FINANCIAL PERFORMANCE ANALYSIS OF NEPALESE COMMERCIAL BANK: USE OF CAMEL RATING FRAMEWORK

A Dissertation submitted to the Office of the Dean Faculty of Management
in partial fulfillment of the requirements for the Master's Degree

by

Aakash Subedi

Shanker Dev Campus

T.U. Reg. No: 7-2-194-1-2013

Exam Roll No.: 6909/18

Campus Roll No: 553/074

Kathmandu, Nepal

July, 2024

CERTIFICATION OF AUTHORSHIP

I hereby corroborate that I have researched and submitted the final draft of the dissertation entitled **"FINANCIAL PERFORMANCE ANALYSIS OF NEPLEASE COMMERCIAL BANK: USE OF CAMEL RATING FRAMEWORK"**. The work of this dissertation has not been submitted previously for conferral of any degrees nor has it been proposed and presented as part of requirements for any other academic purposes.

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

.....

Aakash Subedi

July, 2024

REPORT OF RESEARCH COMMITTEE

Mr. Aakash Subedi successfully defended the research proposal entitled **"FINANCIAL PERFORMANCE ANALYSIS OF NEPLEASE COMMERCIAL BANK: USE OF CAMEL RATING FRAMEWORK"**. The research committee has registered the dissertation for further progress. It is recommended to carry out the work as per the suggestions and guidance of the supervisor Asso. Prof. Pitamber Lamichhane and submit the thesis for the evaluation and viva voice examination.

Dissertation Proposal Defended Date:
17th June, 2022

.....

Asso. Prof. Pitamber Lamichhane

Dissertation Supervisor

Dissertation Submitted Date:

.....

.....

.....

Dissertation Viva Voce Date:

.....

Asso. Prof. Dr. Sajeeb Kumar Shrestha

Chairperson, Research Committee

APPROVAL SHEET

We have examined the dissertation entitled **"FINANCIAL PERFORMANCE ANALYSIS OF NEPLEASE COMMERCIAL BANK: USE OF CAMEL RATING FRAMEWORK"** presented by **Mr. Aakash Subedi** for the Degree of **Master in Business Studies (MBS)**.We hereby certify that the dissertation is acceptable for the award of a degree.

.....
Asso. Prof. Pitamber Lamichhane
Dissertation Supervisor

.....

.....
Internal Examiner

.....

.....
External Examiner

.....
Asso. Prof. Dr. Sajeeb Kumar Shrestha
Chairperson, Research Committee

.....
Prof. Dr. Krishna Prasad Acharya
Campus Chief

ACKNOWLEDGEMENTS

This thesis is intended to meet a portion of the requirements for the Master of Business Studies degree at Tribhuvan University of Nepal. First of all, I would like to convey my sincere gratitude to my supervisor,Asso. Prof. Pitamber Lamichhane for his insightful advice throughout the work. I also want to thank the head of the research department Asso. Prof. Dr. Sajeeb Kumar Shrestha and campus chief Asso. Prof. Dr. Krishna Prasad Acharya. I received a lot of advice and recommendations for this from my instructors, friends, family members, and other officials.

The sources of data and other information for this study, Nepal Rastra Bank, Nepal Bank Limited, Everest Bank Limited, Standard Chartered Bank, Prime Commercial Bank Limited,kumari Bank Limited,Machhapuchhre Bank Limited,Nic Asia Bank limited, SBI Bank Limited and NMB Bank Limited are gratefully appreciated.

I would also like to thank my friend Mr. Sanjok Chongbang Limbu for his assistance and motivational advice in getting this assignment done. I am sincerely grateful to my family members for their assistance.

Aakash subedi

July, 2024

TABLE OF CONTENTS

List of Tables

List of Figures

ABBREVIATIONS

AGM	Annual General Meeting
CAR	Capital Adequacy Ratio
CCR	Core Capital Ratio
EBL	Everest Bank Ltd.
EPS	Earning Per Share
IGSR	Investment in Government Securities Ratio
KBL	Kumari Bank Ltd.
MBL	Machhapuchhre Bank Ltd.
MBS	Master of Business Studies
MOF	Ministry of Finance
NBL	Nepal Bank Ltd.
NEPSE	Nepal Stock Exchange
NIC ASIA	NIC Asia Bank Ltd.
NMB	NMB Bank Ltd.
NRB	Nepal Rastra Bank
PCBL	Prime Commercial Bank Ltd.
RBB	Rastriya Banijya Bank Ltd.
ROA	Return On Assets
ROE	Return on Equity
SBI	Nepal SBI Bank Ltd.
SCB	Nepal Standard Chartered Bank Ltd.

ABSTRACTS

This study examines the financial performance of ten commercial banks in Nepal using the CAMEL model over the period from fiscal years 2013/14 to 2022/23. Through the analysis of secondary data, the research evaluates various financial indicators including Capital Adequacy Ratio (CAR), Core Capital Ratio (CCR), Non-Performing Loan Ratio, Loan Loss Coverage Ratio, Loan Loss Provision Ratio, Management Efficiency Ratio (MER), Earnings Per Share (EPS), Return on Equity (ROE), Return on Assets (ROA), Cash and Bank Balance Ratio, and Investment in Government Security Ratio.

The findings suggest that while most banks met regulatory requirements for CAR and CCR, government-owned banks initially faced challenges but improved gradually. Despite an initial decrease, non-performing loan ratios are currently increasing, indicating difficulties in loan recovery and profitability. There's a noticeable decline in management efficiency ratios, except for Standard Chartered Bank, suggesting potential issues with staffing and operational effectiveness.

Earnings quality indicators such as EPS, ROE, and ROA exhibit fluctuating or declining trends, emphasizing the need for banks to enhance profitability while minimizing costs. Liquidity management poses challenges, with decreasing trends observed in cash and bank balance ratios, indicating potential difficulties in meeting short-term obligations. Investment patterns in government securities fluctuate, underscoring the importance of maintaining adequate liquidity positions.

The implications drawn from these findings suggest addressing weaknesses in asset quality, operational efficiency, earnings quality, and liquidity management. Recommendations include improving loan recovery processes, optimizing staffing levels, enhancing profitability, and maintaining adequate liquidity reserves.

In conclusion, this research offers valuable insights into the financial performance of Nepalese commercial banks and provides strategic recommendations to enhance their stability, profitability, and overall financial soundness.

Keywords : CAMEL,CAR,CR,,EPS,MER,IGSR,ROA,ROE, Financial Soundness

CHAPTER I

INTRODUCTION

1.1 Background of the study

Financial performance is a measure of a company's policies and operations in monetary terms. These results are reflected in the company's return on investment, return on assets, and profitability. Financial performance is a subjective measure of a company's assets in generating revenue. It also includes net operating income (NPI), earnings before interest and taxes (EBIT), earnings after taxes (PAT), and net asset value (NAV). Basically, it is a measure of the efficiency of banks in generating income with the use of their assets.

Khatri (2019) highlighted the process of determining the operational and financial characteristics of any business from accounting and financial statement is financial performance analysis. The goal of financial analysis is to determine the effectiveness and efficiency of the management of a business, as evidenced by financial reports and records. Financial performance analysis is an appraisal of the feasibility, solidity, and fertility of a business, sub- business or mission.Altman (1968)developed the discriminant – ratio analysis model which was the turning point for financial ratio analysis because this model proved to be extremely accurate in predicting the bankruptcy of the sampled banks. Beaver (1994) used statistical technique to predict the financial performance of banks.

Effective performance measurement was first imitated and worked by Edgeworth (1881) and was first made empirically in a book. Efficiency can be defined as the ability to produce the greatest amount of output for the least amount of input. Commercial banks are said to be efficient it they are able to generate maximum revenue by making optimal use of their available resources. Financial performance is the process of measuring the results of organization policies and operations in terms of monetary value. These results are reflected in the firm's profitability, liquidity or leverage (Nirmal, 2004).According to Ahsan et al. (2016) Bank's efficiency is measured using the efficiency ratio(ER), which is calculated

by dividing the firm's total expenses excluding interest expenses over its total revenue; the lower the ratio greater the firm's efficiency and vice-versa. The banking sector has a significant impact on the success of the economy as it plays an important role in sustaining financial markets. Likewise Sangmi and Nazir (2010) highlight that Sound financial health of a bank is the guarantee not only to its depositors but is equally important for the investors, employees, customers, stakeholders, and the whole economy as well. Therefore, efforts have been made from time to time, to measure the financial position of the banks and manage them efficiently and effectively. The efficiency of commercial banks depends on overheads expenses; so, it is believed that the management always tries to minimize the overhead costs.

There are many different ways to measure an organization's financial performance, with no consensus on the best methods to measure it. The CAMEL model is chosen here to evaluate the financial performance of commercial banks because the model includes 5 components that affect the bank in many ways, that is, there is no room for other variables to confound the results. Therefore, CAMEL is said to be the most suitable performance evaluation method.

CAMEL approach is an efficient tool to assess banks performance in terms of efficiency, and help to take the preventive actions for any future failures and inefficiencies. Even if there are different model for evaluations of banks performance, the CAMEL model is most used one as recommended by Basel Committee on Bank Supervision and IMF (Baral, 2005). The study of Baral (2005) asserts that the Nepalese banking sector plays a crucial role in the economy due to its dominant position in the financial system. His study focuses on the use of the CAMEL model to evaluate the financial performance and checkup the financial health and finds that the financial health of joint venture banks is better than that of the other commercial banks. This study attempts to examine the financial performance of public and joint-venture banks in Nepal, and the indicators are explained at length results and findings section of this paper.

Understanding the importance of the banking sector, the government of Nepal has also encouraged the private sector to invest along with restoring democracy. Commercial banks are the most important aspect of the banking industry, as they deal with the process of analyzing the resources available in the required sector. Banks are essentially a bridge between depositors and investors. The bank collects small deposits from a large number of

depositors and provides a large amount to investors who need money to invest in different profitable sectors. With the restoration of democracy, the government of Nepal adopted a policy of liberalization, which led to the rapid development of the banking sector. Financial institutions in Nepal are increasing day by day. A sound banking system serves as an important vehicle for stimulating economic growth by mobilizing small savings from the inefficient domestic sector and putting them to productive use. They are not only necessary for the safety and soundness of the financial system, but also make an important contribution to the country's economy. They keep looking for all available opportunities to improve their productivity and competitiveness.

The proficiency of the managing an account framework is essential to the fulfillment of financial development and advancement in creating nations. Nepalese managing an account segment has conveyed a noteworthy part in encouraging for financial development of Nepal. Nepalese managing an account segment has played an imperative part within the mobilization of investment funds and credit office for the distinctive segment of the economy. A soundness of the banking sector is fundamental to manage with the challenges of budgetary segment.

Commercial banks are the representation of major money related institution since they serve all sorts of excess and shortage units. They acknowledge the pool of little testimony and give to the required units within the shape of credit. Commercial banks are the major source for the reserves required for exchange and industry. The financial improvement of any nation depends on the monetary execution of commercial banks as they are the major source of cash. Commercial banks have imperative part improvement for the immature nation like Nepal.

In most of immature nation keeping money benefit is concentrated as it were in urban range, for flourishment of keeping money division they have to be move their benefit to provincial zone moreover as the noteworthy number of populaces establishes in provincial range. Beneath government structure government of Nepal had made the arrangement of opening of at least single department to each neighborhood body, with the deliberate to supply budgetary help and proficiency to the individuals of rustic zone too. Nepalese economy is significantly impacted by the settlement; since youth of provincial region are tried and

true on outside business which makes a tremendous plausibility of budgetary soundness in country ranges of Nepal. For financial development of any nation, keeping money segment is considered as the breakthrough.

The history of banking started from 1157 with the establishment of Bank of Venice. Bank of Barcelona and Bank of Genoa come into existence after 250 years of establishment of Bank of Venice. Respectively after that Bank of Amsterdam and Bank of England were establishment on 1609 and 1694 With the introduction of banking Act in 1883 , modern banking was started. In Nepalese context modern banking sector started with the establishment of Nepal bank limited in 1937 Nepal bank limited was only the financial institution in the nation until the establishment of Nepal Rastra bank in 1956, which plays the role of central bank and makes the several guidelines for the banking sector of country. After the declaration of economic liberation, the government of Nepal encouraged the foreign banks for the joint venture in Nepal. Today, the banking sector is more liberalized, modernized and managed. There are 20 commercial banks in functions till the date.

Analyzing the financial performance of Neplease Commercial Banks using the CAMEL rating framework provides a structured and comprehensive approach to assess their stability and profitability. Assessing a bank's capital adequacy, asset quality, management quality, earnings, and liquidity provides stakeholders with a exact view of a bank's overall health. This analysis facilitates comparative evaluation with peer institutions and is useful for bench marking and strategic positioning. Additionally, compliance with regulatory standards is guaranteed, which increases trust between regulators and investors. Additionally, insights gained from the analysis inform strategic decisions, risk management efforts, and potential areas of improvement within the bank.

The main focus of this study is to examine the financial soundness of Neplease Commercial Banks by the CAMEL rating framework and to describe their key strengths, weaknesses, and opportunities for improvement. Also, this study contributes to the academic debate and deepens our understanding of banking operations and financial performance evaluation. Therefore, the use of CAMEL framework serves as a powerful tool to evaluate the financial performance of Neplease Commercial Banks, guide the decision-making process of stakeholders, and promote long-term sustainability.

1.2 Problem statement

The financial health of any financial institution depends on various factors such as assets, liquidity position, capital base, quality of management, and earnings. All these factors affect different types of risks of financial institutions such as credit risk, interest rate risk, liquidity risk, insolvency risk, off-balance sheet risk, Technological and operational risks adversely affect the financial position of financial institutions if not managed in a sustainable manner.

The overall performance of a financial institution may not be reflected in the financial statements, so a big question is whether these statements are sufficient to reflect the overall performance of the bank or not. Therefore, it is necessary to determine the overall performance of banks. For these purposes, a number of financial and statistical tools and techniques are developed by different experts and financial institutions around the world, one of which is CAMEL. Banks face many problems. The problem can be separated into different parts. All parts of the problem are scored using CAMEL notation. To review, analyze and measure the performance of banks, CAMEL is a popular and effective tool.

The CAMELS rating system, officially known as the Uniform Financial Institutions Rating System, is a conservative rating system that was originally developed in the United States and approved by the Federal Council on Financial Institutions. passed in 1979 to classify the general condition of a bank. According to this model, each bank is assessed on the spot based on 5 aspects: capital adequacy, asset quality, management efficiency, earnings quality and liquidity (Opez, 1999). It is essential for the bank to operate efficiently and effectively in order to achieve financial performance. It is essential to evaluate the financial performance of banks. Financial performance analysis is the assessment of the viability, soundness and fertility of any financial institution.

There are several methods to evaluate the financial performance of a financial institution, and one of the most commonly used is the CAMEL rating analysis. Altman (1998) reported the use of neutral networks in fault identification in Italian banks.Considering more than 1000 sampled firms and 10 financial ratios as reliable variables, they found that the neutral network is very close to the discriminant analysis network. They conclude with the superiority of traditional statistical techniques over neutral network analysis. Capital adequacy ratio (CAR)

is the ratio of a bank's capital to its risk assets and short-term liabilities. It is decided by central banks and regulators to ensure that it can absorb a reasonable loss and comply with regulatory capital requirements. This is a measure of the bank's capital, the application of regulated levels of this ratio to protect depositors and promote the stability and efficiency of the financial system.

Asset quality is a measure of the price at which a bank or other financial institution can sell a loan or lease it to a third party, determined by the borrower. It is essentially the valuation of assets to measure the credit risk associated with them. Government bonds and treasury bills are considered high-quality loans, while junk bonds and corporate credit are considered low-quality bonds. Quality management is the act of overseeing all activities and tasks necessary to maintain the desired level of excellence. Banks' monetization is an analytical technique to serve as a basis for future decision-making. Trade liquidity refers to the ease of converting assets into cash. From time to time, the financial statements of financial institutions may not reflect the overall financial position. Therefore, it is necessary to identify strengths, weaknesses, opportunities and threats in the general conditions of banks. For these purposes, a number of financial and statistical tools and techniques are developed by various financial experts and institutions around the world, one of which is CAMEL. This study aims to evaluate the financial conditions and overall performance of commercial banks sampled under CAMEL.

Also, a report by the Asian Development Bank (2002) states that the Basel Committee on Banking Supervision of the Bank for International Settlements (BIS) recommends the use of capital adequacy, asset quality, and quality management. volume, earnings and liquidity (CAMEL) as a criterion for evaluating a financial institution in 1988. In addition, Gilbert, Meyer and Vaughan (2000) used market risk (S) added to CAMEL in 997 as the sixth component. Natarajan and Siva (2011) empirically examined the applicability of CAMEL standards and its impact on the performance of SBI teams. The study concludes that the annual CAMEL analysis helps the commercial bank diagnose its financial condition and alerts the bank to take preventive measures to ensure the bank's sustainability.

This study attempts to find out the profitability of the major commercial banks of Nepal and their performance compared to other banks. Since there are many variables that determine

the efficiency and effectiveness of banks, the question arises as to which criteria should be measured. CAMEL ratings are made because they are widely used tools to measure the performance of financial institutions. This study will also highlight the impact of the CAMEL indices on other financial and accounting variables such as stock market risk, prudence and interest rate management. Furthermore, the following will be the subject of this study.

1. What are the capital Adequacy ratios of Selected Commercial Banks in Nepal?
2. What are the qualities of assets of Selected Commercial Banks in Nepal?
3. How is the management quality of selected Commercial Banks in Nepal?
4. What are the earning capacities of selected Commercial Banks in Nepal?
5. What is the liquidity position of Selected Commercial Banks in Nepal?

1.3 Objectives of the study

The overall objective of the study was to examine the financial performance through the CAMEL framework of selected Commercial Banks. To achieve the common goal, the other objectives of the study are:

1. To examine the overall relative financial soundness of selected Commercial banks.
2. To analyze the relevance of CAMEL rating model in analyzing the financial performance of selected Commercial banks.
3. To examine how capital adequacy, assets management, management quality, earnings and liquidity affects the performance of banks.

1.4 Significance of the study

The financial performance of financial institution is important for depositors, lenders, shareholders and other stakeholders. The importance of sound financial sector has increased tremendously after the international financial turmoil of 1990s. International apex body of financial sector like World bank and International Monetary Fund has given a support to

build up the confidence if private sectors in the liberalized financial system. Therefore, they have directed their member's countries for reform of financial sectors and regular checking of financial soundness of financial institution. For example, World Bank is continuously providing financial and technical support to reinforce NRB and restructure Nepal Bank Ltd. and Rastriya Banijya Bank (NRB 2008).

The financial strength of a financial institution depends on the financial strength of each financial institution. To have a healthy financial situation, a financial institution depends on many different factors, which can be classified into macro and micro factors. Among the macro factors, political stability and growth of real sectors are the most important. However, the impact of macro factors varies among other financial institutions. So, above all, examine the financial soundness of a financial institution's financial performance to know the magnitude of these effects.

Among the micro factors, asset quality, liquidity position, capital base, management quality, market sensitivity and earnings are at the forefront. Along with risks: credit risk, interest rate risk, liquidity risk, market risk, off-balance sheet risk, currency risk, sovereignty risk, technology risk, operational risk, risk of insolvency, which greatly affects the good performance of financial institutions, Thapa, Bhattarai and Basnet (2006).

The following points are some of the rationale of the study:

1. Research helps to show all the glory of these sample banks by finding strengths and weaknesses and helping to overcome weaknesses.
2. This study helps to solve the problems that exist in financial institutions, especially for commercial banks, and to develop policies and strategies to maintain their business effectively.
3. The study helps to show the financial position of the banks to the concerned investors and management.
4. This research directly helps stakeholders make effective decisions by analyzing financial and statistical results.
5. This research is important for banks, Board of directors of respective banks, re-

searchers, academics, investors, students, governments, customers, policymakers as well as many others.

1.5 Limitation of the study

A portion of the MBS degree must be completed through this study. As a result, it has various limitations that have an impact on the studies, and those restrictions are listed below;

1. Among 20 commercial banks, we consider here only 10 banks and 10 financial years, ie. from 2013/14 to 2022/23. Therefore, this thesis shows the trend of commercial banks but does not become the overall mirror of all commercial banks.
2. In this fierce competition, there may be other factors besides financial factors affecting the overall position of the bank. But not all factors were considered in this study due to time and financial constraints.
3. This study has not used extended approach of CAMEL model i.e CAMELSC (S=System, C=Compliance to Norm) due to non-availability of data.
4. This study will be based on secondary data and information and on a review of relevant literature. So, it can be misleading to some extent.
5. Incomplete data as the data disclosed in the study were obtained entirely from the respective banks' websites.
6. The lack of research experience seems to be one of the main limitations in the research process.

CHAPTER II

LITERATURE REVIEW

2.1 Introduction

The literature review looks at what research has already been done on a certain topic. A literature review helps a researcher find out what other researchers have already studied and what topics haven't been studied yet. Literature reviews are helpful because they: 1. Show researchers if the same topic has already been researched 2. Teach researchers how to use the same methods other researchers have used 3. Provide new ideas for organizing and planning research 4. Help in understanding the theory behind the research topic.

Financial performance means doing money-related transaction. Financial performance means how well a company has achieved its financial goals. Financial health of a company can be measured over a certain period to see how well it's doing. This way, we can compare different companies in the same industry or even compare different industries. Financial performance is how good a company is at using what they have to make money. This helps check if the company is doing well financially.

