NEPAL SBI Bank Limited \& Bank of Kathmandu Limited)


In partial fulfillment of the requirements for the degree of Master in Business Study (MBS)

Kathmandu
2011

# RECOMMENDATION 

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## DECLARATION

I hereby declare that the data and work reported in this thesis entitled INVESTMENT PRACTICES ANALYSIS OF MAJOR COMMERCIAL BANKS (With reference to Nepal Investment Bank Limited, Himalayan Bank Limited, NEPAL SBI Bank Limited \& Bank Of Kathmandu Limited) submitted to office of the dean, faculty of management, Tribhuvan University is my authentic work done for the partial fulfillment of the requirement of the degree of Master of Business Studies (M.B.S.) under the guidance and supervision of Associate Prof. Achyut Raj Bhattarai and Laxman Kandel of Shanker Dev Campus, T.U.

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Commercial Banks are the backbone of any economy; a bank cannot be imagined without the presence of investors. Thus, protection of Investors should be considered seriously. Legal provision and the practice regarding shareholders' interests also are immature in our country.

This study has been prepared for partial fulfillment of the requirement for the master degree in business studies. It is my privilege to complete this thesis entitled INVESTMENT PRACTICES ANALYSIS OF MAJOR COMMERCIAL BANKS (With reference to Nepal Investment Bank Limited, Himalayan Bank Limited, NEPAL SBI Bank Limited \& Bank Of Kathmandu Limited) which analysis the performance evaluation of the sample banks.

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## Gita Lamichhane

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## ABBREVIATIONS

ADBL : Agricultural Development Bank Ltd
ATM : Automated Teller Machine
B. S. : Bikram Sambat

BOKL : Bank of Kathmandu Limited
CENMAC : Central Management Committee
CEO : Chief Executive Officer
CRR : Cash Reserve Ratio
CV : Co-efficient of Variation
EIR : Expected Inflation Return
ENR : Expected Nominal Return
EPF : Employees Provident Fund
EPS : Earning Per Share
ERR : Expected Real Return
$\mathrm{Eq}^{\mathrm{n}}$ : Equation
FIs : Financial Institution

FY : Fiscal Year
GDP : Gross Domestic Product
Govt. : Government
HBL : Himalayan Bank Limited
i.e. : That is

Inv : Investment

IMF : International Monetary Fund
IRR : Internal Rate of Return

Ltd. : Limited

MAST : Marketability, Ascertain ability, Stability, Transferability
MBS : Masters of Business Studies

MPS : Market Price of Share
NIBL : Nepal Investment Bank Limited

NPV : Net Present Value
NRB : Nepal Rastra Bank
NSBIBL : Nepal SBI Bank Limited
P/L : Profit and Loss
ROA : Return of Assets

ROE : Return on Equity
SCBL : Standard Chartered Bank Limited
S.D. : Standard Deviation

SEBO : Securities Board
Sec: Securities

S \& D : Share and Debenture
TU : Tribhuvan University

## CHAPTER-I

## INTRODUCTION

### 1.1 BACKGROUND OF THE STUDY:

Investment, in its broadest sense, means the sacrifice of current currencies and resources for the sake of future currencies and resources. An investment is one of the decisions of finance function that involves the decision of capital to established commercial or industrial venture. In other words it involves commitment of funds into long-term assets that would yield benefits incoming future period

Nepal is a least developed country which is not being able to develop its economic condition due to various factors like political, Socio-cultural, technological environment of the country. Banking industries are also regarded as one component of economy which transfers the scattered funds collected from saving of the public into various productive sectors. Economic activities remains halt in absence of banking industries. The development of any country depends upon economic development of the country and economic development is supported by financial infrastructure of the country. Banks play vital role in the economic growth of the country. Every well-organized financial institution including finance companies, commercial banks, joint venture banks and other financial institutions plays significant, role for the development of the country.

Investment is an important ingredient of overall national economic development because it ensures efficient allocation of fund to achieve the materials and economic well being of the society. Investment policy is an important factor of the investment practice. Indeed, the large number of nonperforming loans is the main cause of bank failure. Investment is primary factor for economic development of any country. Investment in its broadest sense means the sacrifice of current money for future money. The reward or result of sacrifice comes later and the magnitude is generally uncertain. Time and risk are predominates for investment. Such as investment in government bonds time is predominates whereas in common stock time and risk both are important. (Sharpe, 2000:1)

### 1.1.1 HISTORY OF BANKING IN NEPAL:

Nepal has many nationalized as well as private banking ventures. The history of Nepal can broadly be divided in to three phases, Ancient, Medieval and Modern. The history of the Nepalese monarchy has been the integral and inseparable part of the history of Nepal. Nevertheless, Nepal has much more than Monarchs when it comes to realm of history. It has a Vedic past to boast about and a bright feature to look to.

## Ancient History of Nepal

The history of Nepal dates back to 11,000 years. The recent excavation in the Kathmandu valley has found out Neolithic tools. These tools were used at the advent of Neolithic era and many of them date back to 9000 B.C. This tells about the pre-Aryan settlement in the then Nepal. These people were of Bhutanese-Mongoloid parentage. Nepal once again gets mentioned in the Hindu epic of Ramayana. It is said that Janakpur, in the Tarai Nepal, has been the birthplace of Sita, the wife of Rama. Nepal is mentioned as Kirat Pradesh in the epic Mahabharata that is said to be composed around 1000 B.C. It is mentioned that the concerned king supported Kaurvas against the Pandavas in the battle. It was in the house of one of the Shakya kings that Gautam Siddhartha was born. He got the name of Buddha when he was enlightened. In the later era Nepal fall under the rule of the Maurya. Ashoka finds mention in many of the rock edicts. There are many historical edicts that glorify the reign of Licchhavis.

## Medieval History of Nepal

Nepal remained largely undisturbed in the medieval period. Mallas used to rule Nepal and were largely confined to their own territories. In the sultanate era, there were some attempts of assault on Nepal but they were met with sporadic successes only. The relief and the climate of Nepal have always served as its military generals. It was king Jaisthitimalla who tried to bring Nepal less than one reign in the late 14th century. The unification was short-lived and Nepal got divided in to 3 kingdoms namely, Kathmandu, Patan and Bhadgaon. Apart from these, in the medieval period, Nepal was largely peaceful. May be that lull was going to bring a severe storm.

## Modern History of Nepal

The modern history of Nepal starts with the establishment of the Gorkha kingdom by Prithvi Narayan Shah in the 18th century. He had his own designs and wanted to unite the various warring kingdoms of Nepal. He was largely successful in his attempts of invasion. He annexed a large area of Bhutan and Tibet. His designs were later put to action by his successors. Their attempts hit a roadblock at the advent of the 19th century. The British East India Company got apprehensive of their maneuvers and took them head on. The kingdom was soundly humiliated and routed in the Anglo-Nepalese war of 1816. In the same decade, Jung Bahadur, one of the valiant generals of Shahs tried to topple the regime. The queen met the efforts with the bloody counter initiatives. This led to various massacres on both sides. This started the century long conflict between the Shahs and Ranas, the descendants of Jung Bahadur. In later years close to 20th century, both the warring dynasties established matrimonial relations between them and started to rule Nepal jointly. This pact is evident on the flag of Nepal as well. The two triangular flags, that are the part of a single flag, represent these two dynasties.

Being a commercial bank, it is the one of government to look into neglected sector too. This is the main reason of establishing Nepal Rastra Bank as a central bank of Nepal in 2013B.S Since then it has been functioning as a government bank it has its own limitations and reluctances of NBL to go the unprofitable sectors. To cope with these difficulties, government set up Rastriya Banijya Bank in 2033 B.S. as a fully government owned commercial bank. Gradually, Agricultural Bank and Industrial bank came into existence. Deposit all these efforts of the government, financial sector was found sluggish. Banking service to the satisfaction of the customer's was a far cry. However, the inception of Nepal Arab Bank Limited in 2041B.S. as a first joint venture bank proved to be a milestone in the history of banking. With evolution of globalization and liberal economic policies, Nepalese financial sector is also able to attract foreign investors as well as private investors within the country. We have conducted the research on the sample of four major commercial banks the particular details is presented below: (http://en.wikipedia.org/wiki/History_of_Nepal)

### 1.1.2 BRIEF INTRODUCTION OF SELECTED BANKS:

## NSBI BANK LIMITED.

NSBI Bank Ltd. (NSBI) is the first Indo-Nepal joint venture in the financial sector sponsored by three institutional promoters, namely State Bank of India (SBI), Employees Provident Fund (EPF) and Agricultural Development Bank Ltd.(ADBL)through a Memorandum of Understanding signed on 17th July 1992. NSBL was incorporated as a public limited company at the Office of the Company Registrar on April 28, 1993 under Regn. No. 17-049/50 with an Authorized Capital of Rs. 12 Crores and was licensed by Nepal Rastra Bank on July 6, 1993 under license No. NRB/l.Pa./7/2049/50. NSBL commenced operation with effect from July 7, 1993 with one full-fledged office at Durbar Marg, Kathmandu with 18 staff members. The staff strength has since increased to 511. Under the Banks \& Financial Institutions Act, 2063, Nepal Rastra Bank granted fresh license to NSBL classifying it as an "A" class licensed institution on April 26, 2006 under license No. NRB/I.Pra.Ka.7/062/63. The Authorized,Issued and Paid-Up Capitals have been increased to Rs. 200 Crores,Rs. 166.16 Crores and Rs. 165.36 Crores, respectively. In terms of the Technical Services Agreement concluded between SBI and the Bank, SBI provides management support to the bank through its 3 expatriate officers including Managing Director who is also the CEO of the Bank. A core management team viz. Central Management Committee (CENMAC) consisting of the Managing Director, Chief Operating Officer, Chief Financial Officer and Assistant General Manager(Credit) oversees the overall banking operations in the Bank. ADBL divested its stake in the Bank by selling its entire 5\% promoter shares to SBI on 14th June, 2009. Consequently, the Bank's corporate status has undergone change from its previous status as a Joint-venture Bank to a Foreign Subsidiary Bank of SBI. Presently fifty five percent of the total share capital of the Bank is held by the SBI, fifteen percent is held by the EPF and thirty percent is held by the general public. (Pandey,2010:32)

NSBI Bank Limited (SBI) was established under the company act 1964, in 1993. This is the joint venture of state bank of India and Nepali promoters. The State Bank of India holds 50 percent shares of total investment. NSBI Bank Limited is managed by the State Bank of India under the Joint Venture and Technical Services Agreement signed between it and Nepali promoters.

The main objectives of the bank are to carryout modern banking business in the country under the commercial act 1974, and to provide loan on agriculture, commercial and industrial sectors.

The following facilities have been providing by the bank are:
International Trade and Bank Guarantee
Any Branch Banking
Conventional Banking Facilities
Remittances, etc. (www.nepalsbi.com.np)

## Nepal Investment Bank Limited:

The Bank fully complies with the provisions of Nepalese Money Laundering Prevention Act, 2008 and regulations made thereunder and the Guidelines of our central bank viz. Nepal Rastra Bank (NRB) regarding anti-money laundering. In addition to above the Bank has its own policies and procedures to combat to prevent laundering of criminally earned money using its services. The Bank's Management strictly ensures the compliance with all statutory and regulatory requirements, including designating Focal Officer for this specific purpose and conducting training for staff at all levels.

Nepal Investment Bank Ltd. (NIBL), previously Nepal Indosuez Bank Ltd., was established in 1986 as a joint venture between Nepalese and French partners. The French partner (holding 50\% of the capital of NIBL) was Credit Agricole Indosuez, a subsidiary of one the largest banking group in the world. The name of the bank has been changed to Nepal Investment Bank Ltd. upon approval of bank’s Annual General Meeting, Nepal Rastra Bank and Company Registrar’s office with the following shareholding structure.

- A group of companies holding $50 \%$ of the capital
- Rashtriya Banijya Bank holding 15\% of the Capital.
- Rashtriya Beema Sansthan holding the same percentage.
- The remaining $20 \%$ being held by the General Public (which means that NIBL is a Company which has got listed on the Nepal Stock Exchange i.e. NEPSE). (www.nibl.com.np)


## Himalayan Bank Limited

Himalayan Bank was established in 1993 in joint venture with Habib Bank Limited of Pakistan. Despite the cut-throat competition in the Nepalese Banking sector, Himalayan Bank has been able to maintain a lead in the primary banking activities- Loans and Deposits.

Legacy of Himalayan lives on in an institution that's known throughout Nepal for its innovative approaches to merchandising and customer service. Products such as Premium Savings Account, HBL Proprietary Card and Millionaire Deposit Scheme besides services such as ATMs and Tele-banking were first introduced by HBL. Other financial institutions in the country have been following our lead by introducing similar products and services. Therefore, we stand for the innovations that we bring about in this country to help our Customers besides modernizing the banking sector. With the highest deposit base and loan portfolio amongst private sector banks and extending guarantees to correspondent banks covering exposure of other local banks under our credit standing with foreign correspondent banks, we believe we obviously lead the banking sector of Nepal.

All Branches of HBL are integrated into Globus (developed by Temenos), the single Banking software where the Bank has made substantial investments. This has helped the Bank provide services like ‘Any Branch Banking Facility’, Internet Banking and SMS Banking. Living up to the expectations and aspirations of the Customers and other stakeholders of being innovative, HBL very recently introduced several new products and services. Millionaire Deposit Scheme, Small Business Enterprises Loan, Pre-paid Visa Card, International Travel Quota Credit Card, Consumer Finance through Credit Card
and online TOEFL, SAT, IELTS, etc. fee payment facility are some of the products and services. HBL also has a dedicated offsite 'Disaster Recovery Management System’. Looking at the number of Nepalese workers abroad and their need for formal money transfer channel; HBL has developed exclusive and proprietary online money transfer software- Himal RemitTM. By deputing our own staff with technical tie-ups with local exchange houses and banks, in the Middle East and Gulf region, HBL is the biggest inward remittance handling Bank in Nepal. All this only reflects that HBL has an outsidein rather than inside-out approach where Customers’ needs and wants stand first. (www.himalayanbank.com)

## Bank of Kathmandu Limited

Bank of Kathmandu Limited has become a prominent name in the Nepalese banking sector. We would like to express our sincere gratitude to our customers, shareholders, employees and other stakeholders for their support and co-operation for leading the bank to the present height of achievements. We wish to reiterate here that whatever activity we undertake; we put in conscious efforts to glorify our corporate slogan, "We make your lifeeasier".

We would also like to elucidate that Bank of Kathmandu is committed to delivering quality service to customers, generating good return to shareholders, providing attractive incentives to employees and serving the community through stronger corporate social responsibilityendeavor.

Bank of Kathmandu Limited (BOK) has today become a landmark in the Nepalese banking sector by being among the few commercial banks which is entirely managed by Nepalese professionals and owned by the general public.

BOK started its operation in March 1995 with the objective to stimulate the Nepalese economy and take it to newer heights. BOK also aims to facilitate the nation's economy and to become more competitive globally. To achieve these, BOK has been focusing on its set objectives right from the beginning.

To contribute to the sustainable development of the nation by mobilizing domestic savings and channeling them to productive areas

- To use the latest banking technology to provide better, reliable and efficient services at a reasonable cost
- To facilitate trade by making financial transactions easier, faster and more reliable through relationships with foreign banks and money transfer agencies
- To contribute to the overall social development of Nepal. (www.bok.com.np)


### 1.2 FOCUS OF THE STUDY:

Although recent developments in Nepal's financial sector have moderately improved its performance, including the entry of many new actors, the sector remains fragile and access to financial services has been declining. As intermediaries, the financial institution helps the process of resources mobilization. The importance of financial institutions in the economy has of late growth to an enormous extent. The government in turn is required to regulate their activities so that the financial policies are implemented as per the requirement of the country. Policy such as Investment to priority and deprived sectors, Investment to the educated unemployed people, Investment for creation of entrepreneurs in the society.

Commercial banks are the heart of financial system. They hold the deposits on many persons, government institutions and business units. They make funds available through their Investment and investing activities to borrowing; individuals, business firm and government establishments. In doing so, they assist both the flow of goods and services form the products to consumers and the financial activities of the government. These facts show the commercial banking system of nation is important to the functioning of the economy. Bank creates funds from its client to saving and lends the some to needing person or business institutions in terms of loan, advances and investment. So, proper financial decision making is more important in banking transaction for its efficiency and profitability. Most of the financial decision making are concerned with Investment policy and Investment management. It plays the vital role in the business succession, so efficient Investment management is needed. This study deals with the Investment position, non
performing loan, Investment portfolio management and relation of Investment in profitability of the major commercial selected banks.

The commercial banks are competing mainly in service in order to put in competitive position, majority of the branches of commercial banks have been adapting differentiation strategy. The response shows that different branches of the similar bank have adapted different strategy and few of the banks have followed more than one strategy at the same time. The priority of the majority of Nepalese commercial banks is to retain customers whereas 48 percent of them are concentrating on customer acquisition. While these changes have positively affected the banking sector, at the same time, increased competition due to mushrooming of financial institutions has impacted the banks negatively.

### 1.3 STATEMENT OF THE PROBLEM:

All the commercial banks have played vital role in accepting deposits and providing various types of loans. The problem of Investment has become very serious for developing country like Nepal. The major commercial banks have not formulated their investment policy in organized manner. They mainly rely upon the instructions and guidelines of Nepal Rastra Bank. They do not have clear view towards investment policy. Furthermore the implementation of policy has not been done in an effective way. Such banks invest their funds in limited areas to achieve higher amount of profit. Capital resource is the prime source of the economic development of the country. Economic development of a country succeeds only when the development of the capital formation mechanism exists. The major cause of this chronic problem is the lack of economic development or the slow rate of the national economic growth. Commercial banks suffered from various types of problem such as increasing non-performing loan ratio, liquidity crisis, inflated interest rate, declining deposits and danger of real estate collapse, recovering loans given to the realty sector, to maintain profitability etc. They do not mobilize their deposit properly in terms of development of the nation. It is no debate that high profitable institutions can easily get their goals and can serve the society. The main objective of commercial banks is to increase its returns for their owner which often comes, however, at the cost of various increased risk: Credit Risk, Liquidity Risk,

Interest Rate Risk, Market Risk, Off-Balance Sheet Risk, Foreign Exchange Risk, Country Risk, Technology Risk, Operational Risk and Insolvency Risk. Investment management concept has appeared as a major research gap in Nepalese commercial banks. There is lack of scientific research that could identify the issues of Investment management in commercial banks. In this regard, the performance of the commercial banks is to be analyzed in terms of Investment. Some research questions regarding to the credit practices, liquidity position, economic and industrial environment, management quality are considered as a clear evident in present situation.

1. Is the investment practices adopted by sampled commercial banks in good position?
2. What is the relationship of investment and loan and advances with total deposit and total net profit of the selected banks?
3. Is credit position of bank influences the profitability?
4. Does the investment decision affect the total earning of the banks?
5. Does the investment and loan and advances support the economy for the upliftment?

### 1.4 OBJECTIVE OF THE STUDY:

Investment is necessary for economic development of the country. This study attempts to assess the role and impact of investment on economic development of the country. The specific objectives of the present research are to investigate investment practices and policies adopted by major selected commercial banks and compare with each other. The specific objectives of the study are as follows.

- To see percentage of Investment made by selected commercial banks in Total Investment made by commercial banks.
- To study the relationship between Investment and Deposit, Investment and Loan \& Advances of the selected banks and evaluate the Assets Management efficiency of the selected banks.
- To see Investment trend and their projection for next three years of selected commercial banks.
- To identify Investment sector of selected commercial banks.


### 1.5 SIGNIFICANE OF THE STUDY:

Investment activity is the lifeblood of any financial institution as well as nation. Better return and sustainability are only possible through proper utilization of fund as investment. Capital resource is the prime source of the economic development of the country. Economic development of a country succeeds only when the development of the capital formation mechanism exists. Similarly, the concerned persons would get required information and can take the decision to make investment on shares of bank. In the same way the academic institution, bank employees, trainees and the others concerned with major commercial banks would get useful feedback from this study. The major commercial banks have played vital role in the collection of scattered small savings from mass and converting them into meaningful investment. Deposit collection has no meaning, if it is not invested properly. The comparative study on investment practice of major commercial banks would provide useful information to the management of concerned bank that would help them to take corrective action to improve the weaknesses to investment.

### 1.6 LIMITATION OF THE STUDY:

The evaluations made herein are taken of only four sample units. The study remains largl $y$ in the realms of Offsite Monitoring System. The study focus on the investment practices of the selected banks. So there are some limitations, which narrowed the generalization.

- The study deals with major commercial banks but it may not-applicable to other banks.
- The whole study is based on secondary data collected from the respective banks \& web sites on internet. As far as the output concerned, any research based on secondary data is not far from limitations due to inherent character.
- The study concerns only for period of 5 Fiscal years i.e. from FY 2005/06 to FY 2009/10.


### 1.7 ORGANISATION OF STUDY:

The present study shall be organized in such a way that the stated objectives can easily be fulfilled. The study report shall design in five chapters which are as follows.

- The first chapter shall deals with the introduction part of the study like background of the study, statement of the problem, objective and significance of the study, organization of the study and limitations of the study.
- The second chapter shall deals with review of literature, which includes, review of books, and review of bulletins, journals and annual reports published by banks and other related authorities, review of related articles and study of previous thesis as well.
- This chapter shall explain the research methodology used to evaluate investment practice of major commercial banks in Nepal. This chapter consists of research design, sources of data, population and sample, tools and method of analysis.
- This chapter shall deals with presentation and analysis of data through definite course of research methodology. This chapter analyses different financial ratios and statistical analysis related to investment and fund mobilization of sample banks. Likewise the Major findings of the study have been included in detail in this chapter.
- This shall be last chapter of the study, which shall provide summary and conclusion, suggestion and recommendations for overcoming the weaknesses and improving the future performance of the major commercial banks. Finally, an extensive bibliography and appendices shall also be presented at the thesis.


## CHAPTER - II

## REVIEW OF LITERATURE

Review of literature is the study of previous research or article or book in related field or topics for finding the past studies conclusion and deficiencies that may be known for further research. This chapter will help to check the chances of duplication in the present study. Thus the gap between the previous research and current research can be filled. Therefore, the chapter is categorized under three main heading. Conceptual framework is concern with fundamental of supportive text that will ensure the interpretation whether it is under the principles and doctrine of the theories related to the topic. Review of related studies is about the studies of previous thesis, related books and previous researcher in similar topics. The last is research gap which will describe the difference between the previous thesis and current thesis.

A review may be a self-contained unit - an end in itself - or a preface to and rationale for engaging in primary research. A review is a required part of grant and research proposals and often a chapter in theses and dissertations. Generally, the purpose of a review is to analyze critically a segment of a published body of knowledge through summary, classification, and comparison of prior research studies, reviews of literature, and theoretical articles. (www.writing.wisc.edu)

### 2.1 Conceptual Framework

Then main purpose of review of literature is to find out what research studies have been conducted in one's chosen field of study and what remain to be done. Several research works have been conducted in various aspect of commercial banks for instance financial performance, investment policy, resource mobilization compliance of Nepal Rastra Bank directives by banks, risk and return analysis etc.
"Investment may be defined as the purchase by an individual or institutional investor of a financial or real asset that produces a return proportional to the risk assumed over some future investment period." (Amling, 1996:12)

This chapter focuses on reviewing prior researches, books and journals so that the theoretical framework can be built. Every study is very much based on past knowledge. The past knowledge provides foundation to the present study. This chapter helps to take adequate feedback to broaden the information and inputs to this study. Investment is a present sacrifice for the sake of future benefits. Therefore, investment always involves risk. Present decision about selecting the best alternatives should always take the future risk into consideration. The few alternatives of investment in the past have new expanded into hundreds. Hence, the complexity of investment has also been increasing day by day. To select the best alternative and to construct an efficient portfolio, a wise analysis and decision is required. Before making any decision on investment decision related with saving, capital formation, capital market, and risk involve with it, return, inflation etc.

### 2.1.1 Concept of Commercial Banks

Commercial banks are those banks, which pool together the saving of the community and arrange them for the productive use. It accepts deposits for the purpose of lending or investment and thereby hopes to make a profit - profits which are adequate enough to enable the bank to pay interest at the prescribed rates to its depositors, meet establishment expenses, build reserves, pay dividend to the shareholders, etc. In fact, they circulate the money and create credit. The concept of the commercial banks made the economy strong. And now it’s playing important role to make country economically strong. According to the Black's law Dictionary "commercial bank" means a bank authorized to receive both demand and time deposits, to engage in trust services, to issue letter of credit, to rent time-deposit boxes, and to provide similar services. Capital market also plays a very important role in investment. The shares issues by the company to raise capital for investment are traded in capital market. A commercial bank is an institution that operates for profits. Like other industrial or commercial enterprise, a bank too, seeks to earn maximum income through the suitable employment of its resources. It is a financial intermediary - a sort of a middleman between people with surplus funds and people in need of funds. In general, commercial banks are those FIs, which play the role of financial intermediary in collection and disbursement of funds from surplus unit to deficit unit. (Bhandari, 2003:37)
"A commercial bank is one which exchange money, deposit money, accepts, grant loan and perform commercial banking functions and which is not a bank meant for cooperative agriculture industries or for such specific purpose" (Nepal Commercial Bank Act, 2031:1)

Hence, the term commercial bank is used taking meaning of all banking habits. That's why joint stock banks, member banks, and credit banks are frequently used interchangeably with the term commercial banks. But it is different that central bank. Central bank cannot be interchangeable with other banks. In this way, a commercial bank is different from a central bank. While the primarily objective of a commercial bank is the maximization of profit the central bank is primarily concerned with the effects of its operations on the functioning of the economy. Moreover, while there may certainly be many competing commercial banks, there exists only one central bank in a country. While the commercial banks compete against each other, the central bank comes out if any; ordinary banking business for the general public, incomplete if confines itself mainly to controlling the operations of the banking system in country.

### 2.1.2 Features of a Sound Lending and Investment Policy

Sound lending and Investment policy is not only prerequisite for banks profitability, but also crucially significant for the promotion of commercial savings of an under development country like Nepal.

There are basically five features

1. Liquidity
2. Profitability
3. Suitability
4. Safety and Security
5. Diversification

## 1. Liquidity:

Liquidity for a bank means the ability to meet its financial obligations as they come due. Bank lending finances investments in relatively illiquid assets, but it fund its loans with mostly short term liabilities. In simple sense, liquidity refers to the cash or any assets that can be converted into cash immediately. People deposit their money at the banks in different accounts with confidence that the bank will repay their money when they needed. To maintain such confidence of the depositors, the bank must keep this point in mind while investing in different securities or at the time of lending. Hence, the liquidity position of bank is such an important factor that it must be able to meet its cash requirement either by its cash in vault or by the help of converting its assets into cash in case of demand for such from its customers.

## 2. Profitability:

Like all businesses, banks profit by earning more money than what they pay in expenses. The major portion of a bank's profit comes from the fees that it charges for its services and the interest that it earns on its assets. Its major expense is the interest paid on its liabilities. Commercial banks can maximize its wealth through maximization of return on their investment and lending. Generally the profit of commercial banks depends upon the interest rate of the bank, volume of loan provided, time period of loan and nature of investment on different securities.

A good bank is one who invests most of its funds in different earning asset standing safely from the problem of liquidity i.e. keeping cash reserves to meet day to day requirements of the depositors.

## 3. Suitability:

Bank should always try to know that why a customer needs loan because if the borrower misuse the loan granted by bank he will never be able to repay loan. In order to avoid such circumstances, advanced should be allowed to select the suitable borrowers.

## 4. Safety and Security:

The bank must take care while investing funds. It should never invest its funds in those sectors, which are subject to too much fluctuation because a little difference may cause a great loss. Similarly, the businessman who is bankrupt at once or earns million in a minute should not be financed at all. Banks should accept that type of securities, which are commercial, durable, marketable and high market prices. For this purpose "MAST" should be applied for the investment. "MAST" stands for:

M- Marketability
A- Ascertain ability
S- Stability
T- Transferability
Bank must take care of the belonging of public while investing and providing loan received in the form of deposits. The risk and return involved must be analyzed thoroughly so that depositor's money is advanced safety where the risk of loss does not exist.

## 5. Diversification:

The bank must not invest the funds in one specific sector but the various sectors so that when something goes wrong in one particular sector, other will recover. To minimize risk and maximize wealth, banks must diversify its investment in different sectors. Since future is uncertain and investment decision involves risk, benefits of investment are difficult to measure and cannot be predicted with certainty. But capital market provides a means for distributing risk among various parties. It provides and allocates funds to firms with profitable investment opportunities and offers an avenue of liquidity for individuals to invest current in income or borrow against future income. Capital market brings together those who have surplus funds to lend and those who desire to borrow to finance the investment in industrial or commercial venture. Development of financial market and investment move in similar cyclical patterns. (Bhurtel, 2009:15-17)

### 2.1.3 Principle of Sound Investment Policy

It is universally known fact that the most important problem in banking administration is that of investing its deposits and paid up capital in various forms of earning assets. This is also known as portfolio policy. The bank's portfolio being nothing but an arranged and digested scheme of its assets. Actually the normal practice of bank is collection the deposit for short term maturity and investing and advancing for the long term period which have hampering the liquidity section of any FI's. Every FI"s should maintain the balance portfolio which shall minimize the liquidity crunch and smoothly operates the daily business transaction. The funds of banks are generally invested either in those assets, which are non-profitable, or those, which are profitable. Non-profitable assets include cash reserve and the dead stock and profitable assets includes call money, investment, advances and load, cash credits, overdrafts, discounting of bills and acceptances etc.

