CHAPTER – I

INTRODUCTION

1.1 Background of the Study

The speedy development of any country in this modern era is depends upon to some extent with financial activities of the country. Financial activities play a role of catalyst in the process of economic development of the country. In Nepal financial sectors (banks, finance companies etc.) plays a vital role in the economic development of the country. The current state of Nepalese economy is characterized by unutilized natural sources, miserable agriculture, deficit trade, mass poverty, illiteracy and so forth. Agriculture is the main occupation of almost village people but no scientific methods of agriculture have yet been implemented. It is one of the richest countries in the world in terms of natural resources. The natural resources available here have remained unutilized due to reasons.

Investments in productive sectors increase the economic activities. The unutilized financial resources should be diverted towards productive sector in order to increase the economic activities. To develop the Nepalese economy, the financial institutions should be established. The participations of the private sectors play ever more important role for the economic development. Hence, various banks, insurance companies, financial companies etc. have been established in the private sector and government sector as well to develop the economy to develop the economy of the country, their providing their active participation for the economic development. But however even with the rapid development and expansion of financial institutions, the country has not been able to achieve the desired income so far which is due to the poor capital market condition of our country and due to the early stage of economic growth.

Every company or institution is established based on the definite goals and objectives. According to the objectives, the company performs is tasks. Mainly two types of institutions such as profit oriented and service-oriented instructions are established, but most of them are profit oriented because profit is the NIBL of the business which not only keeps it alive but also assures the future and makes it sound. Profit planning is an important tool of the firm to achieve the

objectives. Profit do not just happen, profits are managed (Lynch and Williamson, 1989: 125). So, to manage the profit, the management should follow various processes of profit planning because the management process and profit planning and control are interrelated to each other.

Profit maximization is the basic objectives of a firm and to make it reliable service should render to its customers. Profit is a device to measure efficiency of a firm.

Planning is the first essence of a management and all other functions are performed with the framework of planning. Planning means deciding in advanced what is to be done in future. Planning starts from forecasting and predetermination of future events. The main objective of planning in business is to increase the chance of making profit. The budget is the primary planning operation document committed to performance. In this sense budget is also called a profit planning.

Planning is the process of developing enterprise objectives and selecting a future course of action to accomplish them. The term comprehensive profit planning and control it defined as a systematic and formalized approach for performing significant phase of the management planning and control function (Welsch, et al., 2001: 45).

-) The development and application of broad and long range objectives of the enterprise.
-) The specification of enterprise goals.
-) A long range profit plan developed in broad terms.
-) A short range profit plan detailed by assigned responsibilities (divisions, product, project etc.).
-) A systematic periodic performance reports detailed by assigned responsibilities, and
-) Follow-up procedures.

As like in the other profit oriented organizations, a commercial bank has also to make reasonable profit for its survival. Most of the commercial banks are formed as a company with joint stock and the shares being traded at stock exchanges. Therefore, profit made by them is the important parameter for measurement of effectiveness efficiency of them.

1.2 Statement of the Problem

Profit planning is the vital tool which directs the organization towards achieving profit. Profit is the very basic primary short term and long term objectives of every business organization. Even increasing ratio of profit is a good symbol of organization. By nature profit is a yard stick judging of managerial efficiency in terms of a means of measurement for the success.

The profit planning tool is a newly developed concept as a crucial way in the business organization. The concept of profit planning has not even familiarized in the most of the business concern. By proper profit planning a business can be managed more effectively and efficiently.

Every financial institutions, as a commercial bank must make profit out of its operations for its survival and fulfillment of the responsibilities assigned. Major activities of a commercial bank comprise mobilization of resources, which involves cost, and profitable deployment of those resources, which generates income. The different interest income over the interest cost, which is popularly called as interest margin, can be considered as the contribution margin in the profit of the bank. The bank attempts to compensate the other operational expenses by generating other income out of non-fund based business activities of the bank.