The word "performance" is coined from the word "parfourmen" which means 'to do', 'to carry out' or 'to render'. Performance refers to the act of accomplishment of given task against the preset standard of accuracy, completeness, cost and speed. Performance means how well an organization did in the past or is expected to do in the future, in terms of things like managing costs, being responsible, or being accountable. This means that how well someone does something is not just about how they showed it, but also how good the outcome was. Performance means how well a company is doing, following rules, and meeting expectations. The financial performance of a company is looked at by many people, like managers, tax authorities, shareholders, and creditors, to see how well the company is doing at a certain time. They want to check the company's money situation. Checking how well a company is doing with money is really important for it to be successful. Financial

performance analysis is when we check how well a company is doing, if it is strong, and if it can keep making money.

Financial performance means how well a company did with its money in a specific time frame. The bank's performance can be measured using different factors like how much money they have, how easily they can access it, how much they owe, how well they use resources, how much they borrow, and how much profit they make. The financial performance of a company means how well they can handle and use their own money and belongings. The way a company handles its money can be shown in documents like cash flow statements, balance sheets, and profit and loss reports. These documents help people decide if the company is doing well financially. Financial performance means how well a company is doing financially. This shows how well a company is doing with its money. The ratio of different things like how easily they can turn assets into cash, how much debt they have, and how much money they make can help determine this. This means that information about money can be gotten from papers that show how much money was received and spent, what the company owns, what the company owes, and whether the money made was more or less than the money spent.

The Basel Committee on Banking Supervision of the Bank of International Settlements (BIS) advocated using capital adequacy, asset management, management quality, earnings, and liquidity (CAMEL) as criteria to measure financial institutions' performance in 1988 (ADB 2002). The sixth component, market sensitivity (S), was added in 1997. However, developing countries such as Nepal use CAMEL rather than CAMELS to evaluate the financial performance of financial institutions.

2.2 Theoretical Review

This section covers the theoretical aspects of the subject, such as the notion of the camel rating system, commercial banks, and their functions.

2.2.1 Theories of Capital Adequacy

Capital adequacy pertains to a financial institution's capacity to fulfill its financial commitments and absorb potential losses while maintaining a healthy capital level. Various theories elucidate this concept within banking and finance:

1. Basel Accords (Basel I, Basel II, Basel III):

   The Basel Accords, developed by the Basel Committee on Banking Supervision, have been instrumental in shaping global banking regulations since the introduction of Basel I in 1988. Basel I, focusing primarily on credit risk, provided a standardized framework for assessing capital adequacy in banks. Subsequent iterations, Basel II in 2004 and Basel III in 2010, expanded regulatory requirements to encompass market and operational risk, and introduced more sophisticated risk management practices. Authored collectively by the Basel Committee, these accords serve as international standards for banking supervision, with the aim of promoting financial stability and sound risk management practices across jurisdictions. Banks and financial institutions worldwide use the Basel framework to assess and manage capital adequacy, liquidity, and risk, ensuring resilience in the face of economic uncertainties and market disruptions.

2. Capital Asset Pricing Model (CAPM) (1964):

   Developed by William F. Sharpe in 1964, the Capital Asset Pricing Model (CAPM) has become a cornerstone in modern portfolio theory and asset pricing. Presented in his landmark paper "Capital Asset Prices: A Theory of Market Equilibrium under Conditions of Risk," CAPM provides a framework for determining the expected return on an asset based on its systematic risk relative to the market. By incorporating the risk-free rate and the asset's beta, CAPM facilitates the estimation of appropriate expected returns, guiding investment decisions and portfolio allocation strategies. Widely used by investors, portfolio managers, and financial analysts, CAPM offers insights into the risk-return relationship, aiding in the evaluation of investment opportunities and the construction of diversified portfolios.

These theories and models are fundamental to understanding and managing capital adequacy, risk, and valuation in the area of finance, guiding decision-making processes for investors, financial institutions, and regulators alike.

2.2.2 Theories of Assets Quality

Asset quality theory doesn't have a single "founding father" because it's more of a collaborative effort, shaped by the work of many economists, financial experts, and industry insiders. But the basic ideas behind it owe a lot to the insights of several key figures in finance history. For instance, Harry Markowitz is a big name in this arena. He won a Nobel Prize for his great ideas on how to build a well-balanced investment portfolio that minimizes risk. Then there's William Sharpe, another Nobel laureate, whose work helped us understand how risk and return are linked in investments.

1. Modern Portfolio Theory (MPT):

   Modern Portfolio Theory (MPT), introduced by Harry Markowitz in 1952, is a cornerstone of investment strategy. Its primary use is to guide investors and portfolio managers in constructing diversified portfolios that balance risk and return. By spreading investments across assets with different risk profiles, MPT aims to optimize risk-adjusted returns. The theory's effect is profound as it provides a systematic framework for investors to manage portfolio risk. It encourages investors to consider the relationship between risk and return and diversify their portfolios accordingly. The practical effect of MPT is seen in the construction of investment portfolios, where investors allocate assets based on their risk tolerance and return objectives. MPT has also influenced the development of financial instruments such as index funds and exchange-traded funds (ETFs), which offer investors diversified exposure to various asset classes.

2. Efficient Market Hypothesis (EMH):

   The Efficient Market Hypothesis (EMH), proposed by Eugene Fama in 1965, has significant implications for investment strategy. Its primary use is to guide investors in understanding how asset prices reflect all available information, making it difficult

to consistently outperform the market. EMH suggests that attempting to identify mispriced assets based on their quality alone is unlikely to be successful in the long run. The effect of EMH is to promote the idea that markets are efficient and that attempting to beat the market through stock picking or market timing is a futile endeavor. This has led to the rise of passive investing strategies such as index investing, where investors seek to match the performance of a market index rather than trying to outperform it. EMH has also influenced the development of quantitative trading strategies that rely on statistical models and algorithms to exploit short-term inefficiencies in market prices.

3. Credit Risk Models:

   Credit risk models, stemming from the pioneering work of Robert C. Merton, who introduced the Continuous-Time Model of Option Pricing in 1973, have evolved significantly over time. Further advancements, including the development of the Gaussian Copula function by David Li in the early 2000s, have enhanced the field. These models are extensively used by financial institutions to assess the probability of default and estimate potential credit losses associated with various assets. They serve as indispensable tools for effective credit risk management, enabling institutions to identify and quantify the risk of poor asset quality accurately. By leveraging statistical methods and historical data, credit risk models empower institutions to implement prudent risk management measures, thereby safeguarding financial stability.

2.2.3 Management Theories

Some popular management theories are mention below:

1. Scientific Management Theory

   Frederick Taylor's Scientific Management, published in 1911, an American mechanical engineer, was a true pioneer in the world of management theory. His idea was not just to increase productivity, They aim to improve the work of everyone involved. Taylor believes that forcing people too hard is not the answer. Instead, he believes that simplifying work can make work more efficient and enjoyable. Before Taylor arrived,

there was often a big divide between bosses and employees. Communication is rare and rules vary from place to place. Workers mainly stay there to secure jobs. Taylor sees things differently. He believes that fair pay is essential to keep people motivated.

This is why he defends the idea of "a fair daily wage for a fair day's work." This idea spread globally and shaped the way companies treated their employees. Taylor's approach didn't just change the workplace; it has changed the way people view work. By emphasizing fairness and efficiency, he made work more humane. His ideas laid the foundation for teamwork and collaboration, making the workplace more balanced and satisfying for everyone.

2. System Management Theory

   Systems management presents a fresh perspective on how we lead and operate organizations. Imagine your business as a living, breathing organism, in which each element plays an important role, just like the organs in our bodies. This theory emphasizes that for a business to prosper, its various parts must work together harmoniously.

   At the heart of systems management theory are people, employees who bring their unique skills, passions, and experiences. Together with them, departments, work groups and business units form the backbone of the organization. From this perspective, managers are not simple supervisors; they are the source, responsible for understanding the complex dynamics of their business. In practice, this means managers must be aligned to the rhythms and gradation of their teams and departments.

   By promoting synergy and collaboration, they transform the workplace into a community where individuals are encouraged to connect and support each other. Instead of operating individually, the goal is to create an environment in which everyone feels valued and empowered to contribute to collective success.

3. Contingency Management Theory

   In the world of management, contingency management theory highlights a fundamental truth, there is no universal approach. It recognizes that different organizations face unique challenges, shaped by both internal dynamics and external factors. At

its core are three key variables organizational size, technology and leadership style. Fred Fiedler, the man behind this theory, emphasizes the importance of understanding that effective leadership is not a fixed trait but a dynamic interaction between leaders and the environment there. According to Fiedler, effective leadership depends on adaptability, that is, the ability to adjust one's approach to circumstances. Essentially, contingency management theory focuses on a few key points: 1. Management isn't a one-trick pony, there's no single formula that works everywhere. 2. A good leader isn't just skilled; they're nimble, capable of recognizing and responding to the needs of each unique situation. 3. Central to Fiedler's theory is the concept of LPC the least preferred co-worker scales an assessment tool that helps managers understand their own orientation and adjust their approach accordingly.

2.2.4 Earnings Theories

Some Popular earnings theories are mention below:

1. Human Capital Theory:

   Human capital theory, pioneered by economist Gary Becker in his seminal work "Human Capital: A Theoretical and Empirical Analysis with Special Reference to Education" (1964), posits that individuals can enhance their earning potential through investments in education, training, and skill development. This theory emphasizes the role of human capital—the knowledge, skills, and abilities possessed by individuals—in driving economic productivity and income generation. It suggests that education and skill acquisition lead to higher productivity, enabling individuals to command higher wages in the labor market. Human capital theory has had a significant impact on education policy, workforce development initiatives, and research on labor market outcomes, highlighting the importance of investing in human capital for economic growth and reducing income inequality. These theories offer different approaches to determining capitalization, each with its own advantages and disadvantages. The choice between cost theory and earnings theory may depend on the specific circumstances and goals of the company.

2. Marginal Productivity Theory:

   The marginal productivity theory of distribution, rooted in the works of economists such as John Bates Clark and Philip Wicksteed in the late 19th and early 20th centuries, asserts that in competitive labor markets, wages are determined by the marginal productivity of labor. According to this theory, workers are paid according to the value of their marginal contribution to the production process. Higher productivity leads to higher wages, as firms are willing to pay more for the additional output or value provided by productive workers. The marginal productivity theory has been instrumental in understanding wage determination in market economies and has influenced debates on labor market policies, income distribution, and economic efficiency.

3. Efficiency Wage Theory:

   Efficiency wage theory, articulated by economists like George Akerlof and Janet Yellen in "Efficiency Wage Models of the Labor Market" (1984), posits that paying wages above the market equilibrium can improve worker productivity, reduce turnover, and enhance firm performance. According to this theory, higher wages serve as an incentive for workers to exert greater effort, leading to increased productivity and lower overall labor costs for employers. Efficiency wage theory has implications for wage-setting practices, labor market dynamics, and macroeconomic stability, informing discussions on minimum wage policies, labor market regulations, and income inequality.

2.2.5 Theories of Liquidity

Some popular Liquidity theories are mention as below:

1. Classical Liquidity Theory:

   This concept, advocated by economists such as Adam Smith and David Ricardo, posits that the liquidity level within an economy hinges on the amount of circulating money. In essence, an upsurge in the money supply results in heightened liquidity, as more funds are available for transactions.

2. Keynesian Liquidity Preference Theory:

   Formulated by John Maynard Keynes, this theory shifts the focus from money supply to money demand. Keynes argues that individuals hold money not only for transactions but also as a precautionary measure against uncertainties and as a store of value. Liquidity preference denotes people's inclination to possess liquid assets rather than non liquid ones, categorized into three motives: transactions, precautionary, and speculative.

3. Fisher's Liquidity Theory:

   Irving Fisher's proposition underscores the interplay between the nominal interest rate, expected inflation rate, and money demand. Fisher posits that individuals adjust their money holdings based on their projections of future inflation and the real rate of return on alternative assets. According to Fisher, an increase in expected inflation diminishes the real value of money, thereby reducing the demand for money, and vice versa.

These theories offer distinct perspectives on the determinants and ramifications of liquidity within an economy or financial market, reflecting the intricate and multifaceted nature of the concept.

2.3 Empirical Review

National and International journals, experts' views, review of previous research are included in this review. Many studies have been carried out by research scholars in the field of CAMEL model.

Sah and Pokharel (2023) investigated the need for a system for rating performance, taking into account a few key financial data, and pinpointing advantages and disadvantages for banks and other financial organizations. A useful instrument for evaluating bank and financial institution performance is the "CAMEL" model. The capital sufficiency, asset quality, management caliber, earnings capacity, and liquidity state of the sample banks were all examined by this model. The study has attempted, albeit in modest measure, to

analyze the performance of three Nepali commercial banks between 2011/12 and 2020/21 using the CAMEL technique. For the purpose of the analysis, three banks were selected as sample banks: the privately held Prime Commercial Bank Limited (PCBL), the Nepal SBI Bank Limited (NSBIL) joint venture, and the fully government-owned Rastriya Banijya Bank. The outcome illustrated PCBL's and NSBIL's financial stability by allowing them to maintain their risk-weighted assets at superior Tier I and II capital levels. Additionally, it was shown that NSBIL could support a larger proportion of loans that were in good standing. The BFIs NSBIL, PCBL, and RBBL all kept their average returns on assets and returns on shareholder equity. Moreover, it discovered that PCBL led NSBIL banks and RBBL in terms of the ratio of liquid assets to total deposits. This means that academics, researchers, and bank management will all benefit greatly from this study. They can use it to draft a budget that will ensure the overall performance of the bank is effective.

Alrafadi (2023) examined that Utilizing the CAMEL show, this think about compares the comes about of the execution of Libyan commercial banks from 2004 to 2010. The primary organizes of this consider utilized the CAMEL show to survey the execution of Libyan commercial banks. Pool Conventional Least Square was utilized within the moment arrange. The discoveries illustrated that the factors utilized for this consider are suitable and speak to the keeping money proportion for finding dependable keeping money teach. Moreover, the discoveries illustrated that the free components had a critical effect on bank execution, and the theory were acknowledged. Agreeing to the think about, corporate administration ought to be taken under consideration in future inquire about in arrange to analyze bank execution in Libya and get advance comes about.

Oke and Onwere (2023) aims to examine CAMEL variables' impacts on store cash banks' share costs for twelve Nigerian banks, nine Kenyan banks, and five South African banks. Strategy: The board relapse approach was utilized to analyze the think about information. The share cost was measured by the entire of the every day closing share cost partitioned by the number of exchanging days. Capital adequacy was peroxide by the equity-to-total-asset proportion, administration productivity was measured by resource turnover, profit quality was measured by net benefit edge, and liquidity was measured by the loan-to-deposit proportion. Discoveries: The discoveries appeared that resource quality emphatically and

altogether impacted the share costs of the South African test but had an inconsequential impact on the share costs of the Nigerian test. The administrative productivity essentially and emphatically affected the share costs of the South African test but had an immaterial impact on the share costs of the Kenyan and Nigerian tests. In conclusion, discoveries appeared that liquidity adversely and essentially affected the share costs of our Kenyan and Nigerian tests but had an immaterial impact on the share costs of our South African tests. Originality/Value: The study's discoveries will offer assistance the administration of African banks makes great administration choices and give data that will offer assistance partners make superior speculation choices. The ponder sheds modern knowledge into the effect of CAMEL factors on the share cost of banks in sub-Saharan Africa.

Sridevi et al. (2023) explores that the Indian banking sector has been more successful because of public trust and confidence. The question of stability can be answered by the efficiency of its operations, both financially and administratively. The parameters that measure efficiency have been shown to be alive and dynamic due to globalization and the entry of foreign banks into the market. This structural change has further forced individual banks, especially state-owned banks, to review their branch operations and identify areas for improvement to increase their competitive advantage. The objective of this paper is to provide a valid, fair and reliable assessment of the management efficiency of public and private sector banks in India using three parameters which are cash contribution ratio, business per person and profit per employee. Five banks of public and private banks were selected for the study. where the data related to the mentioned parameters were collected over a period of ten years, ie. from 2006 to 2015. The collected data was analyzed through both comparative and cross-sectional analysis between industries and within sectors using One Way ANOVA and t-test. know statistical significance of data using Ms Excel. It is observed that there are no significant differences in the managerial efficiency of public and private sector banks.

Swathi and Rajani (2023) points to inspected that The primary bank or financial institution from Asia that's not Japan to be recorded on the NYSE is ICICI, an Indian organization. The nature of this examination is explanatory. This study's essential objective is to utilize camel investigation to look at ICICI Bank's monetary execution. The nature of this examination is explanatory. Auxiliary Yearly reports, books, diaries, and magazines are utilized to

assemble information. Proportion investigation has been utilized to dissect the information that was gotten. The study's discoveries show that ICICI Bank was on the rise which the liquidity metric held the best spot.

Karma et al. (2020)considered this study designed an information system that can determine the health status of village credit institutions (LPDs), which play an important role in supporting the economy of village communities. and is intended to build. As a traditional village-owned financial institution in Bali, LPD's operations are subject to Bali's Level I regional regulations.LPD's main activity is to collect funds from the community in the form of savings or deposits and redistribute them to the community in the form of loans. A portion of the profits generated will be donated to traditional villages as village development funds. Amid fierce competition among existing financial institutions and news that several LPD cases are facing problems, monitoring the health status of LPDs has become important and imperative. The resulting information system is intended to support and facilitate the assessment of the health status of LPDs by supervisory authorities. The methodology used to assess the health of his LPD in this system is the CAMEL methodology, which includes five dimensions: capital, assets, management, earnings, and liquidity.

Hymavathi (2021) inspected and found that Due to globalization within the world advertise Indian keeping money framework has changed. In this article, an exertion has been made to discover out the relative execution of PNB and HDFC. The Indian keeping money framework has been partitioned into open segment, private segment and outside banks. For the objective of benefit investigation and for comparing capital ampleness we have chosen tests one open and one private segment banks i.e. Punjab National Bank (PNB) and Lodging Advancement Back Organization (HDFC) by applying CAMELS investigation strategy. Both these banks are pick up in private and open segment banks so a comparative think about is made by the taking of five a long time (2009-2014). The most parameters of this ponder are capital ampleness proportions, resource quality proportions, administration effectiveness, profit, and liquidity and affectability proportions. The ponder found that HDFC overwhelmed in resource quality, administration productivity, gaining quality and liquidity though PNB has overwhelmed in capital ampleness and affectability proportions.

Kandel et al. (2021)investigate in common, the word bank implies monetary institution

managing with cash. The monetary execution of the budgetary teach is playing the critical part for the economy. Jain and Jaishwal (2016), the budgetary segment are the spine of the economy. The entire scenarios of the economy exercise and the improvement of a nation can be discovered by the condition of managing an account segment. In Nepal, the financial is specifically impacted by the bank's execution, and on beat of that "A" class banks are fundamental banks category that's withstanding the its economy. There are diverse sorts of banks like central bank, commercial banks, Advancement banks, Venture Banks and Co-operative banks. These money related institutions' fundamental work is to play a part of monetary mediators; giving open borrowing and loaning. Ojo et al. (2012) expressed that the inter mediation part of money related teach can be said as catalyst of financial development. Concurring to Zeinab (2006) in spite of of a few confinements the result of inquire about clearly appeared the components that mainly influence the execution of banks completely. From result we will conclude that gaining quality of the banks primarily influence their execution. Other variables as well have the impact for the bank's execution; capital adequacy, resources quality and liquidity other than winning. The result appeared that winning and liquidity positions basically result to the tall impact to return on resources whereas resources quality, liquidity and winning impact more to extend return on equity. As a result, that we can conclude that appropriate calculation and estimation of these pointer are critical for keeping up bank's execution and development.

Octafilia and Wijaya (2020)Inspected that Wellbeing bank level strategy that had been changed three times, from CAMEL, CAMELS to RGEC is Bank Indonesia's procedure in arrange to ensure keeping money division which is susceptive to economy emergency. It is appealing since RGEC strategy is fair executed in Indonesia's keeping money division and it known from universal investigates that are still utilizing CAMELS such as Vietnam, South Africa, India and Bangladesh. At that point, the point of this consider is to analyze ordinary wellbeing bank in Indonesia by combining CAMELS and RGEC strategies; resources, rentability, liquidity, solvability and affectability of showcase hazard. This study's protest is customary bank in Indonesia with 50 banks as test and period of consider is from 2012 to 2017. The result of this ponder appears that resources proportion which is spoken to by Capital Ampleness Proportion and Net Intrigued Edge are for the most part on 1 and

2 composite level. Rentability proportion which is spoken to by Return on Resources and Net Benefit Edge are on 1 and 3 composite level, whereas Advance to Store Proportion and Net Performing Credit which speak to liquidity proportion are generally on composite level 1. At that point, solvability proportion is spoken to by Operational Charge of Operational Pay and affect ability of advertise chance proportion is spoken to by Intrigued Rate Hazard are on composite level 1 commonly. It implies that customary wellbeing bank in Indonesia from 2012 to 2017 is exceptionally solid or satisfactory. From the result of this think about is anticipated to be able to extend society's believe to keeping money segment at that point it can increment individuals venture in bank which is straightforwardly might back economy development of Indonesia.

Abusharbeh et al. (2020) aims to examine the financial stability of listed commercial banks in Palestine using the CAMEL rating system. Content analysis, composite classification and one-sample t-test are applied to a sample of six local banks operating in Palestine. To conduct research and assess financial development, secondary data was obtained from banks 2007-2017. from the annual financial statements. Empirical testing has shown that Palestinian banks meet the solvency requirements of the Basel Committee and have stable profitability and liquidity. However, the paper concludes that the operational efficiency of the banks under consideration is "easily managed". Finally, the findings show significant differences in the performance of Palestinian banks using the CAMEL rating system. This paper recommends that listed Palestinian banks focus on long-term investments instead of short-term investments and monitor their risk management practices to increase their profits and move towards sustainability and growth.