The guiding principal of sound investment is as follows:

## 1. Safety

A bank should be very much conscious and careful in investing procedures and sectors. The banks should never invest its funds on those securities, which are too much volatile because a small alter may cause great loss. Safety would be the first guiding principal of a bank, so far as its advances and investment are concerned, because the very existence of a bank depends on the safety of its outstanding, which should never therefore be sacrifice to the profit earning capacity of its advances.

## 2. Liquidity

Liquidity generally refers to cash or any assets that can be converted into cash immediately. Similarly, liquidity refers to that state or position of a bank to meet all of its obligations. In other words, it refers to the capacity of the bank to pay cash against deposit. People deposit money at the ban k in different account with confidence that the bank will repay their deposit money when they need, to maintain such confidence of depositors, the bank must keep this point in mind while investing its funds in different securities or at the time of lending.

## 3. Diversification of Risk

It is also necessary to remember that a prudent bank must avoid investing all its funds in meeting the needs of any one industry or any one group of industries or any one group of industries for considerations of self-interest as well the larger public good. The imprudence on putting one's own eggs into one basket cannot be too often reiterated. Therefore bank should invest their funds in different field than investing in same field or sector.

## 4. Return

Another important factor that will determine the decision of the bank whether or not to grant loan or to make an Investment will depend upon the answer to the question whether or not it will get a fair return on its Investment. A bank always aims at securing maximum profits for its share-holders. The different between borrowings and lending rate constitutes the gross profit and no bank ordinarily will think of an advance without a satisfaction margin of profit.

## 5. Marketability

The investments of the bank should be such as can be easily should and realized in cash readily. Loans given against commercial paper representing goods in transit or against stocks and shares of well-known companies are easily realizable while loans given against immovable property cannot be easily realized. The bank must make sure that the securities, in which he invests his funds, are easily saleable without appreciable loss.

## 6. Stability of price

The primary object of a bank in buying securities is not to gain by a possible rise in their prices, which is the aim of a speculating dabbler. Therefore the price of the securities should be liable to wide fluctuations.

## 7. Stock Exchange Securities

This consists of govt. securities as well as securities of the joint stock companies. These securities are easily and quickly realizable. As they are quoted on the stock exchanges so their value can be easily ascertained. In case of need, a bank can either sell them or
pledge them without any hesitation. But before accepting them, the bankers should see that the shares of the companies are not partly paid, that sufficient margin has been kept and they are negotiable. Speculative shares should not be accepted. (Mali, 1965: 68)

### 2.2 Some Important Terms

The study in this section comprises of some important banking terms for which efforts have been made to clarity the meaning, which are frequently used in this study, which are given below:

## a. Loan and Advances

Loan and advances is the main sources of income and most profitable assets to a bank. A bank is always willing to lend as possible since they constitute the larger part of revenue. A commercial bank hardly lends money for a long period. The commercial banks lend money for a short period of time that can be collected at a short period. The commercial banks never bounded to provide long-term loan because the banks have to synchronize the loans and advances with the nature of deposit they receive. The banks provide loan and advances against the personal security of the borrower or against the security of the immovable and movable properties. The facilities of granting loan, advances and overdrafts are the main service in which customers of the bank can enjoy. Funds borrowed from the banks are much cheaper than those borrowed from unorganized money lenders. Furthermore, an increase in an economic and business activity always increases the demand for funds. Due to limited resources and increasing loans, there is some fear that commercial banks and other financial institutions too may take more preferential collateral while granting loans causing unnecessary botheration to the general customers. Such loans from their institutions would be available on special request only and there is a chance of utilization of resources in economically less productive fields. In additional to this, some portion of loan, advances and overdraft includes that among which is given to staff of the bank for house loan, vehicle loan, personal loan and others, in mobilization of commercial banks fund, loan, advances and overdrafts have occupied a large portion.

## b. Investment on Government Securities, Share and Debenture

Though a commercial bank can earn some interest and dividend from the investment on government securities, share and debentures, it is not the major portion of income, but it is treated as a second source of banking business. Although the income generating from investment on Government securities, share and debenture is low but the earning is guaranteed. But if we invest in other company share and debenture the income generating is not guaranteed at all. A commercial bank may extend credit by purchasing government securities bond and share for several reasons. Some of them are given as:

- It may want to space it's maturating so that the inflow of cash coincides with expected withdrawals by depositors or large load demands of its customers.
- It may wish to have high-grade marketable securities to liquidate if its primary reserve becomes inadequate.
- It may also be forced to invest because the demand for loans has decreased or is not sufficient to absorb its excess reserves.

However, investment portfolio of commercial bank is established and maintained primarily with a view of nature of banks liabilities that is since depositors' may demand funds in great volume without previous notice to banks. The investment must be of a type that can be marketed quickly with litter or no shrinkage in volume.

## c. Investment on Other Company's Share and Debenture

Due to excess funds and least opportunity to invest their funds in much more profitable sector and to meet the requirement of Nepal Rastra Bank's directives many commercial banks have to utilize their funds to purchase shares and debentures of many other financial and non-financial companies. Nowadays most of the commercial banks have purchased regional development banks and other development bank's shares. But as we know the risk factor investing on other company's share and debenture is high than investing in the government securities, share and debentures.

## d. Deposits

The sum of money collected by the banks from the depositors in different accounts is called deposit. The banks collect deposit from customers in various accounts like current account, saving account and fixed deposit account. Deposit is the main source of fund for the bank. Thus deposit is the lifeblood of commercial banks; the success of a bank greatly depends upon the extent to when it may attract more and more deposits. As deposits are borrowed amount from depositors, it is liability for the banks. Deposit is the lifeblood of the commercial bank. Though, they constitute the great bulk liabilities, the success of a bank greatly depends upon the extent to which it may attract more and more deposits, for accounting and analyzing purpose, deposits are categorized in three headings. They are:

- Current Deposit
- Saving Deposit
- Fixed Deposit (Bhurtel, 2009: 30-33)


### 2.3 Concept of Investment

Banks are such type of institution, which deal in money and substitute for money. They deal with credit and credit instrument. The important thing for the bank is good circulation of credit. Fluctuate flow of credit and weak decision harms the whole economy and the bank as well Good management of credit or credit instrument is very important for banks.
"Investment is any vehicle into which funds can be placed with the expectation that will preserve or increase in value and generate positive return" (Gitman and Jochnk, 1990:21).
"The secret of successful banking is to distribute resources between the various forms of assets in such a way as to get a sound balance between liquidity and profitability so that there is cash (on hand quickly realizable) to meet every claim and at the same time, enough income for the bank to pay its way and earn profit for its shareholders"
(Radheswami \& Vasuderan, 1985: 219).
"Investment is the commitment of funds to one or more assets that will be held over some future time period. Investment is concerned with the management of an investor's wealth, which is the sum of certain income and present value of all future income" (Jones, 1999: 33).
"Investment in it's broaden sense means the sacrifice of current dollars for future dollars. Two different attributes are generally involved : time and risk. The sacrifice takes place in the present and its magnitude is generally uncertain" (Sharpe, Alexander and Bail, 1998: 1).
"Commercial banks still remain the heart of our financial system holding the deposits of millions of personal, governments and business units. They make funds available through their lending and investing activities to borrowers, individuals, business firms and governments. Commercial banks are the most important type of financial institutions in the nation in terms of aggregate assets" (Reed \& Gill et.al. 1980: 5).
"Investment decision expenditure and benefits should be measured in cash. In investment analysis, cash flow is more important than accounting profit. It may also be pointed out that investment decision affects the firm's value. The firm's value will increase if investments are profitable and add to the shareholder's wealth. Thus, investment should be evaluated on the basis of criteria, which is compatible with the objectives of the shareholder's fund maximization.

An investment will add to the shareholder's wealth if it yields benefit in excess of the minimum benefits as per the opportunity cost of capital" (Pandey, 1999: 407).
"Investment has many factors. It may involve putting money into bonds, treasury bills or note or common stock or painting or real state or mortgage or oil venture or cattle or the theater. It may involve specially in bull markets or selling short in bear market. It may involve options, straddles, rights, warrants, convertibles, margin, gold silver, mutual funds, money market funds, index funds and result in accumulation wealth. Diversity and
challenge characterize the field. For the able or lucky, the rewards may be uniformed results can be uniformed results can be disastrous (Ghone, Zinbarg and Zeiked, 1997: 1).

Investment, in its broadest sense, means the sacrifice of current rupees (dollars) and resources to the sake of future rupees (dollars) and resources. In other words, it is a commitment of money and other resources that are expected to generate additional money and resources in the future. Such a commitment takes place in the present and is certain to occur but the reward comes in the future and always remains uncertain. Therefore, every investment entails some degree of risk. Country's growth rate is largely depending on Investment and commercial banks are key for investing funds in productive works as they deal with money. They collect funds and utilize it in a good Investment, which is not an easy task for them. Therefore an Investment of funds may be the question of life and death for the bank. They must have effective and good investment, policy to exits in this world of competition.

Investment is the current commitment of the savings that compensates for the time, the expected rate of inflation and the uncertainty involved. To state in words, an investment in any vehicle into which funds can be placed with the expectation that they will generate positive return and /or their value will be preserved or increased. (Thapa, 2062:1.2)

Mr. Bodhi B. Bajracharya (2047), in his article entitled, "Monetary Policy and Deposit Mobilization in Nepal" at Rajat Jayanti Smarika, RBB has concluded that the mobilization of domestic saving is one of the monetary policies in Nepal. For this purpose commercial banks stood as the vital and active financial intermediary for generating resources in the form of deposit of the private sector for providing credit to the investor's in different sector for providing credit to the investor's in different aspects of economy" (Bajracharya, 2047: 93-97)

Bhaskar Sharma (2002) in his article "Banking the Future Competition" in New Business Age, has mentioned that-due to the lack of investment avenues, banks are tempted to invest without proper credit appraisal and one personal guarantee, whose negative side effect would show colors only after 4 or 5 years; again he mentioned that private
commercial banks are have been mushroomed only in urban areas where banking transaction in large volume is possible. The rural and suburban areas mostly remain unattended too. This is likely to prevail till completion takes its full reinin the urban areas" (Sharma, 2002: 13)

Mr. Shekhar Bahadur Pradhan (2053 B.S.) in his article entitled "Deposit Mobilization, its problem and prospects" in Nepal Bank Patrika has presented that deposit is the life blood of every financial institutions, be it commercial bank, finance company cooperative or non government organization.

Mr. Pradhan has highlighted following problems of deposit mobilization in Nepalese context.

1. Most of the Nepalese people do not go for saving in institutional manner due to the lack of good knowledge. Their reluctance to deal with institutional system is generated by the lower level of understanding about financial organization process, withdrawn system, and availability of depositing facilities and so on.
2. Unavailability of the institutional services in rural areas.
3. Due to lesser office house of banking system people prefer holding the cash in the personal possession.
4. No more mobilization and improvement of the employment of deposits and the loan sectors.

Mr. Pradhan has also recommended for the prosperity of deposit mobilization which are as follows:

1. By providing sufficient institutional in the rural areas.
2. By cultivating the habit of using rural banking unit.
3. By adding service hour system to bank.
4. Nepal Rastra Bank should also organize training program to develop skilled manpower.
5. By spreading co-operatives to the rural areas to develop mini branch services

Sunity Shrestha (1998) In the article of "Leading Operation of Commercial Bank of Nepal and its impact on GDP" in The Business Voice of Nepal, bank portfolio (loans and investments) of commercial banks has been influenced by the variable securities rates Investment planning of commercial banks in Nepal is directly traced to fiscal policy of government and heavy regulatory procedure of NRB. So the investments are not made in professional manner. Investments planning of the commercial banks in are not made in professional manner. Investment planning of the commercial banks in Nepal has not been found satisfactory in terms of profitability, safety, liquidity, productivity and social responsibility. To overcome this problem, she has suggested, commercial banks should take their investment function with proper business altitude and should perform lending and Investment operation efficiently with proper analysis of the projects. Total risk of security can be divided into systematic and unsystematic components. Systematic risk is risk that cannot be diversified away for it affects all securities in the market. Unsystematic risk is unique to the particular securities and can be eliminated with efficient diversification. If the assumption of the CAPM or APT factor model holds this risk does not matter to investor. As a result, diversification of assets by a company in an effort to reduce volatility would not be a thing of value. Investment is done usually to ret some return from it in future. There is no use of Investment if there is not return. Even the parents invest on their children education with a hope that their children will earn money in future with that education they received. Therefore, there must be return may be positive and negative. Internal Rate of Return (IRR) and Net Present Value (NPV) are the only appropriate means by which to judge the economic contribution of Investment proposal. The important distinctions between the internal-rate of return method and the present-value method involve the implied internal rate of return.

If Investors concerned with real returns, their securities will be priced in the market place so that expected nominal returns incorporate the expected rate of inflation. At the start of given Investment holding period nominal interest rate for securities having no risk of default should cover both a requisite, expected real return and the expected rate of inflation. At the end of the period, the real return actually received will be the difference between the nominal return and the rate of inflation actually experienced. Only when
actual inflation equals expected inflation will be actual real return equal the expected real return on such securities. Although deviations of actual inflation from expected inflation may have relatively little effect on the real return on investments in general, they have a significant effect on specific Investment. As given in, the world Book Encyclopedia, Most people store their money with bank, which keeps an account of how much money is costumer deposit. People gain access to their money through cash machine, counter transaction or by writing Cheque. Banks may provide interest when a certain amount of money is kept in the account, but will charge customers who borrow money. Banks also provide financial services, such as pensions and insurance policies. In brief, bank is an institution, which accepts deposits in deposit in different accounts, provides loans of different types and creates credit. In general, the term bank is used to mean commercial bank. The commercial bank is the oldest type of bank. The profit maximization is the main objective of this bank. The modern commercial banks collect deposits in current, saving and fixed account from general public and the institution. It provides loans to individuals and institution from the deposits. In this way bank mobilize saving for productive works and thus for industrial development. The modern commercial banks provide loan not only to traders but also to agriculture, industry and service. Although this bank concentrates itself on short-term loan, it has started to provide even medium and long-term loans to some extent. The difference between the rate of Investment on deposits and loan is the main source of its income. The function of a commercial bank is not unique in all countries. The banks that collect deposits and advance loans are called commercial banks. According to these definition commercial banks accepts deposit and provide loans but other financial institutions also collect deposits. To differentiate commercial bank from other institution Dr. Shyam Joshi had defined it as a great institution that conducts the payment mechanism of a country. The individuals and institution make payment to each other through the mechanism of commercial bank. The commercial bank plays a leading role in the smooth operation of an economy.

In world book (2000), it states that Investment promotes economic growth and contributes to a nation's wealth. People deposit money in a saving account in bank. For example, the bank may invest by lending the fund of various business companies. These firms, in return, may invest the money in new factories and equipment to increase their production. In addition to borrowing from the banks, most companies issue stocks and bonds that they sell to investors to raise capital needed for business expansion. Government also issue bonds to obtain funds to invest in such projects as the construction of dams, roads and schools. All such Investment by individuals, business and govt. Involves a present sacrifice of income to get an expected future benefits. As a result, Investment raises a nation's standard of living. The above statement clearly specifies the importance of Investment and the role of banks for the development of the country. It the major financial need for the various developments. The banks can play the vital role for the financing activities in the business. The saving and Investment is most necessary for the developing country, which can be managed by banks. Capital accumulation also plays vital to accelerate the economic marginal propensity of consumption. As a result, such countries are badly in trapped into the vicious circle of poverty. Therefore the basis problem of the developing of the countries is to raise the level of saving and thus Investment and the problem can be solved through well-established banks. In general, bank means an institution that accepts deposits in different accounts and provides loans of different types. Bank can be defined according to the functions of a bank or the service it provide such as commercial bank, central bank and industrial bank. In the words of leaf a bank is a person or corporation which holds it out to receive from the public, deposits payable on demand by Cheque.

Mr. Sharma (2000) in his article entitled, "Banking the Future on competition" in New Business Age, states that the commercial banks are establishing and operating mostly in urban areas. From his studies he found that:

- Commercial banks are establishing and providing their service in urban area only. They don't have interest to establish in rural areas. Only his branch of Nepal Bank Ltd and Rastriya Banijya Bank Ltd. are running in those sectors.
- They have maximum tax concession.
- They don't properly analyze the credit system.

He found that due to the lack of Investment avenues, banks are tempted to invest without proper credit appraisal and personal guarantee, whose negatives side effects would show colors only after four or five years. This restricts the process of financial intermediation, which might otherwise bring benefits such as reduction of Investment risk and increase in liquidity. When capital is highly mobile international, saving from aboard can also finance the investment needed at home. The development of an economy requires expansion of productive activities, which in turn is the result of the capital formation, which is the capital stock of country. The change in the capital stock of the country is known as Investment. Therefore Capital formation is closely related to investment. Investment generally takes two forms:

1. Financial Investment and
2. Physical Investment

Physical Investment related to real Investment in the economy or industry, which is known as capital formation. Capital formation shows the change in gross fixed assets of production units of manufacturing industries.

Capital formation refers to the creation of physical productive facilities such as building tools, equipment and roads. The process of adding to the amount of stock of the real assets produces growth in the economy. It means increasing a country's stock of real capital. It implies additions to the exiting supply of capital goods in a country. It represents an additional of new capital stock to exiting stock after deducting depreciation, damage and other physical deterioration of the existing capital stock. Economic progress in country depends upon its rate of capital formation. Hence, a key factor in the development of an economy is the mobilization of domestic resources. In the process of capital formation, the capacity to save by certain classes of people and institution becomes quit important. These people have varied asset-preferences, which change from time to time. The need of entrepreneurs who actually use saving for productive purpose also varies over time.

In the journal of Info Himalayan (2003: 4) Yadav pant, a bank is a service-oriented institution, which provides many kinds of services for its customer, all of which are equally important. Moreover, the quality of service should be up to the mark to meet the customer's requirement. Customers are the key players for a service organization, without whom such organization can ever exist.

### 2.4 Review of Related Thesis

A Study done by Lila Prasad Ojha (2009), 'Lending Practices: A study on NABIL Bank
Ltd., SCB Nepal Itd. and Himalayan Bank ltd.' with the objectives of:

- To measure the bank's lending strength.
- To analyze the portfolio behavior of lending and measuring the ration and volume of
- Loans and advances made in agriculture, priority and productive sector.
- To measure the lending performances in quality, efficiency and its contribution in total income.


## Major Findings of this study are as follows:

- The measurement of lending strength in relative terms has revealed that the total liability to total assets of SCBNL has the highest ratio. The high ratio is the result of high volume of shareholder equity in the liability mix. Himalayan Bank Ltd. has high volume of saving and fixed deposits as compared to current deposit resulting intro low ratio of non-interest bearing deposits to total deposits ratio compared to the combined mean.
- The loan advances, and investment to deposit ratio has shown that NABIL Bank Ltd. Has developed the highest proportion of its total deposits in earning activities. This is the indicative of that in fund mobilizing activities NABIL Bank Ltd. is significantly better.
- The ratio of investment to investment and loan and advances has measured the total portion of investment in total of investment and loans and advances. The ratio among the banks does not have deviated significantly.

A Study done by Suman Joshi (2010), entitled with 'Investment practices of Joint Venture Commercial Banks' made a comparative study of SCBL and Nepal SBI Bank. His main objectives were as follows:

- To evaluate the liquidity management, asset management efficiency, profitability, risk position and investment practices of Standard Charted Bank Nepal Ltd. and Nepal SBI Bank Ltd.
- To analyze the deposit and investment trends of the sample organization.
- To recommend the policies to be adopted by the sample organization based the financial analysis for its future development.


## Major Findings of this study are as follows:

- Average ratios of cash and bank balance to total deposit reveals that NSBIBL has the highest ratio then SCBNL. Which shows that the liquidity position of NSBIBL is better than that of other banks. Whereas SCBNL has the lowest C.V., it means SCBNL is more uniform in the comparison of other banks.
- Average ratio of each and bank balance to current assets reveals that NSBIBL has the highest average ratio. It means the liquidity position of current assets of NSBIBL is better in comparison of other banks. However SCBNL has taken more risk to meet the daily requirement of its customer deposit in the comparison of other banks. On the other hand, SCBNL has the lowest C.V., it means SCBNL is more consistent in the concern of maintaining cash and bank balance.
- Average ratio of investment in government securities to current assets reveals that SCBNL has the highest ratio then NSBIBL. It means SCBNL has invested more part of the current assets in government securities and NBBL has invested less part of the current assets in the government securities. On the other hand, C.V. of

SCBNL is the lowest; it means SCBNL is more stable to make investment in government securities.

- The average ratio of loan and advance to current assets shows that NSBIBL has the highest ratio then SCBNL. It means NBBL has mobilized more portions of its current assets in loan and advance and in the case of SCBNL vice-versa.

Mr. Akur Acharaya (2010) has conducted a study on "Investment policy analysis of commercial bank: a comparative study of NIBL with EBL and NABIL bank" will the following objectives:

- To evaluate the liquidity, profitability, risk position and assets management of the sample banks.
- To evaluate and discuss the investment policy and fund mobilization of NIBL, EBL and NABIL.
- To show the relationship between deposit and investment trends of the bank.


## Major Findings of this study are as follows:

- Liquidity position of NIBL is comparatively average than NABIL and EBL. Assets management ratio of NIBL occupies the average position in comparison with other two banks NABIL and EBL.
- NIBL is successful in utilization its overall working fund on profit generating activity than the NABIL and EBL. But return from loan and advances ratio is comparatively average, in this EBL has taken best position.
- From the study of capital risk ratio and credit risk ratio of all three banks comparatively NIBL is successful to attract the deposits and inter banks fund, and utilize its loan and advances form total assets in safest way by taking high risk, which helps to increase the level of profit and maximizing the value of the firm.

A Study done by Shiba Raj Loudari (2010), entitled with 'A study on investment policy of Nepal Investment Bank Ltd. in comparison to Nepal SBI Bank Ltd' with the objective of:

- To examine the liquidity assets management and profitability position and investment policy of NIBL in comparison to Nepal SBI Bank Ltd.
- To study the growth ratios of loans and advances and investment to total deposit and net profit of NIBL comparison to Nepal SBI Bank Ltd.
- To advances, net profit and outside assets of Nepal Indosuez Bank Ltd. in comparison to Nepal SBI Bank Ltd.


## Major Findings of this study are as follows:

- Current ratios for both the Banks is satisfactory.
- Nepal SBI Bank Ltd. has increased investment in government securities where as Nepal Indosuez Bank Ltd. has decreased.
- The analysis of growth ratios shows that growth ratios of total deposits, loans and advances, total investment and net profit of Nepal Indosuez Bank Ltd. are less than that of Nepal SBI Bank Ltd.

A Study done by Tilak Kumar Raya (2010), entitled with 'Investment policy and Analysis of Commercial Banks in Nepal' made a comparative study of SCBL with NIBL and NB Bank. His main objectives were as follows:

- To discuss fund mobilization and Investment policy of SCBL in respect to its fee based off-balance sheet transaction and fund based on balance sheet transaction.
- To evaluate the quality, efficiency and profitability and risk position.
- To evaluate trend of deposit, Investment, loan and advances and projection for next years.


## Major Findings of this study are as follows:

- Mean current ratio of SCBL is slightly higher than that of SCBL and Nepal Investment bank.
- Mean ratio of cash and bank balance to total deposit of SCBL is lower than NIBL and NBBL.
- Liquidity position of SCBL is comparatively better than NIBL and NBBL. It has the lowest cash and bank balance to total deposit and cash and bank balance to current ratio. It has made enough Investment on government securities but it has maintained low Investment policy on loan and advances.
- SCBL is comparatively average successful in it's on balance sheet operation. But off balance sheet operation activities in compared to NIBL and NBBL has maintained the strong position.
- There is significant relationship between deposit of loan and advances and between asset and met profit of SCBL.


### 2.5 Review of Legislative Provision

Legislative environment has significant impact on the commercial banks established, their mobilization and utilization of resources. All the commercial banks have to conform to the legislative provision formulated to facilitate the smooth running of commercial banks. Compulsory Cash Reserve Ratio (CRR) and Refinancing Under the provision in Nepal Rastra Bank, (NRB) Act 2002, the NRB has formulated and implemented five annual monetary policies so far. The focus of monetary policy has been to insure price. External and financial sector stability so as to create the environment supportive for high and sustainable economic growth.

NRB issues new monetary policy release on July 24, 2009 for FY 2009/10. The provision under monetary policy stance of 2009/10 has been taken to be cautious and tight. The following analysis underpins the stance of monetary policy:

Nepal is facing a high inflationary pressure from the third quarter of 2007/08. Though the pressure is largely from the supply side, there is a need to be cautious to avert the fuelling of inflation from the monetary expansion. This entails a cautious and tight monetary policy stance.

Though prices for the tradable are influenced by the international prices, prices for nontradable are determined through domestic demand and supply. So, there exists the potential to generate inflationary pressure forlorn-tradable through excessive growth in money supply. Hence, there is a need for monetary policy stance to be cautious in the present inflationary situation.

The wider volatility in equity prices adversely affects the banking sector in particular and the economy as a whole in general. Excessive exposure of banks and financial institutions to the share market leads to a bubble. When the bubble busts, the non-performing loans (NPLs) rises, leading to a stress in the banking sector. This fact has also been taken into account in choosing the stance of monetary policy for 2009/10.

In the face of deteriorating investment environment and the elevated level of remittances, there could be an increase in exposure of commercial banks and financial institutions to the real sector. This increase may lead to a surge of real estate prices. Banks and financial institutions provide loans to real estate based on the market value of land and houses as collateral, a bubble in the real estate market directly affects the banking sector.

The negative real interest rate for a long period of time partly on account of a rise in inflation has also been a concern of monetary policy. Due to negative real interest rate, the allocation of financial resources has not been efficient. This development also underpins the stance of monetary policy for 2009/10.

Inflation rate at the global level is plummeting to single-digit level, while Nepal still faces the inflation at double-digit level, largely due to supply disturbances. Inflation is estimated to ease to a single-digit level with expected improvement in food and vegetable prices. Subject to no further adjustment in the petroleum prices and improvement in distributional channel, the annual average consumer price inflation is projected to moderate at 7.0 percent in 2009/10.

Like in the past, the international reserves sufficient to cover the merchandise and service imports for at least 6 months has been taken as the second primary objective of monetary policy of 2009/10 as well. In order to meet this target, a BOP surplus of Rs. 18.0 billion is projected for 2009/10.

The existing liquidity overhang in the economy is sufficient enough to facilitate the economic growth of 5.5 percent as mentioned in the budget speech for 2009/010. The growth rate of broad money is projected at 17.0 percent for 2009/10. It is estimated to grow by 21.0 percent in 2008/09. With a view to containing inflation at 7.0 percent, the growth in M2 is projected at a lower rate than that of the previous year.

The gross domestic credit of banking sector is projected to expand by 19.3 percent in 2009/10. Of the total domestic credit of banking sector, the credit to the private sector is projected to increase by 20.7 percent in 2009/10 compared to a growth of 24.2 percent in the previous year.

The NRB has a plan to prepare broad monetary survey by including development banks and finance companies into the coverage of monetary statistics framework. Likewise, the bank is planning to prepare monthly export-import price index (XMPI) within this year, which is believed to further assist trade related and macroeconomic analysis. (NRB press release, July 2009)

## Policy Guidelines on the Establishment of the Commercial banks

Under the act of bank and financial institution 2063 NRB issue new policy to establishment of bank and financial institution on 2063/03/29 and timely changed on 2063/12/13 as follows:

1. Paid up Capital: To establish a commercial bank of national level the paid up capital must be at Rs. 2000 million.
2. Share Capital: In general, the share of commercial banks will be available for the promoters ( 70 percent) and general public ( 30 percent). To operation joint venture of the foreign banks and financial institution could have a maximum of 85 percent to minimum 20 percent share investment on the commercial banks of national level. In order to provide adequate opportunity for investment to the Nepali promoters in national level banks, only 15 percent of total share capital will be made available to general public on the condition that the foreign bank and financial institutions are going to acquire more than 50 percent of the total share. Within 15 percent the bank and financial institution put off provision 5 percent for its staff.
3. Banks already in operation: Banks that is already in operation and those who have already acquired letter of intent before the enforcement of these provisions have to bring their capital level within seven years, i.e. by 30 Ashad 2070, as per the recently declared provision.
4. Legal procedure: Banks to be established with foreign promoter’s participation have also to be registered fulfilling all the legal processes prescribed by the prevalent Nepal laws.
5. Promoter's share payment procedures: Of the total committed sharer capital, the promoters has to deposit in NRB an amount equal to 5 percent along with the application and another 45 percent at the time of receiving the letter of intent on a interest fee basis. The bank should put into operation within one year of receiving the letter of intent. The promoters have to pay fully the remaining balance of committed total share capital before the bank comes into operation. Normally, within 4 months from the date of filling of the application, NRB should give its decision on the establishment of the bank whether it is
in favor or against it. If it declines to issue license, it has to inform in writing with reasons to the concerned body.
6. Promoters' qualification and experience: action on the application from promoters will not be initiated if it is proved that their collateral has been put on auction by bank and financial institution as a result of non-payment of loans in the past, who have not cleared such loans or those in the black list of the credit information Bureau and 3 years have not elapsed from the date of the removal of their name from such list. The application will be deemed automatically cancelled irrespective of it being on any stage of process for license issuance if the above events are proved. Of the total promoter, one-third should be at least a graduate of TU or recognized institution with major in economics or accountancy, finance, law, banking or statistics. Likewise, one-fourth promoters should have the work experience of bank or financial institution or similar nature.
7. Promoters' share: Promoter Group's share can be disposed or transferred only on the condition that the bank has been brought in operation, the share allotted to the general public has been floated in the market and after completion of 3 years from the date it has been registered in the Stock Exchange. But before the disposal of such shares it is mandatory to get approval from NBR. The share allotted to general public has to be issued and sold within 3 years from the date the bank cannot issue bonus shares or declare and distribute dividends, shareholders of the promoters group and their family members cannot have access to loans or facilities from the same institution.
8. Disqualify from becoming director: An individual who is already serving as a director in one of the bank or financial institutions licensed by NRB cannot be considered eligible to become the director in other banks or financial institutions. Also, stock brokers, market makers and also an individual and institution involved as an auditor of the bank and institutions carrying on financial transactions cannot be director.
9. Investment: One person, family, firm, invest maximum 15 percent of a firm and 1 percent of another firm.
10. Promoter: No more than one promoter from one family in one firm.
(Banking Khabar Patra, 2010: 68-73 )

While reviewing the books and articles and past studies, it is found that banks are not just the storehouse of the country's wealth but are reservoirs of resources necessary for economic development and employment generation. There are still different obstacles in the effective operation of the commercial banks in Nepal. Therefore these obstacles should be eradicated of the economic development of Nepal;

### 2.6 Research Gap

The purpose of this study is to draw some ideas concerning to maintain good investment policy and to see what new contribution can be made and to receive some ideas, knowledge and suggestion in relation to maintain good investment policies of sample companies. The previous students cannot be ignored because they provide the foundation to the present study. In other words there has to be continuity research. It is clear that the reference of new research cannot be found on the exact topic that is "Investment Analysis of Commercial banks in Nepal". Therefore to complete this research many book, journals, articles and various published and unpublished dissertation and field opinion are followed as guideline to make the research easier and smooth though the reference materials.