The present study aims to analyze and examines the application of PPC tool in the commercial banks taking a case of Nepal Investment Bank Limited. Nabil Bank Ltd. and Bank of Kathmandu. In this ground, the study deals with the following issues for the purpose of this study.

) What is the relationship between investment, loan and advances with total deposit, net profit and outside assets?

) How properly the collected fund has been used?

) What is the profitability position of the banks?

) What is the trend position of banks in terms of deposits collection and net profit?

) What is the effect of investment decision on profitability position of the banks?

) Is there significant relationship between loan and advances, total interest earned to total outside assets etc?

1.3 Objectives of the Study

The basic objectives of the study are to analysis the profit planning policy of commercial banks with reference to NIBL, NABIL and BOK. The specific objectives of the study are:

- ꭍ To find out the relationships between total investment, loan and advances, deposit, net profit and outside assets.
- ꭍ To identify the investment priority sectors of Commercial Banks.
- ꭍ To assess the impact of investment on profitability.
- ꭍ To analyze and forecast the trend and structure of deposit utilization and its projection for five years of Commercial Banks.
- ꭍ To provide suggestions and possible guidelines to improve investment policy and its problems.

1.4 Significance of the Study

Profit is the life blood of the any organization because the continuity or survival of the each and every organization is depends upon the earning capacity of that organization. This study is concerned with the profit planning in the commercial bank. It attempts to examine and analyze the applicability of profit planning system in the bank. Profit planning process significantly contributes to improve the profitability as well as the overall financial performance of an organization with the help of the best utilization of resources.

Profit planning is a part of an overall process and is an area in which finance function plays major role. It is now an important responsibility of financial manager while activities of those require an accounting background. It's also need knowledge of business principles, economic statistics and mathematics. Hence profit planning represents on overall plan of preparation for a definite period of time.

Profit planning is crucial for management. Profit is the most important indicators for judging managerial efficiency and does not just happened for this every organization has to manage. Various functional budgets are the basic tools for proper planning of profit and control.

Therefore, this study will be useful for those who want to know the profit-planning tool and also for next researcher as a reference.

1.5 Limitations of the Study

The study confines only profit planning aspect of the Nepal Investment Bank Limited Limited., Nabil Bank Ltd. and BOKBank Ltd. So, the limitations of this study are:

1. This study focuses on profit planning control and its application in the NIBL,Nabil and BOK.
2. Only profit planning aspect of Investment Bank, Nabil Bank and BOKBank has been analyzed.
3. This study covers the related data of the banks from FY 2004 to 2008.
4. The study is mostly based on secondary sources of data.

1.6 Organization of the study

The study is divided into the following five chapters.

Chapter- I	Introduction
Chapter- II	Conceptual Framework and Review of Literature
Chapter- III	Research methodology
Chapter - IV	Data Presentation and Analysis
Chapter - V	Summary, Conclusion and Recommendations.

The first chapter deals the background of the study, brief profile of the NIBL, NABIL and BOK, statement of problem, objectives of the study, significance of the study, limitation of the study and organization of the study etc.

Second chapter deals with the review of available literature. It takes in review of related books, journals, articles and previous unpublished Master Degree Dissertation etc.

The third chapter is deals with the research methodology employed in this study. It includes research design, population and sample, data collection procedure and sources of data, data analysis techniques etc.

The fourth chapter is the important chapter of the study which implies the presentation and analysis of data as well as major findings of the study.

The fifth and last chapter covers the summary of the study, the main conclusion that flows from the study and offers some recommendations as well as suggestions for further improvement.

.

<div align="center">

CHAPTER-II

REVIEW OF LITERATURE

</div>

This chapter devotes to review some of the existing literature regarding the profit planning concepts. In this regard, various books, journals and articles concerned to this topic have been reviewed. The first part of the chapter deals with the conceptual framework of the study and the second part is concern with the review of previous articles, journals and dissertation.