Mayakkannan and Jayasankar (2020) conducted a study to evaluate the performance of public and private sector banks in India using the CAMEL model. The findings showed that different banks had different performances based on CAMEL ratios. Public sector banks performed exceptionally well in terms of capital adequacy, while private sector banks excelled in management quality. The public sector bank also had the highest asset quality, while the private sector bank ranked highest in liquidity criteria. In terms of earnings quality, the public sector banks outperformed.

Mahida and Bhatt (2020) examine that In today's Cutting edge financial period managing

an account segment plays central part to meet the investor's desires and development of the economy in common. In thiscontext display consider is anattempt to assess the comparative execution of open division and private division banks in India utilizing CAMEL approach. Private segment banks have initiated solid competition to the open segment banks relating to capital ampleness and for resource quality administration, ICICI bank stoodat the best position. So also, in terms of working and net benefit edge, HDFC bank stood at beat position where as SBI stood at most reduced appearing disturbing circumstance for Open division bank. ANOVA was utilized to analyse the noteworthy distinction within the private division and open segment banks with CAMEL approach variables. The result indicate that private and open division banks don't vary much in terms of CAMEL parameters and which is able offer assistance approach producers to outline the long run keeping money framework effectively.

Nowfal and Muhammed (2019) conducted a study titled "Comparison of operational efficiency of listed banks from Kerala - A study based on camel model". This article emphasizes the increasing importance of banks in our financial system and economic development. The study aims to analyze the operational efficiency of listed banks from the state of Kerala using the camel model. The research focuses on three specific banks: South Indian bank, Federal bank, and Dhanalakshmi bank. By examining the ratings of these banks from 2013-14 to 2017-18, the study provides an accurate assessment of their performance. According to the findings, Federal bank demonstrates a strong foundation and outperforms the other two banks in all camel parameters. On the other hand, Dhanalakshmi bank needs to take corrective actions in order to survive in the highly competitive industry. The study's insights will be beneficial for both bank customers and potential investors in these banks' shares.

Kulshrestha (2019) inspected The execution of the managing an account division is critical for any economy. The development of a country depends essentially upon productive and ideal utilization of assets conjointly on operational productivity of different segments of an economy, of which the banking sector could be a basic portion. Managing an account framework fortifies the incitement of capital arrangement and gives liquidity. Indian keeping money segment comprises private, open, rustic and outside banks. In India, open division banks are experiencing capital advertise. In general, the paper points to degree and com-

pare the money related execution of private and open division banks by utilizing CAMEL approach on their inspected monetary reports of eight a long time period i.e. (2011–2018). The proportions considered for this examination incorporates Capital Ampleness (CA), Resource Quality (AQ), Administration Soundness (MS), Profit and Liquidity (LR). This think about concocted positioning strategy based on midpoints of different proportions and one way annova test is connected to discover out factual noteworthiness contrast among bunches. Comes about appeared that private division banks are superior entertainers compare to Open division bank. The generally comes about mean that the execution of private division banks has progressed since of the usage of present day innovation keeping money changes and recuperation component.

Gunawan and Arvianda (2019)Gunawan and Arvianda (2019) points to rate Panin Dubai Syariah Bank's wellbeing level and to examine whether there are result contrasts of bank wellbeing level utilizing both strategies. This consider was conducted on PT Bank Panin Dubai Syariah Ltd. Monetary Explanations 2016 and 2017. The comes about of this ponder are: (1) When utilizing CAMELS the bank was categorized as reasonably sound in 2016 for both monetary and administration components and in 2017 the bank was categorized as reasonably sound for the monetary and unsound for administration; (2) When utilizing RGEC the comes about were diverse, which depended on each perspective; (3) There were not found numerous contrasts within the comes about of both strategies.

Rai (2018) conducted a study titled "Determinants of financial performance in Nepalese financial institutions" where they used a descriptive and causal comparative design to examine the connection between the financial performance of Nepalese financial institutions. The objective of the study was to evaluate how factors like bank capital adequacy, asset quality, liquidity management, gross domestic product, and inflation impact metrics such as return on assets, return on equity, and net interest margin. The researchers discovered that variables such as capital adequacy ratio, asset quality, and management efficiency had a significant influence on the financial performance of Nepalese financial institutions.

Sathyamoorthi et al. (2017) states that this study used the CAMEL model to assess the financial performance of three listed commercial banks in Botswana for the period 2011-2015. Secondary data from annual reports of listed banks were used in the study. This

result indicates that the selected banks have high leverage and strong liquidity positions. Correlation analysis revealed that earnings per share has a significant positive correlation with the liquidity ratio of total customer deposits to total assets, and that the leverage ratio has a significant negative correlation with the equity ratio. His other CAMEL metrics had no significant correlation with his earnings per share. Regression analysis revealed that capital adequacy, asset quality, profitability, and management efficiency have no significant relationship with selected banks' performance as measured by earnings per share. On the other hand, the liquidity position of these banks was found to be significantly related to the performance of the selected banks at a significance level of 5 percent. The results also showed that the selected banks had an overall good performance during the study period in most parameters of the CAMEL model and had sufficient capital and assets compared to the benchmark. Profitability of selected banks has also increased. The findings of this study will help the management of the selected banks to take appropriate business decisions.

Kavitha (2017) investigated that Great Corporate Administration is critical for sound administration of any organization. Non-Banking Monetary Teach like Lodging Back Companies are no special case and there has been ever-increasing request for straightforwardness. HFCs are confronting more number of challenges in comparison with commercial banks and concentrate more on proficiency in arrange to outlive, so there's much significance of sound management. The most point of this term paper is to analyze the monetary execution of the recorded Five Lodging Back Companies (HFCs) in India, specifically Can Blade Homes, DEWAN Lodging back, PNB Lodging fund, LIC Lodging, HDFC, by utilizing the CAMEL show (Capital Ampleness, Resource Quality, Management Efficiency, Winning Capability and Liquidity). On the premise of corporate administration hones and divulgences within the yearly report for the year 2007-2008 to 2016-2017. For this reason, corporate administration score (CG score) is calculated for each HFCs over the distinctive parameters as per the Companies Act. These components are utilized to reflect monetary execution, working soundness and administrative compliance of monetary teach.

Akter et al. (2017) points to inspected the reason of this paper is to observation-ally analyze the monetary explanation of two chosen banks (One bank from the open segment and another one from the private) in Bangladesh amid 2010-14. This think about highlights

positioning of two banks for their execution on CAMEL (Capital Adequacy; Resource Quality; Administration Quality; Profit Capacity; and Liquidity) proportions. Amid the year Experimental comes about propose that 2010-2014 NCCBL has scored superior position of all the proportions but EPS, fluid resources to add up to resources and fluid resources to add up to stores compared to JBL. By considering all of the parameters of CAMEL, NCCBL is the most noteworthy position evaluated by the CAMEL Demonstrate since of its execution on the CAMEL proportions compared to JBL. JBL is lower position compared to NCCBL beneath the think about since of its destitute execution on the CAMEL proportions. The extreme discoveries of the ponder show that JBL ought to progress the shortcomings of the CAMEL which eventually progress the bank's by and large execution. The discoveries of the paper will empower the professionals and investigators to get it money related explanation examination in a profundity way.

In their article titled "A CAMEL Model Analysis of Selected Banks in Bangladesh," Majumder and Rahman (2017) conducted a study on the performance of fifteen banks in Bangladesh from 2009 to 2013. The study focuses on ranking these banks based on their performance using CAMEL ratios. As a result, it is recommended that policy makers of the banks with lower rankings should take necessary measures to address their weaknesses based on the study's findings. It is important to note that this study is limited in scope as it only pertains to the fifteen selected banks. However, the findings can be valuable for the management of these banks in Bangladesh to enhance their financial performance and develop policies that promote growth. The study also identifies specific areas that banks should focus on to ensure sustainable growth.

Palamalai and Saminathan (2016) inspected that the Camel approach is critical instrument to evaluate the relative budgetary quality of a bank and to recommend essential measures to progress shortcomings of a bank. In India, RBI embraced this approach in 1996 taken after on the suggestions of Padmanabham Working Gather (1995) committee. Within the display ponder, an endeavor has been made to rank the different commercial banks working in India. The banks in India have been categorized into Open segment, Private division, and Outside banks. The test of chosen banks comprises of 25 Open Segment, 18 Private Segment, and 8 Outside banks. For the reason of positioning, Camel show

approach has been connected, joining vital parameters like Capital Adequacy, Resources Quality, Administration Productivity, Profit Quality and Liquidity. The finding of the ponder appears that open segment banks, viz. Andhra Bank, Bank of Baroda, Allahabad Bank, Punjab National Bank IDBI Bank, State Bank of Bikaner and Jaipur and UCO Bank has been positioned at the best five positions in their money related execution amid the consider period. The private segment banks, specifically, Tamilnad Merchantile Bank, Kotak Mahindra Bank, HDFC Bank, Hub Bank, Karur Vysya Bank, ICICI Bank, Citi Union Bank and IndusInd Bank shared the beat five positions. The outside banks such as Bank of Bahrain and Kuwait, HSBC Bank, The Regal Bank of Scotland, Deutsche Bank, CTBS Bank, Citi Bank, DBS Bank and Illustrious Bank of Scotland secured the beat five positions amid the ponder period.

Desta (2016) points to investigate that This ponder analyzed the budgetary execution of the African banks. As it were seven banks were watched among the 30 African best banks as distinguished by the Worldwide Back Magazine. These banks have total and solidified monetary explanations for a period of the later three monetary a long time (i.e. 2012 to 2014). It has connected the CAMEL composite and component rating. The ponder found that the banks are appraised as solid and palatable when appraised in terms of capital adequacy proportion and profit capacity. On the other hand, they were evaluated as less palatable, lacking and basically insufficient when evaluated in terms of resource quality, administration quality and liquidity. All the banks were aggregately appraised as composite 3 (i.e. Reasonable). Standard Bank of South Africa Ltd. (South Africa) positioned final among the banks beneath think about, but it was chosen as the victor best territorial bank by the Worldwide Back Magazine in 2015. The banks are prescribed to utilize the CAMEL composite and component rating on a intermittent premise in arrange to resist trade vacillations and helplessness to outside influences. Similarly, educate just like the Worldwide Back Magazine are suggested to apply the CAMEL composite and component rating whereas positioning best banks. At last, advance investigate is worth seeking after for developing a total ratio's rating scale and weight for all proportions that constitute the composite CAMEL components.

Shukla (2015) inspected that Checking and supervision of banks has gotten to be excep-

tionally critical due to critical Non-performing Resources and bank disappointments from the 1980s till presently. Persistent Execution assessment of the keeping money segment is hence critical to guarantee money related steadiness of an economy. Within the light of the world-wide keeping money emergency in recent years, CAMEL approach could be a valuable apparatus to look at the security and soundness of banks. It moreover highlights the dangers being confronted by banks and help mitigate the potential dangers which may lead to bank disappointments. Within the display think about, an endeavor is made to assess the execution & monetary soundness of chosen different open & private segment banks utilizing CAMEL approach. Within the prepare of assessment of execution of different banks, our ponder concluded that, distinctive banks have gotten diverse exhibitions with regard to CAMEL proportion. Most of these banks, counting HDFC, ICICI, IDBI, lie in a comparable rank locale. Be that as it may, these banks' resources etc. vary a awesome bargain and they cannot be judged exclusively based on the outright values of the CAMEL proportions. Looking at the drift, ready to say that private banks are developing at a quicker pace than open division banks.

Aftab et al. (2015) utilized the camel framework to investigate the relationship between ownership (private or public) and political regimes (democracy or autocracy) on the performance of BFIs in the context of Pakistani banks. Their findings revealed that under private ownership, the profitability of banks tends to rise with enhancements in asset quality and management, but declines when banks increase their capital base or board liquidity. On the other hand, when banks are government-owned, the correlation between asset quality and liquidity loses statistical significance, indicating that the government acts as a guarantor for short-term solvency and shields against asset deterioration.

J. J. Shah et al. (2015) Found the development and steadiness of commercial managing an account is basic for the economy of any country. The Save Bank of India states that the managing an account industry of India is enough capitalized and exceptionally well directed. There are 27 open division banks, 21 private segment banks and 49 outside banks in India in expansion to the different agreeable and territorial banks. This ponder is conducted to compare the execution of the household and remote banks in India. The test measure is two residential banks and two remote banks viz. The State Bank of India, ICICI Bank, Standard

Chartered Bank and HSBC Bank. The budgetary information accessible of these banks for the past 5 a long time have been utilized to conduct this consider. CAMEL system is the most device utilized for the consider whereas ANNOVA has been utilized for testing the different speculations.

Gupta (2014) aims to investigate The movement of an economy is altogether subordinate upon sending as well as ideal utilization of assets and most imperatively operational productivity of the different segments, of which managing an account segment plays an awfully crucial part. Managing an account segment makes a difference in incitement of capital arrangement, advancement and monetization in expansion to assistance of financial approach. It is basic to carefully assess and examine the execution of banks to guarantee a sound monetary framework and an proficient economy. The show consider endeavors to assess the execution of open segment banks in India utilizing CAMEL approach for a five year period from 2009-13.

Venkatesh et al. (2014) point to inspected the money related proficiency of chosen commercial banks in kingdom of Bahrain. Bahrain which is considered as the monetary center of Center East, play critical part within the financial exercises within the Mena Locale. Money related segment play a critical part in Bahrain as 16 Percent of the GDP of Bahrain begins from budgetary segment. The money related productivity of banks beneath ponder is measured by CAMELS investigation. There are 4 retail routine banks that utilized as tests in this inquire about out of the 28 routine and Islamic retail banks within the country. Comes about appear that National Bank of Bahrain, the government bank within the nation, has achieved most noteworthy effectiveness compared to its peers within the showcase.

Jha and Hui (2012) conducted a study on the financial performance comparison of Nepalese public banks, joint ventures, and domestic private banks using the CAMEL framework. Their research revealed that the ROAs of public sector banks were higher than those of joint ventures and domestic private banks due to their significant total assets. However, the overall performance of public sector banks was not deemed sound as other financial ratios, such as ROE, CDR, and CAR, of most joint ventures and domestic private banks were found to be superior. Factors such as high overhead costs, political interventions, poor management, and low-quality collateral contributed to the continued deterioration in the financial health

of public sector banks. The study also indicated that joint ventures and domestic private banks in Nepal are not adequately equipped to handle potential large-scale shocks to their balance sheets. The researchers concluded that factors like capital adequacy ratio, interest expenses to total loans, and CDR do not significantly impact ROA. While CAR positively influences ROE, NPL, CDR, and interest expenses have no significant effect on ROE.

Chand (2011) observed that the bank is currently operating with sufficient capital, meeting the standards set by NRB. The bank's credit management and recovery efforts have been effective, resulting in an increase in the quality of loans. It is anticipated that the number of loan defaults will decrease in the future. Management decisions regarding operations and investments have played a key role in controlling bad debt recovery. The bank has successfully managed interest spreads and secured cost-effective sources of funds, ultimately strengthening its position in the market. With a liquid assets to total deposit ratio exceeding the industry average, the bank has been able to align risk-sensitive assets with risk-sensitive liabilities in long-term maturity buckets, making them immune to interest rate fluctuations.

Acharya et al. (2011) conducted a study on the CAMEL rating system of Commercial Banks in Nepal, focusing on Bank of Kathmandu and Kumari Bank Limited. The objective was to analyze and compare the fundamental performance of BOK and Kumari Bank Limited. It was found that KBL has better capital adequacy compared to BOK, indicating a higher level of security for depositors. Additionally, the loan loss provision of BOK is greater than that of KBL. KBL is making progress in reducing bad debts through its LLP. The management efficiency ratio of BOK appears to be consistent, and BOK has achieved higher profits. Furthermore, BOK has a stronger liquidity position than KBL.

Natarajan and Shiva (2011) reviewed that the Indian financial system has undergone second generation reforms with the main emphasis on individual reform, strengthening of internal system, consideration of various solvency standards like capital adequacy, NPA limitation, operational efficiency and improvement of systems to the implementation of the loan system. This can only be done through proper monitoring and regulatory mechanism. North American bank regulators developed and used the CAMEL methodology to assess the financial and managerial soundness of US commercial banks. Later, the Basel Committee on Banking Supervision (BCBS) was established in 1974 and they also adopt CAMEL as a unified

rating system for financial institutions to evaluate and supervise banks. In India, the Basel I and II norms are adjusted together, so there is a need to ensure a better financial position of its banks and financial institutions. This paper empirically tested the applicability of CAMEL standards and its impact on the performance of SBI teams.

The researchers like Baral (2005), Mohiuddin (2014), Rahim, Kadri, Ee-Ling, and Dee (2018), have attempted to make significant contributions in the field.

2.3.1 Summary of Review of Literature

A country's success depends on using its resources wisely and effectively managing its money. If a nation doesn't handle its resources and capital well, it falls behind, as Nepal is currently experiencing. Capital mobilization, or gathering funds, plays a crucial role in shaping the economy. Financial institutions help by collecting money and supporting various sectors, contributing to national growth. They are both providers and users of funds, actively participating in markets.

The summary tables below show a review of previous studies and articles on this subject.

Table 1: Summary of Review of Literature

Author	**Data period**	**Methodology**	**Findings**
Sah and Pokhrel(2023)	2011 to 2021 10 Years	Descriptive and Comparative analysis	The study have made a modest attempt to use the CAMEL technique to examine the performance of three commercial banks in Nepal this research will be tremendously instructive to academics, researchers, and bank management. They can utilize it to create a financial plan for the effectiveness of the bank's performance as a whole.

Alrafadi-2023	2004 to 2010 7 Years	Quantitative approach, Analytical Approach	The findings demonstrated that the independent factors had a significant impact on bank performance, and the hypothesis was accepted. According to the study, corporate governance should be taken into account in future research to analyze bank performance in Libya and obtain further results.
Swathi and Rajani-2023	2013 to 2017 5 Years	Descriptive and analytical research design	The study's findings indicate that ICICI Bank was on the rise and that the liquidity metric held the top spot.
Oke et al.-2023	2023 1 Year	Descriptive and causal-comparative research design	The findings showed that asset quality positively and significantly influenced the share prices of the South African sample but had an insignificant influence on the share prices of the Nigerian sample. The managerial efficiency significantly and positively influenced the share prices of the South African sample but had an insignificant effect on the share prices of the Kenyan and Nigerian samples.
Kulshrestha-2019	2011 to 2018 8 Years	Comparative Research design	Results show that private sector banks are better performers compared to Public sector banks. The overall results signify that the performance of private sector banks has improved because of the implementation of modern technology banking reforms and recovery mechanisms.

Octafilia and Wijaya (2020)	2012 to 2017 6 Years	Analytical and descriptive research method	The result of this study shows that the assets ratio which is represented by Capital Adequacy Ratio and Net Interest Margin are mostly on 1 and 2 composite levels. Rent-ability ratio which is represented by Return on Assets and Net Profit Margin are on 1 and 3 composite level, while Loan to Deposit Ratio and Net Performing Loan which represent liquidity ratio are mostly on composite level 1. Then, the solvability ratio is represented by the Operational Fee of Operational Income, and sensitivity of the market risk ratio is represented by Interest Rate Risk on composite level 1 commonly. This means that conventional health banks in Indonesia from 2012 to 2017 were very healthy or adequate.
Abusharbeh (2020)	2007 to 2017 10 Years	Correlation and comparative study	The paper concludes that the operational efficiency of the banks being evaluated is "fairly managed". Finally, the findings indicate significant differences amongst Palestinian banks in terms of performance, assessed using the CAMEL rating system. This paper suggests that the listed Palestinian banks should focus on long-term investments rather than short-term ones, and monitor their risk management practices to increase their profits and move towards sustainability and growth.

Kandel (2019)	2012 to 2017 5 Years	Descriptive and comparative study	The outcome of research clearly showed the factors that mainly affect the performance of banks entirely. From result, we can conclude that the earning quality of the banks mainly affects their performance. Other factors too have the influence for the bank's performance; capital adequacy, assets quality and liquidity other than earning. The result showed that earning and liquidity positions mainly result to the high influence to return on assets while assets quality, liquidity and earning influence more to increase return on equity. As a result, that we can conclude that proper calculation and measurement of these indicator are important for maintaining bank's performance and growth.
Kavitha-2017	2007 to 2017 10 Years	Comparative Research Design	Good Corporate Governance is important for sound management of any organization. Non- Banking Financial Institutions like Housing Finance Companies are no exception and there has been an ever-increasing demand for transparency. HFCs are facing more challenges in comparison with commercial banks and concentrate more on efficiency to survive, so there is much importance of sound management.

Barbara and rvianda (2019)	2016 to 2017 2 Years	Comparative Research Design	The results of this study are: (1) When using CAMELS the bank was categorized as fairly sound in 2016 for both financial and management factors and in 2017 the bank was categorized as fairly sound for the financial and unsound for management; (2) When using RGEC the results were different, which depended on each aspect; (3) There were not found many differences in the results of both methods.
Rajesh and Poddar(2019)	2014-2018 5 Years	Descriptive and analytical research design	The Reserve Bank of India states that the banking industry of India is adequately capitalized and very well regulated.
Karma et al. (2019)	Not Mentioned	Comparative and analytical research method	Amid intense competition between existing financial institutions and news of several LPD cases that have problems, monitoring the LPD's health level becomes something important and mandatory. The resulting information system is expected to assist and facilitate the Supervisory Agency in conducting an assessment of the health level of LPDs.
Kumari(2018)	2009-2014 5 Years	Comparative Research Design	The study found that HDFC dominated in asset quality, management efficiency, earning quality and liquidity whereas PNB has dominated in capital adequacy and sensitivity ratios.