Also the past thesis has not analyzed deeply on the major points like Mean Value, SD and CV value. The past researchers only calculated the value and put in the presentation section but not clearly clarify the cause and impact. In this research I have consider very deeply on this matter and analyze comparatively with both table and diagram indeed which differs the other thesis.

The researcher can find out the gaping from the past research that has to be fulfilled by the present research work. In this regard, here the researcher is going to analyze the different policy in this topic. It is the new topic for the research work. It is expected to the uncovered areas of this research work will be studied. The gaping between old and new research work will be focused and filled up based on the given objectives and limitation in this research.

## CHAPTER -IV

## PRESENTATION AND ANALYSIS OF DATA

This chapter is concerned with financial analysis and statistical analysis is concerned about comparative analysis and interpretation of available data. Various financial and statistic tools have been used in this part. Necessary figures and tables are also presented in this part to describe about the investment mechanism of the banks. Various finical ratios concerned to the invest management and the fund mobilization are presented and discussed to evaluate and analyze the performance of the other. It is not able that only some important financial ratios are calculated from the view point of fund mobilization and investment management. Financial analysis assists in identifying the major strengths and weaknesses of any institutions. It indicates whether a company has enough cash to meet its obligations and ability utilize properly their available resources. Financial analysis can also be used to assess the company's liability as an ongoing and determine whether a satisfactory return is being earned for the risks return. Thus, financial condition of the banks in terms of lending portfolio management is necessary to find out the comparative credit practices between the competitors.

### 4.1. Presentation and Analysis of Secondary Data:

This section provides interpretation and analysis of secondary data. The main purpose of this chapter is to study, evaluate and analyze those major financial performances, which are mainly related to the investment management and fund mobilization. It is notable that all types of financial ratios are not studies under this chapter. Secondary data is data collected by someone other than the user. Common sources of secondary data for social science include censuses, surveys, organizational records and data collected through qualitative methodologies or qualitative research. Secondary data can be obtained from two different research strands:

- Quantitative: Census, housing, social security as well as electoral statistics and other related databases.
- Qualitative: Semi-structured and structured interviews, focus groups transcripts, field notes, observation records and other personal, research-related documents.


### 4.1.1 Ratio of Commercial Banks Investment to NIBL Investment

This ratio indicates the portion of Investment made by Nepal Investment Bank to total Investment made by commercial banks of Nepal. It shows how much NIBL portion of investment in percentage is directly involved in Investment compared to other commercial bank. And the ratio is derived by dividing Investment made by NIBL by Total Investment made by commercial banking industry.

Table No. 1 Total Commercial Banks Investment to NIBL Investment Ratio

| (Amt in Millions) |  |  |  |
| :---: | :---: | :---: | :---: |
| Year | Total investment of commercial banks | NIBL investment | Ratio (\%) |
| 2005/06 | 82,174 | 5,602 | 6.82 |
| 2006/07 | 93,531 | 6,505 | 6.95 |
| 2007/08 | 108,955 | 6,874 | 6.31 |
| 2008/09 | 130,857 | 7,399 | 5.65 |
| 2009/10 | 168,758 | 8,635 | 5.12 |
| Mean |  |  | 6.17 |
| S.D |  |  | 0.76 |
| C.V |  |  | 0.12 |

(Source: Annex-1)
The above table shows the Investment made by all commercial banks and by NIBL bank alone. From the above table it shows that portion of Investment made by NIBL is increasing every year. In the FY 2006/07 the ratio is $6.98 \%$, which is maximum and the ratio is $5.12 \%$ which is minimal. The total investment of commercial banks from FY 2005/06 to FY 2009/10 continuously increases. Although the investment of NIBL also continuously increases over the study period but the ratio decline continuously from FY 2005/06 to FY 2009/10 except in FY 2006/07 which increase by 0.13, which shows that the volume of investment figure is continuously increasing over the study period. NIBL is advancing more and more fund in investment sector. The mean ratio is 6.17 during the study period. The standard deviation for the study period is 0.76 and the coefficient variation is 0.12 . The comparison study is done in the comparative analysis table no. 5 .

### 4.1.2. Ratio of Total Commercial Banks Investment to HBL Investment.

This ratio indicates the portion of Investment made by Himalayan bank to total Investment made by commercial banks of Nepal. It shows how much Himalayan bank portion of investment in percentage is directly involved in Investment compared to other commercial bank. And the ratio is derived by dividing Investment made by HBL by Total investment made by commercial banks.

Table No. 2 Total Commercial Banks Investment to HBL Investment Ratio

| Year | Total investment of <br> commercial banks | HBL investment | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| $2005 / 06$ | 82,174 | 10,890 | 13.25 |
| $2006 / 07$ | 93,531 | 11,822 | 12.64 |
| $2007 / 08$ | 108,955 | 13,340 | 12.24 |
| $2008 / 09$ | 130,857 | 8,710 | 6.66 |
| $2009 / 010$ | 168,758 | 8,444 | 5.00 |
| Mean |  |  | 9.96 |
| $y y y y n$ |  |  | 3.42 |
| S.D |  |  | 0.34 |
| C.V |  |  |  |

(Source: Annex-1)
The above table shows the investment made by all commercial banks and by HBL bank alone. From the above table it shows that portion of investment made by HBL is continuously decreasing from FY 2005/06 to FY 2009/10. In the FY 2005/06 the ratio is $13.25 \%$, which is maximum and the ratio is $5.00 \%$ which is minimal in comparison with total commercial banks of the country. The total investment of commercial banks from FY 2005/06 to FY 2009/10 continuously increases. The investment of HBL continuously decreases over the study period with the ratio, which shows that HBL is gradually minimizing the volume of investment figure throughout the study period. The mean ratio is 9.96 during the study period with standard deviation over the study period is 3.42 and coefficient variation of 0.34 . The comparison study is done in the comparative analysis table no. 5.

### 4.1.3. Ratio of Total Commercial Banks Investment to NSBI Investment.

This ratio indicates the portion of investment made by NSBI bank to total investment made by commercial banks of Nepal. It shows how much NSBI bank portion of investment in percentage is directly involved in Investment compared to other commercial bank. The ratio is derived by dividing investment made by NSBI bank by Total Investment made by commercial banks.

Table No 3 Total Commercial Banks Investments to NSBI Investment Ratio

| (Amt in Millions) |  |  |  |
| :---: | :---: | :---: | :---: |
| Year | Total investment of commercial banks | NSBI investment | Ratio (\%) |
| 2005/06 | 82,174 | 3,611 | 4.39 |
| 2006/07 | 93,531 | 2,659 | 2.84 |
| 2007/08 | 108,955 | 3,089 | 2.84 |
| 2008/09 | 130,857 | 13,286 | 10.15 |
| 2009/010 | 168,758 | 16,305 | 9.66 |
| Mean |  |  | 5.98 |
| S.D |  |  | 3.26 |
| C.V |  |  | 0.55 |

(Source: Annex-1)
The above table shows the total Investment of commercial banks and NSBI bank alone. From the above table it shows that only few portion of Investment is cover by NSBI bank in comparison to total Investment of commercial bank. In the FY 2008/09 the ratio is 10.15\% which is maximum and the ratio is 2.84 in FY 2006/07 and FY 2007/08 which is minimal of NSBI bank in total investment made by commercial banks. The total investment of commercial banks from FY 2005/06 to FY 2009/10 continuously increases. The investment of NSBI continuously increases over the study period expect in FY 2006/07 but the NSBI to total investment of commercial bank ratio fluctuates over the study period, which shows that NSBI is also advancing more and more fund in investment sector. The mean ratio is 5.98 during the study period. The standard deviation over the study period is 3.26 and coefficient variation is 0.55 . The comparison study is done in the comparative analysis table no. 5.

### 4.1.4 Ratio of Total Commercial Banks Investment to BOKL Investment.

This ratio indicates the portion of Investment made by BOKL to total investment made by commercial banks of Nepal. It shows how much BOKL portion of investment in percentage is directly involved in Investment compared to other commercial bank. The ratio is derived by dividing investment made by BOKL by Total investment made by commercial banks.

Table No. 4 Total Commercial Banks Investment to BOKL Investment Ratio

| (Amt in Millions) |  |  |  |
| :---: | :---: | :---: | :---: |
| Year | Total investment of commercial banks | BOKL investment | Ratio (\%) |
| 2005/06 | 82,174 | 3,374 | 4.11 |
| 2006/07 | 93,531 | 2,992 | 3.20 |
| 2007/08 | 108,955 | 3,204 | 2.94 |
| 2008/09 | 130,857 | 2,783 | 2.13 |
| 2009/010 | 168,758 | 3,269 | 1.94 |
| Mean |  |  | 2.86 |
| S.D |  |  | 0.78 |
| C.V |  |  | 0.27 |

(Source: Annex-1)
The above table shows the investment made by all commercial banks and by BOKL alone. From the above table the above table it shows that potion of investment made by BOKL is fluctuating over the study period from FY 2005/06 to FY 2009/10. The total investment of commercial banks from FY 2005/06 to FY 2009/10 continuously increases. The investment of NSBI fluctuates which result the BOKL to total investment of commercial bank ratio fluctuates over the study period, which shows that BOKL investing fund goes ups and downs during the study period. The mean ratio is 2.86 during the study period. The standard deviation is 0.78 and the coefficient variation is 0.27 over the study period. The comparison study is done in the comparative analysis table no. 5.

Figure No. 1: Total Commercial Banks Investment to Total Investment Ratio


The above Table No. 1 to 5 and Figure No. 1 shows that HBL covers more percentage than other 3 banks and BOKL bank covers less percentage than other banks on investment made by total commercial banks. Over the study period NSBI covers higher than HBL only in FY 2008/09 and FY 2009/10 and for the other study period HBL covers higher than other sample banks which has been presented by the high bar. TCB bar which represent the total commercial bank ratio of investment is very close to the ratio of sample banks for FY 2005/06, FY 2006/07 and FY 2007/08 but the TCB ratio is very high than ratio of other sample banks in FY 2008/09 and FY 2009/10. Overall comparison HBL and NSBI are able to maintaining the investment volume likewise NIBL and BOKL are much behind to maintain as per the ratio of TCB investment ratio.

Table No. 5 Comparative Analysis of the Sample Bank's Mean, S.D and C.V.

| Sample Banks | Mean | S.D | C.V |
| :---: | :---: | :---: | :---: |
| NIBL | 6.17 | 0.76 | 0.12 |
| HBL | 9.96 | 3.42 | 0.34 |
| NSBI | 5.98 | 3.26 | 0.55 |
| BOKL | 2.86 | 0.78 | 0.27 |
| Higher Value | HBL | HBL | NSBI |
| Lower Value | BOKL | NIBL | NIBL |

## Mean Comparison with the Sample Banks:

Mean of the ratio of HBL Investment is also higher than that of other sample banks which shows that HBL investment portion is higher than that of other sample banks in comparison to total commercial bank investment. Likewise the Mean ratio of BOKL is the lowest among the other sample banks which shows that the investment portion is lower than that of other sample banks in comparison to total commercial bank investment.

## Standard Deviation (S.D) Comparison with the Sample Banks:

The standard deviation HBL investment to total commercial bank Investment is comparatively higher that of other samples banks. It means that the risk is higher in the HBL investment to total investment of commercial bank. Likewise the SD of NIBL is lower compared to other sample banks which mean that the investment of NIBL is less risky than other sample banks. But since the mean value of all the samples banks are different to each other mean which reveals that the S.D is not suitable for absolute comparison. For which further C.V has been calculated to get the better result.

## Coefficient of Variation (C.V) Comparison with the Sample Banks:

CV is a relative measure of variability which measure risk per unit. C.V is more appropriate tool to measure risk with different Mean and S.D value. The CV of NSBI is more compared to other sample banks which mean that there is more variability in investment of NSBI than other sample banks. It is due to higher rate of increment of Investment pattern in NSBI. Likewise CV of NIBL is less compared to other sample banks which mean that there is less variability in investment of NIBL than other sample banks which is due to lower rate of increment of investment pattern in NIBL.

### 4.2 Segregation of Investment

### 4.2.1. Segregation of Investment of NIBL Bank

NIBL invests collected funds in different sectors. Mostly commercial banks are found to invest in government securities, share and debentures of other companies and NRB bonds. Here an attempt is made to segregate the investment made by NIBL.

Table No. 6 Segregation of Investment of NIBL

| Year | Investment | Govt. <br> Securities | $\%$ |  <br> debenture | $\%$ | NRB <br> bond | $\%$ | Others | $\%$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 5602 | 2522 | 45.02 | 18 | 0.32 | - | - | 3066 | 54.73 |
| $2006 / 07$ | 6505 | 3256 | 50.05 | 35 | 0.54 | - | - | 3214 | 49.41 |
| $2007 / 08$ | 6879 | 3154 | 45.86 | 60 | 0.87 | - | - | 3664 | 53.26 |
| $2008 / 09$ | 7402 | 2531 | 34.19 | 64 | 0.86 | - | - | 4807 | 64.94 |
| $2009 / 10$ | 8638 | 4201 | 48.63 | 67 | 0.78 | - | - | 4370 | 50.59 |

(Source: Annex-2)
The above table show the investment made by NIBL in different sector. NIBL is found to invest its fund in Government securities, shares and debenture and others. NIBL is not interest to invest fund in NRB bond which has nil figure over the study period from the FY 2005/06 to FY 2009/10. Investment in Government securities fluctuates over the study period with highest portion of $50.05 \%$ in FY 2006/07 and lowest portion of $34.19 \%$ in FY 2008/09. Investment in Share and Debenture continuously increase over the study period but has the coverage portion very less compared to investment in Govt. Securities and other investment. Investment in Other sectors also fluctuates over the study period. Other investment portion for NIBL remains highest with 64.94\% in FY 2008/09 and lowest portion of 49.41\% in FY 2006/07.

Figure No. 2: Segregation of Investment of NIBL


The above figure shows that the bar chart of Other investment in all the Fiscal Year from FY 2005/06 to FY 2009/10 is higher than other investment areas. Likewise the bar chart of Share and Debenture is the lower than other investment areas. Both the bar chart of Other investment and Govt. Securities fluctuates over the study period. NIBL invests more funds in Other investment compared to other investment areas.

### 4.2.2. Segregation of Investment of HBL Bank

HBL invests collected funds in different sectors. Mostly commercial banks are found to invest in government securities, share and debentures of other companies and NRB bonds. Here an attempt is made to segregate the investment made by HBL.

Table No. 7 Segregation of Investment of HBL

| Year | Investment | Govt. <br> Sec | $\%$ |  <br> debenture | $\%$ | NRB <br> bond | $\%$ | Others | $\%$ |
| :--- | :---: | :---: | :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 10890 | 5144 | 47.24 | 40 | 0.37 | - | - | 5706 | 52.40 |
| $2006 / 07$ | 11822 | 6454 | 54.59 | 73 | 0.62 | - | - | 5295 | 44.79 |
| $2007 / 08$ | 13340 | 7471 | 56.00 | 90 | 0.67 | - | - | 5779 | 43.32 |
| $2008 / 09$ | 8710 | 4211 | 48.35 | 94 | 1.08 | - | - | 4405 | 50.57 |
| $2009 / 10$ | 8444 | 4465 | 52.88 | 79 | 0.94 | - | - | 3900 | 46.19 |

(Source: Annex-3)
The above table show the investment made by HBL in different sector. HBL is found to invest its fund in Government securities, Shares and debenture of other industries and Others investment, but the investment volume is nil for the NRB bond. Investment in Government securities over the study period increases for the first two years and then decreases for the next year and increases again which indicate the fluctuating trend. The Government securities portion was highest in FY 2007/08 with 56.00 \% and lowest in FY 2005/06 with 47.24\%. Investment in Share and Debenture found to be minimal in all the study period with highest portion in FY 2008/09 with 1.08\%. The portion was highest in FY 52.40\% in FY 2005/06 and lowest in FY 2007/08 with 43.32\%. The investment portion of HBL found to be more in Government securities which means that HBL is advancing more and more fund in Government securities instead of Share and Debenture and Others investment.

Figure No. 3: Segregation of Investment of HBL


The above figure shows that the bar chart of Government Securities is higher than other investment areas except in FY 2005/06. Likewise the bar chart of Share and Debenture is the lower than other investment areas. Both the bar chart of Other investment and Govt. Securities fluctuates over the study period. HBL invest more of the fund in Government securities than in the other investment areas.

### 4.2.3. Segregation of Investment of NSBI

NSBI bank invests collected funds in different sectors. Mostly commercial banks are found to invest in government securities, share and debentures of other companies and NRB bonds. Here an attempt is made to segregate the investment made by NSBI bank.

Table No. 8 Segregation of Investment of NSBI

| Year | Investment | Govt. <br> Sec | $\%$ |  <br> debenture | $\%$ | NRB <br> bond | $\%$ | Others | $\%$ |
| :--- | :---: | :---: | :--- | :---: | :--- | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 3611 | 3591 | 99.45 | 20 | 0.55 | - | - | - | - |
| $2006 / 07$ | 2659 | 2345 | 88.19 | 32 | 1.20 | - | - | 282 | 10.61 |
| $2007 / 08$ | 3089 | 3036 | 98.25 | 33 | 1.07 | - | - | 21 | 0.68 |
| $2008 / 09$ | 13286 | 3306 | 24.88 | 33 | 0.25 | - | - | 9947 | 74.87 |
| $2009 / 10$ | 16305 | 4313 | 26.45 | 37 | 0.23 | - | - | 11955 | 73.32 |

(Source: Annex-4)

The above table show the investment made by NSBI in different sector. NSBI is found to invest its fund in Government securities, shares and debenture of other industries, bond and Others. In the first three FY from FY 2005/06 to FY 2007/08 almost all the investment portion of NSBI has been invested in Government securities only. After FY 2007/08 the investment has been made highly in Other investment area. There have been nil figures for the NRB bond area in all the study period. Likewise the investment portion for Share and Debenture is very minimal compared to other investment areas. The highest investment was found on FY 2005/06 with $99.45 \%$ in Government securities. Although the investment figures investment in Government Securities fluctuates over the study period.

Figure No. 4: Segregation of Investment of NSBI


The above figure shows that the bar chart of Government Securities is higher than other investment areas for the first three FY and than the bar chart of Others investment is higher than other investment areas in FY 2008/09 and FY 2009/10. Likewise the bar chart of Share and Debenture is the very lower than other investment areas in all the study period. Both the bar chart of Other investment and Govt. Securities fluctuates over the study period. HBL invest more of the fund in Government securities than in the other investment areas.

### 4.2.4. Segregation of Investment of BOKL

BOKL invests collected funds in different sectors. Mostly commercial banks are found to invest in government securities, share and debentures of other companies and NRB bonds. Here an attempt is made to segregate the investment made by BOKL.

Table No. 9 Segregation of Investment of BOKL

| Year | Investment | Govt. <br> Sec | $\%$ |  <br> debenture | $\%$ | NRB <br> bond | $\%$ | Others | $\%$ |
| :--- | :---: | :---: | :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 3378 | 2658 | 78.69 | 23 | 0.68 | - | - | 697 | 20.63 |
| $2006 / 07$ | 2995 | 2332 | 77.86 | 26 | 0.87 | - | - | 637 | 21.27 |
| $2007 / 08$ | 3206 | 2113 | 65.91 | 28 | 0.87 | - | - | 1065 | 33.22 |
| $2008 / 09$ | 2786 | 1745 | 62.63 | 29 | 1.04 | - | - | 1012 | 36.32 |
| $2009 / 10$ | 3269 | 2955 | 90.39 | 23 | 0.70 | - | - | 291 | 8.90 |

(Source: Annex-5)

The above table show the investment made by BOKL in different sector. BOKL is found to invest its fund in Government securities, Shares and debenture of other industries and Others investment, but the investment volume is nil for the NRB bond in all the study period. Investment in Government securities over the study period fluctuates which indicate the fluctuating trend. The Government securities portion was highest in FY 2009/10 with $90.39 \%$ in and lowest in FY 2008/09 with 62.63\%. Investment in Share and Debenture found to be minimal in all the study period with highest portion in FY 2008/09 with $1.04 \%$. The investment in Others sectors has also fluctuating trend over the study period. The portion was highest in FY 2008/09 and lowest in FY 2009/10 with 8.90\%. The investment portion of BOKL found to be more in more in Government securities which means that BOKL is advancing more and more fund in Government securities instead of Share and Debenture and Others investment.

Figure No. 5: Segregation of Investment of BOKL


The above figure shows that the bar chart of Government Securities is higher than other investment areas in all the study period from FY 2005/06 and FY 2009/10. Likewise the bar chart of Share and Debenture is the very lower than other investment areas in all the study period. Both the bar chart of Other investment and Govt. Securities fluctuates over the study period. BOKL invest more of the fund in Government securities than in the other investment areas.

### 4.3 Asset Management Ratio

The management of physical assets (their selection, maintenance, inspection and renewal) plays a key role in determining the operational performance and profitability of industries that operate assets as part of their core business. Asset Management is the art and science of making the right decisions and optimizing these processes. A commercial bank must be able to manage its assets very well to earn high profit, to satisfy its customers and for its own existence. Assets management ratio measures how efficiently, the bank manages the resources at its commands.

Typically, asset management is only practiced by the very wealthy, as the services of a professional firm can demand considerable sums of money, and successful asset management usually requires a large and diverse portfolio. Numerous professional firms and investment banks offer asset management services, which are often handled by a team of financial professionals for the best results

### 4.3.1 Ratio of Total Investment to Total Deposit

A commercial bank may finance its deposit fund to small industries building up of bank credit depends upon mutual connections and relationship between the banks and the customers. Banks needs to satisfy themselves regarding the technical knowledge and capacity for hard and sustained work on the part of borrows and the quality and marketability of the goods produced by them. Therefore commercial banks may mobilize its bank deposit by investing its fund in different securities issued by government and other financial or non-financial or companies. Now effort has made to measure the extent to which the banks are successful in mobilizing the total deposits on investment. In the process of portfolio management of bank assets, various factors such as availability of fund, liquidity requirement, central bank's norms etc. are to be considered in general. A high ratio is the indicator of high success to mobilize the banking fund as investment and vice versa. This ratio is calculated by dividing total investment by total deposit.

Table No. 10 Total Investment to Total Deposit Ratio of NIBL

| Year | Investment | Deposit | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 5602 | 18927 | 29.60 |
| 2006/07 | 6505 | 24488 | 26.56 |
| 2007/08 | 6874 | 34451 | 19.95 |
| 2008/09 | 7399 | 46698 | 15.84 |
| 2009/10 | 8635 | 50094 | 17.24 |
| Mean |  |  | 21.84 |
| S.D |  |  | 5.35 |
| C.V |  |  | 0.24 |

(Source: Annex-6)
The table shows the investment and deposit ratio of NIBL. From the FY 2005/06 to FY 2009/10 the investment and deposit continuously goes on increasing trend over the study period which has present the strong bank image among the others commercial banks. Although the investment and deposit both increases throughout the year but the investment to deposit ratio continuously decreases over the study period except in FY 2009/10. It is found that NIBL invest the fund more in the investment sectors as the
deposit rises. The maximum ratio was in FY 2005/06 with $29.60 \%$ and minimum in FY 2008/09 with $15.84 \%$. The average ratio of total investment to total deposit is 21.84 , standard deviation is 5.35 and coefficient variation is 0.24 percent. The comparison study is done in the comparative analysis table no. 14 .

Table No. 11 Total Investment to Total Deposit Ratio of HBL
(Amt in Millions)

| Year | Investment | Deposit | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| $2005 / 06$ | 10,890 | 26,490 | 41.11 |
| $2006 / 07$ | 11,822 | 30,048 | 39.34 |
| $2007 / 08$ | 13,340 | 31,842 | 41.89 |
| $2008 / 09$ | 8,710 | 34,681 | 25.11 |
| $2009 / 10$ | 8,444 | 37,611 | 22.45 |
| Mean |  |  | 33.98 |
| S.D |  | 8.41 |  |
| C.V |  | 0.25 |  |

(Source: Annex-6)
The table shows the investment and deposit ratio of HBL. From the FY 2005/06 to FY 2009/10 the investment amount of HBL remain fluctuates the amount goes ups and downs over the study period. But the deposit of HBL continuously increases which has develop the increasing trend over the study period. Likewise the ratio of investment to deposit for HBL also fluctuates with maximum of 41.89\% in FY 2007/08 and minimum of $22.45 \%$ in FY 2009/10. Although the deposit is increasing but HBL investment volume is not getting into the trend with deposit. The average ratio of total investment to total deposit is 33.98 , standard deviation is 8.41 and co-efficient variation is 0.25 percent. The comparison study is done in the comparative analysis table no. 14.

Table No. 12 Total Investment to Total Deposit Ratio of NSBI

| Year | Investment | Deposit | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 3611 | 11002 | 32.82 |
| 2006/07 | 2659 | 11445 | 23.23 |
| 2007/08 | 3089 | 13715 | 22.52 |
| 2008/09 | 13286 | 27957 | 47.52 |
| 2009/10 | 16305 | 34896 | 46.72 |
| Mean |  |  | 34.56 |
| S.D |  |  | 10.88 |
| C.V |  |  | 0.31 |

(Source: Annex-7)
The table shows the investment and deposit ratio of NSBI. From the FY 2005/06 to FY 2009/10 the investment goes continuously increasing trend and same as deposit goes continuously increasing over the study period. The ratio of investment to deposit of NSBI continuously decline from FY 2006/07 to 2007/08 and rises in FY 2008/09 and again slightly decline which has the fluctuating trend. The ratio was maximum in FY 2008/09 with $47.52 \%$ and minimum in FY 2007/08 with $22.52 \%$. It is found that NSBI is positive to advance its fund more and more in investment sector when deposit also increases. The average ratio of total investment to total deposit is 34.56 , standard deviation is 10.88 and coefficient variation is 0.31 percent. The comparison study is done in the comparative analysis table no. 14 .

Table No. 13 Total Investment to Total Deposit Ratio of BOKL

|  |  | (Amt in Millions) |  |
| :---: | :---: | :---: | :---: |
| Year | Investment | Deposit | Ratio (\%) |
| 2005/06 | 3374 | 10485 | 32.18 |
| 2006/07 | 2992 | 12388 | 24.15 |
| 2007/08 | 3204 | 15833 | 20.24 |
| 2008/09 | 2783 | 18083 | 15.39 |
| 2009/10 | 3269 | 20315 | 16.09 |
| Mean |  |  | 21.61 |
| S.D |  |  | 6.15 |
| C.V |  |  | 0.28 |

(Source: Annex-7)

The table shows the investment and deposit ratio of BOKL. From the FY 2005/06 to FY 2009/10 the investment amount goes on fluctuating trend means ups and downs over the study period. The deposit continuously increases over the study period. The ratio of investment to deposit continuously decreases except in FY 2009/10 with maximum of 32.18\% in FY 2005/06 and minimum of 15.39\% in FY 2008/09. It is found that BOKL advancing fund in investment sectors has been fluctuating although the deposit increases over the study period. The average ratio of total investment to total deposit is 21.61, standard deviation is 6.15 and coefficient variation is 0.28 percent. The comparison study is done in the comparative analysis table no. 14.

Figure No. 6: Total Investment to Total Deposit Ratio


The above figure shows the bar chart of investment to deposit ratio of NIBL, HBL, NSBI and BOKL for the study period i.e. from FY 2005/06 to FY 2009/10. The above figure present that the ratio has fluctuating trend over the study period for all the sample banks. HBL has the highest ratio for the first three Fiscal Year FY 2005/06 to FY 2007/08 and NSBI has the highest ratio for the last two Fiscal Year i.e. from FY 200809 to FY 2009/10. Comparatively the highest ratio is of NSBI in FY 2008/09 and the lowest ratio is of BOKL in FY 2008/09 itself. Therefore, it is clear that HBL's and NSBI's capacity to mobilize its deposits on investment is better than that of other sample banks.