Sathyamoorthi et al. (2017)	2011 to 2015 5 Years	Basic study	The selected banks performed well during the study period in terms of most of the parameters of the CAMEL model with adequate capital and assets when compared to benchmarks. The earning capacity of the selected banks was also on the increase. The findings of this study will be helpful to the management of selected banks in making appropriate managerial decisions.
Sridevi (2018)	2006 to 2015 10 Years	Descriptive and comparative study	This structural change has further forced individual banking institutions, especially state-owned banks, to inspect the performance of their branches and identify improvement directions to gain further competitive advantages.
Desta (2016)	2012 to 2014 3 Years	comparative and exploratory study	The study found that the banks are rated as strong and satisfactory when rated in terms of capital adequacy ratio and earnings ability. Conversely, they were rated as less satisfactory, deficient and critically deficient when rated in terms of asset quality, management quality and liquidity. All the banks were aggregated rated as composite 3 (i.e. Fair). Standard Bank of South Africa Ltd. (South Africa) ranked last among the banks under study, but it was selected as the winner best regional bank by the Global Finance Magazine in 2015.

Akter (2017)	2010 to 2014 5 Years	Observational	The ultimate findings of the study indicate that JBL should improve the weaknesses of the CAMEL which ultimately improve the bank's overall performance
Sinha (2016)	Not Mentioned	Analytical and comparative study	The result indicate that private and public sector banks do not differ much in terms of CAMEL parameters and which will help policymakers to frame the future banking system successfully.
Gupta (2014)	2009 to 2013 5 Years	Basic Research Design	Banking sector helps in stimulation of capital formation, innovation and monetization in addition to facilitation of monetary policy.
Kumar et al. (2012)	2000 to 2011 11 Years	Descriptive and comparative study	Private Sector banks are on the top list of performance in term of soundness in comparison to public sector banks.
Venkatesh and Suresh (2014)	2006 to 2012 7 Years	comparative study	Results show that National Bank of Bahrain, the government bank in the country, has attained highest efficiency compared to its peers in the market.
Kumar (2011)	Not Mentioned	Correlation and comparative study	Significant difference was noticed in the opinion of banker's regarding various ratios under.
Prasad. and Ravinder (2012)	2006 to 2010 5 Years	comparative and analytical study	Top performers were Andra Bank, Bank of Baroda, Punjab and S ind Bank, Indian bank and corporation bank. Bottom Performers were bank of Maharastra, UCO bank, and united bank of india and Vijaya bank.

Kumar (2011)	2005 to 2009 5 Years	Comparative study	Public sector banks outperformed private sector banks with regard to CAMEL framework.
Dang (2011)	2007 to 2010 4 Years	Observation and Basic Research	Internationally standardized rating the CAMEL rating is significant to banking supervision and it is popular among regulators.
Gupta (2008)	2003 to 2007 5 Years	Comparative study	Based on CAMEL model ranked the top five and bottom five banks.
Bodla And Verma (2006)	Not Mentioned	Basic Research	CAMEL model is a rating model which assists in inter bank performance comparison
Prasuna (2003)	2003 to 2004 1 Years	Descriptive and Quantitative study	Rivalry among banks benefited the customers in term of better service, innovative products and good negotiations.
Joshi and Joshi (2002)	Not Mentioned	Basic study	It is a mode of ranking and rating of banks.

2.4 Research Gap

When analyzing the financial performance of banks, researchers and scholars frequently use the CAMEL Analysis. In the Nepalese banking sector, the overall performance of the top 10 commercial banks is also determined by this research. In terms of CAMEL, this study emphasizes the commercial banks' strong financial position. No researcher has yet examined the top-performing banks in Nepal during this period, despite the fact that numerous academics and researchers have already examined this term in relation to joint venture banks in the country's banking sector. As a result, this paper will yield the financial standing of Nepal's top-performing government own,joint venture and Private Commercial banks combined in the CAMEL component matrix.

CHAPTER III

RESEARCH METHODOLOGY

Two words make up research methodology: ”research” and ”methodology.”. The methodical, planned investigation of a particular issue that requires a solution is known as research. The investigation process entails a number of carefully considered steps, including data collection, recording, analysis, and interpretation, all aimed at solving a particular problem. Therefore, ”methodology” refers to the research approach that is used to test a hypothesis, whereas ”research” refers to the entire process by which we try to solve a problem. Any study that is to be worthwhile must follow a solid and organized methodology.

The search for knowledge is referred to as research. ”A careful critical inquiry or examination in seeking facts and principles; diligent investigation in order to ascertain something” is how the Webster International Dictionary defines research, and it’s a very inclusive definition (Saravanavel, 1990). One approach to methodically addressing the research problem is through research methodology (Kothari, 1990). One way to conceptualize it would be as a science that studies scientific research methodology. We examine the many approaches that a researcher typically takes in this, analyzing the reasoning behind each step as well as the research problem.

The different steps a researcher must take in order to study a problem with specific goals in mind is referred to as research methodology. Utilizing a specific research methodology is necessary to meet the study’s objectives. Methods and procedures used throughout the entire study’s subject are described in research methodology. This chapter thus covers the following topics: population and samples, data collection and analysis tools, research design, nature and source of data, and data gathering practices.

3.1 Research Design

A study’s plan or framework, which directs data collection and analysis, is called a research design. Planning, organizing, and implementing an investigation in order to find the answer

to a research question and manage deviations is known as research design. A comparative and descriptive research design will be employed in order to meet the study's goal.

3.2 Population and Sample

For the purposes of this study, all commercial banks are considered to be part of the total population. Therefore, twenty commercial banks make up the population. Two government-owned commercial banks, Four commercial banks in the private sector, and four banks in joint ventures are taken as samples of the entire population. Rastriya Banijya Bank, Nepal Bank Ltd., Prime Commercial Bank, Kumari bank Ltd., NIC ASIA Bank, Machhapuchhre Bank Ltd, Everest Bank Ltd, Standard Charted Bank Ltd, NMB Bank and SBI Bank are these. Due to the subject's ease of access and the constraints of time, money, and resources, these banks were chosen using a random sample technique.

3.3 Sources and Nature of Data

This study is based on secondary data drawn from the annual reports of respective banks. The data is related to 10 years (2013/14-2022/23). For analysis of the data two important statistical tool viz. mean and standard deviation has been used to draw the conclusion. The required data for the study is collected in followings ways:

1. Annual reports of sample bank.
2. Internet, home page and related link visit.
3. Directives of NRB.
4. Articles published by different authors on different journals.

3.4 Methods of Analysis

For the analysis of the data financial ratio are used. These ratios are categorized in accordance of CAMEL.

(C) Capital Adequacy

$$\text{Capital Adequacy Ratio(CAR)} = \frac{\text{Total Capital Fund}}{\text{Total risk Weighted assets}} * 100 \quad (1)$$

$$\text{Core Capital Ratio(CCR)} = \frac{\text{Total Core Capital Fund}}{\text{Total risk Weighted assets}} * 100 \quad (2)$$

Where,

Total capital fund =core capital +supplementary capital

Total risk weighted asset= on balance sheet risk weighted items + off balance sheet risk weighted items.

(A) Assets Quality Ratio The main sources of funds collection of commercial banks are from deposit capital. It mobilizes these funds in different profitable sectors for its earnings. The major source of earnings of banks is from lending activities. There are two types of loan and advances.

1. Performing loans

   Loan which payment is within 90 days is termed as a performing loan.

2. Non-performing loan

   The loan in which burrowers has not made the payment in last 90 days is non-performing loans.

3. Sub-standard loan

   Loan which are due from last 3 months to 6 months. Here, the full collection of principle is doubtful.

4. Doubtful loan

   Loans that are due from the last 6 months are doubtful loans.

5. Bad loan

Loans that are due from last year are bad loans.

$$\text{Non-Performing loan Ratio (NPL)} = \frac{\text{Total Non-Performing loan}}{\text{Total loan and advances}} * 100 \quad (3)$$

Where,

Total non-performing loan (NPL) = substandard loan + doubtful loan+ bad loan Total loan and advances = total performing loan + total non-performing loan

$$\text{Loan Loss Coverage Ratio} = \frac{\text{Loan Loss Provision}}{\text{Total Non-Performing loan}} * 100 \tag{4}$$

$$\text{Loan Loss Provision Ratio} = \frac{\text{Total Loan Loss Provision}}{\text{Total Loan and Advances}} * 100 \tag{5}$$

Where,

Total loan loss provision (LLP) = provision on (Pass loan + Reconstruction loan + Substandard loan + Doubtful loan + Bad loan)

Total non-performing loan = Substandard loan + Doubtful loan + Bad loan

(M) Management Efficient management is the key for sound financial performances of commercial banks. Any institution can easily achieve its goals if management of institution is visionary and efficient. Management analysis can be done by following formula.

$$\text{Management Efficiency Ratio(MER)} = \frac{\text{Net Profit after Tax}}{\text{Total no. of Staff}} * 100 \tag{6}$$

(E) Earnings

Earnings are the ultimate goal for commercial banks. Earnings can be defined as the excess of revenue over cost. Earnings can also be termed as profit of commercial banks. Financial position of commercial banks is reflected through its earnings. Earnings of commercial banks are calculated by given formula

$$\text{Earnings Per Share(EPS)} = \frac{\text{Net Profit after Tax}}{\text{No. Of Share Outstanding}} * 100 \tag{7}$$

$$\text{Return on Equity(ROE)} = \frac{\text{Net Profit after Tax}}{\text{Total Share Holders Equity}} * 100 \tag{8}$$

$$\text{Return on Assets(ROA)} = \frac{\text{Net Profit after Tax}}{\text{Total Assets}} * 100 \tag{9}$$

(L) Liquidity

Liquidity is the ability of the organization to meet the financial obligations. It refers to the short term financial position of the banks. Commercial banks does not provide all the deposits as loans and advances, certain percentage of deposit is kept for itself.

Liquidity of banks is measured by three methods:

Cash reserve ratio (CRR)

Cash and bank balance ratio (CBR)

Investment in government securities ratio (IGSR)

Cash reserve ratio (CRR)

It is the minimum amount that must be hold in the form of account balance with NRB.

$$\text{Cash Reserve Ratio(CAR)} = \frac{\text{Cash Balance in NRB}}{\text{Local Currency Deposit-Margin Deposit}} * 100 \quad (10)$$

Cash and bank balance ratio (CBR)

This ratio measures the ability of commercial banks to meet the immediate financial obligations. This ratio is used to cope up the unexpected demand of depositors.

$$\text{Cash and Bank Balance Ratio} = \frac{\text{Cash and Bank Balance}}{\text{Total Deposit}} * 100 \quad (11)$$

Investment in government securities ratio (IGSR)

These are the risk-free assets, which can be easily converted into cash when required. So, commercial banks should invest certain amount of their deposit in government securities.

$$\text{Investment in Gov. Security ratio} = \frac{\text{Investment in Gov. Securities}}{\text{Total Deposit}} * 100 \quad (12)$$

3.5 Research Framework

The research framework provides a visual depiction of how independent variables relate to dependent variables. In this instance, Financial soundness is viewed as the dependent

variable, with Capital Adequacy, Asset Quality, Management Quality, Earning Capability, and Liquidity identified as the independent variables. This relationship is illustrated in the diagram below.

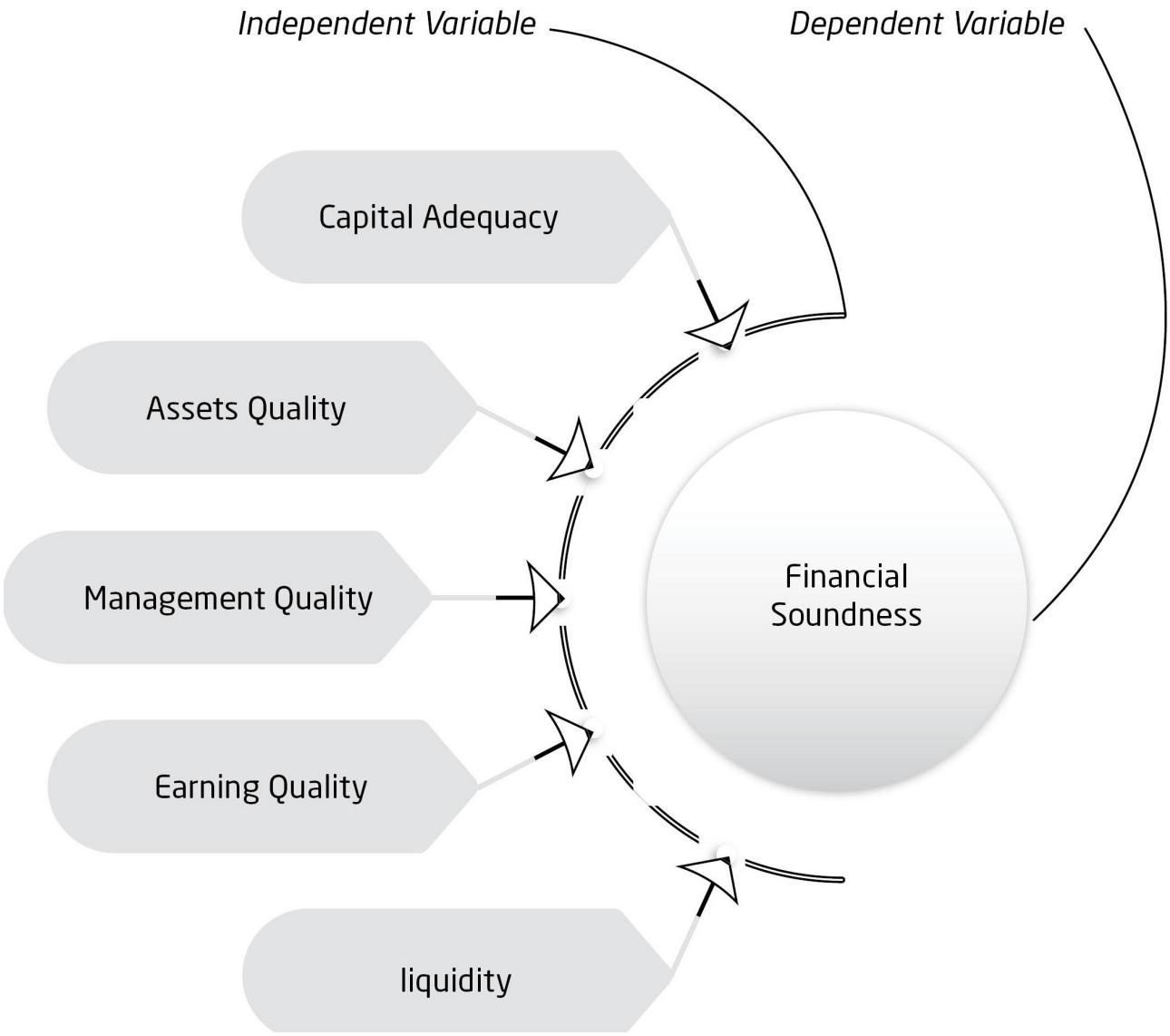

Figure 1: Research Framework

Source: CAMEL Analysis of Commercial Bank in Nepal:Assessment of Financial Soundness by B. Shah and Tiwari (2023) .

The research framework of this study revolves around the CAMEL rating methodology, which is a widely used approach to assess the financial health and performance of banks. The framework consists of five main components, each representing an important aspect of

bank operations and management.

1. Capital Adequacy

   Capital adequacy measures a bank's ability to absorb unexpected losses and maintain financial stability. This reflects how well a bank's capital help risk. Capital adequacy ratios, such as capital adequacy ratio (CAR), assess the ratio of a bank's capital to its risk-weighted assets. A higher capital adequacy ratio indicates greater strength to adverse economic conditions and financial shocks.

2. Assets Quality

   Asset quality assesses the composition and risk content of a bank's asset portfolio. It assesses the credit risk associated with assets held by banks, such as loans, investments, and other financial products. Key indicators of asset quality include non-performing loan (NPL) levels, loan loss provisions, and asset concentration. High asset quality means a healthy asset base and low credit risk.

3. Management Quality

   Management quality examines the effectiveness of a bank's governance structure, strategic decision-making processes, and operational efficiency. Assess senior management's ability to direct the bank's operations, manage risk, and ensure compliance with regulatory requirements. Factors such as corporate governance practices, risk management frameworks, and leadership qualities contribute to the assessment of management quality. Good management quality promotes prudent decision-making and improves overall business performance.

4. Earning Quality

   Earnings quality assesses a bank's profitability and sustainability. Examines a bank's ability to generate profits from its core banking activities while effectively managing risk. The most important metrics include Earning Per Share(EPS) Return on Assets (ROA), and Return on Equity (ROE). Sustainable earnings reflect a bank's ability to generate long-term returns that support financial stability and growth.

5. Liquidity

Liquidity measures a bank's ability to meet short-term obligations in a timely manner. Assess the availability of liquid assets to meet financing needs and withstand liquidity shocks. Liquidity ratios such as Cash and Bank Balance ratio and Investment in government secutities ratio assess the adequacy of a bank's liquid assets relative to its short-term liabilities. Adequate liquidity facilitates banking operations and reduces the risk of financial problems.

6. Relationship to financial soundness

   Each component of the CAMEL rating system contributes to a bank's overall financial soundness. A comprehensive assessment of capital adequacy, asset quality, management quality, earnings quality, and liquidity allows stakeholders to assess the strength and resilience of a bank's financial condition. Analyzing these factors together provides regulators, investors, and other stakeholders with a comprehensive view of a bank's performance and enables them to make informed decisions. This framework provides a structured approach to assess the financial performance of commercial banks in Nepal using the CAMEL rating methodology. This highlights the connection between the five components and their importance in assessing overall financial soundness.

CHAPTER IV

RESULTS AND DISCUSSION

4.1 Results

This section of the study examines how CAMEL affect the financial soundness of commercial banks' in Nepal. For this study, the key factors influencing the financial soundness are taken into account. It includes data presentation, analysis, and conclusions. Organizing, tabulating, and evaluating financial and statistical results are all parts of data presentation and analysis.

4.1.1 Capital Adequacy

Capital adequacy refers to the ability of a bank or financial institution to meet its financial obligations and absorb potential losses. It is typically measured by the ratio of a bank's capital to its risk-weighted assets, ensuring that banks have enough capital to withstand unexpected losses and maintain stability. Regulatory bodies impose minimum capital requirements to ensure the safety and soundness of the financial system, with the goal of protecting depositors and maintaining confidence in the banking sector. Banks with higher capital adequacy ratios are generally considered more financially stable and less risky.

4.1.1.1 Capital Adequacy Ratio Analysis

The standard by which banks are measured is capital adequacy. The ratio of capital to risk-weighted assets is another name for it. It serves depositors as well as the stability and effectiveness of the financial system. The capital adequacy ratio is calculated by measuring Tier I and Tier II capital. While Tier II capital can absorb losses in the case of winding-up and hence offer a lower level of protection to depositors, Tier I capital can absorb losses without requiring a bank to stop trading.

$$\text{CAR} = \frac{\text{Tier-I Capital+ Tier-II Capital}}{\text{Total Risk-Weighted assets}} * 100 \quad (1)$$

Where,

• Tier I Capital and Tier II Capital

The bank's primary source of funding is Tier I capital. It is made up of retained earnings and shareholders' equity. In addition to Tier I capital, Tier II capital is the secondary component of bank capital that contributes to the required reserves of the bank. Known as supplemental capital, Tier II capital consists of subordinated term loans, concealed reserves, revaluation reserves, and hybrid instruments.

Table 1

Capital Adequacy Ratio(CAR)

Fiscal Year	RBB	NBL	NMB	SBI	EBL	SCB	PCBL	MBL	KBL	NIC
2013/14	4.62	4.79	10.75	13.28	11.31	12.27	12.40	10.63	11.81	14.05
2014/15	10.16	8.00	11.13	14.03	13.33	13.10	12.16	12.24	10.84	12.49
2015/16	11.60	10.20	10.98	13.89	12.66	16.38	11.60	12.36	11.69	12.44
2016/17	11.64	14.47	13.61	16.17	14.69	21.08	13.28	16.82	14.50	13.83
2017/18	11.27	11.27	15.75	15.15	14.20	22.99	12.24	15.36	13.36	12.24
2018/19	13.39	16.80	15.43	14.12	13.74	19.69	12.76	12.79	11.75	13.32
2019/20	12.64	17.01	15.08	15.55	13.38	18.51	13.84	13.02	1645	13.50
2020/21	13.46	16.80	15.08	13.86	12.48	17.17	14.82	12.06	13.71	12.47
2021/22	13.29	15.05	13.59	13.25	11.89	15.95	13.12	13.36	12.68	13.38
2022/23	12.92	13.74	13.33	12.58	13.31	17.09	12.10	13.58	12.11	13.36
Mean	11.5	12.81	13.47	14.18	13.09	17.42	12.83	13.22	12.89	13.1
S.D.	1.03	1.66	1.75	4.15	0.64	1.92	0.96	2.65	1.12	3.32

Source:Data derived from the annual reports of the selected commercial banks.

Table 1 show the Capital Adequacy Ratio of ten commercial banks from the fiscal year 2013/14 to 2022/23. Analyzing the Capital Adequacy Ratio (CAR) data over fiscal years indicates significant tendencies among the banks examined. NIC ASIA and NMB have continuously good CARs, ranging from 12.24% (2017-18) to 15.75% (2017-18) and 10.75% (2013-14) to 15.43% (2018-19), suggesting strong capital levels and effective risk management techniques. Banks such as NBL and SBI, on the other hand, have varying CARs, with NBL ranging from 4.79% (2013-14) to 16.80% (2018-19) and SBI from 13.28% (2013-14) to 13.25% (2021-22), presumably reflecting periodic modifications in their capital structures or risk exposures. Meanwhile, RBB and SCB exhibit a typically growing tendency in CARs over the years, with RBB ranging from 4.62% (2013-14) to 13.39% (2018-19) and SCB from 12.27% (2013-14) to 21.08% (2016-17), indicating attempts to enhance capital.