Table No. 14 Comparative Analysis of the Sample Bank's Mean, S.D \& C.V

| Sample Banks | Mean | S.D | C.V |
| :---: | :---: | :---: | :---: |
| NIBL | 21.84 | 5.35 | 0.24 |
| HBL | 33.98 | 8.41 | 0.25 |
| NSBI | 34.56 | 10.88 | 0.31 |
| BOKL | 21.61 | 6.15 | 0.28 |
| Higher Value | NSBI | NSBI | NSBI |
| Lower Value | BOKL | NIBL | NIBL |

## Mean Comparison with the Sample Banks:

Mean of the ratio of NSBI Investment is higher than that of other sample banks which shows that NSBI investment portion is higher than that of other sample banks in comparison to deposit volume. Likewise the Mean ratio of BOKL is the lowest among the other sample banks which shows that the investment portion is lower than that of other sample banks in comparison to deposit volume.

## Standard Deviation (S.D) Comparison with the Sample Banks:

The standard deviation of NSBI investment to total commercial bank Investment is comparatively higher that of other samples banks. It means that the risk is higher in the NSBI investment to deposit. Likewise the SD of NIBL is lower compared to other sample banks which mean that the investment to deposit of NIBL is less risky than other sample banks. But since the mean value of all the samples banks are different to each other mean which reveals that the S.D is not suitable for absolute comparison. For which further C.V has been calculated to get the better result.

## Coefficient of Variation (C.V) Comparison with the Sample Banks:

CV is a relative measure of variability which measure risk per unit. C.V is more appropriate tool to measure risk with different Mean and S.D value. The CV of NSBI is more compared to other sample banks which mean that there is more variability in
investment of NSBI than other sample banks compared to deposit. It is due to higher rate of increment of Investment pattern in NSBI. Likewise CV of NIBL is less compared to other sample banks which mean that there is less variability in investment of NIBL to deposit than other sample banks which is due to lower rate of increment of investment pattern in NIBL. But in conclusion it can be said that NIBL is successful in utilizing its resources on Investment than that of NSBI.

### 4.3.2 Total Loan and Advance to Total Deposit Ratio:

Loan and Advancement is also another type of investment of banks. Since the major functions of commercial banks are of deposits collection and lending, it is very important to have looked at the credit to deposit ration. Lending is a high risk Investment for a bank and the main income source of the bank is also the interest earned from loan and advances. This ratio actually measures the extent to which the banks are successful to mobilization the total deposits on loan and advances for the purpose of profit generation. A high ratio of loan and advancement indicates better mobilization of collected deposits and vice-versa. But it should be noted that too high ratio may not be better from its liquidity point view. This ratio is calculated by dividing total loan $\&$ advances by total deposits. The following table exhibits the ratio of total loan and advancement to total deposits of NIBL.

Table No. 15 Total Loan and Advance to Deposits ratio of NIBL

| (Amt in Millions) |  |  |  |
| :---: | :---: | :---: | :---: |
| Year | Loan and advances | Deposit | Ratio (\%) |
| 2005/06 | 12776 | 18927 | 67.50 |
| 2006/07 | 17286 | 24488 | 70.59 |
| 2007/08 | 26996 | 34451 | 78.36 |
| 2008/09 | 36241 | 46698 | 77.61 |
| 2009/10 | 40318 | 50094 | 80.48 |
| Mean |  |  | 74.91 |
| S.D |  |  | 4.98 |
| CV |  |  | 0.07 |

(Source: Annex-8)

The table shows Loan and Advance to Deposits ratio of NIBL. From the FY 2005/06 to FY 2009/10 the Loan and Advance to deposit goes on increasing trend due to increase in loan figure of NIBL. The ratio is of loan and advance to deposit has increasing trend except in the FY 2008/09. The ratio is maximum of $80.48 \%$ in FY 2009/10 and minimum of $67.50 \%$ in FY 2005/06. It is found that the collect fund in the term of deposit is successfully mobilizing by NIBL in term of loan over the study period. The average ratio of investment plus Loan and Advance to total deposit is 74.91, standard deviation is 4.98 and co-efficient variation is 0.07 percent. The comparison study is done in the comparative analysis table no. 19

Table No. 16 Total Loan and Advance to Deposits ratio of HBL

|  |  | (Amt in Millions) |  |
| :---: | :---: | :---: | :---: |
| Year | Loan and advances | Deposit | Ratio (\%) |
| 2005/06 | 14642 | 26490 | 55.27 |
| 2006/07 | 16997 | 30048 | 56.57 |
| 2007/08 | 19497 | 31842 | 61.23 |
| 2008/09 | 24793 | 34681 | 71.49 |
| 2009/10 | 27980 | 37611 | 74.39 |
| Mean |  |  | 63.79 |
| S.D |  |  | 7.78 |
| CV |  |  | 0.12 |

(Source: Annex-8)
The table shows Investment plus Loan and Advance to Deposits ratio of HBL. From the FY 2005/06 to FY 2009/10 the Loan and Advance to deposit goes on increasing trend due to the continuously increasing the loan over the study period. The ratio of loan and advances with deposit has increasing trend over the study period with maximum of $74.39 \%$ in FY 2009/10 and minimum of $55.27 \%$ in FY 2005/06. It is found that the collect fund in the term of deposit is successfully mobilizing by HBL in term of loan over the study period. The average ratio of Loan and Advance to total deposit is 63.79, standard deviation is 7.78 and co-efficient variation is 0.12 percent. The comparison study is done in the comparative analysis table no. 19

Table No. 17 Total Loan and Advance to Deposits ratio of NSBI
(Amt in Millions)

| Year | Loan and Advance | Deposit | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 7626 | 11002 | 69.31 |
| 2006/07 | 9460 | 11445 | 82.66 |
| 2007/08 | 12113 | 13715 | 88.32 |
| 2008/09 | 15131 | 27957 | 54.12 |
| 2009/10 | 17480 | 34896 | 50.09 |
| Mean |  |  | 68.90 |
| S.D |  |  | 15.09 |
| C.V |  |  | 0.22 |

(Source: Annex-9)
The table shows Loan and Advance to Deposits ratio of NSBI. From the FY 2005/06 to FY 2009/10 the Loan and Advance to deposit goes on increasing trend till FY 2007/08 and start declining from FY 2008/09 to FY 2009/10 over the study period. The loan and advances to deposit ratio has the fluctuating trend over the study period. The ratio is maximum with $88.32 \%$ in FY 2007/08 and is minimum with 50.09\% in FY 2009/10. It is also found that NSBI is lowering mobilizing the fund in term of loan over the study period. The average ratio of Loan and Advance to total deposit is 68.90, standard deviation is 15.09 and co-efficient variation is 0.22 percent. The comparison study is done in the comparative analysis table no. 19

Table No. 18 Total Loan and Advance to Deposits ratio of BOKL
(Amt in Millions)

| Year | Loan and Advance | Deposit | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 7259 | 10485 | 69.23 |
| 2006/07 | 9399 | 12388 | 75.87 |
| 2007/08 | 12462 | 15833 | 78.71 |
| 2008/09 | 14647 | 18083 | 81.00 |
| 2009/10 | 16664 | 20315 | 82.03 |
| Mean |  |  | 77.37 |
| S.D |  |  | 4.59 |
| C.V |  |  | 0.06 |

(Source: Annex-9)

The table shows Loan and Advance to Deposits ratio of BOKL. From the FY 2005/06 to FY 2009/10 the Loan and Advance to deposit goes on increasing trend due to increase in the sum of loan over the study period. The loan and advances to deposit ratio continuously increases over the study period which has the increasing trend. The ratio is maximum of $82.03 \%$ in FY 2009/10 and minimum of $69.23 \%$ in FY 2005/06. It is also found that BOKL is also successfully mobilizing the fund in term of loan and advance over the study period. The average ratio Loan and Advance to total deposit is 77.37, standard deviation is 4.59 and co-efficient variation is 0.06 percent. The comparison study is done in the comparative analysis table no. 19

Figure No. 7: Total Loan and Advance to Deposits ratio


The above figure shows that the bar chart which present the ratio of total loan and advances to deposit of the sample banks in different five Fiscal years. The above figure shows that the bar level is somehow at same level for all the sample banks not very high variation. The bar chart of BOK in average has the higher ratio than other sample banks over the study period which remains almost same over the study period which maintains the level. Likewise the bar of NSBI has increasing trend and also decline at the recent years. All the sample banks are serious to advance fund more and more to loan and advance which generates more income for the banks.

Table No. 19 Comparative Analysis of the Sample Bank's Mean, S.D \& C.V

| Sample Banks | Mean | S.D | C.V |
| :---: | :---: | :---: | :---: |
| NIBL | 74.91 | 4.98 | 0.07 |
| HBL | 63.79 | 7.78 | 0.12 |
| NSBI | 68.90 | 15.09 | 0.22 |
| BOKL | 77.37 | 4.59 | 0.06 |
| Higher Value | BOKL | NSBI | NSBI |
| Lower Value | HBL | BOKL | BOKL |

## Mean Comparison with the Sample Banks:

Mean of the ratio of BOKL Loan and advance to deposit ratio is higher than that of other sample banks which shows that BOKL loan and advance portion is higher than that of other sample banks in comparison to deposit volume. The lending of BOKL is higher than other sample banks which shows that there might be the possibility of liquidity crunches at any time. Likewise the Mean ratio of HBL is the lowest among the other sample banks which shows that the loan and advances portion is lower than that of other sample banks in comparison to deposit volume, which shows that HBL lending volume is low compared to deposit volume of the sample banks.

## Standard Deviation (S.D) Comparison with the Sample Banks:

The standard deviation of NSBI loan and advances is comparatively higher that of other samples banks. It means that the risk is higher in the NSBI loan and advances to deposit. Likewise the SD of NIBL is lower compared to other sample banks which mean that the loan and advance to deposit of BOKL is less risky than other sample banks. But since the mean value of all the samples banks are different to each other mean which reveals that the S.D is not suitable for absolute comparison. For which further C.V has been calculated to get the better result.

## Coefficient of Variation (C.V) Comparison with the Sample Banks:

CV is a relative measure of variability which measure risk per unit. C.V is more appropriate tool to measure risk with different Mean and S.D value. The CV of NSBI is more compared to other sample banks which mean that there is more variability in loan and advances of NSBI than other sample banks compared to deposit. It is due to higher rate of increment of loan and advances pattern in NSBI. Likewise CV of BOKL and is less compared to other sample banks which mean that there is less variability in loan of BOKL to deposit than other sample banks which is due to lower rate of increment of loan and advances and pattern in BOKL. But in conclusion it can be said that BOKL is successful in utilizing its resources on loan and advance than that of NSBI.

### 4.3.3. Ratio of Investment and Total Assets Ratio.

A commercial bank's working fund should play very active role in profit generation through fund mobilization. This ratio reflects the extent to which the banks are successful in mobilizing their total assets on Investment for the purpose of income generation. A high ratio indicates a better mobilization of fund as investment and vice-versa. This ratio is calculated by dividing total investment by total assets i.e. total working fund. The following table exhibits the ratio of investment to total assets of NIBL, HBL, NSBI, and BOKL.

Table No. 20 Total Investment to Total Assets Ratio of NIBL
(Amt in Millions)

| Year | Total Investment | Total Assets | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 5,602 | 21,330 | 26.26 |
| 2006/07 | 6,505 | 27,590 | 23.58 |
| 2007/08 | 6,874 | 38,873 | 17.68 |
| 2008/09 | 7,399 | 53,010 | 13.96 |
| 2009/10 | 8,635 | 57,305 | 15.07 |
| Mean |  |  | 19.31 |
| S.D |  |  | 4.81 |
| CV |  |  | 0.25 |

(Source: Annex-10)

The above table shows Total Investment to Total Assets Ratio of NIBL. From the FY 2005/06 to FY 2009/10 both Total Investment and Total Assets are goes on increasing trend. But the ratio of total investment and total assets over the study period decreases except in FY 2009/10. The ratio continuously decreases but increase by 1.11\% in FY 2009/10 compared to the ratio of FY 2008/09. The maximum ratio is on FY 2005/06 with $26.26 \%$ and the minimum ratio is on FY 2008/09 with $13.96 \%$. NIBL seems lucrative in lending fund in the investment sector over the study period due to the continuously increasing trend. There is parallel relationship between Total Investment and Total Assets due to increasing of both. The average ratio of Total Investment to Total Assets is 19.31, standard deviation is 4.81 and co-efficient variation is 0.25 percent. The comparison study is done in the comparative analysis table no. 24

Table No. 21Total Investment to Total Assets Ratio of HBL

| (Amt in Millions) |  |  |  |
| :---: | :---: | :---: | :---: |
| Year | Total Investment | Total Assets | Ratio (\%) |
| 2005/06 | 10,890 | 29,460 | 36.97 |
| 2006/07 | 11,822 | 33,519 | 35.27 |
| 2007/08 | 13,340 | 36,175 | 36.88 |
| 2008/09 | 8,710 | 39,320 | 22.15 |
| 2009/10 | 8,444 | 42,717 | 19.77 |
| Mean |  |  | 30.21 |
| S.D |  |  | 7.61 |
| CV |  |  | 0.25 |

(Source: Annex-10)

The above table shows Total Investment to Total Assets Ratio of HBL. From the FY 2005/06 to FY 2009/10 Total Investment of HBL go ups and downs over the study period. Total Investment volume increases till FY 2007/08 and then decreases in FY 2008/09 and FY 2009/10. Total Assets are goes on increasing trend for all the study period fiscal years. Likewise the ratio of total investment and total assets over the study period has the fluctuating trend over the study period. The maximum ratio is on FY 2005/06 with $36.97 \%$ and the minimum ratio is on FY 2009/10 with $19.77 \%$. HBL seems
depressing in the Total investment due to the decreasing volume. There is non-parallel relationship between Total Investment and Total Assets due to ups and downs in the Total Investment of HBL. The average ratio of Total Investment to Total Assets is 30.21, standard deviation is 7.61 and co-efficient variation is 0.25 percent. The comparison study is done in the comparative analysis table no. 24

Table No. 22 Total Investment to Total Assets Ratio of NSBI

| Year | Total Investment | Total Assets | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 3,611 | 13,035 | 27.70 |
| 2006/07 | 2,659 | 13,901 | 19.13 |
| 2007/08 | 3,089 | 17,187 | 17.97 |
| 2008/09 | 13,286 | 30,166 | 44.04 |
| 2009/10 | 16,305 | 38,047 | 42.85 |
| Mean |  |  | 30.34 |
| S.D |  |  | 11.22 |
| C.V |  |  | 0.37 |

(Source: Annex-11)

The above table shows Total Investment to Total Assets Ratio of NSBL. From the FY 2005/06 to FY 2009/10 both Total Investment and Total Assets are goes on increasing trend. But the ratio of total investment and total assets over the study period has the fluctuating trend. The ratio was maximum on FY 2008/09 with $44.04 \%$ and minimum on FY 2007/08 with $17.97 \%$. NSBL seems lucrative in lending fund in the investment sector over the study period due to the continuously increasing trend of both Total Investment and Total Assets. Total investment on FY 2008/09 and FY 2009/10 has rapidly increases and also as same for the Total Assets. There is parallel relationship between Total Investment and Total Assets due to increasing of both volume. The average ratio of Total Investment to Total Assets is 30.34 , standard deviation is 11.22 and co-efficient variation is 0.37 percent. The comparison study is done in the comparative analysis table no. 24

Table No. 23 Total Investment to Total Assets Ratio of BOKL

| Year | Total Investment | Total Assets | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 3374 | 12278 | 27.48 |
| 2006/07 | 2992 | 14570 | 20.54 |
| 2007/08 | 3204 | 17721 | 18.08 |
| 2008/09 | 2783 | 20496 | 13.58 |
| 2009/10 | 3269 | 23396 | 13.97 |
| Mean |  |  | 18.73 |
| S.D |  |  | 5.09 |
| CV |  |  | 0.27 |

(Source: Annex-11)
The above table shows Total Investment to Total Assets Ratio of BOKL. From the FY 2005/06 to FY 2009/10 Total Investment for BOKL go ups and downs over the study period which result for fluctuating trend. Meanwhile the Total Assets goes on increasing trend over the study period. The ratio of total investment and total assets over the study period decreasing trend due to the continuously decreasing of the ratio except in FY 2009/10. The ratio was maximum on FY 2005/06 with $27.48 \%$ and minimum on FY 2008/09 with $13.58 \%$. BOKL seems less lucrative in lending fund in the investment sector over the study period due to the fluctuating trend of both Total Investment. Total investment is not increasing rapidly compared to the growth of the Total Assets. There is non-parallel relationship between Total Investment and Total Assets due to ups and downs of Total Investment volume. The average ratio of Total Investment to Total Assets is 18.73 , standard deviation is 5.09 and co-efficient variation is 0.27 percent. The comparison study is done in the comparative analysis table no. 24 .

Figure No. 8 Total Investment to Total Assets Ratio


The above figure shows the bar chart of the ratio of Total Investment to Total Assets of the sample banks. The ratio of HBL is higher than other sample banks for the first three fiscal year i.e. FY 2005/06 to FY 2007/08. Likewise the ratio of NSBI is higher than other sample banks for the last two fiscal year i.e. FY 2008/09 and FY 2009/10, which have been clearly presented by the bar chart figure above. The ratio of BOKL seems lower than other sample banks. The bar chart shows that the higher the bar of respective bank is the high volume of the Investment compared to Total Assets and vice versa.

Table No. 24 Comparative Analysis of the Sample Bank's Mean, S.D \& C.V

| Sample Banks | Mean | S.D | C.V |
| :---: | :---: | :---: | :---: |
| NIBL | 19.31 | 4.81 | 0.25 |
| HBL | 30.21 | 7.61 | 0.25 |
| NSBI | 30.34 | 11.22 | 0.37 |
| BOKL | 18.73 | 5.09 | 0.27 |
| Higher Value | NSBI | NSBI | NSBI |
| Lower Value | BOKL | NIBL | NIBL \& HBL |

## Mean Comparison with the Sample Banks:

Mean of the ratio of NSBI Investment to Total Asset ratio is higher than that of other sample banks which shows that NSBI investment portion is higher than that of other sample banks in comparison to Total Asset volume, which shows that the NSBI is looking forward to generate income from investment. Likewise the Mean ratio of BOKL is the lowest among the other sample banks which shows that the investment portion is lower than that of other sample banks in comparison to Total Asset volume, which shows that BOKL lending volume is low compared to Total Asset volume of the sample banks.

## Standard Deviation (S.D) Comparison with the Sample Banks:

The standard deviation of NSBI Investment to Total Asset is comparatively higher that of other samples banks. It means that the risk is higher in the NSBI Investment to Total Asset. Likewise the SD of NIBL is lower compared to other sample banks which mean that the investment to total asset of BOKL is less risky than other sample banks. But since the mean value of all the samples banks are different to each other mean which reveals that the S.D is not suitable for absolute comparison. For which further C.V has been calculated to get the better result.

## Coefficient of Variation (C.V) Comparison with the Sample Banks:

CV is a relative measure of variability which measure risk per unit. C.V is more appropriate tool to measure risk with different Mean and S.D value. The CV of NSBI is more compared to other sample banks which mean that there is more variability in investment of NSBI than other sample banks compared to total asset. It is due to higher rate of increment of Investment and pattern in NSBI. Likewise CV of NIBL and HBL is less compared to other sample banks which mean that there is less variability in investment of NIBL and HBLL to total asset than other sample banks which is due to lower rate of increment of investment pattern in NIBL and HBL. But in conclusion it can be said that NIBL and HBL is successful in utilizing its resources on Investment than that of NSBI.

### 4.3.4 Investment on Government Securities to Total Assets Ratio

The commercial banks mostly invest its funds collected in various government securities issued by government because they consider them most liquid, than is, they can realize cask at short notice and without must loss in capital invested. And also such securities would serve as the basis for loan from the central bank at the bank rate. The government securities are the safest place to invest the funds. They can be easily sold in the market or they can be converted into the cash in other ways. But they are not so much liquid as cash and bank balance. Here an effort is made to examine the position of a bank's total assets that is invested on different government securities. This ratio is very important to know the extent of which the banks are successful in mobilizing their total working fund on different types of government securities to maximize the income. All the deposits of the bank should not be utilized in loan and advances and other credit from security and liquidity point of view. Therefore, to some extent, commercial banks seem to be interested to utilize their deposits by purchasing government securities. A high ratio indicates batter mobilization of fund as Investment of government securities and viceversa. This ratio is calculated by dividing Investment on government securities by total assets. The following table shows the ratios of investment on government securities to total working fund of NIBL, HBL, NSBI, and BOKL.

Table No. 25 Investment on Government Securities to Total Assets Ratio of NIBL

| Year | Investment on government securities | Total Assets | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 2,522 | 21,330 | 11.82 |
| 2006/07 | 3,256 | 27,590 | 11.80 |
| 2007/08 | 3,155 | 38,873 | 8.12 |
| 2008/09 | 2,531 | 53,010 | 4.77 |
| 2009/10 | 4,201 | 57,305 | 7.33 |
| Mean |  |  | 8.77 |
| S.D |  |  | 2.72 |
| CV |  |  | 0.31 |

(Source: Annex-12)

The above table shows Total Investment on Government Securities to Total Assets Ratio of NIBL. From the FY 2005/06 to FY 2009/10 Total Assets goes on increasing trend, and Total Investment on Government Securities goes on fluctuating trend, due to the ups and downs in the investment volume in Government securities. NIBL is spontaneous in investing the fund in the government securities from the ups and downs figure of the study period. The ratio of investment on government securities and total assets continuously decreases over the study period which results for the decreasing trend except in FY 2009/10. The ratio is maximum on FY 2005/06 with $11.82 \%$ and minimum on FY 2008/09 with 4.77\%. The average ratio of total Investment on Government Securities to total Assets 8.77, standard deviation is 2.72 and co-efficient variation is 0.31 percent. The comparison study is done in the comparative analysis table no. 29.

Table No. 26 Investment on Government Securities to Total Assets Ratio of HBL (Amt in Millions)

| Year | Investment on government securities | Total Assets | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 5,144 | 29,460 | 17.46 |
| 2006/07 | 6,454 | 33,519 | 19.25 |
| 2007/08 | 7,471 | 36,175 | 20.65 |
| 2008/09 | 4,211 | 39,320 | 10.71 |
| 2009/10 | 4,465 | 42,717 | 10.45 |
| Mean |  |  | 15.71 |
| S.D |  |  | 4.31 |
| CV |  |  | 0.27 |

(Source: Annex-12)
The above table shows Total Investment on Government Securities to Total Assets Ratio of HBL. From the FY 2005/06 to FY 2009/10 Total Assets goes on increasing trend, and Total Investment on Government Securities goes on fluctuating trend, due to the ups and downs in the investment volume in Government securities.. The ratio of investment on government securities and total assets continuously increase from FY 2006/07 to FY 2007/08 and continuously decreases from FY 2008/09 to FY 2009/10. The ratio is
maximum on FY 2007/08 with $20.65 \%$ and minimum on FY 2009/10 with $10.45 \%$. The average ratio of total Investment on Government Securities to total Assets 15.71, standard deviation is 4.31 and co-efficient variation is 0.27 percent. The comparison study is done in the comparative analysis table no. 29.

Table No. 27 Investment on Government Securities to Total Assets Ratio of NSBI

| Year | Investment on <br> government securities | Total Assets | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| $2005 / 06$ | 3,591 | 13,035 | 27.55 |
| $2006 / 07$ | 2,345 | 13,901 | 16.87 |
| $2007 / 08$ | 3,035 | 17,187 | 17.66 |
| $2008 / 09$ | 3,306 | 30,166 | 10.96 |
| $2009 / 10$ | 4,313 | 38,047 | 11.34 |
| Mean |  |  | 16.87 |
| S.D |  |  | 6.00 |
|  |  |  | 0.36 |
| CV |  |  |  |
|  |  |  |  |
|  |  |  |  |

(Source: Annex-13)
The above table shows Total Investment on Government Securities to Total Assets Ratio of NSBI. From the FY 2005/06 to FY 2009/10 Total Assets goes on increasing trend, and Total Investment on Government Securities goes on increasing trend except in FY 2006/07, due to the down in figure of the investment volume in Government securities. NSBI is lucrative in investing the fund in the government securities from increasing figure of the investment in the study period. The ratio of investment on government securities and total assets continuously fluctuates over the study period due to the ups and downs in the ratio. The ratio is maximum on FY 2005/06 with $27.55 \%$ and minimum on FY 2008/09 with $10.96 \%$. The average ratio of total Investment on Government Securities to total Assets 16.87, standard deviation is 6.00 and co-efficient variation is 0.36 percent. The comparison study is done in the comparative analysis table no. 29.

Table No. 28 Investment on Government Securities to Total Assets Ratio of BOKL (Amt in Millions)

| Year | Investment on government securities | Total Assets | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 2,658 | 12,278 | 21.65 |
| 2006/07 | 2,332 | 14,570 | 16.01 |
| 2007/08 | 2,113 | 17,721 | 11.92 |
| 2008/09 | 1,745 | 20,496 | 8.51 |
| 2009/10 | 2,955 | 23,396 | 12.63 |
| Mean |  |  | 14.14 |
| S.D |  |  | 4.44 |
| CV |  |  | 0.31 |

(Source: Annex-13)
The above table shows Total Investment on Government Securities to Total Assets Ratio of BOKL. From the FY 2005/06 to FY 2009/10 Total Assets goes on increasing trend, and Total Investment on Government Securities goes on decreasing trend except in FY 2009/10, due to the continuous declining in the investment volume in Government securities. NSBI is spontaneous in investing the fund in the government securities from decreasing figure of the investment in the study period. The ratio of investment on government securities and total assets continuously declines over the study period except in FY 2009/10. The ratio is maximum on FY 2005/06 with $21.65 \%$ and minimum on FY 2008/09 with $8.51 \%$. The average ratio of total Investment on Government Securities to total Assets 14.14, standard deviation is 4.44 and co-efficient variation is 0.31 percent. The comparison study is done in the comparative analysis table no. 29.

Figure No. 9 Investment on Government Securities to Total Assets Ratio


The above bar chart shows that the ratio of total investment on government securities to total assets. The ratio of NSBI is higher than other sample banks which mean NSBI has mobilized its assets as investment in government securities more than other sample banks. The ratio of NIBL is lower than other sample banks which mean NIBL has not mobilized its assets as investment in government securities than other sample banks. The bar chart of NSBI is higher than any other sample banks in FY 2005/06 and FY 2008/09 and the bar chat of HBL is higher than any other sample banks in FY 2006/07 and FY 2007/08.

Table No. 29 Comparative Analysis of the Sample Bank's Mean, S.D \& C.V

| Sample Banks | Mean | S.D | C.V |
| :---: | :---: | :---: | :---: |
| NIBL | 8.77 | 2.72 | 0.31 |
| HBL | 15.71 | 4.31 | 0.27 |
| NSBI | 16.87 | 6.00 | 0.36 |
| BOKL | 14.14 | 4.44 | 0.31 |
| Higher Value | NSBI | NSBI | NSBI |
| Lower Value | NIBL | NIBL | NIBL \& BOKL |

## Mean Comparison with the Sample Banks:

Mean of the ratio of NSBI Investment on Government securities to Total Asset ratio is higher than that of other sample banks which shows that NSBI investment on government securities portion is higher than that of other sample banks in comparison to Total Asset volume, which shows that the NSBI is looking forward to generate more income and keep the fund safety from investment on government securities. Likewise the Mean ratio of NIBL is the lowest among the other sample banks which shows that the investment on government securities portion is lower than that of other sample banks in comparison to Total Asset volume, which shows that NIBL lending volume is low on government securities compared to Total Asset volume of the sample banks.

## Standard Deviation (S.D) Comparison with the Sample Banks:

The standard deviation of NSBI Investment on Government securities to Total Asset is comparatively higher that of other samples banks. It means that the risk is higher in the NSBI Investment on government securities to Total Asset. Likewise the SD of NIBL is lower compared to other sample banks which mean that the investment on government securities to total asset of BOKL is less risky than other sample banks. But since the mean value of all the samples banks are different to each other mean which reveals that the S.D is not suitable for absolute comparison. For which further C.V has been calculated to get the better result.

## Coefficient of Variation (C.V) Comparison with the Sample Banks:

CV is a relative measure of variability which measure risk per unit. C.V is more appropriate tool to measure risk with different Mean and S.D value. The CV of NSBI is more compared to other sample banks which mean that there is more variability in investment on government securities of NSBI than other sample banks compared to total asset. It is due to higher rate of increment of Investment on Government Securities pattern in NSBI. Likewise CV of NIBL and BOKL is less compared to other sample banks which mean that there is less variability in investment on government securities of NIBL and BOKL to total asset than other sample banks which is due to lower rate of increment of investment on government securities pattern in NIBL and BOKL. But in conclusion it can be said that NIBL and BOKL is successful in utilizing its resources on Investment on Government securities than that of NSBI.

### 4.3.5 Investment on Share and Debentures to Total Assets Ratio

To study the investment management of NIBL, NSBI, HBL and BOKL total investment has been separated into two parts i.e. investment on government securities and investment on shares and debentures. Nowadays, a commercial bank is interested to invest its fund not only on government securities but also in shares and debenture of other different types of companies. During the study period, most of the commercial banks of Nepal have found to purchase the share of other companies too. Investment on shares and debentures to total assets ratio reflects the extent to which the banks are successful to mobilize their assets on purchase of shares and debentures of other companies to generate incomes and utilize their excess fund.