4.1.1.2 Core Capital Ratio Analysis

From the perspective of regulators, an institution's core capital indicates its financial health. In Nepalese commercial banks, core capital consists of paid-up capital, share premium, non-redeemable preference shares, general reserve fund, cumulative profit/loss, capital redemption reserves, capital adjustment fund, and other free reserves. The total of core capital is reduced by the amount of goodwill, fictitious assets, investments made above what the NRB has prescribed, and investments made in the security of a business in which the investor has a financial stake. It is computed using the provided formula.

$$\text{Core Capital Ratio(CRR)} = \frac{\text{Tier-I Capital}}{\text{Total Risk Weighted assets}} * 100 \tag{2}$$

Table 2

Core Capital Ratio(CRR)

Fiscal Year	RBB	NBL	NMB	SBI	EBL	SCB	PCBL	MBL	KBL	NIC
2013/14	4.46	4.13	9.91	10.19	9.35	10.83	11.53	9.69	10.85	11.84
2014/15	10.16	6.74	8.84	11.18	10.44	11.67	11.29	11.14	9.89	10.53
2015/16	10.46	9.01	9.34	11.31	10.34	14.08	10.76	11.32	10.75	10.69
2016/17	10.39	13.37	12.39	13.93	12.72	19.58	12.45	15.78	13.55	12.38
2017/18	9.98	10.29	14.78	13.38	12.65	21.42	11.43	14.38	12.48	8.66
2018/19	12.31	15.87	13.09	12.72	12.38	18.31	11.97	11.88	10.89	8.24
2019/20	11.43	16.00	13.00	12.39	11.92	16.85	12.83	9.57	12.88	8.35
2020/21	11.09	13.54	11.42	11.02	11.24	15.53	12.28	8.67	10.64	7.36
2021/22	10.95	11.96	10.36	10.42	10.78	14.40	11.87	8.62	9.83	8.80
2022/23	10.80	10.85	10.15	10.10	11.18	14.17	10.80	9.02	8.13	9.46
Mean	10.20	11.17	11.33	11.66	11.30	15.68	11.72	11	10.98	9.63
S.D.	1.11	1.61	2.45	3.82	1.66	1.93	0.69	2.13	1.36	3.38

Source:Data derived from the annual reports of the selected commercial banks.

Table 2 show the Core Capital Ratio of ten commercial banks from the year 2013/14 to 2022/23. Analyzing Core Capital Ratio (CCR) data across fiscal years provides an understanding of the financial health of different banks. Consider NIC ASIA, for example. It has constantly maintained a reasonably high CCR, ranging from 11.84% in 2013-14 to 9.46% in 2022-23. This shows that NIC ASIA has a strong core capital base and utilizes good risk-management methods. On the other side, institutions such as NBL and SBI have had some ups and downs in their CCRs throughout the years. NBL's CCR, for example, varies from 4.13% in 2013-14 to 16.00% in 2019-20, demonstrating some flexibility in its capital structure or risk management strategy. Similarly, SBI's CCR ranges from 10.19% in 2013-14 to 10.42% in 2021-22, indicating a very constant but unremarkable development.

Meanwhile,Banks such as SCB and RBB have gradually increasingly fluctuating their CCRs in recent years. SCB's CCR increase from 10.83% in 2013-14 to 14.17% in 2022-23, while RBB's increase from 4.46% in 2013-14 to 10.80% in 2022-23. This means that they should pay more attention to maintaining adequate capital reserves and managing risks efficiently. Overall, while each bank's journey is unique, it demonstrates the significance of having a strong core capital foundation to ensure financial stability and regulatory compliance.

4.1.2 Assets Quality Analysis

The likelihood of a loan or lease default paired with an assessment of its marketability is called asset quality. As defined by the borrower or lessee, particularly bond issuers, it is, thus, the price at which a bank or other financial institution can sell a loan or lease to a third party. The evaluation of the credit risk associated with a certain asset is the basis for an asset's quality rating.

4.1.2.1 Non-Performing Loan

Loans which are due from more than 3 months are known as non- performing loan. It consists of sub-standard loan, doubtful loan and bad loan. Non- performing loan ratio shows the relationship between loan and non-performing loan. It is the proportion of non-performing loan to total advance loan. Higher non-performing loan indicated that the bank assets are performing efficiently. Lower ratio of non- performing loans indicates the efficiency of the bank assets management. It is calculated by following formula.

$$\text{Non-Performing loan Ratio(NPLR)} = \frac{\text{Total Non-Performing Loan}}{\text{Total Loan and Advances}} * 100 \qquad (3)$$

Where, Total non-performing loan = Sub-standard loan+ Doubtful loan+ Bad loan Total loan and advances = Total performing loan + Total non- performing loan

Table 3

Non-Performing Loan Ratio (NPLR)

Financial Year	EBL	KBL	MBL	NBL	NIC	NMB	PCBL	RBB	SBI	SCB
2013/14	0.97	4.03	1.78	5.12	2.33	0.55	2.43	6.38	0.26	0.48
2014/15	20.66	2.49	0.64	3.98	2.07	0.42	1.83	5.35	0.19	0.34
2015/16	0.38	1.15	0.55	3.11	0.76	1.81	1.23	4.25	0.14	0.32
2016/17	0.25	1.86	0.38	3.32	0.36	1.68	0.88	3.77	0.10	0.19
2017/18	0.20	1.05	0.44	3.37	0.06	0.88	0.85	4.75	0.20	0.18
2018/19	0.16	1.01	0.37	2.64	0.46	0.82	0.92	4.79	0.20	0.15
2019/20	0.22	1.39	0.52	2.47	0.76	2.68	1.48	4.08	0.23	0.44
2020/21	0.12	0.96	0.62	2.05	0.50	2.27	1.45	3.23	0.23	0.96
2021/22	0.12	1.11	1.04	1.83	0.53	1.45	1.40	2.09	0.15	0.59
2022/23	0.79	4.96	2.26	2.85	0.88	2.75	4.85	3.77	2.43	1.17
Mean	0.388	2.001	0.861	3.074	0.871	1.531	1.732	4.247	0.412	0.483
S.D.	0.31	1.41	0.65	0.96	0.74	0.86	1.20	1.18	0.71	0.34

Source:Data derived from the annual reports of the selected commercial banks.

Table 3 show non performing loan ratios of sample banks.where NIC ASIA's Non-Performing Loan (NPL) ratio has consistently improved throughout fiscal years, with values of 2.33% in 13-14 and 0.76% in 19-20, but it increased slightly to 0.88% in the latter year. In contrast, NMB faced difficulties, with its NPL ratio rising significantly from 0.42% in 2013-14 to 2.68% in 19-20. EBL's NPL ratio fluctuated, hitting a high of 0.97% in 2013-14 and 0.79% in 22-23. RBB showed an overall downward trend, with its NPL ratio falling from 6.38% in 2013-14 to 3.77% in 22-23. KBL and NBL had occasional rises and decreases, with KBL fluctuating between 0.66% in 14-15 to 4.96% in 22-23, and NBL from 3.11% in 15-16 to 3.37% in 17-18.MBL was stable until a significant rise in 22-23, rising from 0.55% in 13-14 to 2.26% in 22-23. PCBL fluctuated, peaking at 4.85% in 22-23, whilst SBI and SCB fluc-

tuated and increased significantly in 22-23, with SBI going from 0.10% in 16-17 to 2.43% in 22-23 and SCB rising from 0.19% in 16-17 to 1.17% in 22-23. These differences highlight banks' various tactics and performance in dealing with non-performing loans throughout the course of a fiscal year.

4.1.2.2 Loan Loss Coverage Ratio

It is the connection between the total amount of non-performing loans and the total loan loss provision. It calculates the ratio of total non-performing loans to total loan loss provisions. If any loans out of the total amount of non-performing loans turn into bad debt for the bank, they are recouped from the loan loss provision fund. Therefore, from that perspective, banks benefit more from a greater loan-loss coverage ratio. It is computed using the provided formula.

$$\text{loan Loss Coverage Ratio} = \frac{\text{Total Loan Loss Provision}}{\text{Total Non-Performing loan}} * 100 \tag{4}$$

Where,

Total loan loss provision = Provision on (Pass loan+ Restructure loan + Sub Standard loan + Doubtful loan + Bad loan)

Total Non-performing loan = Sub Standard loan + Doubtful loan + Bad loan

Below table shows the numerical value of total loan loss coverage ratio of sampled banks during sampled time frame.

Table 4

loan Loss Coverage Ratio

Fiscal Year	EBL	KBL	MBL	NBL	NIC	NMB	PCBL	RBB	SBI	SCB
2013/14	186.71	23.84	92.93	18.58	41.88	182.95	40.23	18.45	390.44	205.74
2014/15	239.96	39.62	251.22	27.44	42.49	249.91	53.91	18.25	557.59	294.70
2015/16	361.71	90.68	247.64	37.69	145.51	71.60	82.39	25.30	327.16	760
2016/17	501.20	60.68	356.89	33.09	282.14	61.94	119.23	31.49	1032.98	536.96
2017/18	502.92	98.34	228.67	32.43	1663.99	116.33	123.61	23.48	541.58	605.96
2018/19	630.07	102.88	264.50	44.11	214.96	134.31	120.93	19.80	493.31	690.12
2019/20	627.81	82.74	178.01	48.72	122.79	40.99	93.48	22.00	508.68	340.16
2020/21	1057.28	143.71	230.71	63.08	268.19	51.09	114.20	36.53	632.61	154.22
2021/22	1040.34	153.90	130.79	87.89	269.42	86.17	120.59	79.35	1338.90	242.83
2022/23	162.54	38.91	64.11	53.27	154.77	45.58	35.42	42.19	67.06	122.20
Mean	531.05	83.53	204.54	44.63	320.61	104.08	90.39	31.68	632.31	352.0
S.D.	320.58	43.75	88.46	20.02	480.16	68.24	35.42	18.57	350.01	195.02

Source:Data derived from the annual reports of the selected commercial banks.

Table 4 show the Loan loss coverage ratio of the sample banks. where, Everest Bank Limited (EBL)'s LLCR increased from 186.71 in 2013-14 to 1,040.34 in 2021-22. In contrast, Kumari Bank Limited (KBL) experienced varying LLCRs ranging from 23.84 to 153.90 during the same period, with no discernible trend. Machhapuchchhre Bank Limited (MBL)'s LLCR fluctuated between 92.93 and 130.79, indicating a lack of stability in trend. Nabil Bank Limited (NBL) maintained reasonable stability in its LLCR, which ranged between 18.58 and 87.89. NIC Asia Bank Limited (NIC ASIA) saw a significant increase in LLCR from 41.88 to 269.42, showing an improved trend. NMB Bank Limited (NMB) had its LLCR drop from 182.95 to 86.17, indicating difficulties in maintaining loan loss coverage.Prime Bank Limited (PCBL) reported fluctuating LLCRs ranging from 40.23 to 120.59, with no discernable trend. Rastriya Banijya Bank (RBB) has a falling LLCR from 18.45 to 79.35, showing difficulties in covering loan losses. State Bank of India (SBI)

maintained very consistent LLCRs, ranging from 390.44 to 1,338.90. Standard Chartered Bank (SCB) saw swings in LLCR from 205.74 to 242.83, resulting in a modest overall gain.

4.1.2.3 Loan loss Provision Ratio Analysis

The Loan Loss Provision Ratio, an essential metric for banks and financial institutions, embodies a proactive approach to risk management in the lending sector. It represents the sum allocated by a bank to cushion potential losses stemming from defaulted loans, safeguarding its financial stability amidst uncertain economic landscapes. Computed by dividing total loan loss provisions by outstanding loans, this ratio serves as a barometer of a bank's resilience against credit risk. A lower ratio signifies prudent lending practices and a portfolio dominated by low-risk, high-quality loans, bolstering investor confidence and underpinning sustained profitability. Conversely, a higher ratio may raise concerns about asset quality and future earnings potential. Thus, the Loan Loss Provision Ratio not only gauges current risk exposure but also offers insights into a bank's future performance and capacity to weather adverse credit events. It is computed using the provided formula.

$$\text{loan Loss Provision Ratio} = \frac{\text{Total Loan Loss Provision}}{\text{Total loan and advances}} * 100 \tag{5}$$

Where,

Total loan loss provision = Provision on (Pass loan + Restructure loan + Sub-standard loan + Doubtful loan + Bad loan) Total loan and advances = Total performing loan + Total Non-performing loan Table 4.5 shows the loan loss provision ratio of four commercial banks during the study period in numerical term which is presented below.

Table 5

loan Loss Provision Ratio

Fiscal Year	EBL	KBL	MBL	NBL	NIC	NMB	PCBL	RBB	SBI	SCB
2013/14	1.81	0.96	1.65	0.95	0.98	1.01	0.98	1.18	1.00	1.00
2014/15	1.59	0.99	1.60	1.09	0.88	1.05	0.99	0.98	1.03	1.00
2015/16	1.39	1.04	1.35	1.17	1.11	1.29	1.02	1.08	1.05	1.05
2016/17	1.27	1.13	1.35	1.10	1.02	1.04	1.05	1.19	1.04	1.04
2017/18	1.01	1.03	1.02	1.09	1.00	1.02	1.05	1.12	1.08	1.09
2018/19	1.01	1.04	0.99	1.16	0.99	1.10	1.11	0.95	0.99	1.04
2019/20	1.38	1.15	0.93	1.20	0.93	1.10	1.38	0.90	1.17	1.50
2020/21	1.27	1.38	1.42	1.29	1.33	1.16	1.66	1.18	1.45	1.48
2021/22	1.25	1.71	1.37	1.61	1.43	1.25	1.69	1.66	2.01	1.43
2022/23	1.28	1.93	1.45	1.52	1.37	1.25	1.72	1.59	1.63	1.43
Mean	1.32	1.23	1.31	1.22	1.10	1.12	1.26	1.18	1.24	1.20
S.D.	0.24	0.33	0.25	0.20	0.20	0.11	0.31	0.26	0.34	0.22

Source:Data derived from the annual reports of the selected commercial banks.

Table 5 shows the loan loss provision ratios for each bank reveals various patterns. Everest Bank Limited's ratio declines from 1.81 in 2013-14 to 1.25 in 21-22, suggesting improved asset quality. Kumari Bank Limited, on the other hand, displays an escalation from 0.96 to 1.93 during the same time period, indicating increased risk exposure. Machhapuchchhre Bank Limited remains quite stable, with moves fluctuating between "0.93 to 1.45". Nabil Bank Limited is on an overall upward tendency, rising from 0.95 to 1.52, indicating possible asset quality deterioration. NIC Asia Bank Limited exhibits volatility, but overall increases from 0.88 to 1.43, showing increased risk exposure. NMB Bank Limited shows a minor rising trend from 1.01 to 1.25, but Prime Bank Limited shows a large increase from 0.98

to 1.72, indicating potential asset quality degradation or higher risk exposure. Rastriya Banijya Bank's ratio has steadily climbed from 0.98 to 1.66, indicating that asset quality may be deteriorating or that risk exposure has increased. SBI Bank remains reasonably constant, with swings ranging from 1.00 to 1.08 and 0.99 up to 2018-19 but then after continuously growing trend from 1.17 to 1.63, whereas Standard Chartered Bank exhibits a relatively stable trend, hanging between 1.00 and 1.50, reflecting each bank's individual risk management methods and market conditions.

4.1.3 Management Quality

Management quality refers to the effectiveness and competency of a company's leadership in making strategic decisions, managing operations, allocating resources, and achieving organizational goals. It encompasses factors such as leadership skills, corporate governance practices, transparency, ethical standards, and risk management capabilities. High-quality management is characterized by prudent decision-making, clear communication with stakeholders, efficient use of resources, and a focus on long-term sustainability and value creation. Investors and stakeholders often assess management quality as a key indicator of a company's potential for success and its ability to navigate challenges and capitalize on opportunities.

4.1.3.1 Management Quality Analysis

Any organization's ability to succeed depends on its management. to formulate short- and long-term interest policies that support the accomplishment of the goals and objectives of financial institutions and banks. The effectiveness of the board of directors, management, human resources, and officials, operating expenses, customer relations, management information systems, organizational working methods and cultures, internal control systems, power concentration, monitoring, and decision-making processes are all taken into consideration when evaluating the efficiency of management. The formula below can be used to perform management analysis.

$$\text{Management Efficiency Ratio (MER)} = \frac{\text{Net profit after tax}}{\text{Total no of Staff}} * 100 \tag{6}$$

Below table shows the management efficiency ratio of ten commercial banks during our study period.

Table 6

Management Efficiency Ratio

Fiscal Year	EBL	KBL	MBL	NBL	NIC	NMB	PCBL	RBB	SBI	SCB
2013/14	0.22	0.09	0.07	0.03	0.14	0.13	0.17	0.07	0.15	0.29
2014/15	0.23	0.10	0.10	0.02	0.09	0.14	0.21	0.18	0.18	0.30
2015/16	0.23	0.19	0.14	0.12	0.10	0.15	0.29	0.10	0.20	0.30
2016/17	0.27	0.09	0.18	0.15	0.08	0.16	0.26	0.12	0.20	0.29
2017/18	0.31	0.13	0.13	0.15	0.06	0.17	0.25	0.19	0.23	0.45
2018/19	0.34	0.12	0.14	0.11	0.09	0.20	0.30	0.24	0.22	0.46
2019/20	0.29	0.07	0.09	0.11	0.11	0.10	0.15	0.22	0.15	0.37
2020/21	0.21	0.10	0.11	0.12	0.09	0.16	0.21	0.16	0.10	0.28
2021/22	0.23	0.14	0.11	0.12	0.10	0.17	0.17	0.20	0.18	0.45
2022/23	0.23	0.03	0.10	0.13	0.11	0.16	0.06	0.14	0.21	0.69
Mean	0.25	0.10	0.11	0.10	0.096	0.15	0.20	0.16	0.18	0.38
S.D.	0.04	0.04	0.03	0.05	0.02	0.03	0.07	0.05	0.04	0.13

Source:Data derived from the annual reports of the selected commercial banks.

Table 6 shows the sum of each bank's Management Efficiency Ratio (Net profit per employee) over fiscal years provides insight into their respective performance. Everest Bank Limited (EBL) made a generally steady contribution to the total, ranging from 0.21 to 0.34 throughout time, demonstrating sustained profitability per employee. Kumari Bank Limited (KBL) made a moderate but varying contribution, with its maximum amount of 0.19 in 2015-16 and a fall to 0.03 in 2022-23, indicating a diverse performance. Machhapuchchhre Bank Limited (MBL) made a tiny contribution to the amount, peaking at 0.18 in 2016-17.

Nepal Bank Limited (NBL) made fluctuating but small contributions, with peaks of 0.15 in 2017-18 and 2019-20. NIC ASIA Bank contributed consistently, with the greatest sums of 0.14 in 2013-14 and 2017-18, demonstrating that its profitability per employee remained stable. Nepal Bank Ltd. (NBL) made a variety of donations, with the highest being 0.19 in 2015-16. NMB made a consistent contribution to the sum, maintaining around 0.15. Prime Bank Limited (PCBL) saw fluctuations, with its highest amount of 0.30 in 2018-19. Rastriya Banijya Bank (RBB) shown a growing contribution trend, reaching 0.24 in 2018-19. SBI Bank contributed considerably, with the maximum sum of 0.23 in 2017-18. Finally, Standard Chartered Bank (SCB) continuously dominated the contribution, with a large increase to 0.69 in 2022-23, suggesting extraordinarily high profitability per employee compared to other banks.Overall, the various sums indicate differences in management efficiency and profitability per person across the banking industry, with some institutions constantly outperforming others.

4.1.4 Earnings

Earnings are the extra revenue over an organization's costs. For every organization, the profit is the excess of operating expenses. Any organization's ultimate purpose is to make money. In general, an organization is seen as being in good operating order if its earnings are high. Commercial banks' greater financial standing is reflected in their higher earnings. The following ratios show how the banks are doing financially.

4.1.4.1 Earnings Per Shares

It is the key factor that affects share price the most. This is the amount of earnings per outstanding share of ordinary stock that the corporation allots. The earnings per share is computed using the formula below.

$$\text{Earnings Per Shares (EPS)} = \frac{\text{Net Profit Tax}}{\text{No of Share outstanding}} \tag{7}$$

Below table shows the earnings per shares of the Ten commercial banks for the last Ten years.

Table 7

Earning Per Share(Rs)

Financial Year	EBL	KBL	MBL	NBL	NIC	NMB	PCBL	RBB	SBI	SCB
2013/14	86.04	14.05	14.45	18.08	31.28	17.08	17.63	21.38	30.27	59.51
2014/15	78.04	14.63	17.69	7.48	18.41	18.34	20.12	54.07	27.43	45.91
2015/16	65.97	26.53	19.25	44.59	18.47	20.20	24.48	26.20	26.78	34.47
2016/17	44.32	11.07	16.88	38.77	18.38	19.30	18.27	32.37	19.04	17.74
2017/18	32.16	14.54	15.52	39.98	16.62	24.38	21.49	42.61	25.15	27.34
2018/19	38.05	14.16	21.10	26.47	34.22	23.47	23.60	56.08	27.13	30.33
2019/20	31.35	9.26	14.96	20.68	31.89	12.28	16.10	48.53	27.13	24.81
2020/21	21.92	14.20	17.76	23.43	28.18	16.61	20.32	33.58	17.23	16.32
2021/22	26.19	17.54	16.44	20.29	36.45	17.92	14.94	28.71	10.15	23.92
2022/23	31.43	1.97	15.85	23.39	38.44	17.55	5.30	23.02	16.67	36.75
Mean	45.55	13.78	16.99	26.31	27.23	18.71	18.22	36.65	19.44	31.71
S.D.	22.81	6.20	2.04	11.47	8.46	3.46	5.47	12.81	6.36	13.20

Source:Data derived from the annual reports of the selected commercial banks.