Table No. 30 Investment on Share and Debentures to Total Assets Ratio of NIBL (Amt in Millions)

| Year | Investment on shares \& debentures | Total Assets | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 203 | 21,330 | 0.95 |
| 2006/07 | 108 | 27,590 | 0.39 |
| 2007/08 | 55 | 38,873 | 0.14 |
| 2008/09 | 60 | 53,010 | 0.11 |
| 2009/10 | 64 | 57,305 | 0.11 |
| Mean |  |  | 0.34 |
| S.D |  |  | 0.32 |
| CV |  |  | 0.94 |

(Source: Annex-14)
The above table shows Investment on Share and Debentures to Total Assets Ratio of NIBL, From the FY 2005/06 to FY 2009/10 Total Assets are goes on increasing trend, and Total Investment on Share and Debentures goes on fluctuating trend due to ups and downs in the investment on share and debenture figures over the study period. The ratio of total investment on share and debenture and total assets continuously decreases which result the decreasing trend. The ratio is maximum on FY 2005/06 with $0.14 \%$ and minimum on FY 2008/09 and FY 2009/10 with $0.11 \%$. NIBL is lending fewer funds of its assets in the investment on share and debenture. The average ratio of Investment on

Share and Debentures to Total Assets 0.34, standard deviation is 0.32 and co-efficient variation is 0.94 percent. The comparison study is done in the comparative analysis table no. 34.

Table No. 31 Investment on Share and Debentures to Total Assets Ratio of HBL

| Year | Investment on shares <br> \& debenture | Total Assets | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| $2005 / 06$ | 39 | 29,460 | 0.13 |
| $2006 / 07$ | 0 | 33,519 | 0.00 |
| $2007 / 08$ | 72 | 36,175 | 0.20 |
| $2008 / 09$ | 90 | 39,320 | 0.23 |
| $2009 / 10$ | 94 | 42,717 | 0.22 |
| Mean |  |  | 0.16 |
| S.D |  |  | 0.10 |
|  |  |  | 0.64 |
| C.V |  |  |  |
|  |  |  |  |

(Source: Annex-14)
The above table shows Investment on Share and Debentures to Total Assets Ratio of HBL, From the FY 2005/06 to FY 2009/10 Total Assets are goes on increasing trend, and Total Investment on Share and Debentures goes on increasing trend except to the nil figures in FY 2006/07 over the study period. The ratio of total investment on share and debenture and total assets has the fluctuating trend due to the ups and downs of the ratio over the study period. The ratio is maximum on FY 2008/09 with $0.23 \%$ and minimum on FY 2006/07 with $0 \%$. HBL is lending more and more of its assets in the investment on share and debenture which have mobilize the fund in income generating sector although the figure of investment on share and debentures is very minimal over the study period. The average ratio of Investment on Share and Debentures to Total Assets 0.16, standard deviation is 0.10 and co-efficient variation is 0.64 percent. The comparison study is done in the comparative analysis table no. 34 .

Table No. 32 Investment on Share and Debentures to Total Assets Ratio of NSBI

| Year | Investment on shares <br> \& debentures | Total Assets | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| $2005 / 06$ | 20 | 13,035 | 0.15 |
| $2006 / 07$ | 20 | 13,901 | 0.14 |
| $2007 / 08$ | 32 | 17,187 | 0.19 |
| $2008 / 09$ | 53 | 30,166 | 0.18 |
| $2009 / 10$ | 33 | 38,047 | 0.09 |
| Mean |  |  | 0.15 |
| S.D |  |  | 0.00 |
| CV |  |  | 0.00 |

(Source: Annex-15)
The above table shows Investment on Share and Debentures to Total Assets Ratio of NSBI, From the FY 2005/06 to FY 2009/10 Total Assets are goes on increasing trend, and Total Investment on Share and Debentures goes on increasing trend except in FY 2009/10 over the study period. The ratio of total investment on share and debenture and total assets has the fluctuating trend due to the ups and downs of the ratio over the study period. The ratio is maximum on FY 2007/08 with $0.19 \%$ and minimum on FY 2009/10 with $0.09 \%$. NSBI is spontaneous investing of its assets in the investment on share and debenture due to the high and low figure in the investment on share and debentures over the study period. The average ratio of Investment on Share and Debentures to Total Assets 0.15 , standard deviation is 0 and co-efficient variation is 0 percent. The comparison study is done in the comparative analysis table no. 34 .

Table No. 33 Investment on Share and Debentures to Total Assets Ratio of BOKL (Amt in Millions)

| Year | Investment on shares \& debenture | Total Assets | Ratio (\%) |
| :---: | :---: | :---: | :---: |
| 2005/06 | 19 | 12,278 | 0.15 |
| 2006/07 | 93 | 14,570 | 0.64 |
| 2007/08 | 663 | 17,721 | 3.74 |
| 2008/09 | 1,091 | 20,496 | 5.32 |
| 2009/10 | 1,029 | 23,396 | 4.40 |
| Mean |  |  | 2.85 |
| S.D |  |  | 2.07 |
| CV |  |  | 0.73 |

(Source: Annex-15)
The above table shows Investment on Share and Debentures to Total Assets Ratio of BOKL, From the FY 2005/06 to FY 2009/10 Total Assets are goes on increasing trend, and Total Investment on Share and Debentures goes on increasing trend except in FY 2009/10 over the study period. The ratio of total investment on share and debenture and total assets has the increasing trend expect in FY 2009/10. The ratio is maximum on FY 2008/09 with $5.32 \%$ and minimum on FY 2005/06 with $0.15 \%$. BOKL is lucrative investing of its assets in the investment on share and debenture due to the high investment on share and debentures over the study period. BOKL is mobilizing its assets successfully over the rapidly increases figure in current fiscal year. The average ratio of Investment on Share and Debentures to Total Assets 2.85, standard deviation is 2.07 and co-efficient variation is 0.73 percent. The comparison study is done in the comparative analysis table no. 34 .

Figure No. 10 Investment on Share and Debentures to Total Assets Ratio


The above bar chart shows that the ratio of Total Investment on share debenture to total assets. The ratio of BOKL is higher than other sample banks it can be stated that BOKL has invested higher amount in shares and debentures in comparison to other sample banks. But it shows that all banks invest fewer funds in share and debentures of other companies. HBL and NSBI bar level is very low compared to other sample banks which mean that these banks has invested lower amount in share and debentures in comparison to other sample banks.

Table No. 34 Comparative Analysis of the Sample Bank's Mean, S.D \& C.V

| Sample Banks | Mean | S.D | C.V |
| :---: | :---: | :---: | :---: |
| NIBL | 0.34 | 0.32 | 0.94 |
| HBL | 0.16 | 0.10 | 0.64 |
| NSBI | 0.15 | 0.00 | 0.00 |
| BOKL | 2.85 | 2.07 | 0.73 |
| Higher Value | BOKL | BOKL | NIBL |
| Lower Value | NSBI | NSBI | NSBI |

## Mean Comparison with the Sample Banks:

Mean of the ratio of BOKL Investment on Share and Debentures to Total Asset ratio is higher than that of other sample banks which shows that BOKL investment on share and debenture portion is higher than that of other sample banks in comparison to Total Asset volume, which shows that the BOKL is forward and mobilizing its assets in investment on government securities than other sample banks. Likewise the Mean ratio of NSBI is the lowest among the other sample banks which shows that the investment on share and debentures portion is lower than that of other sample banks in comparison to Total Asset volume, which shows that NSBI lending volume is low on share and debentures compared to Total Asset volume of the sample banks, which mean that NSBI is less mobilizing its assets in share and debentures.

## Standard Deviation (S.D) Comparison with the Sample Banks:

The standard deviation of BOKL Investment on Share and Debentures to Total Asset is comparatively higher that of other samples banks. It means that the risk is higher in the BOKL Investment on share and debentures to Total Asset. Likewise the SD of NSBI is lower compared to other sample banks which mean that the investment on share and debentures to total asset of NSBI is less risky than other sample banks. But since the mean value of all the samples banks are different to each other mean which reveals that the S.D is not suitable for absolute comparison. For which further C.V has been calculated to get the better result.

## Coefficient of Variation (C.V) Comparison with the Sample Banks:

CV is a relative measure of variability which measure risk per unit. C.V is more appropriate tool to measure risk with different Mean and S.D value. The CV of NIBL is more compared to other sample banks which mean that there is more variability in investment on share and debentures of NIBL than other sample banks compared to total asset. It is due to higher rate of increment of Investment on share and debentures pattern in NIBL. Likewise CV of NSBI is less compared to other sample banks which mean that there is less variability in investment on share and debentures of NSBI to total asset than other sample banks which is due to lower rate of increment of investment on share and debentures pattern in NSBI. But in conclusion it can be said that NSBI is successful in utilizing its resources on Investment on share and debenture than that of NIBL. From the above it can be concluded that all the banks doesn't invest much on share and debenture of other company. It may be because of higher risk involved with it. But commercial bank should invest in other company's shares also to develop the industry and to develop the country.

### 4.4 Growth Ratios

Growth ratios represent how well the Commercial banks are maintaining their economic and financial position. Here those growth ratios are analyzed and interpreted which are directly related to the fund mobilization and investment management of a commercial bank. During the study period from FY 2005/06 and FY 2009/10 investment, deposit and loan and advances has been taken for the growth analysis of NIBL, HBL, NSBI and BOKL. The high ratio generally indicated better performance of a bank and vice-versa.

### 4.4.1 Growth Ratio of Total Investment

This ratio shows whether the sample bank had increased the total investment or decreased the total investment of particular sample banks. Firstly the growth of the investment volume for the four Fiscal year i.e. from FY 2006/07 to FY 2009/10 has been calculated. Then after calculating the growth for all the sample banks further the average growth has been calculated which has been presented on below table. Likewise the detail of the calculation is presented in the annexure section. The growth rate is on average basis which is mentioned below also the following table shows the growth ratio of NIBL, HBL, NSBI and BOKL.

Table No. 35 Growth Ratio of Investment

| Year | NIBL | HBL | NSBI | BOKL |
| :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 5,602 | 10,890 | 3,611 | 3,374 |
| $2006 / 07$ | 6,505 | 11,822 | 2,659 | 2,992 |
| $2007 / 08$ | 6,874 | 13,340 | 3,089 | 3,204 |
| $2008 / 09$ | 7,399 | 8,710 | 13,286 | 2,783 |
| $2009 / 10$ | 8,635 | 8,444 | 16,305 | 3,269 |
| Average <br> Growth \% | 9.23 | $\mathbf{( 3 . 2 7 )}$ | 68.53 | 0.02 |

(Source: Annex-16)
The above table presents the Total Investment of sample banks with the average growth during the study period i.e. from FY 2005/06 to FY 2009/10. The investment figure of NIBL and NSBI is in increasing trend. The investment figure of HBL is in decreasing trend and the investment figure of BOKL is in fluctuating trend. The average growth rate of NSBI is the highest among the sample banks with $68.53 \%$ and the average growth of HBL is negative over the study period with -3.27\%. Investment volume of NSBI is higher and the investment volume of BOKL is lower comparing the figure of the last FY 2009/10. NSBI seems lucrative in funding more of its assets in investment section regarding to the current year comparing to other sample banks indeed.

Figure No. 11 Growth line of Investment of the sample banks.


The above line chart shows that the investment line of the entire sample banks over the study period. NIBL is gradually increasing and upward moving over the study period. The investment line of HBL is rapidly declining downward as shown from the above figure which implies that the investment volume is decreasing in every FY. The investment line of NSBI is gradually increasing till FY 207/08 and rapidly increases as shown from the upward moving line after FY 2007/08 till FY 2009/10. The investment line for BOKL has fluctuating which move upward and downward in the above figure over the study period.

### 4.4.2 Growth Ratios of Deposit

The bank collects its deposits from public. The growth ratio of deposits represent whether the banks had been able to increase its deposit collection or not. The following table represents the growth ratios of deposits of NIBL, HBL, NSBI and BOKL.

Table No. 36 Growth Ratio of Deposit

| Year | NIBL | HBL | NSBI | BOKL |
| :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 18,927 | 26,490 | 11,002 | 10,485 |
| $2006 / 07$ | 24,488 | 30,048 | 11,445 | 12,388 |
| $2007 / 08$ | 34,451 | 31,842 | 13,715 | 15,833 |
| $2008 / 09$ | 46,698 | 34,681 | 27,957 | 18,083 |
| $2009 / 10$ | 50,094 | 37,611 | 34,896 | 20,315 |
| Average <br> Growth \% | 22.58 | 7.35 | 30.50 | 14.50 |

(Source: Annex-17)

The above table presents the Total Deposit of sample banks with the average growth during the study period i.e. from FY 2005/06 to FY 2009/10. The deposit figure of all the sample banks i.e. NIBL, HBL, NSBI and BOKL is in increasing trend over the study period. The average growth rate of NSBI is the highest among the sample banks with $30.50 \%$ and the average growth of HBL is lower over the study period with $7.35 \%$, which mean that the deposit in volume of NSBI is increasing higher and the deposit of HBL is increasing lower than any of the sample banks. But the total volume of deposit of NIBL is higher and the deposit volume of BOKL is lower comparing the deposit volume at the last FY 2009/10.

Figure No. 12 Growth line of Deposit of the sample banks.


The above line chart shows that the deposit line of the entire sample banks over the study period. NIBL is rapidly increasing which is presented by upward moving line over the study period. The investment line of HBL is gradually increasing shown from the above figure. The investment line of NSBI is rapidly increasing as shown from the upward moving line over the study period than any other sample banks. The investment line for BOKL is also rapidly increasing which is shown from the upward moving line of BOKL over the study but low than NSBI and NIBL.

### 4.4.3 Growth Ratio of Loan and Advances

Loan and advances growth ratio shows whether the banks are increasing its loan and advances or decreasing. The following table shows the position of loan and advances of HBL and NSBI bank.

Table No. 37 Growth Ratio of loan and Advance

| Year | NIBL | HBL | NSBI | BOKL |
| :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 12,776 | 14,642 | 7,626 | 7,259 |
| $2006 / 07$ | 17,286 | 16,997 | 9,460 | 9,399 |
| $2007 / 08$ | 26,996 | 19,497 | 12,113 | 12,462 |
| $2008 / 09$ | 36,241 | 24,793 | 15,131 | 14,647 |
| $2009 / 10$ | 40,318 | 27,980 | 17,480 | 16,664 |
| Average <br> Growth \% | 27.39 | 14.16 | 18.51 | 18.67 |

(Source: Annex-18)

The above table presents the Total loan and advance of sample banks with the average growth during the study period i.e. from FY 2005/06 to FY 2009/10. The loan and advance figure of all the sample banks i.e. NIBL, HBL, NSBI and BOKL is in increasing trend over the study period. The average growth rate of NIBL is the highest among the sample banks with $27.39 \%$ and the average growth of HBL is lower over the study period with $14.16 \%$, which mean that the loan and advance in volume of NIBL is increasing higher and the loan and advances of HBL is increasing lower than any of the sample banks. But the total volume of loan and advances of NIBL is higher and the loan and advance volume of BOKL is lower comparing the deposit volume at the last FY 2009/10. All the commercial bank's loan and advances portion remains high than any other items in total assets which generate high income for the banks.

Figure No. 13 Growth line of loan and Advance of the sample banks.


The above line chart shows the loan and advance line of the all sample banks over the study period. NIBL loan and advances line is rapidly increasing which is presented by upward moving line over the study period. The loan and advances line of HBL is gradually increasing shown from the above figure which is lower than any other sample banks over the study period. The loan and advances line of NSBI is also gradually increasing as shown from the upward moving line over the study period. The loan and advances line for BOKL is also gradually increasing which is shown from the upward moving line of BOKL over the study.

### 4.5 Statistical Analysis

Here, statistical tools such as co-efficient of correlation analysis between different variables, trend analysis of investment, loan and advances and total deposit are used to achieve the objectives of the study.

### 4.5.1 Regression analysis:

Regression analysis is a mathematical measure of the average relationship between two or more variables in terms of the original units of the data. Thus it can be said that regression is the estimation or prediction of one variable's value from the given of other variable's value. This relationship is used to estimate the value of dependent variable for the given values of independent variables. In this regression one dependent variable and one independent variables X and Y so that the regression equation for the observed data is given by:
$Y=a+b x$ $E q^{n}(i)$

Where,
$\mathrm{Y}=$ dependent variable
$\mathrm{X}=$ independent variable
$a=$ intercept of the regression line
$b=$ Slope of the regression line which measure the change in $Y$ per unit change in $X$. It is also known as regression coefficients of Y on X and is denoted by $\mathrm{b}_{\mathrm{yx}}$.

Equation (i) is used to estimate the value of Y for given value of X but without knowing the values of a \& b we are not able to estimate the value of Y.

Here, $\mathrm{a} \& \mathrm{~b}$ are estimated by solving the following normal equation.

$\sum X Y=a \sum X+b \sum X^{2} \cdots \cdots \cdots \cdots \cdots \cdots \cdots q^{n}($ iii $)$

### 4.5.2. Co-efficient of Correlation Analysis between Investment and Deposit

Under this topic, Karl Person's coefficient of correlation has been used to find out the relationship between investment plus loan and advances and deposit. It is already mentioned that investment is dependent upon saving i.e. deposit. Longer the duration of deposit, higher the banker's ability to acquire long term asset. In the other words banker can't invest more on long asset if duration of deposit is short. In this sense it can be said that investment is the function of deposit. Theoretically it is assumed that long-term asset yield higher return. It means longer the duration of deposit, higher would be the profitability of the bank. But investment may not be the function of deposit only. Sometimes investment is made from the funds raised from the sources. In such situation investment is not dependent upon deposit only co-efficient of correlation between these two variables. In this analysis deposits is independent variable ( Y ) and investment plus Loan and Advances is dependent variable (X).

Table No. 38 Correlation between Investment and Deposits

| S.No. | Banks | $\mathbf{r}$ | $\mathbf{r}^{2}$ | P.E | $6 \times$ P.E |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | NIBL | 0.9980 | 0.9960 | 0.0036 | 0.0216 |
| 2 | HBL | 0.9747 | 0.9500 | 0.150 | 0.90 |
| 3 | NSBI | 0.9980 | 0.9960 | 0.0011 | 0.0063 |
| 4 | BOKL | 0.9991 | 0.9982 | 0.0069 | 0.0414 |

(Source: Annex-19,20,21 \& 22)
From the above table, BOKL has higher co-efficient of relation (r) than other banks and HBL has the lower co-efficient of relation (r). The co-efficient of relation (r) for all the sample bank is positive which mean positive relationship between these two variables i.e. Investment and Deposit. And the value of co-efficient of determination (r2) is also higher of BOKL, which means $99.91 \%$ of investment decision is dependent upon deposit and only $0.09 \%$ investment is depend upon other variables. Similarly probable Error (P.E.) is 0.0069 and 6P.E. is 0.0414 which shows that ' $r$ ' is highly greater than 6P.E. Therefore it reveals that relationship between deposit and investment is significant.

Likewise in the case of HBL, coefficient of correlation between investment and deposit is 0.9747 which shows that there is a positive correlation between deposit and investment and the value of co- efficient of determination (r2) is 0.9500 , which means $97.47 \%$ investment is depend on deposit and $2.53 \%$ investment decision depends of other variables. And it's probable Error (P.E) is 0.150 and similarly 6P.E. is 0.90 which is less than coefficient of correlation (r). It also significant though there is positive relation between investment and deposit.

Likewise in the case of NIBL, The co-efficient of relation (r) is positive which mean positive relationship between these two variables i.e. Investment and Deposit. And the value of co-efficient of determination (r2) 0.9980 which indicate that $99.80 \%$ of investment decision is dependent upon deposit and only $0.002 \%$ investment is depend upon other variables. Similarly probable Error (P.E.) is 0.0036 and 6P.E. is 0.0216 which
shows that ' $r$ ' is highly greater than 6P.E. Therefore it reveals that relationship between deposit and investment is significant

Likewise in the case of NSBI, The co-efficient of relation (r) is positive which mean positive relationship between these two variables i.e. Investment and Deposit. And the value of co-efficient of determination (r2) 0.9980 which indicate that $99.80 \%$ of investment decision is dependent upon deposit and only $0.002 \%$ investment is depend upon other variables. Similarly probable Error (P.E.) is 0.0011 and 6P.E. is 0.0063 which shows that ' $r$ ' is highly greater than 6P.E. Therefore it reveals that relationship between deposit and investment is significant

### 4.5.3. Trend Analysis and Projection for Next Three Years

The objective of this topic is to analysis trend of investment of NIBL, HBL, NSBI and BOKL. To utilize investment of a commercial bank may grant loan and advances and invest in government securities, shares, and debentures of other companies. Under this topic an attempt is made to analyze trend of Investment of NIBL, HBL, NSBI and BOKL and also forecast their trend for next three years. The projections are based on the following assumptions:
a. The main assumption is that other things will remain unchanged.
b. The bank will operate the banking transaction same as in present position.
c. The economy will remain in the present stage.
d. Nepal Rastra Bank will not change its guidelines to commercial banks.

### 4.5.4 Trend Analysis of Total Investment

Under this topic an attempt is made to analyze the trend of investment of NIBL, HBL, NSBI and BOKL and forecast the trend for next 3 years. Here, investment includes investment on government securities and investment in share and debenture of other companies plus loan and advances. Since loan and advances are also the investment of the bank, it is also included with total investment. The following table shows the trend values of 8 years from FY 2005/06 to FY 2012/13 of NIBL, HBL, NSBI and BOKL.

Table No. 39 Trend values of Investment

| Years | NIBL | HBL | NSBI | BOKL |
| :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 18,378 | 25,532 | 11,237 | 10,633 |
| $2006 / 07$ | 23,791 | 28,819 | 12,119 | 12,391 |
| $2007 / 08$ | 33,870 | 32,837 | 15,202 | 15,666 |
| $2008 / 09$ | 43,640 | 33,503 | 28,417 | 17,430 |
| $2009 / 10$ | 48,953 | 36,424 | 33,785 | 19,933 |
| $2010 / 11$ | 58,026 | 39,363 | 38,570 | 22,302 |
| $2011 / 12$ | 66,126 | 42,010 | 44,710 | 24,666 |
| $2012 / 13$ | 74,226 | 44,657 | 50,849 | 27,030 |

(Source: Annex-23, 24, 25 \& 26)

From the above table no. 39 it is found that investment trend of commercial banks is in increasing trend. Other things remaining the same, the investment of NIBL will be higher than the other bank. Similarly the investment volume of the sample banks i.e. NIBL, HBL, NSBI and BOKL is expected to have increasing trend for the projected years. From the above investment trend it is clear that NIBL run far ahead than other banks. In conclusion, we can say that all the commercial banks have following the policy of maximizing the investment.

Figure No. 14 Trend line of Investment of the Sample banks.


From the figure no. 14 it is graphically presented the investment trend line of the sample banks. The upward moving growth trend of the investment of NIBL and HBL indicate higher growth with consistency than that of NSBI and BOKL which has been showed from the line of the each sample bank on the above figure. Also the projected investment value of NIBL is higher and then followed by NSBI, HBL and BOKL respectively.

### 4.6 Major Finding of the Study

## Findings from ratio of Sample banks to Total Commercial banks:

Mean of the ratio of HBL Investment is $9.96 \%$ which higher than that of other sample banks which shows that HBL investment portion is higher than that of other sample banks. Likewise the Mean ratio of BOKL is $2.86 \%$ the lowest among the other sample banks which shows that the investment portion is lower than that of other sample banks. HBL investment to total investment of commercial bank is riskier due to high S.D. Likewise the SD of NIBL is lower compared to other sample banks which mean that the investment of NIBL is less risky than other sample banks. The CV of NSBI is more compared to other sample banks which mean that there is more variability in investment of NSBI than other sample banks. Likewise CV of NIBL is less compared to other sample banks which mean that there is less variability in investment of NIBL.

## Findings from the Investment pattern of Sample banks:

NSBI, BOKL and HBL had investment most of their fund in government securities than other bank. Likewise NIBL do invest in other sectors with share and debentures. None of the banks is recently investing in NRB bond. The investment in government securities is in fluctuating trend over the study period of all sample banks. The lower investment for all the sample banks is in share and debenture of the other company. All the sample banks had invested fewer funds to share and capital of other company due to high risk. The commercial banks mostly invest on government securities, NRB and others securities.

## Findings from Assets Management Ratios:

The mean ratio of Investment of total deposit of NSBI is $34.56 \%$ which is higher than other banks. Likewise NIBL, HBL and BOKL mean ratios are $21.84 \%, 33.98 \%$ and $21.61 \%$ respectively. The ratio of BOKL is less than other banks. The deposit volume of all the sample banks is increasing and the investment of NIBL, NSBI and BOKL is also increasing but the investment volume of HBL is decreasing. Loan and advances is also another type of Investment of Commercial banks. The mean ratio of loan and advances to deposit ratio of BOKL is $77.37 \%$ which is higher than other banks, HBL has the lower ratio of $63.79 \%$. It shows that the sample banks except HBL uses most of its fund from deposit on loan and advances which exceeds $65 \%$ of the total deposit. The mean ratio of total investment to total assets ratio of NSBI is $34.56 \%$ which is greater than other banks. Similarly BOKL has lower ratio of $21.61 \%$ than other banks. The mean ratio of total of investment on government securities to total assets ratio of NSBI is $16.87 \%$ which is higher than other banks and NIBL has $8.77 \%$ which is lower ratio than other banks. The mean ratio of investment on share and debenture to total asset ratio BOKL is $2.85 \%$ which is higher than other banks. BOKL has use its more fund on share and debenture of other companies than other banks. NSBI has $0.15 \%$ which is less ratio of investment on share and debenture.

## Financial from Growth Ratio:

Growth ratio of investment of NSBI is $68.53 \%$ which is higher than other banks. Likewise HBL, NIBL and BOKL have the growth ratio of $-3.27 \%, 9.23 \%$ and $0.02 \%$ respectively. All the banks increasing their investment, BOKL has $0.02 \%$ which is less growth ratio than other banks. Growth ratio of loan and advance of NIBL has 27.39\% which is higher than that of other banks and HBL has $14.16 \%$ which is lower growth ratio of loan and advance. All the banks are increasing their loan and advance. Growth ratio of deposits of NSBI is $30.50 \%$ which is higher than that other banks and HBL has $7.35 \%$ which is lower growth ratio of deposit. All the banks are increasing their deposits.

## Findings from Statistical Analysis

## 1. Regression analysis

This analysis supports to find the trend value of investment for the next three years. The trend analysis shows that the investment volume for the next three projected years of all the sample banks will continuously increase. The trend line of the investment volume will have the upward slope. NIBL is projected to have the highest growth with NSBI, HBL and BOKL respectively. All the sample banks are aggressively advancing funds on investment. The estimated investment volume of NIBL is expected to be 74,226 and the investment volume of BOKL is expected to be 27,030 for the FY 2012/13.

## 2. Correlation Coefficient analysis

Correlation of coefficient between deposit and investment of all four banks are significant and the value of coefficient of determination (r2) of BOKL is 0.9982 which is higher than other banks it means $99.82 \%$ of investment decision is dependent upon deposit and only $0.18 \%$ investment is depend upon other variables. Similarly probable Error (P.E.) is 0.0011 and 6 P.E. is 0.0063 which shows that ${ }^{\circledR}$ is highly greater than 6 P.E. In the case of HBL, coefficient of correlation between investment and deposit is 0.9747 which is less than other banks it shows that there is a positive correlation between deposit and investment and the value of coefficient of determination (r2) is 0.950 , Which mean $95.0 \%$ investment is depend on deposit and $5 \%$ investment decision depends on other variables. And it's probable error (P.E.) is 0.15; 6P.E. is 0.9 which shows that ( r ) is higher than (6P.E.). It means correlation of coefficient between deposit and investment of HBL is significant through there is positive correlation between them.

## CHAPTER FIVE

## SUMMARY, CONCLUSION AND RECOMMENDATION

The last chapter of this study is summary, conclusion and recommendation developed from the analysis of various aspects of the investment of commercial banks by using some financial as well as statistical tools. After completing the basic analysis required for the study the final and the most important task of the researcher is to be summarized the study and recommendation for the future importance.

### 5.1 Summary

Banks \& financial institutions are the backbone of the economic development of a country. They have promoted industrialization \& economic development by channeling the public deposit into industrial as well as agricultural sector. Commercial banks play an important role in the economic development of the country as they provide capital for the development of industry, trade as well as agriculture by disbursing the saving collected as deposits from the people. Commercial banks investment strongly support for the economic condition of the country. Loan granted to small sector and agricultural sector support to increment of per capita income of the rural people. Banks loans help the growth of trade and commerce, energy sector as well as agriculture and empower the economic activities of the country. In Nepal history of modern financial institution begins with the establishment of NBL in 1937A.D. since then several financial institutions have come into existence. But Nepalese Industries have been facing challenges especially due to inadequacy of financial resources. Globalization and freeing up of the economy, decentralization, restructuring and downswing of large firms, worldwide communication networks and transfer and acquisition of state of the art, technology and other application, all have brought the challenges and opportunities to entrepreneur. Those who can respond to these challenges and mobilize necessary financial resources become successful and those who do not, fall victim in this matter. Commercial banks not only collect the scattered saving from individual by accepting deposits but also provides various types of loan. And it itself invest in various share and debentures of other companies. A healthy development of any band depends heavily upon its Investment policy. A sound and
variable investment policy can be effective one for the economy to attain the economic objectives directed towards the acceleration of the pace of development. So, now in Nepal there are many commercial banks competition with each other in their business. These banks are mainly concentrated themselves on financing foreign trade commerce and industry.