Table 7 show EPS data for Sample years and Sample banks, several trends and patterns emerge.In the fiscal year 2013-2014, EBL (Everest Bank Limited) had the highest EPS at 86.04, followed by SBI Bank Ltd at 30.27 and SCB (Standard Chartered Bank) at 59.51, suggesting strong profitability for these banks. However, NBL (Nepal Bank Limited) had a significantly lower EPS of 18.08.In later years, EPS fluctuates between banks. For example, in 2014-2015, RBB (Rastriya Banijya Bank) saw a substantial growth in EPS to 54.07, whilst NBL saw a notable fall to 7.48.In 2017-2018, NIC ASIA's EPS increased significantly to 39.98, whereas KBL decreased to 11.07. In the most recent fiscal year, 2022-2023, NBL's EPS increased significantly to 23.39, but PCBL (Prime Bank Limited) had a considerable decrease to 5.30. In summary, evaluating EPS data over time provides insights into each bank's financial performance and profitability, revealing both strengths and opportunities for

improvement. Throughout the years, some banks, such as SCB and EBL, have consistently maintained greater EPS, while others have fluctuated. Furthermore, several banks, such as NMB Bank Limited, have demonstrated moderate but consistent EPS performance over the years.In the most recent fiscal year, 2022-2023, NBL's EPS increased significantly to 23.39, but PCBL (Prabhu Bank Limited) had a considerable decrease to 5.30.

In summary, evaluating EPS data over time provides insights into each bank's financial performance and profitability, revealing both strengths and opportunities for improvement.

4.1.4.2 Return on Equity

Return on equity is a measure of how well shareholders' money is being used to generate profit. Increased return on equity is thought to be beneficial for banks. The formula used to calculate it is as follows.

$$\text{Return on Equity (ROE)} = \frac{\text{Net Profit Tax}}{\text{Total Share Holders Fund}} * 100 \tag{8}$$

Below table shows the return on equity of ten commercial banks during last ten fiscal year.

Table 8

Return on Equity (ROE)(in Percentage)

Financial Year	EBL	KBL	MBL	NBL	NIC	NMB	PCBL	RBB	SBI	SCB
2013/14	86.04	14.05	14.45	19.08	31.28	17.08	17.63	21.38	30.27	59.51
2014/15	78.04	14.63	17.69	7.48	18.41	18.34	20.12	54.07	27.43	45.91
2015/16	65.97	26.53	19.25	44.59	18.47	20.20	24.48	26.20	26.78	34.47
2016/17	44.32	11.07	16.88	38.77	18.38	19.30	18.27	32.37	19.04	17.74
2017/18	32.16	14.54	15.52	39.98	16.62	24.38	21.49	42.61	25.15	27.34
2018/19	38.05	14.16	21.10	26.47	34.22	23.47	23.60	56.08	27.13	30.33
2019/20	29.57	9.26	14.96	20.68	31.89	12.28	16.10	48.53	17.23	24.81
2020/21	21.92	14.20	17.76	23.43	28.18	16.61	20.32	33.58	10.15	16.32
2021/22	26.19	17.54	16.44	20.29	36.45	17.92	14.94	28.71	16.67	23.92
2022/23	31.43	1.97	15.85	23.39	38.44	17.55	5.30	23.02	19.44	36.75
Mean	45.36	13.79	16.99	26.31	27.23	18.71	18.22	36.65	21.93	31.71
S.D.	22.94	6.20	2.04	11.47	8.46	3.46	5.47	12.81	6.36	13.20

Source:Data derived from the annual reports of the selected commercial banks.

Table 8 shows the ROE trends of sample banks over the past decade reveals interesting insights. Everest Bank Limited (EBL) began strong in 2013-14 with a ROE of 86.04%, but has gradually declined over the years, reaching 26.19% in 2021-22. This drop indicates probable difficulties in maintaining profitability or successfully utilizing shareholder equity. In contrast, Machhapuchchhre Bank Limited (MBL) has a generally consistent ROE trend with modest changes. This shows that profitability has been consistent or that shareholder equity is being managed effectively. Nepal Bank Limited (NBL) has had a fall in ROE in recent years, indicating probable difficulties in maintaining profitability or reacting to market changes. NIC Asia Bank (NIC ASIA) saw variations in ROE, with a large increase in 2022-23. This indicates efforts to increase profitability or make better use of shareholder equity. NMB Bank's (NMB) ROE trend remained reasonably stable, indicating consistent

profitability or excellent shareholder equity management. Prime Bank Limited (PCBL) showed a decreasing ROE trend, indicating probable difficulties in maintaining profitability or effectively utilizing shareholder equity. Rastriya Banijya Bank (RBB) reported variable ROE values, including a large decline in 2022-23. This means that the bank may face profitability concerns or operational issues that have an impact on its performance. SBI Bank's ROE trend was falling, indicating that profitability or market forces could be impacting its performance. Standard Chartered Bank (SCB) showed a changing ROE pattern, with a significant increase in 2022-23. This implies efforts to increase profitability or effectively use shareholder equity.

Overall, evaluating ROE trends of these banks emphasizes the need of consistent profitability performance and effective management of shareholder equity for long-term growth and success.

4.1.4.3 Return on Assets

An indicator of a company's profitability in relation to its total assets is called return on assets (ROA). Managers and analysts can determine how well a company's management uses its assets to create earnings by looking at its return on assets. Increased return on assets (ROA) is a sign of improved asset usage and management abilities. The formula used to calculate it is as follows.

$$\text{Return on Assets (ROA)} = \frac{\text{Net Profit Tax}}{\text{Total Assets}} * 100 \tag{9}$$

Below table shows the return on assets of the sample banks for sample time frame.

Table 9

Return on Assets (ROA)(in Percentage)

Fiscal Year	EBL	KBL	MBL	NBL	NIC	NMB	PCBL	RBB	SBI	SCB
2013/14	2.20	1.10	0.99	0.92	1.61	1.36	1.46	1.50	1.51	2.51
2014/15	1.59	1.06	1.26	0.55	1.12	1.21	1.63	3.33	1.80	1.99
2015/16	1.52	1.68	1.51	2.79	1.33	1.47	2.05	1.41	1.70	1.98
2016/17	1.72	1.08	1.89	2.78	1.49	1.65	1.89	1.60	1.53	1.84
2017/18	1.78	1.26	1.47	2.35	0.78	1.66	1.82	1.85	1.97	2.64
2018/19	1.80	1.17	1.62	1.51	1.39	1.67	2.15	2.23	1.94	2.61
2019/20	1.36	0.76	1.02	1.63	1.24	0.95	1.48	1.64	1.17	1.71
2020/21	0.92	1.04	1.02	1.81	0.94	1.17	1.72	1.10	0.70	1.22
2021/22	1.10	1.22	0.94	1.12	1.18	1.29	1.33	1.31	1.07	1.83
2022/23	1.34	0.14	0.87	1.16	1.22	1.12	0.47	0.91	1.06	2.29
Mean	1.53	1.05	1.26	1.66	1.23	1.36	1.60	1.69	1.44	2.06
S.D.	0.37	0.39	0.35	0.77	0.25	0.25	0.48	0.68	0.43	0.45

Source:Data derived from the annual reports of the selected commercial banks.

Table 9 show the Return on assets from the year 2013/14 to 2022/23 of sample banks.Return on Assets (ROA) is a metric that assesses how efficiently a bank generates income from its assets. Everest Bank Limited (EBL) continuously maintained a moderate to strong ROA, ranging from 2.20 in 2013/14 to 1.10 in 2022/23, showing effective asset utilization. Kumari Bank Limited (KBL) has consistently maintained ROA above 1.0, with fluctuations ranging from 1.10 in 2013/14 to 0.14 in 2022/23, indicating different levels of profitability and asset management efficiency. MBL's ROA values fluctuated, with a significant reduction in 2022/23 (0.87), indicating probable profitability and asset management issues. Nepal Bank Limited (NBL) showed a generally increasing tendency until 2019/20 (2.79), followed

by a modest fall to 1.16 in 2022/23, indicating the need for stronger asset management techniques.NIC ASIA Bank had a stable ROA of roughly 1.0, with moves from 1.61 in 2013/14 to 1.22 in 2021/22, suggesting consistent asset use and profitability.

NMB Bank's ROA values fluctuated, with a significant decline in 2019/20 (0.95), indicating issues in asset management and profitability. Prime Bank Limited (PCBL) reported variable ROA values, with a notable decline in 2022/23 (0.47), indicating potential operational issues harming profitability. Rastriya Banijya Bank (RBB) had changing ROA values, with a large dip in 2022/23 (0.91), indicating issues with asset management and profitability. SBI Bnak has changing ROA values, with a notable dip in 2020/21 (0.70), which could indicate issues with asset management and profitability. Standard Chartered Bank (SCB) maintained a stable ROA of around 1.0, with swings ranging from 1.83 in 2021/22 to 1.98 in 2015/16, showing consistent asset usage and profitability.

Overall, some banks' ROA values remained stable or increased, while others witnessed volatility or large declines, indicating differing levels of asset use and profitability. Continued monitoring and strategic modifications may be required for banks having issues in improving their ROA and overall financial performance.

4.1.5 Liquidity Analysis

The speed at which a company can obtain cash on hand is known as liquidity. It can just say that money will be returned whenever the group needs it. When it comes to banks, it shows their short-term financial stability. Certain deposits for loans and advances are not supplied by commercial banks in full. A specific portion of deposits ought to be held in cash at banks. A bank that hoards too much cash may lose out on opportunities to invest; conversely, one that holds too little cash will find it difficult to make deposits to depositors when needed. These metrics can be used to quantify liquidity.

4.1.5.1 Cash and Bank Balance Ratio Analysis

It displays the commercial banks' cash and balance. The higher cash to bank balance ratio denotes greater liquidity and the capacity to satisfy depositors' unforeseen demands. Conversely, a lower ratio suggests that there is a lack of liquidity to meet its obligations. You may compute it using the formula below.

$$\text{Cash and Bank Balance Ratio} = \frac{\text{Cash and Bank Balance}}{\text{Total Deposit}} * 100 \quad (10)$$

Below table shows the Cash and bank balance ratio of Ten commercial banks over last Ten fiscal year.

Table 10

Cash and Bank Balance Ratio

Fiscal Year	EBL	KBL	MBL	NBL	NIC	NMB	PCBL	RBB	SBI	SCB
2013/14	6.00	3.87	9.10	5.39	4.44	7.23	5.08	3.32	5.07	5.02
2014/15	9.62	4.91	8.53	5.54	3.57	18.38	5.72	3.59	7.31	3.95
2015/16	10.41	3.71	8.01	5.25	8.03	6.37	5.52	3.91	6.08	4.41
2016/17	7.16	6.00	7.19	4.56	4.03	4.72	6.21	3.72	7.25	2.91
2017/18	7.81	5.43	3.11	4.65	5.08	3.82	5.75	3.87	6.28	3.00
2018/19	5.35	5.51	4.52	3.64	7.90	3.41	5.45	3.15	5.11	2.43
2019/20	3.91	4.56	5.37	3.49	4.07	4.04	6.93	3.07	6.00	2.48
2020/21	3.84	3.99	4.39	4.57	4.34	3.46	3.09	2.80	4.57	3.08
2021/22	4.10	4.35	4.46	3.26	3.35	4.20	6.69	2.51	2.55	2.27
2022/23	4.14	3.61	3.53	2.48	3.18	3.72	3.95	2.38	2.40	1.91
Mean	6.23	4.59	5.82	4.28	4.80	5.94	5.44	3.23	5.26	3.15
S.D.	2.43	0.84	2.19	1.02	1.76	4.56	1.18	0.55	1.72	1.01

Source:Data derived from the annual reports of the selected commercial banks.

Table 10 shows that Cash and bank balance ratio of sample banks in sample time frame.Where, EBL started the period with a ratio of 6.00 in 2013/14, indicating a strong liquidity position. However, the ratio fluctuated throughout time, hitting a low of 3.84 in 2020/21 before recovering a little to 4.10 in 2021/22 and 4.14 in 2022/2023. KBL's ratio starting lower than EBL in 2013/14 at 3.87, but has steadily increased over the years, peaking at 6.00 in 2016/2017. Despite a little dip following, it remained very constant, reaching 3.61 in 2022/23. MBL followed a similar path to KBL, with a lower starting point of 9.10 in 2013/14 but a steady increasing trend until 2016/17, peaking at 9.10. However, it saw a significant dip after that, decreasing to 3.53 in 2022/2023.NBL maintained a reasonable ratio during the period, hovering around 5.00, showing a balanced approach to liquidity management, with the ratio fluctuating between 3.11 and 5.54 over time. NIC Asia Bank's ratio fluctuated throughout time, with peaks and troughs indicating different techniques for managing cash and bank balances, with values varying from 3.18 to 8.03.NMB Bank experienced an important rise in 2014/15, reaching 18.38, followed by a slow fall over time. However, the ratio remained rather steady, fluctuating from 3.09 to 6.93.PCBL showed a variable trend, with clear peaks and troughs showing adjustments in liquidity management methods over time, with the ratio ranging between 3.09 and 6.69.RBB's ratio remained reasonable throughout the time, indicating a consistent approach to liquidity management, ranging from 2.38 to 3.87.SBI began with a very high ratio of 5.07 in 2013/14, but the ratio has gradually decreased over time, showing changes in liquidity management techniques, with the ratio that extend from 2.51 to 4.57.SCB typically maintained lower ratios than other banks, indicating a more conservative approach to liquidity management, with ratios ranging from 1.91 to 4.41.These ratios provide information on each bank's liquidity status and ability to satisfy short-term obligations.

4.1.5.2 Investment in Government Securities Ratio Analysis

Securities issued by governments are safe investments. When cash is needed to satisfy a short-term obligation, such an investment can be simply converted into cash. A specific portion of deposits made by commercial banks are invested in government security. The formula used to calculate it is as follows.

$$\text{Investment in Government Securities ratio(IGSR)} = \frac{\text{investment in Government Securities}}{\text{Total Deposit}} * 100 \quad (11)$$

Table 11

Investment in Government Securities ratio(IGSR)

Fiscal Year	EBL	KBL	MBL	NBL	NIC	NMB	PCBL	RBB	SBI	SCB
2013/14	4.10	9.64	0.11	0.23	12.50	7.84	6.90	28.43	0.35	5.04
2014/15	10.33	11.69	2.42	0.20	11.52	12.17	11.98	27.50	0.28	10.07
2015/16	11.05	9.97	5.68	0.21	15.18	6.79	8.01	28.84	8.97	13.07
2016/17	8.98	10.11	6.26	0.24	9.81	9.17	5.84	24.31	9.36	7.10
2017/18	12.44	14.43	10.71	12.75	8.55	9.49	9.89	26.16	10.37	6.59
2018/19	15.81	12.22	11.86	11.18	8.68	9.17	11.52	19.58	9.47	14.88
2019/20	19.33	10.39	10.76	21.20	12.59	9.49	9.86	31.24	11.02	13.36
2020/21	19.64	14.60	14.08	18.49	9.77	9.29	13.58	24.18	19.84	13.56
2021/22	22.73	12.08	15.71	19.74	12.29	16.26	16.31	23.05	19.48	6.92
2022/23	19.55	4.60	16.60	21.81	9.94	14.46	14.72	22.68	22.27	19.35
Mean	14.40	10.97	9.42	10.61	11.08	10.41	10.86	25.60	11.14	10.99
S.D.	5.93	2.85	5.60	9.54	2.10	2.97	3.41	3.48	7.56	4.58

Source:Data derived from the annual reports of the selected commercial banks.

Table 11 shows the investment in government securities ratio. where,Over the years, EBL has steadily increased its investment in government securities ratio. Starting at 4.10% in 2013/14, it rose to 22.73% by 2021/22, suggesting a steady increasing trend with minor fluctuations. This shows that EBL has been gradually allocating more of its resources to government securities, possibly as a strategic move to balance its investment portfolio or to capitalize on the stability provided by government assets.KBL started with a comparatively

high investment in government securities ratio of 9.64% in 2013/14, increasing progressively to 12.08% by 2021/22. However, there was a noticeable drop in 2022/23, to 4.60%. This fluctuation suggests that, while KBL has historically been inclined to invest in government securities, certain variables may have influenced their investment selections during the observed fiscal year.MBL's investment in government securities ratio has fluctuated over time, with peaks and troughs. It began at 0.11% in 2013/14 and reached to 16.60% in 2022/23, suggesting significant growth. However, this increase could be due to a variety of factors, such as changes in market conditions or the bank's strategic investment decisions.From 2013/14 to 2022/23, NBL's investment in government securities ratio remained relatively steady, ranging between 0.20% and 0.24%. This shows a more conservative approach to investing in government securities than other banks in the dataset.NIC Asia Bank started with a high investment in government securities ratio of 12.50% in 2013/14, which fluctuated over time but stayed generally greater than 9%. In 2022/23, it stood at 9.94 percent. This suggests that NIC Asia Bank has held a sizable amount of its portfolio in government securities, probably for stability or liquidity concerns. NMB Bank's investment in government securities ratio has fluctuated over the years, beginning at 7.84% in 2013/14 and peaking at 16.26% in 2021/22, before falling slightly to 14.46% in 2022/23. This points to a rather variable investment strategy, with periods of greater allocation to government securities followed by corrections.PCBL's investment in government securities ratio has remained reasonably consistent, ranging from 5.84% to 16.31% between 2013/14 and 2022/23. However, fluctuations within this range show that the bank's investment portfolio may be adjusted in reaction to market conditions or strategic concerns.RBB's investment in government securities ratio has been lowering throughout the years, peaking at 28.43% in 2013/14 and falling to 22.68% in 2022/23. This reduction could suggest a shift in RBB's investing strategy toward diversification or an evaluation of the risk-reward dynamics associated with government assets.SBI's investment in government securities ratio has remained reasonably high and constant over time, ranging from 0.28% to 31.24% between 2013/14 and 2022/23. This suggests that SBI has a constant preference for government securities in its investment portfolio, which could be influenced by risk management or regulatory obligations. SCB's investment in government securities has fluctuated over time, ranging from 5.04% to 19.35% between 2013/14 and 2022/23. While there have been periods of

very large allocation to government securities, there have also been variations, indicating that the bank's investment strategy may have been adjusted in reaction to market conditions or internal considerations.

In summary, each bank has a unique pattern in its investment in government securities ratio, indicating various strategies, risk tolerance, and market conditions.

4.2 Discussion

The study's main conclusions on the Financial Performance analysis of Neplease commercial banks by using CAMEL framework are based on data given by the banks. The CAMEL analysis of several banks, including Everest Bank, Kumari Bank, Machhapuchhre Bank, Nepal Bank, Nic Asia Bank, NMB Bank, Prime Commercial Bank, Rastriya Bannijya Bank, SBI Bank, and Standard Chartered Bank, provides insightful findings about their financial health and performance over time. Notably, most joint ventures and private sector banks have met the required Capital Adequacy Ratio (CAR) set by the Nepal Rastra Bank (NRB), maintaining adequate levels throughout the review period. However, government-owned banks like Nepal Bank Ltd. and Rastriya Banijya Bank Ltd. struggled to meet these requirements initially but improved over time. Additionally, there's a positive trend in decreasing Non-Performing Loan (NPL) ratios until the FY 2021/22, indicating efficient loan management. However, concerns arise as the current NPL ratios are on an upward trajectory, suggesting challenges in lending and loan recovery.

Furthermore, while there's a positive trend in decreasing loan loss provision ratios until a certain period, recent years have seen an increase across all banks, indicating potential deterioration in loan quality. Notably, Everest Bank Ltd. and Standard Chartered Bank Ltd. maintained higher loan loss coverage ratios over the years, showcasing efficient loan recovery compared to others. Additionally, Standard Chartered Bank Ltd. exhibited improving Management Efficiency Ratios (MER), indicating effective HR management, while other banks showed fluctuating or decreasing trends.

Moreover, fluctuating Earnings per Share (EPS) among banks suggest varied financial conditions, with some banks showing upward trends indicating favorable conditions, while

others demonstrate downward trends. Return on Equity (ROE) and Return on Assets (ROA) highlight varying profitability and performance among banks, with SCB consistently showing strong performance. Lastly, the analysis reveals decreasing trends in Cash and Bank Balance Ratios, indicating challenges in managing short-term liquidity, and fluctuating Investment in Government Security Ratios across banks, reflecting differing investment strategies. Overall, while some banks exhibit robust performance metrics, others face challenges that require attention to ensure sustained financial stability and growth.

The findings of our study, conducted using the CAMEL model to analyze the financial performance of Nepalease commercial banks over a ten year period, offer valuable insights into various aspects of bank stability and profitability. In this discussion, we evaluate and interpret the results, exploring the consistency or inconsistency with theoretical predictions and comparing them with findings from other researchers. We also search into potential reasons for similarities or contradictions, considering methodological limitations and contextual factors.

Capital Adequacy and Asset Quality:

Our analysis reveals a consistent trend with theoretical expectations regarding the importance of strong capital adequacy and asset quality for bank stability. Private banks and joint ventures demonstrated strong capital positions, aligning with theoretical emphasis on adequate capital reserves to withstand financial shocks. However, the increasing trend of non-performing loans (NPLs) across all banks contradicts expectations of effective asset quality management. This inconsistency may stem from varying risk management practices or external economic factors impacting loan portfolios. Comparisons with Aftab, Samad, & Husain (2015) highlight nuanced effects of ownership structure on performance, emphasizing the need to consider specific contextual factors shaping bank operations.

Management Efficiency and Earnings Capacity:

The declining trend in Management Efficiency Ratios (MER) aligns with theoretical discussions on the importance of efficient management for bank profitability. However, the declining returns on assets and equity raise concerns about profitability and shareholder returns, contrary to theoretical expectations of maintaining or improving earnings capacity

over time. Potential reasons for this inconsistency may include economic fluctuations or internal issues such as ineffective business strategies. Comparisons with Chand (2011) emphasize successful management practices in credit management and interest spread, but discrepancies in liquidity management highlight the complexity of this aspect and its implications for bank stability.

Liquidity State and Comparative Performance Analysis:

Challenges in liquidity management observed in our study are consistent with theoretical discussions emphasizing the importance of maintaining optimal liquidity positions for short-term obligations. However, fluctuating trends in liquidity ratios among sample banks contradict expectations of stable liquidity positions. Potential reasons for this inconsistency may include variations in liquidity strategies or external factors impacting liquidity levels. Comparative analysis with Jha & Hui (2012) provides insights into variations in financial ratios among different bank categories, highlighting disparities in performance metrics such as return on assets (ROA) and return on equity (ROE). Differences in banking systems, regulatory frameworks, or market conditions may contribute to inconsistencies between our findings and those of other researchers.

Interpretation and Limitations:

While interpreting the results, it's essential to acknowledge potential biases, imprecision of measures, and methodological limitations. Sample size, data quality, and contextual factors may influence the applicability of findings. The complexity of banking operations and external economic factors necessitate caution in drawing definitive conclusions. Future research could address these limitations by employing larger sample sizes, refining methodologies, and considering broader contextual factors to enhance the robustness and reliability of findings.

In sum, our study offers valuable insights into the financial performance of Nepali commercial banks, highlighting the importance of capital adequacy, asset quality, management efficiency, earnings capacity, and liquidity management for bank stability and profitability. While the findings align with theoretical expectations in some aspects, inconsistencies underscore the complexity of banking operations and the need for nuanced analysis. By

considering methodological limitations and contextual factors, future research can further advance our understanding of the dynamics shaping bank performance in diverse contexts.

CHAPTER V

SUMMARY AND CONCLUSION

This chapter includes three aspects of study – summary, conclusion and implication. The first aspects summarize the whole study, second aspects draw the conclusion and last for implication.

5.1 Summary

This study was conducted with objectives to analyze the financial conditions of Everest Bank, Kumari Bank, Machhapuchhre Bank, Nepal Bank, NIC ASIA Bank, NMB Bank, Prime Bank, Rastriya Banijya Bank, SBI Bank and Standard Chartered Bank in framework of CAMEL model over the periods of 2013/14 to 2022/23. The study was based on secondary data. Ten commercial banks were taken from twenty commercial banks for the study purposes. The bank was chosen on the basis of researcher's convenience. CAMEL model is the common methods to analyze the financial conditions of financial institution. It was designed by the regularity authorities andthis study analyze the financial condition of Everest Bank, Kumari Bank, Machhapuchhre Bank, Nepal Bank, NIC ASIA Bank, NMB Bank, Prime Bank, Rastriya Banijya Bank, SBI Bank and Standard Chartered Bank as regards to CAMEL i.e. Capital adequacy, Assets quality, Management Earnings and liquidity. Financial statements of respective banks were studied thoroughly to find out better sight for banks performances and financial position. Various financial and statistical tools were used in the research to get the meaningful result and to meet the research objectives.

The analysis has been made to compare the banks ratios as NRB and international standard. All the banks are successful to maintained Capital adequacy as NRB standard i.e. 10%. As per the data capital adequacy of Standard Chartered Bank has highest CAR. It means that Standard Chartered Bank has good financial conditions and security of depositors as compared to others banks of study. However, Nepal Bank Ltd. and Rastriya Banijya Bank Ltd. ware not adequately capitalized as per NRB during FY 2013/14(4.79%) to 2014/15(8%)

and FY 2013/14(4.62%) respectively. Then after they maintain minimum CAR. It means NBL & RBB has not good financial condition in FY 2013/14 and FY 2014/15. Similarly, all ten commercial banks have maintained higher CRR then prescribed by NRB i.e. 6% In recent fiscal years. It indicates that the banks are financially sound and security of creditors and depositors.

Recently the non-performing loan ratio of all banks is in increasing trends compare to FY 2021/22, which indicate the ineffective performance of the banks in mobilizing loans and advances. It indicates the average performances of performing loans whereas the loan loss coverage ratio of the banks is in decreasing trends. In the same way loan loss provision ratio is increasing every year.

The management efficiency ratio (MER) indicates the average operation of banks and average profitability. Majority of banks' MER in downward trending in recent years. It shows banks have to utilize their resources optimally and effectively. EPS of majority banks is in decreasing trends. Return on assets and Return on equity is of fluctuating in nature, but in downward trend, it is not good enough for stakeholders. Cash and bank balance ratio are also in downward trended. Investment on government security ratio has fluctuated in nature but in upward trend. It shows that all the banks are in average liquidity position to meet their short-term obligations.

5.2 Conclusion

The study conducted a comprehensive analysis of the financial conditions of ten commercial banks over a span of ten years, employing the CAMEL model. Here are the key conclusions drawn from the findings:

1. Capital Adequacy ratio (CAR) of joint ventures and private banks is higher than prescribed by NRB, which reveals that the banks are running with adequate capital and the capital fund is sound and sufficient to meet the banking operations. But Government own banks has struggling at the beginning and after they able to maintain minimum requirements, which reveals that the banks have improved their performance and running with adequate capital fund is sound and sufficient to meet the banking

operations in recent years.

2. Joint Ventures and Private Banks are financially sound and strong as Core Capital Ratio (CRR) of these banks is above than NRB standard in all years. But Government Own banks are struggling to meet required standard at the beginning. But they improved wisely and meet & maintained required standard in recent years. In recent years all the banks have enough amount of internal source or core capital.

3. Recently the increasing trends of non-performing loans show that the banks are not aware about the non-performing loans and not adopting appropriate policy and standards in mobilization of loans and advances.

4. The decreasing trends of loan loss coverage ratio show that the banks are not adopting the proper policy to recover the loans in recent years compare to beginning.

5. The increasing trend of loan loss provision ratio indicates that the quality of loan is decreasing wisely year by year. It shows the amount of non-performing loan will increase in future.

6. The Management Efficiency Ratio (MER) serves as a crucial indicator of a bank's ability to effectively utilize its human resources, reflecting its management efficiency and productivity. Recent research highlights a concerning trend: with the exception of SCB, all banks are experiencing a downward trend in their MER. This downward trend suggests potential challenges such as overstaffing, the presence of unskilled personnel, or a lack of staff motivation within these banks. Consequently, this situation has adverse implications for both the profitability and overall soundness of these sample Banks.

7. The return on investors is fluctuating in downward trending with the comparing to beginning years as the earnings per share (EPS) of banks is in decreasing trends in recent years.

8. The decreasing trends of return of equity (ROE) show that the return of banks share-holders is decreasing year by year.

9. The fluctuating and declining trends observed in the Return on Assets (ROA) signal a

concerning pattern: the net income generated per unit of a bank's assets is diminishing annually compared to the beginning of the year. This indicates a challenge in the management's ability to effectively convert the bank's assets into revenue generating assets, a scenario that doesn't align with the interests of stakeholders.

10. The decreasing trend of cash and bank balance ratio and highly fluctuating trend of investment on government security ratio shows that the banks are in average liquidity position and hardly able to meet their obligations.

In conclusion, the study underscores the importance of continuous monitoring and strategic measures to address the identified weaknesses and ensure the overall financial soundness and stability of the banking sector.

5.3 Implications

The following implication is made on the basis of conclusion drawn above to overcome the weakness as regards to financial position of Everest Bank Ltd.,Machhapuchhre Bank Ltd., Nepal Bank Ltd., NIC ASIA Bank Ltd., NMB Bank Ltd., Prime Commercial Bank Ltd., Rastriya Banijya Bank Ltd., SBI Bank Ltd., and Standard Chartered Bank Ltd.

1. The Capital Adequacy Ratio (CAR) and Core Capital Ratio (CCR) of Joint Ventures and Private Banks consistently surpass NRB standards but display fluctuating trends. Thus, it becomes essential to ensure stability and support core capital to elevate the capital adequacy ratio. Conversely, Government-owned banks initially lag behind during the research period, failing to meet NRB standards. However, through wise measures, they progressively enhance their CAR and CRR, eventually meeting the required benchmarks. Hence, there's a crucial need to focus on maintaining stability and increase core capital, particularly for government owns banks.

2. The assets quality ratio of all banks is not in satisfactory level. It is improving in trend from beginning to FY 2021/22 but eventually in current year all banks are facing problem in managing their assets quality and all indicators of assets quality are trended negatively. So, the implication is to improve non-performing loan ratio and maintain as lower as possible and try to give additional attention in recovering

the doubtful and loss loan in future and try to increase its performing loan ratio.

3. The management efficiency ratio of Everest Bank Ltd., Nepal Bank Ltd., NIC ASIA Bank Ltd., SBI Bank Ltd. and Standard chartered Bank Ltd. Seems to be satisfactory as compare to Kumari Bank Ltd, Machhapuchhre Bank Ltd, NMB Bank Ltd, Prime Commercial Bank Ltd, and Rastriya Banijya Bank Ltd, on the basis of their trend and comparing to their own previous year's performance. But in sum all banks have downward trended MER except Standard Chartered Bank. So, the implication is that the all banks should review their staff position, there might be over staffing, the presence of unskilled personnel, or a lack of staff motivation within these banks. SCB should maintain their MER with consistency in coming Years.

4. The earning quality ratios of banks, such as EPS, ROE, and ROA, show a declining trend compared to the previous year. Consequently, there arises a collective important for banks to enhance profitability while concurrently minimizing operating costs. This can be achieved through optimizing the operating efficiency of employees, thereby support overall financial performance.

5. The liquid assets held by commercial banks play a vital role in fulfilling their day-to-day and short-term obligations. Proper maintenance of the liquid asset ratio is crucial to avoid the risk of banks facing liquidation. However, there has been a concerning downward trend in the cash and bank balance ratios of all banks compared to FY 2013/14, indicating challenges in maintaining liquidity. Moreover, the investment patterns in government securities among banks have shown fluctuating tendencies. This volatility underscores the importance of support cash and bank balance ratios. Increasing investments in government securities across all banks can serve as a strategic measure to enhance their ability to meet short-term financial obligations effectively.

References

Abusharbeh, M., et al. (2020). Determinants of islamic bank financing in the middle east: Vector error correction model (vecm). https://doi.org/https://repository.aaup.edu/handle/123456789/1320

Acharya, V. V., Gujral, I., Kulkarni, N., & Shin, H. S. (2011). *Dividends and bank capital in the financial crisis of 2007-2009* (tech. rep.). National Bureau of Economic Research.

Aftab, N., Samad, N., & Husain, T. (2015). Historical analysis of bank profitability using camel parameters: Role of ownership and political regimes in pakistan. *International Journal of Economics and Finance*, *7*(2), 144–155.

Ahsan, M. K., et al. (2016). Measuring financial performance based on camel: A study on selected islamic banks in bangladesh. *Asian Business Review*, *6*(1), 47–56.

Akter, R., Hossain, M. R., Rahman, M. M., Rahman, B. S., & Ahmed, K. (2017). The effect of commercial probiotics on health and production of shrimp (penaeus monodon). *Asian Journal of Medical and Biological Research*, *3*(1), 88–93.

Alrafadi, K. M. (2023). Evaluating performance of libyan banks using camel model. *European Journal of Business and Management Research*, *8*(4), 7–12. https://doi.org/10.24018/ejbmr.2023.8.4.1949

Altman, E. I. (1968). Financial ratios, discriminant analysis and the prediction of corporate bankruptcy. *The journal of finance*, *23*(4), 589–609.

Altman, E. I. (1998). Market dynamics and investment performance of distressed and defaulted debt securities. *New York University, Center for Law and Business, Working Paper*, (98-022).

Chand, R. (2011). *Stock market, bank and economic growth: A case of nepal* [Doctoral dissertation, Faculty of Management].

Desta, T. S. (2016). Financial performance of "the best african banks": A comparative analysis through camel rating. *Journal of accounting and management*, *6*(1), 1–20. https://doi.org/https://hrcak.srce.hr/162948

Edgeworth, F. Y. (1881). *Mathematical psychics: An essay on the application of mathematics to the moral sciences*. CK Paul.

Gunawan, B., & Arvianda, K. M. (2019). Bank health level analysis using camels and rgec methods on pt bank panin dubai syariah ltd. *5th International Conference on Accounting and Finance (ICAF 2019)*, 20–26. https://doi.org/10.2991/icaf-19.2019.4

Gupta, S. (2014). An empirical study of financial performance of icici bank-a comparative analysis. *Journal of Business Studies (JBS)*, *1*(1).

Hymavathi, C. (2021). Relative performance analysis on selected public and private sector banks: A camel model approach. *The journal of contemporary issues in business and government*, *27*(1), 3535–3545. https://doi.org/1323-6903/article/view/809/775

Jha, S., & Hui, X. (2012). A comparison of financial performance of commercial banks: A case study of nepal. *African Journal of Business Management*, *6*(25), 7601.

Kandel, K., Mishra, D. R., Aithal, P., et al. (2021). Profitability in commercial bank–a case from nepal. *International Journal of Case Studies in Business, IT, and Education (IJCSBE)*, *5*(1), 61–77.

Karma, I. G. M., Sulastra, I. M. D. J., & Dewi, N. W. K. (2020). A health level and risk rating monitoring system of village credit institutions. https://doi.org/10.21744/irjmis.v9n6.2167

Kavitha, A. (2017). Comparative analysis of selected indian housing finance companies based on camel approach. *Scholarly Research Journal for Interdisciplinary Studies*, *4*, 37.

Khatri, M. B. (2019). Macroeconomic influence on the nepalese stock market. *NRB Economic Review*, *31*(1), 47–64.

Mahida, A., & Bhatt, S. (2020). A study on financial performance of selected private sector banks in india by using of camel approach.

Majumder, M. T. H., & Rahman, M. M. (2017). A camel model analysis of selected banks in bangladesh. *Available at SSRN 3068004*.

Mayakkannan, C., & Jayasankar, C. (2020). A study on performance evaluation of selected public and private sector banks through camel model in india. *Purakala Journal*, *31*(25), 202–206.

Natarajan, P., & Shiva, K. (2011). Implications of merger: A perceptional study. *Journal of Banking Financial Services and Insurance Research*, *1*(4), 63–76.

Natarajan, P., & Siva, S. (2011). Entrepreneurial styles among the entrepreneurs of msme's (a study with reference to puducherry region). *Asia Pacific Journal of Research in Business Management*, *2*(8), 57–68.

Nowfal, M. S., & Muhammed, B. (2019). Comparison of operational efficiency of listed banks from kerala-a study based on camel model. *Journal of Internet Banking and Commerce*, *24*(1), 1–15.

Octafilia, Y., & Wijaya, A. (2020). Harga, kualitas pelayanan, promosi dan lokasi terhadap keputusan pelanggan karoke keluarga di kota pekanbaru. *INVEST: Jurnal Inovasi Bisnis dan Akuntansi*, *1*(1), 1–12.

Oke, B. O., & Onwere, H. I. (2023). Evaluating the impact of camel variables on the share price of banks in sub-sahara africa. https://doi.org/www.um.edu.mt/library/oar/handle/123456789/109247

Palamalai, S., & Saminathan, Y. (2016). A camel model analysis of public, private and foreign sector banks in india. *Pacific Business Review International*, *8*(9), 45–57. https://doi.org/ssrn.com/abstract=2770470

Rai, S. (2018). An analysis of banking efficiency in india: With reference to commercial banks.

Sah, G. K., & Pokharel, S. P. (2023). Analysis of financial performance of nepalese commercial banks using camel approach. *Cognition*, *5*(1), 37–49.

Sangmi, M.-D., & Nazir, T. (2010). Analyzing financial performance of commercial banks in india: Application of camel model. *Pakistan Journal of Commerce and Social Sciences (PJCSS)*, *4*(1), 40–55.

Sathyamoorthi, C. R., Mapharing, M., Ndzinge, S., Tobedza, G., & Wally-Dima, L. (2017). Performance evaluation of listed commercial banks in botswana: The camel model. *Archives of Business Research*, *5*(10). https://doi.org/10.14738/abr.510.3783.

Shah, B., & Tiwari, U. K. (2023). Camel analysis of commercial banks in nepal: Assessment of financial soundness. *Journal of Computers, Mechanical and Management*, *2*(4).

Shah, J. J., Babel, S. N., Kulkarni, G., Poddar, R. S., & Singh, S. H. 2. (2015). Endodontic management of a mandibular first molar with six root canal systems: A case report. *Journal of Aesthetics, Conservative Dentistry and Endodontics*, 79. https://doi.org/10.4103/0972-0707.164060

Shukla, S. S. (2015). Analysing financial strength of public and private sector banks: A camel approach. *Pacific Business Review International*, *7*(8), 44–50.

Sridevi, M. M., Sathyakala, S., & Lal, M. S. R. (2023). A performance of capital adequacy ratio indicator in private sector banks-an empirical study.

Swathi & Rajani. (2023). Bank runs, deposit insurance, and liquidity. *Journal of political economy*, *91*(3), 401–419. https://doi.org/10.1086/261155

Venkatesh, T., Suresh, P. S., & Tsutsumi, R. (2014). New insights into the genetic basis of infertility. *The application of clinical genetics*, 235–243.

APPENDIX A

Collection of Data

Data are collected from the Annual reports of the bank which are provided online on the internet. These are the websites to obtain annual reports:

1. www.nrb.gov.np
2. www.rbb.com.np
3. www.kumaribank.com
4. www.nicasiabank.com
5. www.standardcharterdbank.com
6. www.sbibank.com
7. www.nmbbank.com
8. www.everestbank.com
9. www.nepalbank.com.np
10. www.primebabnk.com
11. www.everestbank.com
12. www.sharesansar.com

APPENDIX B

Share Capital of sample banks as of FY 2022-23

Capital	EBL	KBL	MBL	NBL	NIC	NMB	PCBL	RBB	SBI	SCB
Authorized Capital	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000
Issued Capital	1,069.81	2,622.59	1,025.72	1,469.40	1,156.40	1,836.67	1,940.26	1,564.00	1,012.06	942.95
Paid up Capital	1,069.81	2,622.59	1,025.72	1,469.40	1,156.40	1,836.67	1,940.26	1,564.00	1,012.06	942.95

Source: Data derived from the annual reports of the selected commercial banks.

APPENDIX C

Data of Sample Banks

Everest Bank Ltd.

Heading/Fiscal Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
Total Capital Fund	642.23	845.70	1,009.48	1,306.37	1,561.67	1,695.56	1,778.04	1,908.93	2,197.07	2,643.77
Core Capital fund	530.78	662.44	824.07	1,130.93	1,391.23	1,527.60	1,584.36	1,719.45	1,992.41	2,220.83
Total Risk Weighted Assets	5,678.02	6,345.11	7,971.18	8,892.96	11,000.55	12,339.11	13,288.22	15,295.53	18,480.30	19,863.94
Non-Performing Loan	47.04	36.72	26.44	19.89	18.80	17.89	26.20	16.22	18.61	132.40
Total Loan and Advances	4,845.03	5,536.35	6,891.15	7,828.47	9,399.16	11,182.18	11,906.92	13,517.32	15,505.38	16,759.21
Loan Loss Provision	87.83	88.11	95.64	99.69	94.54	112.73	164.46	171.50	193.57	215.21
Net Profit after Tax	154.97	157.43	173.02	200.62	258.17	305.41	251.62	195.80	247.94	336.21
Total Share holders' Fund	180.12	201.74	262.26	452.64	802.69	802.69	851.02	893.37	946.73	1,069.81
Total Assets	7,044.51	9,915.28	11,388.50	11,651.04	14,481.83	17,007.75	18,502.32	21,233.61	22,538.13	25,009.05
Cash and Bank Balance	372.59	799.03	976.14	680.64	909.79	696.88	561.66	615.33	707.65	825.01
Total Deposit	6,210.81	8,309.38	9,373.55	9,509.45	11,642.78	13,017.74	14,354.55	16,022.03	17,273.92	19,922.71
Investment in Government Securities	254.47	858.77	1,036.18	853.80	1,448.29	2,057.51	2,774.70	3,146.00	3,927.02	3,895.45
No. Of Share Outstanding	1.80	2.02	2.62	4.53	8.03	8.03	8.03	8.93	9.47	10.70
Total no. of staffs	696.00	696.00	739.00	748.00	836.00	893.00	868.00	932.00	1,078.00	1,460.00

Kumari Bank Ltd.