The main objective of the study is to evaluate the Investment Analysis of Sample Commercial Banks in Nepal. And to suggest measures to improve the investment policy of the banks. The study is based on secondary data from fiscal year 2005/06 to 2009/10. The data which were employed in this research are secondary in nature. They are obtained from annual report and financial statement, official records, periodicals, journals and bulletins, various published reports and relevant unpublished master degree thesis. Financial as well as statistical tools have been developed in order to analyze and interpret the data information, under financial analysis, various financial ratio, assets management ratio and growth ration have been analyzed and interpreted. Under statistical tools like percentage, mean, standard deviation, coefficient of variation, coefficient of correlation, trend analysis and interpretation of the data. This analysis gives clean picture of the performance of the bank with regard to investment operation.

### 5.2 Conclusion

Banks \& financial institutions in Nepal will have to benchmark themselves against some of the best in the world, for a strong and resilient banking and financial system. Therefore, banks need to go beyond peripheral issues and tackle significant issues like improvements in profitability, efficiency and technology, while achieving economies of scale through available cost effective solutions. These are some of the major issues that need to be addressed by banks in recent scenario, for their success and not just survival, in the changing environment. After study and analysis of given data we conclude that banking is one of sector business. All the banks are running in profit. They invest in different sector. NIBL is oldest bank of the sample banks. It is running successfully and the growth rate loan and advance is higher than that of other banks.

Likewise growth rate of deposit of NSBI is higher than other bank which means that it collects more deposit from different sector. The entire sample banks are running successfully and the growth rate of the sample banks are satisfactory. From above data we can say that BOKL has collected deposit and invest more funds on loan and advance than after followed by NIBL, NSBI and HBL with mean value 74.91, 68.90 and 63.79 respectively. Mean ratio of HBL Investment to total commercial banks investment is $9.96 \%$ which is extremely higher than that of other banks to total commercial banks. The ratio of BOKL is $2.86 \%$ which is less than other banks. The mean ratio of Investment of total deposit of NSBI is $34.56 \%$ which is higher than other banks. The mean ratio of loan and advances to deposit ratio of NIBL is $86.38 \%$ which is higher than other banks, HBL has lower ratio than other banks. It shows that the bank uses most of its fund from deposit on loan and advances. Mean of the ratio of NSBI Investment to Total Asset ratio is higher than that of other sample banks which shows that NSBI investment portion is higher than that of other sample banks in comparison to Total Asset volume. Likewise the Mean ratio of BOKL is the lowest among the other sample banks which shows that the investment portion is lower than that of other sample banks in comparison to Total Asset volume. Mean of the ratio of NSBI Investment on Government securities to Total Asset ratio is higher than that of other sample banks which shows that NSBI investment on government securities portion is higher than that of other sample banks. Likewise the Mean ratio of NIBL is the lowest among the other sample banks which shows that the investment on government securities portion is lower than that of other sample banks. The mean ratio of investment on share and debenture to total asset ratio BOKL is $2.85 \%$ which is higher than other banks. BOKL has use its more fund on share and debenture of other companies than other banks. NSBI has $0.15 \%$ which is less ratio of investment on share and debenture. The investment figure of NIBL and NSBI is in increasing trend. The investment figure of HBL is in decreasing trend and the investment figure of BOKL is in fluctuating trend. The average growth rate of NSBI is the highest among the sample banks with $68.53 \%$ and the average growth of HBL is negative over the study period with (3.27)\%. Investment volume of NSBI is higher and the investment volume of BOKL is lower comparing the figure of the last FY 2009/10.

### 5.3 Recommendation

On the basis of analysis finding of study, the following recommendation and suggestion are forwarded;
> Mean ratio of Total Commercial bank investment to Sample banks investment for BOKL is the lowest among the other sample banks which shows that the investment portion is lower than that of other sample banks in comparison to total commercial bank investment. So it is recommended for BOKL to invest more funds in investment sectors to earn profit, solve liquidity problems, guarantee income etc.
> Since the entire sample banks investment portion compared to total investment in Government securities is high. So it is recommended to invest also in NRB bond and Share \& Debentures to segregate risk, earn high income and secure the investment which also overcome liquidity crunch whenever required.
> The average ratio of investment to total deposit ratio of NSBI is higher than that of other banks, it means it has invested more investment products compared to deposit volume of the sample banks. Likewise BOKL investment to deposit ratio is lower than other sample banks which might create lack of marketable securities in time of liquidity crunch. So it is recommended to increase BOKL's investment compared to deposit volume.

The average ratio of loan and advance to total deposit ratio of BOKL is higher than other sample banks which might create liquidity crunch due to non marketable securities. So it is recommended to decreases its loan and advance considering the liquidity condition and remain far away from the liquidity crunch. Also HBL loan and advance to total deposit ratio is lower which means that comparing to sample banks ratio HBL earning assets is less so it is recommended to increase its investments to earn of its assets instead of remaining idle.
$>$ BOKL has the low mean ratio for the total investment to total assets as compared to others sample banks. Also the overall growth rate of BOKL is very low than other sample banks. Likewise the BOKL investment portion to total investment of commercial bank is also less. Hence it is recommended to flow more fund in investment sectors.

NSBI has invested its more funds only in government securities so it is recommended that it should invest in other different sector. Likewise none of the sample banks have invested in NRB bond so it is recommended to invest in NRB bond too and balance the ratio in different sectors.
> All the sample banks is investing very low fund in Share and Debenture sectors which has been presented on the presentation section of this research. So it is recommended to invest in Share and Debenture of other company and balance the investment ratio in different sectors.
$>$ Growth ratio of loan and advances of HBL is less than that of other banks so it is recommended that it should increased its loan and advances to make more profit.
$>$ Growth ratio of deposit of HBL is too low than that of other banks so it is recommended to put effort to increase the deposit volume by issuing different products and services which are more preferable by the customers. Also to expand the banking services to remote area of Nepal.
> The growth trend line for investment of NIBL is higher than other sample banks and BOKL trend line is lower over the study period. So it is recommended to increase the investment volume and balance the loan and advances for BOKL. Only advancing loan might create liquidity problems. Investment figure has almost guarantee return if invested in government securities and also can easily marketable which will minimize the liquidity problem.
> Portfolio condition of all the banks should be examined from time to time and attention should be made to maintain equilibrium in the portfolio condition as far as possible. The investment opportunities should be grabbed to optimize their investment portfolio. Nepal commercial banks should invest in different projects, finance developing industries like tourism and hydro-electricity with the help government, which provides security to them.
> In the light of growth competition in the banking sectors, the business of the banks should be customer oriented. It should focus not only towards big clients but also towards small clients who will support to increase the deposit volume and meanwhile increase the lending volume which turn to high profit and success of the bank. For that each and every sample banks should launched new and unique products and services with personal touch which result easy and convenient to the customers.

Majority of commercial banks have been found to be profit oriented ignoring their social responsibility, which is not a proper strategy to sustain in long run. So all the banks are suggested to render their serves even in the rural areas providing special loans to the deprived and priority sectors, which might further intensify the goodwill of the banks in future.
> Most of the people who live in rural areas are not benefited from the modern banking facilities. To making investment in agricultural sector which is need to development for the economic growth of the nation. All the sample banks are recommended to expand its branches in rural areas. Financial support from the bank helps to improve the financial condition of the rural people. To meet the poverty alleviation objectives of the government the banks helps by expanding their branches in rural areas.

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APPENDIX
(Annex-1)

| Year | Total Inv. of CB | NIBL <br> Inv. | $\begin{aligned} & \text { HBL } \\ & \text { Inv. } \end{aligned}$ | $\begin{aligned} & \text { NSBI } \\ & \text { Inv. } \end{aligned}$ | BOK <br> Inv. | Ratio NIBL (w) | Ratio HBL <br> (x) | Ratio NSBI (y) | Ratio <br> BOK <br> (z) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2005/06 | 82,174 | 5,602 | 10,890 | 3,611 | 3,374 | 6.82 | 13.25 | 4.39 | 4.11 |
| 2006/07 | 93,531 | 6,505 | 11,822 | 2,659 | 2,992 | 6.95 | 12.64 | 2.84 | 3.20 |
| 2007/08 | 108,955 | 6,874 | 13,340 | 3,089 | 3,204 | 6.31 | 12.24 | 2.84 | 2.94 |
| 2008/09 | 130,857 | 7,399 | 8,710 | 13,286 | 2,783 | 5.65 | 6.66 | 10.15 | 2.13 |
| 2009/10 | 168,758 | 8,635 | 8,444 | 16,305 | 3,269 | 5.12 | 5.00 | 9.66 | 1.94 |
| Sum of Ratio $\sum \mathrm{w}, \sum \mathrm{x}, ~ \sum \mathrm{y}$ \& $\sum \mathrm{z}$ |  |  |  |  |  | 30.85 | 49.80 | 29.89 | 14.31 |
| Mean of Sample bank $\bar{w}, \overline{-}, \bar{y} \overline{\&} \bar{z}$ |  |  |  |  |  | 6.17 | 9.96 | 5.98 | 2.86 |
| $\Sigma(\mathrm{w}-\overline{\mathrm{w}})^{2}, \sum(\mathrm{x}-\overline{\mathrm{x}})^{2}, \sum(\mathrm{y}-\overline{\mathrm{y}})^{2} \& \sum(\mathrm{z}-\bar{z})^{2}$ |  |  |  |  |  | 2.91 | 58.72 | 53.22 | 3.06 |
| Mean |  |  |  |  |  | 6.17 | 9.96 | 5.98 | 2.86 |
| S.D |  |  |  |  |  | 0.76 | 3.42 | 3.26 | 0.78 |
| C.V |  |  |  |  |  | 0.12 | 0.34 | 0.55 | 0.27 |

Ratio of NIBL bank $=$ Total investment of CB $\div$ NIBL bank investment $\times 100$ for each FY.

Mean of NIBL bank $=$ Sum of Ratio of all FY of NIBL $\div$ No. of Observation (5)
S.D of NIBL bank $=\sqrt{\sum(w-w) 2 \div N}$
C.V of NIBL bank $=$ S.D of NIBL $\div$ Mean of NIBL

Note:
Ratio, Mean, S.D and C.V of each sample banks i.e. HBL, NSBI and BOK has been calculated using above formula. All the calculation has been done using excel sheet and only the required figure has been posted at the above table to eliminate unnecessary figures.
(Source: Annual Report of NIBL, HBL, NSBI and BOK from FY 2005/06 to FY 2009/10.)
(Annex-2)
Segregation of Total Investment of NIBL

| Year | Investment | Govt. <br> Sec | $\%$ |  <br> debenture | $\%$ | NRB <br> bond | $\%$ | Others | $\%$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 5,602 | 2,522 | 45.02 | 18 | 0.32 | - | - | 3,066 | 54.73 |
| $2006 / 07$ | 6,505 | 3,256 | 50.05 | 35 | 0.54 | - | - | 3,214 | 49.41 |
| $2007 / 08$ | 6,879 | 3,154 | 45.86 | 60 | 0.87 | - | - | 3,664 | 53.26 |
| $2008 / 09$ | 7,402 | 2,531 | 34.19 | 64 | 0.86 | - | - | 4,807 | 64.94 |
| $2009 / 10$ | 8,638 | 4,201 | 48.63 | 67 | 0.78 | - | - | 4,370 | 50.59 |

Ratio of Govt. Securities $=$ Govt. Securities $\div$ Investment $\times 100$ for each FY.
Ratio of Share \& Debenture $=$ Share \& Debenture $\div$ Investment $\times 100$ for each FY
Ratio of Other Investment $=$ Other Investment $\div$ Investment $\times 100$ for each FY
(Source: Annual report of NIBL from FY 2005/06 to FY 2009/10)
(Annex-3)
Segregation of Total Investment of HBL

| Year | Investmen | Govt. <br> Sec | $\%$ |  <br> debenture | $\%$ | NRB <br> bond | $\%$ | Other | $\%$ |
| :--- | :---: | :--- | :--- | :---: | :--- | :---: | :--- | :--- | :--- |
| $2005 / 06$ | 10,890 | 5,144 | 47.24 | 40 | 0.37 | - | - | 5,706 | 52.40 |
| $2006 / 07$ | 11,822 | 6,454 | 54.59 | 73 | 0.62 | - | - | 5,295 | 44.79 |
| $2007 / 08$ | 13,340 | 7,471 | 56.00 | 90 | 0.67 | - | - | 5,779 | 43.32 |
| $2008 / 09$ | 8,710 | 4,211 | 48.35 | 94 | 1.08 | - | - | 4,405 | 50.57 |
| $2009 / 10$ | 8,444 | 4,465 | 52.88 | 79 | 0.94 | - | - | 3,900 | 46.19 |

Ratio of Govt. Securities $=$ Govt. Securities $\div$ Investment $\times 100$ for each FY.
Ratio of Share \& Debenture $=$ Share \& Debenture $\div$ Investment $\times 100$ for each FY
Ratio of Other Investment $=$ Other Investment $\div$ Investment $\times 100$ for each FY
(Source: Annual report of HBL from FY 2005/06 to FY 2009/10)

## (Annex-4)

| Segregation of Total Investment of NSBI |  |  |  |  |  |  |  |  |  |
| :--- | :---: | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| Year | Investment | Govt <br> Sec | $\%$ |  <br> debenture | $\%$ | NRB <br> bond | $\%$ | others | $\%$ |
| $2005 / 06$ | 3,611 | 3,591 | 99.45 | 20 | 0.55 | - | - | - | - |
| $2006 / 07$ | 2,659 | 2,345 | 88.19 | 32 | 1.20 | - | - | 282 | 10.61 |
| $2007 / 08$ | 3,089 | 3,036 | 98.25 | 33 | 1.07 | - | - | 21 | 0.68 |
| $2008 / 09$ | 13,286 | 3,306 | 24.88 | 33 | 0.25 | - | - | 9,947 | 74.87 |
| $2009 / 10$ | 16,305 | 4,313 | 26.45 | 37 | 0.23 | - | - | 11,955 | 73.32 |

Ratio of Govt. Securities $=$ Govt. Securities $\div$ Investment $\times 100$ for each FY.
Ratio of Share \& Debenture $=$ Share \& Debenture $\div$ Investment $\times 100$ for each FY
Ratio of Other Investment $=$ Other Investment $\div$ Investment $\times 100$ for each FY
(Source: Annual report of NSBI from FY 2005/06 to FY 2009/10)

## (Annex-5)

Segregation of Total Investment of BOKL

| Year | Investment | Govt. <br> Sec | $\%$ |  <br> debenture | $\%$ | NRB <br> bond | $\%$ | Other <br> s | $\%$ |
| :--- | :---: | :--- | :--- | :---: | :--- | :---: | :--- | :--- | :--- |
| $2005 / 06$ | 3,378 | 2,658 | 78.69 | 23 | 0.68 | - | - | 697 | 20.63 |
| $2006 / 07$ | 2,995 | 2,332 | 77.86 | 26 | 0.87 | - | - | 637 | 21.27 |
| $2007 / 08$ | 3,206 | 2,113 | 65.91 | 28 | 0.87 | - | - | 1,065 | 33.22 |
| $2008 / 09$ | 2,786 | 1,745 | 62.63 | 29 | 1.04 | - | - | 1,012 | 36.32 |
| $2009 / 10$ | 3,269 | 2,955 | 90.39 | 23 | 0.70 | - | - | 291 | 8.90 |

Ratio of Govt. Securities $=$ Govt. Securities $\div$ Investment $\times 100$ for each FY.
Ratio of Share \& Debenture $=$ Share \& Debenture $\div$ Investment $\times 100$ for each FY
Ratio of Other Investment $=$ Other Investment $\div$ Investment $\times 100$ for each FY
(Source: Annual report of BOKL from FY 2005/06 to FY 2009/10)
(Annex-6)

| NIBL Investment to Deposit Ratio |  |  |  | HBL Investment to Deposit Ratio |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Year | Investment | Deposit | Ratio (w) | Investment | Deposit | Ratio (x) |
| 2005/06 | 5,602 | 18,927 | 29.60 | 10,890 | 26,490 | 41.11 |
| 2006/07 | 6,505 | 24,488 | 26.56 | 11,822 | 30,048 | 39.34 |
| 2007/08 | 6,874 | 34,451 | 19.95 | 13,340 | 31,842 | 41.89 |
| 2008/09 | 7,399 | 46,698 | 15.84 | 8,710 | 34,681 | 25.11 |
| 2009/10 | 8,635 | 50,094 | 17.24 | 8,444 | 37,611 | 22.45 |
| Sum of ratio of NIBL $\sum$ w $=$ |  |  | 109.20 | Sum of ratio of HBL $\sum x=$ |  | 169.91 |
|  | Mean of | $\text { BL } \overline{\mathrm{w}}=$ | 21.84 | Mean of HBL $\overline{\mathrm{x}}=$ |  | 33.98 |
| $\sum(\mathrm{w}-\mathrm{w})^{2}=$ |  |  | 143.19 | $\sum(x-\bar{x})^{2}=$ |  | 353.76 |
| Mean |  |  | 21.84 | Mean |  | 33.98 |
| S.D |  |  | 5.35 |  | S.D | 8.41 |
| C.V |  |  | 0.24 | C.V |  | 0.25 |
| Ratio of NIBL bank $=$ Investment $\div$ Deposit $\times 100$ for each FY. <br> Mean of NIBL bank $=$ Sum of Ratio of all FY of NIBL $\div$ No. of Observation (5) <br> S.D of NIBL bank $=\sqrt{\sum(\mathrm{w}-\mathrm{w}) 2 \div \mathrm{N}}$ <br> C.V of NIBL bank $=$ S.D of NIBL $\div$ Mean of NIBL <br> Note: <br> Ratio, Mean, S.D and C.V of NIBL and HBL has been calculated using above formula. All the calculation has been done using excel sheet and only the required figure has been posted at the above table to eliminate unnecessary figures. |  |  |  |  |  |  |

(Source: Annual Report of NIBL and HBL from FY 2005/06 to FY 2009/10)
(Annex-7)

| NSBI Investment to Deposit Ratio |  |  |  | BOKL Investment to Deposit Ratio |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Year | Investment | Deposit | Ratio (y) | Investment | Deposit | Ratio (z) |
| 2005/06 | 3,611 | 11,002 | 32.82 | 3,374 | 10,485 | 32.18 |
| 2006/07 | 2,659 | 11,445 | 23.23 | 2,992 | 12,388 | 24.15 |
| 2007/08 | 3,089 | 13,715 | 22.52 | 3,204 | 15,833 | 20.24 |
| 2008/09 | 13,286 | 27,957 | 47.52 | 2,783 | 18,083 | 15.39 |
| 2009/10 | 16,305 | 34,896 | 46.72 | 3,269 | 20,315 | 16.09 |
| Sum of ratio of NSBI $\sum y=$ |  |  | 172.82 | Sum of ratio of BOK $\sum \mathrm{z}=$ |  | 108.05 |
|  | Mean of | $\text { NSBI } \bar{y}=$ | 34.56 | Mean of BOK $\bar{z}=$ |  | 21.61 |
| $\sum(y-\bar{y})^{2}=$ |  |  | 592.24 |  | $\sum(\mathrm{z}-\overline{\mathrm{z}})^{2}=$ | 189.20 |
| Mean |  |  | 34.56 |  | Mean | 21.61 |
| S.D |  |  | 10.88 |  | S.D | 6.15 |
| C.V |  |  | 0.31 |  | C.V | 0.28 |
| Ratio of <br> Mean of <br> S.D of N <br> C.V of <br> Note: | NSBI bank = <br> NSBI bank = <br> BI bank = <br> SBI bank = S <br> atio, Mean, S <br> rmula. All th <br> gure has been | vestment $\div$ <br> um of Rati <br> $\sum(y-y) 2$ <br> of NSBI <br> and C.V <br> calculation <br> osted at th | Deposit $\times$ of all FY $\div \mathrm{N}$ <br> Mean of <br> of NSBI <br> has been d <br> above tab | 00 for each <br> NSBI - <br> BI <br> BOKL has <br> ne using exce <br> to eliminate | observation <br> en calculated <br> sheet and only <br> necessary figu | 5) <br> sing above he required es. |

(Source: Annual Report of NSBI and BOKL from FY 2005/06 to FY 2009/10)
(Annex-8)

| NIBL Loan \& Advance to Deposit Ratio |  |  |  | HBL Loan \& Advance to Deposit Ratio |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Year | I Loan | Deposit | Ratio (w) | Loan | Deposit | Ratio (x) |
| 2005/06 | 18,378 | 18,927 | 97.10 | 25,532 | 26,490 | 96.38 |
| 2006/07 | 23,791 | 24,488 | 97.15 | 28,819 | 30,048 | 95.91 |
| 2007/08 | 33,870 | 34,451 | 98.31 | 32,837 | 31,842 | 103.12 |
| 2008/09 | 43,640 | 46,698 | 93.45 | 33,503 | 34,681 | 96.60 |
| 2009/10 | 48,953 | 50,094 | 97.72 | 36,424 | 37,611 | 96.84 |
| Sum of ratio of NIBL $\sum \mathrm{w}=$ |  |  | 483.74 | Sum of ratio | of HBL $\sum x=$ | 488.87 |
| $\text { Mean of NIBL } \overline{\mathrm{w}}=$ |  |  | 96.75 |  | n of HBL $\overline{\mathrm{x}}=$ | 97.77 |
| $\sum(\mathrm{W}-\overline{\mathrm{w}})^{2}=$ |  |  | 14.55 |  | $\sum(x-\bar{x})^{2}=$ | 36.27 |
| Mean |  |  | 96.75 |  | Mean | 97.77 |
| S.D |  |  | 1.71 |  | S.D | 2.69 |
| C.V |  |  | 0.02 |  | C.V | 0.03 |
| Ratio of <br> Mean of <br> S.D of N <br> C.V of N <br> Note: | NIBL bank <br> NIBL bank <br> BL bank = <br> BL bank = <br> atio, Mean, <br> rmula. All <br> gure has be | oan and ad <br> um of Ratio <br> $\sum(w-w)$ <br> of NIBL <br> and C.V <br> calculation <br> osted at the | ance $\div$ De <br> of all FY <br> $\div \mathrm{N}$ <br> Mean of <br> of NIBL <br> has been d <br> above tabl | sit $\times 100 \mathrm{fo}$ NIBL $\div$ <br> BL <br> HBL has <br> e using exc <br> to eliminate | ach FY. <br> of Observation <br> en calculated <br> sheet and only <br> necessary figu | 5) <br> ing above e required s. |

(Source: Annual Report of NIBL and HBL from FY 2005/06 to FY 2009/10)
(Annex-9)

| NSBI Loan \& Advance to Deposit Ratio |  |  |  | BOKL Loan \& Advance to Deposit Ratio |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Year | Loan | Deposit | Ratio (y) | Loan | Deposit | Ratio (z) |
| 2005/06 | 11,237 | 11,002 | 102.14 | 10,633 | 10,485 | 101.41 |
| 2006/07 | 12,119 | 11,445 | 105.89 | 12,391 | 12,388 | 100.02 |
| 2007/08 | 15,202 | 13,715 | 110.84 | 15,666 | 15,833 | 98.95 |
| 2008/09 | 28,417 | 27,957 | 101.65 | 17,430 | 18,083 | 96.39 |
| 2009/10 | 33,785 | 34,896 | 96.82 | 19,933 | 20,315 | 98.12 |
| Sum of ratio of NSBI $\sum y=$ |  |  | 517.33 | Sum of ratio of BOK $\sum \mathrm{z}=$ |  | 494.89 |
| Mean of NSBI $\overline{\mathrm{y}}=$ |  |  | 103.47 | Mean of BOK $\overline{\mathrm{z}}=$ |  | 98.98 |
| $\sum(y-\bar{y})^{2}=$ |  |  | 109.58 |  | $\sum(\mathrm{z}-\overline{\mathrm{z}})^{2}=$ | 14.46 |
| Mean |  |  | 103.47 |  | Mean | 98.98 |
| S.D |  |  | 4.68 |  | S.D | 1.70 |
| C.V |  |  | 0.05 |  | C.V | 0.02 |
| Ratio of Mean of S.D of N <br> C.V of <br> Note: | SBI bank = <br> NSBI bank = <br> BI bank = <br> BI bank = <br> tio, Mean, <br> mula. All <br> ure has bee | oan and ad um of Rati $\sum(y-y) 2$ of NSBI <br> and C.V calculation posted at the | ance $\div$ De of all FY $\div \mathrm{N}$ <br> Mean of N <br> of NSBI <br> has been d above tabl | sit $\times 100$ fo <br> NSBI $\div$ <br> BI <br> BOKL has <br> ne using exc <br> to eliminat | ach FY. <br> of Observation <br> en calculated <br> sheet and only <br> necessary figu | (5) <br> sing above <br> e required <br> es. |

(Source: Annual Report of NSBI and BOKL from FY 2005/06 to FY 2009/10)
(Annex-10)

| NIBL Total Investment to Total Asset Ratio |  |  |  | HBL Total Investment to Total Asset Ratio |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Year | Total Investment | Total Asset | $\begin{aligned} & \text { Ratio } \\ & \text { (w) } \\ & \hline \end{aligned}$ | Total Investment | Total Asset | Ratio (x) |
| 2005/06 | 5,602 | 21,330 | 26.26 | 10,890 | 29,460 | 36.97 |
| 2006/07 | 6,505 | 27,590 | 23.58 | 11,822 | 33,519 | 35.27 |
| 2007/08 | 6,874 | 38,873 | 17.68 | 13,340 | 36,175 | 36.88 |
| 2008/09 | 7,399 | 53,010 | 13.96 | 8,710 | 39,320 | 22.15 |
| 2009/10 | 8,635 | 57,305 | 15.07 | 8,444 | 42,717 | 19.77 |
| Sum of ratio of NIBL $\sum \mathrm{w}=$ |  |  | 96.55 | Sum of ratio of HBL $\sum x=$ |  | 151.03 |
| Mean of NIBL $\bar{w}=$ |  |  | 19.31 | Mean of HBL $\bar{x}=$ |  | 30.21 |
| $\Sigma(\bar{w}-\overline{\mathrm{w}})^{2}=$ |  |  | $\begin{gathered} 115.8 \\ 4 \\ \hline \end{gathered}$ |  | $\sum(x-x)^{2}=$ | 289.66 |
| Mean |  |  | 19.31 |  | Mean | 30.21 |
| S.D |  |  | 4.81 |  | S.D | 7.61 |
| C.V |  |  | 0.25 |  | C.V | 0.25 |
| Ratio of N <br> Mean of <br> S.D of N <br> C.V of N <br> Note: <br> R | NIBL bank = <br> NIBL bank = <br> BL bank = <br> BL bank $=\mathrm{S}$ <br> atio, Mean, S <br> mula. All <br> quired figure gures. | tal Investm um of Ratio <br> $\sum(w-w) 2$ <br> of NIBL $\div$ <br> and C.V of <br> calculation <br> as been po | ent $\div T$ of all $\div \mathrm{N}$ <br> Mean <br> NIBL <br> has be <br> sted at | tal Asset $\times 1$ of NIBL $\div$ <br> NIBL <br> nd HBL has <br> n done usin <br> he above tab | for each FY. <br> o. of Observat <br> en calculated excel sheet a to eliminate | (5) <br> sing above only the necessary |

(Source: Annual Report of NIBL and HBL from FY 2005/06 to FY 2009/10)

Annex-11

| NSBI Total Investment to Total Asset Ratio |  |  |  | BOKL Total Investment to Total Asset Ratio |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Year | Total Investment | Total Asset | Ratio (y) | Total Investment | Total Asset | Ratio <br> (z) |
| 2005/06 | 3,611 | 13,035 | 27.70 | 3,374 | 12,278 | 27.48 |
| 2006/07 | 2,659 | 13,901 | 19.13 | 2,992 | 14,570 | 20.54 |
| 2007/08 | 3,089 | 17,187 | 17.97 | 3,204 | 17,721 | 18.08 |
| 2008/09 | 13,286 | 30,166 | 44.04 | 2,783 | 20,496 | 13.58 |
| 2009/10 | 16,305 | 38,047 | 42.85 | 3,269 | 23,396 | 13.97 |
| Sum of ratio of NSBI $\sum y=$ |  |  | 151.70 | Sum of ratio of BOK $\sum \mathrm{z}=$ |  | 93.65 |
| Mean of NSBI $\bar{y}=$ |  |  | 30.34 | Mean of BOK $\bar{z}=$ |  | 18.73 |
| $\Sigma(y-\bar{y})^{2}=$ |  |  | 630.00 |  | $\sum(\mathrm{z}-\mathrm{z})^{2}=$ | $\begin{gathered} 129.4 \\ 2 \end{gathered}$ |
| Mean |  |  | 30.34 |  | Mean | 18.73 |
| S.D |  |  | 11.22 |  | S.D | 5.09 |
| C.V |  |  | 0.37 |  | C.V | 0.27 |

Ratio of NSBI bank $=$ Total Investment $\div$ Total Assets $\times 100$ for each FY.
Mean of NSBI bank $=$ Sum of Ratio of all FY of NSBI $\div$ No. of Observation (5)
S.D of NSBI bank $=\sqrt{\sum(\mathrm{y}-\mathrm{y}) 2 \div \mathrm{N}}$
C.V of NSBI bank $=$ S.D of NSBI $\div$ Mean of NSBI