Heading/Fiscal Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
Total Capital Fund	**318.55**	**352.57**	**425.91**	**840.73**	**1,046.29**	**1,143.29**	**2,044.17**	**2,238.25**	**2,545.18**	**4,460.71**
Core Capital fund	**292.62**	**321.47**	**391.55**	**785.60**	**977.04**	**1,059.20**	**1,599.94**	**1,736.33**	**1,972.28**	**2,995.30**
Total Risk Weighted Assets	**2,697.58**	**3,251.85**	**3,643.68**	**5,796.59**	**7,829.67**	**9,730.23**	**12,426.40**	**16,326.36**	**20,071.69**	**36,845.28**
Non-Performing Loan	**91.83**	**67.40**	**34.63**	**84.06**	**65.88**	**77.35**	**160.04**	**132.38**	**169.34**	**1,436.20**
Total Loan and Advances	**2,280.85**	**2,707.04**	**3,011.15**	**4,519.52**	**6,274.10**	**7,658.48**	**11,513.40**	**13,789.79**	**15,256.29**	**28,938.80**
Loan Loss Provision	**21.89**	**26.71**	**31.40**	**51.01**	**64.79**	**79.58**	**132.41**	**190.25**	**260.61**	**558.85**
Net Profit after Tax	**34.17**	**39.48**	**71.61**	**66.07**	**104.19**	**123.00**	**115.90**	**197.10**	**258.00**	**51.79**
Total Share holders' Fund	**243.17**	**269.92**	**269.92**	**596.95**	**716.34**	**868.56**	**1,252.00**	**1,387.85**	**1,471.12**	**2,622.59**
Total Assets	**3,102.06**	**3,737.45**	**4,273.85**	**6,141.62**	**8,272.36**	**10,531.15**	**15,334.16**	**18,979.24**	**21,210.84**	**38,052.48**
Cash and Bank Balance	**106.63**	**164.20**	**140.67**	**286.22**	**323.32**	**403.29**	**531.81**	**581.54**	**768.62**	**1,140.61**
Total Deposit	**2,757.84**	**3,342.19**	**3,795.05**	**4,769.18**	**5,954.63**	**7,320.11**	**11,654.70**	**14,583.82**	**17,676.77**	**31,604.71**
Investment in Government Securities	**265.77**	**390.57**	**378.21**	**482.13**	**859.48**	**894.76**	**1,211.27**	**2,129.20**	**2,135.05**	**1,453.88**
No. Of Share Outstanding	**2.43**	**2.70**	**2.70**	**5.97**	**7.16**	**8.69**	**12.52**	**13.88**	**14.71**	**26.23**
Total no. of staffs	**362.00**	**392.00**	**385.00**	**755.00**	**796.00**	**1,043.00**	**1,781.00**	**1,881.00**	**1,845.00**	**1,577.00**

Source:Data derived from the annual reports of the selected commercial banks.

Machhapuchhre Bank Ltd.

Heading/Fiscal Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
Total Capital Fund	345.65	435.19	572.61	909.12	1,062.37	1,130.85	1,481.72	1,670.99	2,062.16	2,140.40
Core Capital fund	315.08	395.93	524.51	853.08	994.31	1,050.76	1,089.22	1,201.19	1,330.64	1,421.61
Total Risk Weighted Assets	3,252.88	3,554.44	4,634.26	5,405.34	6,916.62	8,842.41	11,384.49	13,859.46	15,430.85	15,765.95
Non-Performing Loan	52.53	22.22	24.15	19.58	28.64	29.09	49.41	71.87	135.31	291.27
Total Loan and Advances	2,954.14	3,481.95	4,423.42	5,186.68	6,436.57	7,767.27	9,453.67	11,637.34	12,955.99	12,876.82
Loan Loss Provision	48.82	55.81	59.80	69.89	65.49	76.94	87.95	165.80	176.96	186.73
Net Profit after Tax	40.13	61.64	89.82	130.25	125.00	170.00	126.52	160.75	168.67	162.55
Total Share holders' Fund	277.62	348.41	466.64	771.66	805.57	805.57	845.85	905.31	1,025.72	1,025.72
Total Assets	4,072.40	4,875.35	5,945.55	6,892.57	8,478.76	10,524.60	12,451.96	15,821.35	17,872.73	18,657.42
Cash and Bank Balance	338.06	377.05	418.93	421.46	220.93	384.93	558.86	577.91	646.43	544.65
Total Deposit	3,713.21	4,420.56	5,229.19	5,862.91	7,114.24	8,519.84	10,409.89	13,161.80	14,502.60	15,417.96
Investment in Government Securities	4.11	107.19	297.19	367.19	761.90	1,010.81	1,120.41	1,853.63	2,277.97	2,559.62
No. Of Share Outstanding	2.78	3.48	4.67	7.72	8.06	8.06	8.46	9.05	10.26	10.26
Total no. of staffs	597.00	610.00	663.00	742.00	953.00	1,195.00	1,486.00	1,510.00	1,584.00	1,558.00

Nepal Bank Ltd

Heading/Fiscal Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
Total Capital Fund	359.31	439.82	743.96	1,215.89	1,103.97	2,224.48	2,300.74	2,788.24	3,128.74	3,036.93
Core Capital fund	309.68	370.91	657.19	1,123.59	1,008.27	2,102.08	2,163.51	2,246.61	2,484.97	2,399.14
Total Risk Weighted Assets	7,503.64	5,499.30	7,290.77	8,405.32	9,799.31	13,242.91	13,522.80	16,594.84	20,782.99	22,110.56
Non-Performing Loan	210.92	212.61	197.83	246.98	268.36	257.82	263.86	291.00	325.08	524.56
Total Loan and Advances	4,121.82	5,338.84	6,352.43	7,437.29	7,963.25	9,765.78	10,682.49	14,194.91	17,764.01	18,405.62
Loan Loss Provision	39.19	58.34	74.56	81.71	87.02	113.72	128.56	183.56	285.71	279.45
Net Profit after Tax	71.70	48.35	288.30	311.80	321.57	259.67	233.29	296.12	292.33	343.76
Total Share holders' Fund	396.55	646.50	646.50	804.27	804.27	981.11	1,128.28	1,263.68	1,440.59	1,469.40
Total Assets	7,798.05	8,821.11	10,347.95	11,205.71	13,681.14	17,151.56	14,298.92	16,362.25	26,007.79	29,673.56
Cash and Bank Balance	374.06	431.91	469.46	428.47	463.99	430.19	494.43	744.79	639.16	605.65
Total Deposit	6,933.76	7,799.88	8,941.00	9,394.40	9,983.14	11,827.53	14,153.04	16,281.34	19,607.61	24,451.40
Investment in Government Securities	15.83	15.75	19.08	22.40	1,272.76	1,321.81	3,000.93	3,010.93	3,870.58	5,333.93
No. Of Share Outstanding	3.97	6.47	6.47	8.04	8.04	9.81	11.28	12.64	14.41	14.69
Total no. of staffs	2,618.00	2,623.00	2,356.00	2,112.00	2,142.00	2,317.00	2,172.00	2,504.00	2,429.00	2,725.00

NIC Asia Bank Ltd.

Heading/Fiscal Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
Total Capital Fund	572.59	605.93	819.30	1,091.22	1,535.00	2,180.41	2,500.60	3,115.70	3,427.50	3,511.90
Core Capital fund	482.75	510.94	704.06	976.63	1,086.27	1,348.31	1,547.00	1,839.00	2,255.70	2,487.50
Total Risk Weighted Assets	4,076.28	4,850.30	6,584.84	7,891.06	12,537.08	16,367.79	18,521.60	24,991.80	25,622.50	26,281.50
Non-Performing Loan	86.99	89.84	45.21	26.26	7.24	69.05	131.20	131.70	142.46	240.04
Total Loan and Advances	3,730.59	4,333.00	5,949.88	7,256.18	12,066.68	15,010.77	17,374.20	26,484.00	26,823.60	27,159.40
Loan Loss Provision	36.44	38.17	65.78	74.08	120.47	148.43	161.10	353.20	383.80	371.50
Net Profit after Tax	83.16	68.03	106.68	147.58	133.49	302.33	309.85	325.89	421.49	444.48
Total Share holders' Fund	265.83	369.50	577.63	803.11	803.11	883.42	971.77	1,156.40	1,156.40	1,156.40
Total Assets	5,150.05	6,051.94	8,045.66	9,926.57	17,094.32	21,769.70	25,059.04	34,614.75	35,857.00	36,408.90
Cash and Bank Balance	199.68	190.96	556.44	348.96	708.85	1,397.25	858.78	1,302.58	989.42	999.54
Total Deposit	4,498.42	5,347.72	6,928.80	8,669.71	13,958.96	17,682.07	21,090.20	30,025.20	29,497.70	31,431.20
Investment in Government Securities	562.09	615.86	1,051.70	850.70	1,193.90	1,534.28	2,656.19	2,934.51	3,626.05	3,124.00
No. Of Share Outstanding	2.66	3.70	5.78	8.03	8.03	8.83	9.72	11.56	11.56	11.56
Total no. of staffs	595.00	730.00	1,101.00	1,755.00	2,191.00	3,472.00	2,908.00	3,792.00	4,385.00	3,943.00

NMB Bank Ltd.

Heading/Fiscal Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
Total Capital Fund	291.89	398.29	779.05	1,139.37	1,685.13	1,906.14	2,277.63	2,947.04	3,213.42	3,274.98
Core Capital fund	268.99	316.36	662.97	1,037.16	1,581.05	1,616.65	1,963.02	2,231.79	2,450.37	2,495.28
Total Risk Weighted Assets	2,714.17	3,577.83	7,095.38	8,368.49	10,696.48	12,353.14	15,102.90	19,546.24	23,651.58	24,575.07
Non-Performing Loan	11.26	11.46	98.42	105.14	66.57	75.35	326.37	358.76	260.38	536.53
Total Loan and Advances	2,046.70	2,728.89	5,445.94	6,260.90	7,564.59	9,188.70	12,177.81	15,804.39	17,957.40	19,510.07
Loan Loss Provision	20.59	28.64	70.47	65.13	77.44	101.20	133.76	183.28	224.37	244.55
Net Profit after Tax	40.99	50.10	111.50	146.70	185.38	225.73	171.28	271.11	329.11	322.25
Total Share holders' Fund	240.00	273.24	551.86	760.23	760.33	961.82	1,395.10	1,632.60	1,836.67	1,836.67
Total Assets	3,021.17	4,133.75	7,568.23	8,881.00	11,161.85	13,546.81	17,945.19	23,154.69	25,515.06	28,777.71
Cash and Bank Balance	195.79	675.12	412.84	345.36	322.92	336.14	544.68	575.74	776.40	782.86
Total Deposit	2,708.73	3,672.29	6,478.15	7,322.41	8,450.71	9,851.67	13,481.04	16,645.38	18,481.71	21,030.47
Investment in Government Securities	212.46	446.91	440.15	671.79	801.73	903.89	1,279.02	1,545.96	3,004.63	3,040.26
No. Of Share Outstanding	2.40	2.73	5.52	7.60	7.60	9.62	13.95	16.33	18.37	18.37
Total no. of staffs	322.00	357.00	755.00	918.00	1,080.00	1,120.00	1,654.00	1,744.00	1,961.00	1,980.00

Prime Commercial Bank Ltd.

Heading/Fiscal Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
Total Capital Fund	388.86	462.50	577.67	993.78	1,165.93	1,364.45	2,100.20	2,740.77	2,752.20	2,626.43
Core Capital fund	361.65	429.31	535.72	931.52	1,089.31	1,279.14	1,946.64	2,270.95	2,489.78	2,345.16
Total Risk Weighted Assets	3,135.58	3,803.24	4,978.67	7,482.08	9,528.44	10,689.00	15,174.40	18,492.35	20,981.86	21,713.75
Non-Performing Loan	67.52	61.22	50.71	51.58	60.49	70.19	163.44	196.31	216.89	790.89
Total Loan and Advances	2,783.67	3,347.17	4,109.32	5,868.83	7,116.77	7,629.84	11,043.58	13,538.38	15,491.98	16,306.98
Loan Loss Provision	27.16	33.01	41.78	61.51	74.77	84.89	152.79	224.19	261.54	280.09
Net Profit after Tax	55.34	74.56	111.58	146.79	172.62	219.88	225.15	326.84	278.73	102.79
Total Share holders' Fund	314.01	370.53	455.75	803.33	803.33	931.86	1,398.52	1,608.30	1,865.63	1,940.26
Total Assets	3,803.10	4,580.09	5,439.90	7,770.28	9,504.40	10,225.58	15,218.30	19,053.72	21,036.19	22,082.78
Cash and Bank Balance	172.82	234.64	266.86	409.20	417.31	419.62	827.50	476.36	1,071.17	686.74
Total Deposit	3,404.53	4,100.58	4,834.21	6,585.59	7,263.60	7,704.01	11,944.16	15,413.95	16,020.34	17,405.80
Investment in Government Securities	234.92	491.43	387.34	384.59	718.54	887.83	1,178.01	2,093.61	2,612.41	2,562.22
No. Of Share Outstanding	3.14	3.71	4.56	8.03	8.03	9.32	13.99	16.08	18.66	19.40
Total no. of staffs	323.00	362.00	390.00	571.00	691.00	725.00	1,469.00	1,548.00	1,600.00	1,639.00

Rastriya Banijya Bank Ltd.

Heading/Fiscal Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
Total Capital Fund	284.29	760.35	995.00	1,229.63	1,396.20	2,030.34	2,084.66	2,841.64	3,406.25	3,393.93
Core Capital fund	274.53	760.35	896.91	1,098.28	1,236.50	1,866.73	1,884.26	2,340.46	2,806.21	2,838.35
Total Risk Weighted Assets	6,152.11	7,484.13	8,577.95	10,567.13	12,385.51	15,161.85	16,489.55	21,109.15	25,637.03	26,276.25
Non-Performing Loan	388.52	405.81	347.57	385.14	574.13	709.49	638.60	632.98	473.84	915.88
Total Loan and Advances	6,085.48	7,583.65	8,178.00	10,216.00	12,087.00	14,812.00	15,652.00	19,597.00	22,672.00	24,294.00
Loan Loss Provision	71.67	74.07	87.93	121.29	134.80	140.47	140.47	231.22	376.00	386.38
Net Profit after Tax	183.67	464.39	235.00	278.00	366.00	505.00	437.00	342.00	429.00	360.00
Total Share holders' Fund	858.90	858.90	897.00	858.90	858.90	900.48	900.48	1,018.49	1,494.00	1,564.00
Total Assets	12,255.79	13,956.08	16,643.21	17,354.58	19,763.00	22,641.00	26,677.00	30,999.00	32,840.00	39,488.00
Cash and Bank Balance	355.83	445.44	572.33	570.99	655.84	604.47	709.39	741.78	648.73	766.64
Total Deposit	10,726.99	12,422.17	14,621.00	15,358.00	16,933.00	19,199.00	23,090.26	26,480.09	25,814.43	32,165.49
Investment in Government Securities	3,049.28	3,416.04	4,217.13	3,733.06	4,429.59	3,758.46	7,213.45	6,403.37	5,949.18	7,296.54
No. Of Share Outstanding	8.59	8.59	8.97	8.59	8.59	9.00	9.00	10.18	14.94	15.64
Total no. of staffs	2,523.00	2,545.00	2,470.00	2,248.00	1,945.00	2,096.00	1,978.00	2,187.00	2,136.00	2,635.00

SBI Bank Ltd.

Heading/Fiscal Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
Total Capital Fund	589.20	706.37	816.97	1,169.21	1,372.88	1,480.48	1,739.37	1,813.64	2,030.46	2,061.27
Core Capital fund	452.24	563.15	665.18	1,006.79	1,212.54	1,334.01	1,385.93	1,442.62	1,596.90	1,654.98
Total Risk Weighted Assets	4,436.43	5,036.30	5,882.10	7,229.89	9,063.81	10,486.02	11,182.63	13,088.89	15,322.01	16,385.03
Non-Performing Loan	9.12	7.49	6.60	6.42	15.05	17.71	21.72	23.35	16.59	296.28
Total Loan and Advances	3,571.43	4,047.19	4,754.30	6,375.21	7,523.59	8,855.90	9,443.52	10,153.80	11,057.71	12,192.39
Loan Loss Provision	35.62	41.78	50.15	66.31	81.49	87.37	110.49	147.74	222.08	198.68
Net Profit after Tax	92.30	106.54	133.19	152.32	202.35	229.25	154.33	96.35	163.83	196.75
Total Share holders' Fund	304.91	388.37	497.31	800.00	804.69	844.93	895.62	949.36	982.59	1,012.06
Total Assets	6,108.30	5,927.73	7,851.53	9,982.86	10,253.87	11,831.42	13,240.19	13,768.66	15,310.28	18,595.81
Cash and Bank Balance	276.40	377.33	396.18	591.67	529.44	500.06	663.02	485.99	304.86	361.63
Total Deposit	5,449.30	5,162.82	6,521.35	8,166.45	8,426.92	9,792.44	11,044.59	10,623.85	11,971.02	15,082.84
Investment in Government Securities	18.82	14.21	585.00	764.19	873.50	926.98	1,217.57	2,107.39	2,332.33	3,358.77
No. Of Share Outstanding	3.05	3.88	4.97	8.00	8.05	8.45	8.96	9.49	9.83	10.12
Total no. of staffs	607.00	596.00	679.00	768.00	871.00	1,029.00	1,004.00	967.00	910.00	923.00

Standard Chartard Bank Ltd.

Heading/Fiscal Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
Total Capital Fund	533.35	611.18	777.94	1,197.51	1,398.68	1,497.10	1,542.19	1,672.87	1,868.11	2,236.37
Core Capital fund	470.99	544.70	668.49	1,111.93	1,303.43	1,392.61	1,403.36	1,513.30	1,686.25	1,854.83
Total Risk Weighted Assets	4,347.04	4,667.27	4,748.55	5,680.20	6,083.88	7,605.19	8,329.95	9,743.48	11,711.34	13,088.99
Non-Performing Loan	12.73	9.48	10.18	7.67	8.02	7.96	25.05	68.61	52.75	110.75
Total Loan and Advances	2,632.84	2,802.38	3,169.73	3,972.98	4,456.13	5,309.21	5,693.58	7,147.39	8,941.48	9,466.15
Loan Loss Provision	26.20	27.93	33.31	41.20	48.60	54.96	85.22	105.82	128.11	135.34
Net Profit after Tax	133.66	129.00	129.25	142.16	219.00	243.00	198.74	139.88	225.59	346.53
Total Share holders' Fund	224.58	281.02	374.99	801.14	801.14	801.14	801.14	857.22	942.95	942.95
Total Assets	5,332.41	6,492.68	6,518.57	7,740.86	8,309.47	9,326.42	11,643.83	11,473.88	12,335.57	15,137.80
Cash and Bank Balance	232.59	226.43	245.77	186.03	200.86	184.29	235.24	269.29	212.98	224.24
Total Deposit	4,629.85	5,728.65	5,572.72	6,387.29	6,706.10	7,573.15	9,502.08	8,756.42	9,372.19	11,750.10
Investment in Government Securities	233.39	576.62	728.13	453.75	441.89	1,126.62	1,269.48	1,187.75	648.14	2,273.37
No. Of Share Outstanding	2.25	2.81	3.75	8.01	8.01	8.01	8.01	8.57	9.43	9.43
Total no. of staffs	460.00	433.00	435.00	495.00	485.00	531.00	535.00	504.00	505.00	504.00

List of Commercial Banks in Nepal

SN	Bank Name	Established	Head Office
1	Nepal bank Ltd.	11/15/1937	Dharmapath,Kathmandu
2	Rastriya Banijya Bank Ltd.	1/23/1966	Sinhadurbarplaza, Kathmandu
3	Agriculture Development Bank Ltd.	1/21/1968	Ramshahpath, Kathmandu
4	Nabil Bank Ltd.	7/12/1984	Beena Marg, Kathmandu
5	Nepal Investment Mega Bank Ltd.	3/9/1986	Durbar Marg, Kathmandu
6	Standard Chartered bank Nepal Ltd.	2/28/1987	New Baneshwor, Kathmandu
7	Himalayan Bank Ltd.	1/18/1993	kamaladi, Kathmandu
8	Nepal SBI Bank Ltd.	7/7/1993	Kesharmahal, Kathmandu
9	Everest Bank Ltd.	10/18/1994	Lazimpat, Kathmandu
10	Kumari Bank Ltd.	4/3/2001	Tangal, Kathmandu
11	Laxmi Sunrise Bank Ltd.	4/1/2002	Hattisar, Kathmandu
12	Citizens Bank International Ltd.	4/20/2007	Narayanhitipath, Kathmandu
13	Prime Commercial Bank Ltd.	9/24/2007	Kamalpokhari, Kathmandu
14	Sanima Bank Ltd.	2/15/2012	Nagpokhari, Kathmandu
15	Machhapuchhre Bank Ltd.	7/9/2012	Lazimpat, Kathmandu
16	Global IME Bank Ltd.	2012	Kamaladi, Kathmandu
17	NIC Asia Bank Ltd.	6/30/2013	Thapathali, Kathmandu
18	Prabhu Bank Ltd.	9/14/2014	Babarmahal, Kathmandu
19	NMB Bank Ltd.	10/18/2015	Babarmahal, Kathmandu
20	Siddhartha Bank Ltd.	7/21/2016	Hattisar, Kathmandu

FINANCIAL PERFORMANCE ANALYSIS OF NEPALESE COMM...

By: Aakash Subedi

As of: Jun 11, 2024 11:54:35 AM
23,756 words - 115 matches - 16 sources

Similarity Index
14%

Mode: Summary Report

sources:

604 words / 2% - Internet from 03-Mar-2023 12:00AM
pdfcoffee.com

269 words / 1% - from 17-Jan-2024 12:00AM
elibrary.tucl.edu.np

206 words / 1% - from 21-Jan-2024 12:00AM
elibrary.tucl.edu.np

167 words / 1% - Internet from 09-Mar-2023 12:00AM
elibrary.tucl.edu.np

136 words / 1% - from 05-Jan-2024 12:00AM
elibrary.tucl.edu.np

272 words / 1% - Internet from 07-Nov-2022 12:00AM
www.atlantis-press.com

147 words / 1% - Internet from 08-Oct-2022 12:00AM
www.atlantis-press.com

366 words / 1% - from 09-May-2023 12:00AM
www.nepjol.info

251 words / 1% - Internet from 20-Feb-2023 12:00AM
www.researchgate.net

201 words / 1% - from 11-May-2023 12:00AM
www.um.edu.mt

192 words / 1% - Internet
Tesfatsion Sahlu Desta. "FINANCIAL PERFORMANCE OF “THE BEST AFRICAN BANKS”: A COMPARATIVE ANALYSIS THROUGH CAMEL RATING", Çroatian Accountant - Independent Association of Accountants, Tax Advisors and Finance professionals, 2016

173 words / 1% - Internet from 05-Jan-2018 12:00AM
pbr.co.in

164 words / 1% - Internet from 21-Aug-2022 12:00AM
www.ieeesem.com