## Note:

Ratio, Mean, S.D and C.V of NSBI and BOKL has been calculated using above formula. All the calculation has been done using excel sheet and only the required figure has been posted at the above table to eliminate unnecessary figures.
(Source: Annual Report of NSBI and BOKL from FY 2005/06 to FY 2009/10)
(Annex-12)

| NIBL Govt. Securities to Total Asset Ratio |  |  |  | HBL Govt. Securities to Total Asset Ratio |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Year | Inv. In Govt. Sec | Total Asset | Ratio (w) | Inv. In Govt. Sec | Total Asset | Ratio (x) |
| 2005/06 | 2,522 | 21,330 | 11.82 | 5,144 | 29,460 | 17.46 |
| 2006/07 | 3,256 | 27,590 | 11.80 | 6,454 | 33,519 | 19.25 |
| 2007/08 | 3,155 | 38,873 | 8.12 | 7,471 | 36,175 | 20.65 |
| 2008/09 | 2,531 | 53,010 | 4.77 | 4,211 | 39,320 | 10.71 |
| 2009/10 | 4,201 | 57,305 | 7.33 | 4,465 | 42,717 | 10.45 |
| Sum of ratio of NIBL $\sum \mathrm{w}=$ |  |  | 43.85 | Sum of ratio of HBL $\sum x=$ |  | 78.53 |
| Mean of NIBL $\bar{w}=$ |  |  | 8.77 | Mean of HBL $\bar{x}=$ |  | 15.71 |
| $\Sigma(\mathrm{w}-\overline{\mathrm{w}})^{2}=$ |  |  | 36.98 |  | $\mathbb{E}(\mathrm{x}-\overline{\mathrm{x}})^{2}=$ | 92.70 |
| Mean |  |  | 8.77 |  | Mean | 15.71 |
| S.D |  |  | 2.72 |  | S.D | 4.31 |
| C.V |  |  | 0.31 |  | C.V | 0.27 |
| $\begin{aligned} & \text { Ratio of NIBL bank }=\text { Investment in Govt. Sec } \div \text { Total Asset } \times 100 \text { for each FY. } \\ & \text { Mean of NIBL bank }=\text { Sum of Ratio of all FY of NIBL } \div \text { No. of Observation (5) } \end{aligned}$ |  |  |  |  |  |  |
| $\text { S.D of NIBL bank }=\sqrt{\sum(w-w) 2 \div \mathrm{N}}$ |  |  |  |  |  |  |
| C.V of NIBL bank $=$ S.D of NIBL $\div$ Mean of NIBL |  |  |  |  |  |  |
| Ratio, Mean, S.D and C.V of NIBL and HBL has been calculated using above formula. All the calculation has been done using excel sheet and only the required figure has been posted at the above table to eliminate unnecessary figures. |  |  |  |  |  |  |

(Source: Annual Report of NIBL and HBL from FY 2005/06 to FY 2009/10)
(Annex-13)

| NSBI Govt. Securities to Total Asset Ratio |  |  |  | BOKL Govt. Securities to Total Asset Ratio |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Year | Inv. In Govt. Sec | Total Asset | Ratio (y) | Inv. In Govt. Securities | Total Asset | Ratio (z) |
| 2005/06 | 3,591 | 13,035 | 27.55 | 2,658 | 12,278 | 21.65 |
| 2006/07 | 2,345 | 13,901 | 16.87 | 2,332 | 14,570 | 16.01 |
| 2007/08 | 3,035 | 17,187 | 17.66 | 2,113 | 17,721 | 11.92 |
| 2008/09 | 3,306 | 30,166 | 10.96 | 1,745 | 20,496 | 8.51 |
| 2009/10 | 4,313 | 38,047 | 11.34 | 2,955 | 23,396 | 12.63 |
| Sum of ratio of NSBI $\sum y=$ |  |  | 84.37 | Sum of ratio of BOK $\sum \mathrm{z}=$ |  | 70.72 |
| Mean of NSBI $\mathrm{y}=$ |  |  | 16.87 | Mean of BOK $\overline{\mathrm{z}}=$ |  | 14.14 |
| $\Sigma(y-y)^{2}=$ |  |  | 180.22 |  | $\sum(\mathrm{z}-\mathrm{z})^{2}=$ | 98.70 |
| Mean |  |  | 16.87 |  | Mean | 14.14 |
| S.D |  |  | 6.00 |  | S.D | 4.44 |
| C.V |  |  | 0.36 |  | C.V | 0.31 |

Ratio of NSBI bank $=$ Investment in Govt. Securities $\div$ Total Assets $\times 100$ for each FY.
Mean of NSBI bank $=$ Sum of Ratio of all FY of NSBI $\div$ No. of Observation (5)
S.D of NSBI bank $=\sqrt{\sum(y-y) 2 \div N}$
C.V of NSBI bank $=$ S.D of NSBI $\div$ Mean of NSBI

Note:
Ratio, Mean, S.D and C.V of NSBI and BOKL has been calculated using above formula. All the calculation has been done using excel sheet and only the required figure has been posted at the above table to eliminate unnecessary figures.
(Source: Annual Report of NSBI and BOKL from FY 2005/06 to FY 2009/10)
(Annex-14)

| NIBL S\&D to Total Asset Ratio |  |  |  | HBL S\&D to Total Asset Ratio |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Year |  <br> Debenture | Total Asset | Ratio <br> (w) |  <br> Debenture | Total Asset | Ratio (x) |
| 2005/06 | 203 | 21,330 | 0.95 | 39 | 29,460 | 0.13 |
| 2006/07 | 108 | 27,590 | 0.39 | 0 | 33,519 | 0.00 |
| 2007/08 | 55 | 38,873 | 0.14 | 72 | 36,175 | 0.20 |
| 2008/09 | 60 | 53,010 | 0.11 | 90 | 39,320 | 0.23 |
| 2009/10 | 64 | 57,305 | 0.11 | 94 | 42,717 | 0.22 |
| Sum of ratio of NIBL $\sum \mathrm{w}=$ |  |  | 1.71 | Sum of ratio of HBL $\sum \mathrm{x}=$ |  | 0.16 |
| $\text { Mean of NIBL } \overline{\mathrm{w}}=$ |  |  | 0.34 | Mean of HBL $\bar{x}=$ |  | 0.16 |
| $\sum(\mathrm{w}-\overline{\mathrm{w}})^{2}=$ |  |  | 0.52 |  | $\Sigma(x-\bar{x})^{2}=$ | 0.04 |
| Mean |  |  | 034 |  | Mean | 0.16 |
| S.D |  |  | 0.32 |  | S.D | 0.10 |
| C.V |  |  | 0.94 |  | C.V | 0.64 |
| Ratio of <br> Mean of <br> S.D of N <br> C.V of N <br> Note: | IBL bank = <br> IBL bank = <br> BL bank = <br> BL bank $=\mathrm{S}$ <br> tio, Mean, <br> mula. All th <br> ure has been | re and Debe of Ratio of $(w-w) 2 \div$ of NIBL $\div \mathrm{M}$ and C.V of alculation ha sted at the ab | ture $\div$ T <br> all FY of <br> an of N <br> NIBL <br> been do <br> ve table | Asset $\times 100$ <br> IBL $\div$ No. <br> HBL has using excel eliminate un | each FY. <br> bservation (5) <br> calculated us et and only th essary figures. | above equire |

(Source: Annual Report of NIBL and HBL from FY 2005/06 to FY 2009/10)
(Annex-15)

| NSBI S\&D to Total Asset Ratio |  |  |  | BOKL S\&D to Total Asset Ratio |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Year |  <br> Debenture | Total Asset | Ratio (y) |  <br> Debenture | Total Asset | Ratio (z) |
| 2005/06 | 20 | 13,035 | 0.15 | 19 | 12,278 | 0.15 |
| 2006/07 | 20 | 13,901 | 0.14 | 93 | 14,570 | 0.64 |
| 2007/08 | 32 | 17,187 | 0.19 | 663 | 17,721 | 3.74 |
| 2008/09 | 53 | 30,166 | 0.18 | 1,091 | 20,496 | 5.32 |
| 2009/10 | 33 | 38,047 | 0.09 | 1,029 | 23,396 | 4.40 |
| Sum of ratio of NSBI $\sum y=$ |  |  | 0.75 | Sum of ratio of BOK $\sum \mathrm{z}=$ |  | 14.26 |
| Mean of NSBI $\mathrm{y}=$ |  |  | 0.15 | Mean of $\mathrm{BOK} \overline{\mathrm{z}}=$ |  | 2.85 |
| $\Sigma(y-\bar{y})^{2}=$ |  |  | 0.01 |  | $\sum(\mathrm{z}-\mathrm{z})^{2}=$ | 21.46 |
| Mean |  |  | 0.15 |  | Mean | 2.85 |
| S.D |  |  | 0.00 |  | S.D | 2.07 |
| C.V |  |  | 0.00 |  | C.V | 0.73 |
| Ratio of N <br> Mean of <br> S.D of NS <br> C.V of N <br> Note: | BI bank = Sh <br> I bank = Su <br> bank $=\sqrt{\Sigma}$ <br> bank $=$ S.D <br> Mean, S.D <br> ula. All the has been po | and Deben <br> of Ratio of $(y-y) 2 \div N$ <br> f NSBI $\div$ M <br> and C.V of <br> alculation h <br> ted at the ab | ure $\div$ Tot <br> all FY of N <br> an of NSB <br> NSBI and <br> been do <br> ve table to | Assets $\times 1$ <br> SBI $\div$ No. of <br> BOKL has <br> e using exc <br> eliminate un | r each FY. <br> servation (5) <br> n calculated eet and only ssary figures. | using above the require |

(Source: Annual Report of NSBI and BOKL from FY 2005/06 to FY 2009/10)
(Annex-16)

## Growth of Investment of the sample banks

| Year | NIBL Inv. | HBL Inv. | NSBI Inv. | BOKL Inv. |
| :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 5,602 | 10,890 | 3,611 | 3,374 |
| $2006 / 07$ | 6,505 | 11,822 | 2,659 | 2,992 |
| $2007 / 08$ | 6,874 | 13,340 | 3,089 | 3,204 |
| $2008 / 09$ | 7,399 | 8,710 | 13,286 | 2,783 |
| $2009 / 10$ | 8,635 | 8,444 | 16,305 | 3,269 |

Growth of the Investment for the four FY

| $2006 / 07$ | 16.12 | 8.56 | $(26.36)$ | $(11.32)$ |
| :---: | :---: | :---: | :---: | :---: |
| $2007 / 08$ | 5.67 | 12.84 | 16.17 | 7.09 |
| $2008 / 09$ | 7.64 | $(34.71)$ | 330.11 | $(13.14)$ |
| $2009 / 10$ | 16.70 | $(3.05)$ | 22.72 | 17.46 |
| Total Growth | 46.13 | $(16.36)$ | 342.64 | 0.09 |
| Average Growth \% | 9.23 | $(3.27)$ | 68.53 | 0.02 |

Growth of NIBL for FY 2006/07= (NIBL Inv. of FY 2006/07 - NIBL Inv. of FY 2005/06) $\div$ NIBL Inv. of FY 2005/06 $\times 100$
Similarly all the growth of the sample banks has been calculated using above formula.
Total Growth = Sum of growth of sample banks from FY 2006/07 to FY 2009/10
Average Growth $\%$ of NIBL $=$ Total Growth of NIBL $\div 5 \times 100$
(Source: Annual reports of NIBL, HBL, NSBI \& BOKL from FY 2005/06 to FY 2009/10)
(Annex-17)

## Growth of Deposit of the sample banks

| Year | NIBL Inv. | HBL Inv. | NSBI Inv. | BOKL Inv. |
| :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 18,927 | 26,490 | 11,002 | 10,485 |
| $2006 / 07$ | 24,488 | 30,048 | 11,445 | 12,388 |
| $2007 / 08$ | 34,451 | 31,842 | 13,715 | 15,833 |
| $2008 / 09$ | 46,698 | 34,681 | 27,957 | 18,083 |
| $2009 / 10$ | 50,094 | 37,611 | 34,896 | 20,315 |

Growth of the Deposit for the four FY

| $2006 / 07$ | 29.38 | 13.43 | 4.03 | 18.15 |
| :---: | :---: | :---: | :---: | :---: |
| $2007 / 08$ | 40.69 | 5.97 | 19.83 | 27.81 |
| $2008 / 09$ | 35.55 | 8.92 | 103.84 | 14.21 |
| $2009 / 10$ | 7.27 | 8.45 | 24.82 | 12.34 |
| Total Growth | 112.89 | 36.77 | 152.52 | 72.51 |
| Average Growth <br> $\%$ | 22.58 | 7.35 | 30.50 | 14.50 |

Growth of NIBL for FY 2006/07= (NIBL Dep. of FY 2006/07 - NIBL Dep. of FY $2005 / 06) \div$ NIBL Dep. of FY 2005/06 $\times 100$

Similarly all the growth of the sample banks has been calculated using above formula.
Total Growth = Sum of growth of sample banks from FY 2006/07 to FY 2009/10
Average Growth \% of NIBL $=$ Total Growth of NIBL $\div 5 \times 100$
(Source: Annual reports of NIBL, HBL, NSBI \& BOKL from FY 2005/06 to FY 2009/10)
(Annex-18)

## Growth of Loan and Advance of the sample banks

| Year | NIBL Inv. | HBL Inv. | NSBI Inv. | BOKL Inv. |
| :---: | :---: | :---: | :---: | :---: |
| $2005 / 06$ | 12,776 | 14,642 | 7,626 | 7,259 |
| $2006 / 07$ | 17,286 | 16,997 | 9,460 | 9,399 |
| $2007 / 08$ | 26,996 | 19,497 | 12,113 | 12,462 |
| $2008 / 09$ | 36,241 | 24,793 | 15,131 | 14,647 |
| $2009 / 10$ | 40,318 | 27,980 | 17,480 | 16,664 |

Growth of the Loan and Advance for the four FY

| $2006 / 07$ | 35.30 | 16.08 | 24.05 | 29.48 |
| :---: | :---: | :---: | :---: | :---: |
| $2007 / 08$ | 56.17 | 14.71 | 28.04 | 32.59 |
| $2008 / 09$ | 34.25 | 27.16 | 24.92 | 17.53 |
| $2009 / 10$ | 11.25 | 12.85 | 15.52 | 13.77 |
| Total Growth | 136.97 | 70.81 | 92.53 | 93.37 |
| Average Growth \% | 27.39 | 14.16 | 18.51 | 18.67 |

Growth of NIBL for FY 2006/07= (NIBL Loan \& Adv of FY 2006/07 - NIBL Loan \& Adv of FY 2005/06) $\div$ NIBL Loan \& Adv of FY 2005/06 $\times 100$

Similarly all the growth of the sample banks has been calculated using above formula.
Total Growth = Sum of growth of sample banks from FY 2006/07 to FY 2009/10
Average Growth \% of NIBL $=$ Total Growth of NIBL $\div 5 \times 100$
(Source: Annual reports of NIBL, HBL, NSBI \& BOKL from FY 2005/06 to FY 2009/10)

## (Annex-19)

Correlation Between Investment and Deposit of NIBL.


Note the above calculation of the correlation has been done using the below formula.
$\operatorname{NIBL}(\mathrm{r})=\frac{n \sum x y-\sum x \sum y}{\sqrt{n \sum x 2-\left(\sum x\right) 2} \cdot \sqrt{n \sum y 2-\left(\sum y\right) 2}}$
$\operatorname{NIBL}\left(r^{2}\right)=\operatorname{NIBL}(r) \times \operatorname{NIBL}(r)$
NIBL P.E $=0.6745 \times \frac{1-r 2}{\sqrt{n}}$
NIBL $6 \times$ P.E $=6 \times$ NIBL P.E
(Source: Annual Report of NIBL from FY 2005/06 to FY 2009/10)
(Annex-20)

Correlation Between Investment and Deposit of HBL.


Note the above calculation of the correlation has been done using the below formula.
$\operatorname{HBL}(\mathrm{r})=\frac{n \sum x y-\sum x \sum y}{\sqrt{n \sum x 2-\left(\sum x\right) 2} \cdot \sqrt{n \sum y 2-\left(\sum y\right) 2}}$
$\operatorname{HBL}\left(\mathrm{r}^{2}\right)=\operatorname{HBL}(\mathrm{r}) \times \operatorname{HBL}(\mathrm{r})$
HBL P.E $=0.6745 \times \frac{1-r 2}{\sqrt{n}}$
HBL $6 \times$ P.E $=6 \times$ HBL P.E
(Source: Annual Report of HBL from FY 2005/06 to FY 2009/10)

## (Annex-21)

## Correlation Between Investment and Deposit of NSBI.



Note the above calculation of the correlation has been done using the below formula.
$\operatorname{NSBI}(\mathrm{r})=\frac{\mathrm{n} \sum \mathrm{xy}-\sum \mathrm{x} \sum \mathrm{y}}{\sqrt{n \sum x 2-\left(\sum x\right) 2} \cdot \sqrt{n \sum y 2-(\Sigma y)^{2}}}$
$\operatorname{NSBI}\left(\mathrm{r}^{2}\right)=\operatorname{NSBI}(\mathrm{r}) \times \operatorname{NSBI}(\mathrm{r})$
NSBI P.E $=0.6745 \times \frac{1-r 2}{\sqrt{n}}$
NSBI $6 \times$ P.E $=6 \times$ NSBI P.E
(Source: Annual Report of NSBI from FY 2005/06 to FY 2009/10)
(Annex-22)

Correlation Between Investment and Deposit of BOKL.

| Year | BOKL Inv. <br> + Loan (x) | BOKL <br> Deposit. (y) | xy | $\mathrm{x}^{2}$ | $y^{2}$ |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 2005/06 | 10,633 | 10,485 | 11,1487,005 | 113,060,689 | 109,935,225 |
| 2006/07 | 12,391 | 12,388 | 153,499,708 | 153,536,881 | 153,462,544 |
| 2007/08 | 15,666 | 15,833 | 248,039,778 | 245,423,556 | 250,683,889 |
| 2008/09 | 17,430 | 18,083 | 315,186,690 | 303,804,900 | 326,994,889 |
| 2009/10 | 19,933 | 20,315 | 404,938,895 | 397,324,489 | 412,699,225 |
|  | $\sum \mathrm{x}=76,053$ | $\Sigma y=77,104$ |  | $\begin{aligned} & \sum x^{2}= \\ & 1,213,150,515 \end{aligned}$ | $\begin{aligned} & \sum y^{2}= \\ & 1,253,775,772 \end{aligned}$ |
|  |  |  |  | $\mathrm{r}=$ | 0.9991 |
|  |  |  |  | $\mathrm{r}^{2}=$ | 0.9982 |
|  |  |  |  | P.E= | 0.0069 |
|  |  |  |  | $6 \times$ P.E $=$ | 0.0414 |

Note the above calculation of the correlation has been done using the below formula.
$\operatorname{BOKL}(\mathrm{r}) \frac{\mathrm{n} \sum \mathrm{xy}-\sum \mathrm{x} \sum \mathrm{y}}{\sqrt{n \sum x 2-\left(\sum x\right) 2} \cdot \sqrt{n \sum y 2-\left(\sum y\right) 2}}$
$\operatorname{BOKL}\left(r^{2}\right)=\operatorname{BOKL}(r) \times \operatorname{BOKL}(r)$
BOKL P.E $=0.6745 \times \frac{1-r 2}{\sqrt{n}}$
BOKL $6 \times$ P.E $=6 \times$ BOKL P.E
(Source: Annual Report of BOKL from FY 2005/06 to FY 2009/10)
(Annex-23)
Calculation of Investment Trend for Next Three Year of NIBL

| Year (X) | Investment (Y) | $\mathbf{x}(\mathbf{X}-\bar{X})$ | $\mathbf{y}(\mathbf{Y}-\bar{Y})$ | $\mathbf{x y}$ | $\mathbf{x}^{2}$ |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 2006 | 18,378 | -2 | $-15,492$ | 30,984 | 4 |
| 2007 | 23,791 | -1 | $-10,079$ | 10,079 | 1 |
| 2008 | 33,870 | 0 | 0 | 0 | 0 |
| 2009 | 43,640 | 1 | 9,770 | 9,770 | 1 |
| 2010 | 48,953 | 2 | 15,083 | 30,166 | 4 |
| Total |  | $\mathbb{x}=0$ | $\Sigma y=-718$ | $\sum x y=80,999$ | $\mathbb{2} x^{2}=10$ |

(Source: Annual Reports of NIBL from FY 2005/06 to FY 2009/10)
We have,

$$
\begin{equation*}
\mathrm{Y}=a+b \mathrm{x} \tag{n}
\end{equation*}
$$

$\qquad$
$\sum \mathrm{y}=\mathrm{n} a+b \sum \mathrm{x}$ $\qquad$ .$e q^{n}$ (ii)
$\sum \mathrm{xy}=a \sum \mathrm{x}+b \sum \mathrm{x}^{2}$ $\qquad$
$\qquad$ .$e q^{n}$ (iii)

From equation (ii) we get putting the value from the above table in the eq ${ }^{\mathrm{n}}$ (ii)

$$
\begin{array}{ll} 
& \sum \mathrm{y}=\mathrm{n} a+b \sum \mathrm{x} \\
\text { Or, } & -718=5 \times a+b \times 0 \\
\text { Or, } & -718=5 a \\
\text { Or, } & a=\frac{-718}{5} \\
\text { Or, } & a=-143.6
\end{array}
$$

From equation (iii) we get putting the value from the above table in the eq ${ }^{\mathrm{n}}$ (iii)

$$
\begin{aligned}
& \sum \mathrm{xy}=a \sum \mathrm{x}+b \sum \mathrm{x}^{2} \\
& \text { Or, } 80,999=a \times 0+b \times 10 \\
& \text { Or, } 80,999=10 b \\
& \text { Or, } b=\frac{80,999}{10}
\end{aligned}
$$

$$
\text { Or, } b=8,099.9
$$

Now after finding the value of $a$ and $b$ we get the formal eq ${ }^{\mathrm{n}}$ (i) as below after replacing the value of $a$ and $b$ in $e q^{n}$ (i)

$$
\begin{gathered}
\mathrm{Y}=a+b \mathrm{x} \\
\text { Or, } \mathrm{Y}-\overline{\mathrm{Y}}=a+\bar{b}(\mathrm{X}-\mathrm{X}) \\
\overline{\mathrm{Or}}, \mathrm{Y}=\mathrm{Y}+a+b(\mathrm{X}-\mathrm{X})
\end{gathered}
$$

Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2011 as below:

Or, $\mathrm{Y}_{2011}=33,870-143.6+8,099.9(2011-2008)$
Or, $\mathrm{Y}_{2011}=33,726.40+8,099.9 \times 3$

Or, $\mathrm{Y}_{2011}=33,726.40+24,299.7$

Or, $\mathrm{Y}_{2011}=58,026.10$

Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2012 as below:

Or, $\mathrm{Y}_{2012}=33,870-143.6+8,099.9(2012-2008)$
Or, $\mathrm{Y}_{2012}=33,726.40+8,099.9 \times 4$

Or, $\mathrm{Y}_{2012}=66,126.00$

Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2013 as below:

Or, $\mathrm{Y}_{2013}=33,870-143.6+8,099.9(2013-2008)$
Or, $\mathrm{Y}_{2013}=33,726.40+8,099.9 \times 5$

Or, $\mathrm{Y}_{2013}=74,225.90$
(Annex-24)
Calculation of Investment Trend for Next Three Year of HBL

| Year (X) | Investment (Y) | $\mathbf{x}(\mathbf{X}-\bar{X})$ | $\mathbf{y}(\mathbf{Y}-\overline{\mathbf{Y}})$ | $\mathbf{x y}$ | $\mathbf{x}^{2}$ |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2006 | 25,532 | -2 | $-7,305$ | 14,610 | 4 |  |  |  |  |  |
| 2007 | 28,819 | -1 | $-4,018$ | 4,018 | 1 |  |  |  |  |  |
| 2008 | 32,837 | 0 | 0 | 0 | 0 |  |  |  |  |  |
| 2009 | 33,503 | 1 | 666 | 666 | 1 |  |  |  |  |  |
| 2010 | 36,424 | 2 | 3,587 | 7,174 | 4 |  |  |  |  |  |
| Total |  |  |  |  |  |  | $\sum x=0$ | $\sum y=-7,070$ | $\sum x y=26,468$ | $\sum x^{2}=10$ |

(Source: Annual Reports of HBL from FY 2005/06 to FY 2009/10)
We have,

$$
\begin{align*}
& \mathrm{Y}=a+b \mathrm{x}  \tag{n}\\
& \sum \mathrm{y}=\mathrm{n} a+b \sum \mathrm{x} \\
& . e q^{\mathrm{n}} \text { (ii) } \\
& \sum \mathrm{xy}=a \sum \mathrm{x}+b \sum \mathrm{x}^{2} \\
& e q^{\mathrm{n}} \text { (iii) }
\end{align*}
$$

From equation (ii) we get putting the value from the above table in the eq ${ }^{\mathrm{n}}$ (ii)

$$
\sum \mathrm{y}=\mathrm{n} a+b \sum \mathrm{x}
$$

$$
\begin{aligned}
& \text { Or, }-7070=5 \times a+b \times 0 \\
& \text { Or, }-7070=5 a \\
& \text { Or, } a=\frac{-7070}{5} \\
& \text { Or, } a=-1414
\end{aligned}
$$

From equation (iii) we get putting the value from the above table in the eq ${ }^{\mathrm{n}}$ (iii)

$$
\begin{aligned}
& \sum \mathrm{xy}=a \sum \mathrm{x}+b \sum \mathrm{x}^{2} \\
& \text { Or, } 26,468=a \times 0+b \times 10 \\
& \text { Or, } 26,468=10 b
\end{aligned}
$$

Or, $b=\frac{26,468}{10}$
Or, $b=2,646.80$

Now after finding the value of $a$ and $b$ we get the formal eq ${ }^{\mathrm{n}}$ (i) as below after replacing the value of $a$ and $b$ in $e q^{n}$ (i)

$$
\mathrm{Y}=a+b \mathrm{x}
$$

$$
\begin{aligned}
& \text { Or, } \mathrm{Y}-\overline{\mathrm{Y}}=a+\bar{b}(\mathrm{X}-\mathrm{X}) \\
& \overline{\text { Or, }} \mathrm{Y}=\mathrm{Y}+a+b(\mathrm{X}-\mathrm{X})
\end{aligned}
$$

Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2011 as below:

Or, $\mathrm{Y}_{2011}=32,837-1414+2,646.8(2011-2008)$
Or, $\mathrm{Y}_{2011}=31,423+2,646.8 \times 3$

Or, $\mathrm{Y}_{2011}=31,423+7,940.4$

Or, $\mathrm{Y}_{2011}=39,363.40$

Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2012 as below:

Or, $\mathrm{Y}_{2012}=32,837-1414+2,646.8(2012-2008)$
Or, $\mathrm{Y}_{2012}=31,423+2,646.8 \times 4$

Or, $\mathrm{Y}_{2012}=42,010.20$

Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2013 as below:

Or, $\mathrm{Y}_{2013}=32,837-1414+2,646.8(2013-2008)$
Or, $\mathrm{Y}_{2013}=31,423+2,646.8 \times 5$
Or, $\mathrm{Y}_{2013}=44,657.0$
(Annex-25)
Calculation of Investment Trend for Next Three Year of NSBI

| Year (X) | Investment (Y) | $\mathbf{x}(\mathbf{X}-\bar{X})$ | $\mathbf{y}(\mathbf{Y}-\overline{\mathbf{Y}})$ | $\mathbf{x y}$ | $\mathbf{x}^{2}$ |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2006 | 11,237 | -2 | $-3,965$ | 7,930 | 4 |  |  |  |  |  |
| 2007 | 12,119 | -1 | $-3,083$ | 3,083 | 1 |  |  |  |  |  |
| 2008 | 15,202 | 0 | 0 | 0 | 0 |  |  |  |  |  |
| 2009 | 28,417 | 1 | 13,215 | 13,215 | 1 |  |  |  |  |  |
| 2010 | 33,785 | 2 | 18,583 | 37,166 | 4 |  |  |  |  |  |
| Total |  |  |  |  |  |  | $\sum x=0$ | $\sum y=24,750$ | $\sum x y=61,394$ | $\sum x^{2}=10$ |

(Source: Annual Reports of NSBI from FY 2005/06 to FY 2009/10)
We have,

$$
\begin{equation*}
\mathrm{Y}=a+b \mathrm{x} \tag{n}
\end{equation*}
$$

$\qquad$

$$
\sum \mathrm{y}=\mathrm{n} a+b \sum \mathrm{x}
$$

$\qquad$ . . .$q^{n}$ (ii)
$\sum \mathrm{xy}=a \sum \mathrm{x}+b \sum \mathrm{x}^{2}$ $\qquad$
$\qquad$ .$e q^{n}$ (iii)

From equation (ii) we get putting the value from the above table in the $\mathrm{eq}^{\mathrm{n}}$ (ii)

$$
\mathbb{Z}=\mathrm{n} a+b \sum \mathrm{x}
$$

$$
\begin{aligned}
& \text { Or, } 24,750=5 \times a+b \times 0 \\
& \text { Or, } 24,750=5 a \\
& \text { Or, } a=\frac{24,750}{5} \\
& \text { Or, } a=4,950
\end{aligned}
$$

From equation (iii) we get putting the value from the above table in the $\mathrm{eq}^{\mathrm{n}}$ (iii)

$$
\begin{aligned}
& \sum x y=a \sum x+b \sum x^{2} \\
& \text { Or, } 61,394=a \times 0+b \times 10
\end{aligned}
$$

Or, $61,394=10 b$
Or, $b=\frac{61,394}{10}$
Or, $b=6,139.40$

Now after finding the value of $a$ and $b$ we get the formal eq ${ }^{\mathrm{n}}$ (i) as below after replacing the value of $a$ and $b$ in eq ${ }^{n}(i)$

$$
\begin{gathered}
\mathrm{Y}=a+b \mathrm{x} \\
\text { Or, } \mathrm{Y}-\overline{\mathrm{Y}}=a+b(\mathrm{X}-\mathrm{X}) \\
\overline{\mathrm{Or}}, \mathrm{Y}=\overline{\mathrm{Y}}+a+b(\mathrm{X}-\mathrm{X})
\end{gathered}
$$

Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2011 as below:

Or, $\mathrm{Y}_{2011}=15,202+4950+6,139.4(2011-2008)$
Or, $\mathrm{Y}_{2011}=20,152+6,139.4 \times 3$

Or, $\mathrm{Y}_{2011}=20,152+18,418.20$

Or, $\mathrm{Y}_{2011}=38,570.2$

Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2012 as below:

Or, $\mathrm{Y}_{2012}=15,202+4950+6,139.4(2012-2008)$
Or, $\mathrm{Y}_{2012}=20,152+6,139.4 \times 4$

Or, $\mathrm{Y}_{2012}=20,152+24,557.6$

Or, $\mathrm{Y}_{2012}=44,709.6$

Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2013 as below:

Or, $\mathrm{Y}_{2013}=15,202+4950+6,139.4(2013-2008)$

Or, $\mathrm{Y}_{2013}=20,152+6,139.4 \times 5$

Or, $\mathrm{Y}_{2013}=20,152+30,697$

Or, $\mathrm{Y}_{2013}=50,849.0$
(Annex-26)
Calculation of Investment Trend for Next Three Year of BOKL

| Year (X) | Investment (Y) | $\mathbf{x}(\mathrm{X}-\overline{\mathrm{X}})$ | $\mathbf{y}(\mathbf{Y}-\overline{\mathbf{Y}})$ | xy | $\mathrm{x}^{2}$ |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 2006 | 10,633 | -2 | -5,033 | 10,066 | 4 |
| 2007 | 12,391 | -1 | -3,275 | 3,275 | 1 |
| 2008 | 15,666 | 0 | 0 | 0 | 0 |
| 2009 | 17,430 | 1 | 1,764 | 1,764 | 1 |
| 2010 | 19,933 | 2 | 4,267 | 8,534 | 4 |
| Total |  | $\sum \mathrm{x}=0$ | $\Sigma y=-2,277$ | $\sum x y=23,639$ | $\sum x^{2}=10$ |

(Source: Annual Reports of BOKL from FY 2005/06 to FY 2009/10)

We have,

$$
\begin{align*}
& \mathrm{Y}=a+b \mathrm{x}  \tag{n}\\
& \sum \mathrm{y}=\mathrm{n} a+b \sum \mathrm{x} \\
& . q^{n}(i i) \\
& \sum \mathrm{xy}=a \sum \mathrm{x}+b \sum \mathrm{x}^{2} \\
& . e q^{n}(i i i)
\end{align*}
$$

From equation (ii) we get putting the value from the above table in the eq ${ }^{\mathrm{n}}$ (ii)

$$
\sum \mathrm{y}=\mathrm{n} a+b \sum \mathrm{x}
$$

$$
\begin{aligned}
& \text { Or, }-2,277=5 \times a+b \times 0 \\
& \text { Or, }-2,277=5 a \\
& \text { Or, } a=\frac{-2,277}{5}
\end{aligned}
$$

$$
\text { Or, } a=-455.4
$$

From equation (iii) we get putting the value from the above table in the eq ${ }^{\mathrm{n}}$ (iii)

$$
\begin{aligned}
& \sum x y=a \sum x+b \sum x^{2} \\
& \text { Or, } 23,639=a \times 0+b \times 10 \\
& \text { Or, } 23,639=10 b \\
& \text { Or, } b=\frac{23,639}{10} \\
& \text { Or, } b=2,363.9
\end{aligned}
$$

Now after finding the value of $a$ and $b$ we get the formal eq ${ }^{\mathrm{n}}$ (i) as below after replacing the value of $a$ and $b$ in $e q^{n}(i)$

$$
\begin{gathered}
\mathrm{Y}=a+b \mathrm{x} \\
\text { Or, } \mathrm{Y}-\overline{\mathrm{Y}}=a+\bar{b}(\mathrm{X}-\mathrm{X}) \\
\overline{\mathrm{Or}}, \mathrm{Y}=\mathrm{Y}+a+b(\mathrm{X}-\mathrm{X})
\end{gathered}
$$

Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2011 as below:

Or, $\mathrm{Y}_{2011}=15,666-455.4+2,363.9(2011-2008)$
Or, $\mathrm{Y}_{2011}=15,210.6+2,363.9 \times 3$

Or, $\mathrm{Y}_{2011}=15,210.6+7,091.7$

Or, $\mathrm{Y}_{2011}=22,302.3$
Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2012 as below:

Or, $\mathrm{Y}_{2012}=15,666-455.4+2,363.9(2012-2008)$
Or, $\mathrm{Y}_{2012}=15,210.6+2,363.9 \times 4$

Or, $\mathrm{Y}_{2012}=15,210.6+9,455.6$

Or, $\mathrm{Y}_{2011}=24,666.20$

Now, putting the value of $a$ and $b$ as calculated above we can get the projected figure for 2013 as below:

Or, $\mathrm{Y}_{2013}=15,666-455.4+2,363.9(2013-2008)$
Or, $\mathrm{Y}_{2013}=15,210.6+2,363.9 \times 5$

Or, $\mathrm{Y}_{2013}=15,210.6+11,819.5$

Or, $\mathrm{Y}_{2013}=27,030.10$

## BANK OF KATHMANDU LTD <br> PROFIT AND LOSS STATEMENT

| Fiscal Year (FY) | 2005/2006 | 2006/2007 | 2007/2008 | 2008/2009 | 2009/2010 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Particulars |  |  |  |  |  |
| Interest Income | 718,121,378 | 819,003,947 | 1,034,157,874 | 1,347,755,382 | 1,870,846,758 |
| Interest Expenses | 308,155,647 | 339,181,011 | 417,543,432 | 563,113,007 | 902,927,971 |
| Net Interest Income | 409,965,730 | 479,822,936 | 616,614,442 | 784,642,375 | 967,918,787 |
| Commission and Discount | 70,776,158 | 97,431,129 | 129,415,582 | 150,919,291 | 160,065,397 |
| Other Operating Income | 16,967,545 | 19,002,897 | 23,167,724 | 43,222,093 | 73,925,961 |
| Exchange Profit | 78,955,495 | 80,826,013 | 93,765,039 | 136,036,316 | 140,785,065 |
| Total Operating Income | 576,664,929 | 677,082,975 | 862,962,787 | 1,114,820,075 | 1,342,695,210 |
| Staff Expenses | 59,119,564 | 69,740,384 | 90,601,920 | 146,494,578 | 168,512,807 |
| Other Operating Expenses | 117,591,235 | 138,429,941 | 170,480,908 | 233,667,863 | 294,456,774 |
| Exchange Loss |  |  |  |  |  |
|  |  |  |  |  |  |
| Operating Profit Before Provision for Losses | 399,954,129 | 468,912,650 | 601,879,959 | 734,657,634 | 879,725,629 |
| Provision for Possible Losses | 78,381,056 | 81,894,981 | 38,438,498 | 33,745,192 | 119,401,328 |
| Operating Profit | 321,573,073 | 387,017,669 | 563,441,461 | 700,912,442 | 760,324,301 |
| Non-operating Income/ Loss | 1,090,139 | $(2,779,849)$ | 810,748 | $(2,027,469)$ | 2,917,800 |
| Loss Provision Written Back | 103,871,477 | 37,103,885 | 61,832,950 | 21,577,091 | 41,817,988 |
| Profit from Regular Operations | 426,534,689 | 421,341,705 | 626,085,159 | 720,462,064 | 805,060,089 |
| Profit/ Loss from extra-ordinary activities | $(95,205,482)$ | 411,150 | 45,396,284 | 6,934,365 |  |
| Net Profit after considering all activities | 331,329,207 | 421,752,855 | 580,688,875 | 727,396,429 | 805,060,089 |
| Provision for Staff Bonus | 30,120,837 | 38,341,169 | 52,789,898 | 66,126,948 | 73,187,281 |
| Income Tax Provision | 98,767,743 | 121,024,706 | 166,402,098 | 199,534,570 | 222,609,667 |
| Current Year | 93,235,553 | 115,424,706 | 162,535,369 | 200,304,605 | 218,985,198 |
| Upto Previous Year | 5,532,190 | 5,600,000 | 3,866,729 |  | 3,189,790 |
| Deferred Tax Income / (Expense) |  |  |  | $(770,035)$ | 434,679 |
|  |  |  |  |  |  |
| Net Profit/ Loss | 202,440,627 | 262,386,980 | 361,496,879 | 461,734,911 | 509,263,141 |


| BANK OF KATHMANDU LTD |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BALANCE SHEET |  |  |  |  |  |
| Fiscal Year (FY) | 2005/2006 | 2006/2007 | 2007/2008 | 2008/2009 | 2009/2010 |
| Capital \& Liabilities |  |  |  |  |  |
| Share Capital | 463,580,900 | 603,141,300 | 603,141,300 | 1,182,157,100 | 1,359,480,700 |
| Reserve \& Fund | 376,152,981 | 378,837,432 | 738,932,488 | 559,433,063 | 714,049,039 |
| Debentures and Bonds | 200,000,000 | 200,000,000 | 200,000,000 | 200,000,000 | 200,000,000 |
| Borrowings | 553,180,000 | 730,000,000 | 100,000,000 | 100,000,000 | 300,000,000 |
| Deposits Liabilities | 10,485,359,239 | 12,388,927,294 | 15,833,737,799 | 18,083,980,266 | 20,315,834,405 |
| Bills Payable | 11,621,657 | 25,776,722 | 51,576,245 | 51,124,559 | 35,702,186 |
| Proposed and Dividend Payable | 98,711,520 | 135,575,231 | 32,804,204 | 62,218,615 | 177,323,565 |
| Income Tax Liabilities |  |  |  |  |  |
| Other Liabilities | 89,723,005 | 107,840,825 | 161,733,151 | 257,091,880 | 293,801,896 |
| Total Liabilities | 12,278,329,302 | 14,570,098,804 | 17,721,925,187 | 20,496,005,483 | 23,396,191,791 |
| Assets |  |  |  |  |  |
| Cash Balance | 184,019,718 | 219,042,572 | 536,747,143 | 565,065,889 | 455,181,141 |
| Balance with NRB | 349,295,702 | 883,495,841 | 606,049,072 | 1,324,108,341 | 687,581,848 |
| Balance with Banks/ FI's | 195,381,672 | 213,365,528 | 297,670,728 | 292,937,606 | 655,604,407 |
| Money at Call and Short Notice | 594,047,379 | 259,278,628 | 72,679,836 | 243,351,500 | 931,988,734 |
| Investments | 3,374,711,966 | 2,992,433,866 | 3,204,067,718 | 2,783,598,566 | 3,269,204,631 |
| Loan, Advances \& Bills Purchased | 7,259,082,579 | 9,399,327,617 | 12,462,637,541 | 14,647,296,987 | 16,664,930,855 |
| Fixed Assets | 110,745,198 | 320,846,395 | 387,274,153 | 417,040,587 | 491,295,122 |
| Non-Banking Assets | 7,356,136 | 3,625,715 | 452,978 |  |  |
| Other Assets | 203,688,954 | 278,682,642 | 154,346,018 | 222,606,007 | 240,405,053 |
| Total Assets | 12,278,329,302 | 14,570,098,804 | 17,721,925,187 | 20,496,005,483 | 23,396,191,791 |


| HIMALAYAN BANK LIMITED |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| PROFIT AND LOSS STATEMENT FOR THE FIVE YEARS PERIOD |  |  |  |  |  |
| Fiscal Year (FY) | 2005/2006 | 2006/2007 | 2007/2008 | 2008/2009 | 2009/2010 |
| Particulars |  |  |  |  |  |
| Interest Income | 1,626,473,819 | 1,775,582,617 | 1,963,647,472 | 2,342,198,179 | 3,148,605,196 |
| Interest Expenses | 648,841,818 | 767,411,247 | 823,744,838 | 934,778,015 | 1,553,530,687 |
| Net Interest Income | 977,632,001 | 1,008,171,370 | 1,139,902,634 | 1,407,420,164 | 1,595,074,509 |
| Commission and Discount | 16,544,787 | 193,224,228 | 202,888,358 | 284,302,277 | 270,258,732 |
| Other Operating Income | 52,324,749 | 40,328,872 | 62,103,241 | 46,342,872 | 112,346,425 |
| Exchange Profit | 198,130,134 | 151,637,322 | 192,600,803 | 249,986,606 | 180,278,743 |
| Total Operating Income | 1,393,534,756 | 1,393,361,792 | 1,597,495,036 | 1,988,047,949 | 2,157,958,409 |
| Staff Expenses | 234,588,969 | 290,921,268 | 307,528,289 | 360,980,641 | 414,983,894 |
| Other Operating Expenses | 329,699,087 | 322,865,061 | 329,005,633 | 398,316,566 | 471,102,966 |
| Exchange Loss |  |  |  |  |  |
|  |  |  |  |  |  |
| Operating Profit Before Provision for Losses | 8,292,467 | 779,575,463 | 960,961,114 | 1,228,750,712 | 1,271,871,549 |
| Provision for Possible Losses | 14,515,452 | 90,688,827 | 58,431,489 | 199,214,970 | 692,640,089 |
| Operating Profit | 684,092,180 | 688,886,636 | 902,529,625 | 1,029,535,742 | 579,231,460 |
| Non-operating Income/ Loss | 1,887,070 | 3,493,278 | 9,700,477 | 3,810,145 | 12,382,440 |
| Loss Provision Written Back | 56,561,901 | 412,654,152 | 184,106,852 | 149,894,111 | 265,542,038 |
| Profit from Regular Operations | 742,541,151 | 1,105,034,066 | 1,096,336,954 | 1,183,239,998 | 857,155,938 |
| Profit/ Loss from extra-ordinary activities | 2,902,317 | 315,890,702 | 52,614,217 | 9,973,406 | 25,855,926 |
| Net Profit after considering all activities | 739,638,834 | 789,143,364 | 1,043,722,737 | 1,173,266,592 | 831,300,012 |
| Provision for Staff Bonus | 67,239,895 | 71,740,305 | 94,883,886 | 106,660,599 | 75,572,728 |
| Income Tax Provision | 214,941,243 | 225,580,154 | 948,838,851 | 313,771,258 | 246,929,091 |
| Deferred Tax Income / (Expense) |  |  |  |  |  |
|  |  |  |  |  |  |
| Net Profit/ Loss | 457,457,696 | 491,822,905 | 635,868,519 | 752,834,735 | 508,798,193 |


| HIMALAYAN BANK LIMITED |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BALANCE SHEET FOR THE FIVE YEARS PERIOD. |  |  |  |  |  |
| Fiscal Year (FY) | 2005/2006 | 2006/2007 | 2007/2008 | 2008/2009 | 2009/2010 |
| Capital \& Liabilities |  |  |  |  |  |
| Share Capital | 772,200 | 810,810,000 | 1,013,512,500 | 1,216,215,000 | 2,000,000,000 |
| Reserve \& Fund | 993,976 | 1,335,689,655 | 1,499,479,102 | 1,903,665,537 | 1,439,205,130 |
| Debentures and Bonds | 360,000 | 380,000,000 | 860,000,000 | 500,000,000 | 500,000,000 |
| Borrowings | 144,625 | 235,967,811 | 83,177,973 |  |  |
| Deposits Liabilities | 26,490,852 | 30,048,417,756 | 31,842,789,358 | 34,682,306,863 | 37,611,202,274 |
| Bills Payable | 73,578 | 91,303,206 | 102,669,798 | 31,847,391 | 216,158,879 |
| Proposed and Dividend Payable | 238,409 | 130,939,748 | 263,076,319 | 162,096,954 | 189,473,600 |
| Income Tax Liabilities |  | 11,913,476 | 19,131,036 | 10,163,115 |  |
| Other Liabilities | 386,751 | 494,099,459 | 491,695,555 | 823,836,963 | 761,084,730 |
| Total Liabilities | 29,460,389,672 | 33,519,141,111 | 36,175,531,637 | 39,330,131,823 | 42,717,124,613 |
| Assets |  |  |  |  |  |
| Cash Balance | 305,428 | 177,242,226 | 278,183,489 | 473,759,695 | 514,223,569 |
| Balance with NRB | 1,096,253 | 1,272,543,067 | 935,841,697 | 2,328,405,821 | 2,604,790,901 |
| Balance with Banks/ FI's | 315,671 | 307,555,959 | 234,117,704 | 246,361,272 | 747,476,214 |
| Money at Call and Short Notice | 1,005,280 | 1,710,023,859 | 518,529,500 | 1,170,793,650 | 308,840,000 |
| Investments | 10,889,031 | 11,822,984,558 | 13,340,176,785 | 8,710,690,646 | 8,444,910,165 |
| Loan, Advances \& Bills Purchased | 14,642,560 | 16,997,997,046 | 19,497,520,482 | 24,793,155,269 | 27,980,628,760 |
| Fixed Assets | 540,824 | 574,080,430 | 728,068,462 | 952,196,395 | 1,061,870,757 |
| Non-Banking Assets | 21,733 | 12,766,060 | 10,306,683 | 22,694,688 |  |
| Other Assets | 643,610 | 843,967,906 | 634,786,835 | 632,074,387 | 1,054,384,247 |
| Total Assets | 29,460,389,672 | 33,519,141,111 | 36,175,531,637 | 39,330,131,823 | 42,717,124,613 |


| NEPAL INVESTMENT BANK LTD. |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| PROFIT AND LOSS STATEMENT |  |  |  |  |  |
| Fiscal Year (FY) | 2005/2006 | 2006/2007 | 2007/2008 | 2008/2009 | 2009/2010 |
| Particulars |  |  |  |  |  |
| Interest Income | 1,172,742,193 | 1,584,987,354 | 2,194,275,722 | 3,267,941,142 | 4,653,521,338 |
| Interest Expenses | -490,946,961 | -685,530,264 | -992,158,398 | -1,686,973,130 | -2,553,847,497 |
|  |  |  |  |  |  |
| Net Interest Income | 681,795,232 | 899,457,090 | 1,202,117,324 | 1,580,968,012 | 2,099,673,841 |
| Commission and Discount | 115,942,016 | 163,899,110 | 215,292,193 | 262,791,664 | 242,886,274 |
| Other Operating Income | 35,902,340 | 47,318,720 | 66,376,659 | 87,574,794 | 168,312,660 |
| Exchange Profit | 125,747,407 | 135,355,345 | 165,838,748 | 185,327,111 | 224,056,830 |
|  |  |  |  |  |  |
| Total Operating Income | 959,386,995 | 1,246,030,265 | 1,649,624,924 | 2,116,661,581 | 2,734,929,605 |
| Staff Expenses | -120,663,710 | -145,370,601 | -187,149,985 | -225,721,490 | -279,851,360 |
| Other Operating Expenses | 190,605,132 | -243,430,632 | -313,153,795 | -413,883,755 | -433,596,280 |
| Exchange Loss |  |  |  |  |  |
|  |  |  |  |  |  |
| Operating Profit Before Provision for Losses | 648,118,153 | 857,229,032 | 1,149,321,144 | 1,477,056,336 | 2,021,481,965 |
| Provision for Possible Losses | -103,807,589 | -129,718,921 | -135,989,237 | -166,201,383 | -93,056,584 |
|  |  |  |  |  |  |
| Operating Profit | 544,310,564 | 727,510,111 | 1,013,331,907 | 1,310,854,953 | 1,928,425,381 |
| Non-operating Income/ Loss | 390,742 | 1,426,134 | 7,047,735 | 2,953,012 | 10,606,049 |
| Loss Provision Written Back | 10,704,164 | 66,776,784 | 101,576,771 | 114,653,009 | 50,000,462 |
|  |  |  |  |  |  |
| Profit from Regular Operations | 555,405,470 | 795,713,029 | 1,121,956,413 | 1,428,460,974 | 1,989,031,892 |
| Profit/ Loss from extra-ordinary activities |  |  |  |  |  |
|  |  |  |  |  |  |
| Net Profit after considering all activities | 555,405,470 | 795,713,029 | 1,121,956,413 | 1,428,460,974 | 1,989,031,892 |
| Provision for Staff Bonus | -50,491,407 | -72,337,548 | -101,996,038 | -129,860,089 | -180,821,081 |
| Income Tax Provision |  |  |  |  |  |
| Current Year | -154,377,650 | -221,976,628 | -323,228,859 | -389,580,266 | -532,898,521 |
| Upto Previous Year |  |  |  | 7,477,673 | -9,362,702 |
| Deferred Tax Income / (Expense) |  |  |  | -15,879,221 |  |
| Net Profit/ Loss | 350,536,413 | 501,398,853 | 696,731,516 | 900,619,072 | 1,265,949,588 |


| NEPAL INVESTMENT BANK LTD. |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BALANCE SHEET |  |  |  |  |  |
| Fiscal Year (FY) | 2005/2006 | 2006/2007 | 2007/2008 | 2008/2009 | 2009/2010 |
| Capital \& Liabilities |  |  |  |  |  |
| Share Capital | 590,586,000 | 801,352,600 | 1,203,915,400 | 2,407,068,900 | 2,409,097,700 |
| Reserve \& Fund | 824,853,715 | 1,076,770,938 | 1,482,870,648 | 1,500,770,808 | 2,176,295,392 |
| Debentures and Bonds | 550,000,000 | 800,000,000 | 1,050,000,000 | 1,050,000,000 | 1,050,000,000 |
| Borrowings |  |  |  | 38,800,000 | 37,314,826 |
| Deposits Liabilities | 18,927,305,974 | 24,488,855,696 | 34,451,726,191 | 46,698,100,065 | 50,094,725,497 |
| Bills Payable | 18,820,120 | 32,401,462 | 78,838,643 | 82,338,018 | 38,143,836 |
| Proposed and Dividend Payable | 121,626,997 | 43,650,251 | 93,468,245 | 481,413,780 | 602,274,425 |
| Income Tax Liabilities | 9,318,522 | 295,150 | 24,082,669 | 38,296,736 | 37,195,255 |
| Other Liabilities | 287,626,214 | 347,518,664 | 488,404,288 | 714,014,819 | 860,366,551 |
| Total Liabilities | 21,330,137,542 | 27,590,844,761 | 38,873,306,084 | 53,010,803,126 | 57,305,413,482 |
| Assets |  |  |  |  |  |
| Cash Balance | 562,560,620 | 763,984,320 | 1,464,482,719 | 1,833,462,494 | 1,525,441,872 |
| Balance with NRB | 1,526,066,660 | 1,381,351,556 | 1,820,006,035 | 4,411,133,083 | 3,237,217,030 |
| Balance with Banks/ FI's | 247,894,116 | 296,178,324 | 470,452,814 | 1,673,408,313 | 2,053,230,931 |
| Money at Call and Short Notice | 70,000,000 | 362,970,000 |  |  |  |
| Investments | 5,602,868,649 | 6,505,679,987 | 6,874,023,625 | 7,399,811,700 | 8,635,530,125 |
| Loan, Advances \& Bills Purchased | 12,776,208,037 | 17,286,427,389 | 26,996,652,258 | 36,241,206,558 | 40,318,308,062 |
| Fixed Assets | 343,449,635 | 759,456,336 | 970,091,759 | 1,060,752,482 | 1,136,247,319 |
| Non-Banking Assets |  | 1,125,000 | 750,000 |  |  |
| Other Assets | 201,089,825 | 233,671,849 | 276,846,874 | 390,653,496 | 399,438,143 |
| Total Assets | 21,330,137,542 | 27,590,844,761 | 38,873,306,084 | 53,010,428,126 | 57,305,413,482 |


| NEPAL SBI BANL LIMITED |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| BALANCE SHEET FOR THE FIVE YEARS PERIOD. |  |  |  |  |  |
| Fiscal Year (FY) | 2005/2006 | 2006/2007 | 2007/2008 | 2008/2009 | 2009/2010 |
| Capital \& Liabilities |  |  |  |  |  |
| Share Capital | 640,236,100 | 647,798,400 | 874,527,840 | 1,224,338,976 | 1,861,324,239 |
| Reserve \& Fund | 342,137,628 | 515,492,451 | 540,116,972 | 488,268,219 | 589,229,831 |
| Debentures and Bonds | 200,000,000 | 200,000,000 | 200,000,000 | 200,000,000 | 200,000,000 |
| Borrowings | 612,428,650 | 815,365,219 | 1,627,480,190 |  |  |
| Deposits Liabilities | 11,002,040,633 | 11,445,286,030 | 13,715,394,960 | 27,957,220,794 | 34,896,424,201 |
| Bills Payable | 46,238,743 | 48,855,749 | 75,115,471 | 62,947,325 | 72,368,229 |
| Proposed and Dividend Payable | 35,469,706 | 91,024,235 | 12,228,852 | 18,411,112 | 83,080,145 |
| Income Tax Liabilities |  |  |  |  |  |
| Other Liabilities | 157,287,664 | 137,378,475 | 142,581,889 | 215,253,123 | 345,252,820 |
| Total Liabilities | 13,035,839,124 | 13,901,200,559 | 17,187,446,174 | 30,166,439,549 | 38,047,679,465 |
| Assets |  |  |  |  |  |
| Cash Balance | 244,187,671 | 287,530,644 | 308,101,599 | 652,027,266 | 815,679,624 |
| Balance with NRB | 626,123,385 | 556,678,464 | 403,810,203 | 444,138,596 | 1,842,802,239 |
| Balance with Banks/ FI's | 247,847,352 | 278,481,119 | 631,048,524 | 80,273,976 | 782,779,614 |
| Money at Call and Short Notice | 363,200,000 | 350,000,000 | 304,012,877 |  |  |
| Investments | 3,610,775,484 | 2,659,452,919 | 3,088,886,918 | 13,286,181,660 | 16,305,632,815 |
| Loan, Advances \& Bills Purchased | 7,626,736,137 | 9,460,450,701 | 12,113,698,428 | 15,131,747,944 | 17,480,548,194 |
| Fixed Assets | 66,711,798 | 97,218,804 | 120,222,259 | 253,580,695 | 418,244,760 |
| Non-Banking Assets | 24,555,992 | 3,847,024 |  |  |  |
| Other Assets | 225,701,305 | 207,540,884 | 217,665,366 | 318,489,412 | 401,992,219 |
| Total Assets | 13,035,839,124 | 13,901,200,559 | 17,187,446,174 | 30,166,439,549 | 38,047,679,465 |


| NEPAL SBI BANK LIMITED |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| PROFIT AND LOSS STATEMENT FOR THE FIVE YEARS PERIOD |  |  |  |  |  |
| Fiscal Year (FY) | 2005/2006 | 2006/2007 | 2007/2008 | 2008/2009 | 2009/2010 |
| Particulars |  |  |  |  |  |
| Interest Income | 708,718,614 | 831,116,781 | 970,512,681 | 1,460,445,686 | 2,269,704,291 |
| Interest Expenses | 334,770,096 | 412,261,744 | 454,917,713 | 824,700,275 | 1,443,693,573 |
| Net Interest Income | 373,948,518 | 418,855,037 | 515,594,968 | 635,745,411 | 826,010,718 |
| Commission and Discount | 40,753,985 | 52,591,560 | 50,917,830 | 78,836,624 | 131,692,149 |
| Other Operating Income | 7,136,575 | 12,601,352 | 19,557,259 | 52,790,137 | 78,796,662 |
| Exchange Profit | 43,060,315 | 51,989,275 | 49,463,539 | 61,294,299 | 70,328,247 |
| Total Operating Income | 464,899,393 | 533,511,488 | 638,059,332 | 828,666,471 | 1,106,827,776 |
| Staff Expenses | 50,539,528 | 53,232,464 | 74,890,269 | 121,989,160 | 130,336,536 |
| Other Operating Expenses | 99,214,082 | 120,111,581 | 152,379,842 | 223,965,592 | 343,850,266 |
| Exchange Loss |  |  |  |  |  |
| Operating Profit Before Provision for Losses | 315,145,783 | 360,167,443 | 410,789,221 | 482,711,719 | 632,640,974 |
| Provision for Possible Losses | 146,656,796 | 59,376,948 | 57,463,909 | 40,345,336 | 62,350,544 |
| Operating Profit | 168,488,987 | 300,790,495 | 353,325,312 | 442,366,383 | 570,290,430 |
| Non-operating Income/ Loss | $(2,926,272)$ | $(256,759)$ | $(271,006)$ | 2,516,407 | 2,552,892 |
| Loss Provision Written Back | 54,177,763 | 78,515,105 | 29,782,580 | 198,672,788 | 56,621,276 |
| Profit from Regular Operations | 219,740,478 | 379,048,841 | 382,836,886 | 643,555,578 | 629,464,598 |
| Profit/ Loss from extra-ordinary activities |  |  |  | $(156,220,828)$ | $(37,266,000)$ |
| Net Profit after considering all activities | 219,740,478 | 379,048,841 | 382,836,886 | 487,334,750 | 592,198,598 |
| Provision for Staff Bonus | 19,976,407 | 34,458,986 | 34,803,353 | 44,303,159 | 53,836,236 |
| Income Tax Provision | 82,762,098 | 89,681,011 | 100,262,775 | 126,658,096 | 146,620,243 |
| Current Year | 66,120,456 | 86,704,011 | 105,745,947 | 133,123,502 | 183,015,350 |
| Upto Previous Year | 16,641,642 | 2,977,000 | 870,463 | 2,582,900 | $(28,395,565)$ |
| Deferred Tax Income / (Expense) |  |  | $(6,353,635)$ | $(9,048,306)$ | $(7,999,542)$ |
| Net Profit/ Loss | 117,001,973 | 254,908,844 | 247,770,758 | 316,373,495 | 391,742,119 |