2.1 Conceptual Framework

2.1.1 General Concept of Profit Planning

Profit Planning is a comprehensive statement of intentions expressed in financial terms for the operation of both short and long period. It is a plan of the firm's expectation and is used as a basis for measuring the actual performance of managers and their units. A profit plan has an immense value in management; it helps in planning and coordinating if used appropriately, but not a replacement for management. Profit planning is a comprehensive and coordinated plan expressed in financial terms for the operations and resource of an enterprise for some specific period in the future (Fremgen, 1973: 12).

Profit Planning is a predetermined detailed plan of action developed and distributed as a guide to current operations and as a partial basis for the subsequent evaluation of performance. Thus it can say that profit planning is a tool which may be used by the management in planning the future course of actions and controlling the actual performance (Gupta, 1992:3). The term comprehensive profit planning and control it defined as a systematic and formalized approach for performing significant phase of the management planning and control functions.

A profit planning and control program can be one of the more effective communication networks in an enterprise. Communication for effective planning and control requires that both the executive and the subordinate have the same understanding of responsibilities, ensure a degree of understanding not otherwise understanding of responsibilities, and ensure a degree of understanding not otherwise possible. Full and open reporting in performing reports that, fouls

on assigned responsibilities likewise enhance the degree of communication essential to sound management (Welsch, et al., 2001:215).

Profit Planning is an example of short range planning. This planning focuses on improving the profit especially from a particular product over a relatively short period of time. Therefore as used here, it is not the same as corporate planning of a cost rendition program (Terry, 1968:245).

Profit Planning involves streamlining activities in order to get employees profit minded and to secure maximum benefit from minimum effort and expenditure. Best results seem to be obtained by assigning a profit planner to investigate all the footers affecting the profit obtained from a single product; the planner is given the right to prove the economics, the organization. The mode of operations, the pricing, the marketing or any fact of making and selling the product that in his judgment affects profit accruing from that product.

A profit plan is an advance decision of expected achievement based on the most efficient operating standards in effect or n prospect of time. It is established against which actual accomplishment is regularly compared (Niel, 2001:305). Profit Planning through volume of cost analysis, however, is a modern concept of management planning tools designated primarily for industrial enterprises. It involves a study of what a business cost and expenses should be and will be at different level of operations and it include a study of the resultant effect due to this hanging relationships between volume and cost (Young Dong, 200:74).

2.1.2 Concept of Profit

Profit is the basic elements of profit plan so that the concept of profit planning may not be completed and meaningful in absence of the clear-cut well defined idea of profit. Oxford dictionary defines profit as a (a) financial gain and amount of money gained in business especially the difference between the amount earned and the amount spent (b) Advantage or benefits gained from something (Hornby et al., 1992:63).

According to some theories, profits are the factor payment for talking the risk for agreeing to take what is left over after contractual outlays have been made. In the second type of profit

theory they viewed as a wage for the service of innovation. Profits in this theory are tied to dynamic development. Profit around which all enterprises activities directly or indirectly revolve play the significant role for judging the managerial efficiency. In absence of profit nobody can think about the long-term survivability of the enterprises.

2.1.3 Concept of planning

Planning is the first essence of management and all other functions are performed within the framework of planning. Planning means deciding in advance what is to be done in future. Planning starts from forecasting and predetermination of future events. Planning is the whole concept of any business organization with proper and effective planning. No firm can accomplish its predetermined goals and objectives. Hence it is the life blood of any organization which helps them to run efficiently in competitive environment. Planning is a techniques were by the use pattern of resources is carried out (Agrawal, et al., 1989:24).

A planning process includes setting goals, evaluating resources forecasting by different methods and formulating a master plan. Planning depends upon the organized objectives. For the planning purpose a firm's objectives can distinguish mainly three types, the first is prime, the second is instrumental objectives are aims for accomplishment of more basis aim. For this purpose the company has established divisional departmental and individual job objectives. Specific objectives are those objectives that have been specified as to tome and magnitude which is known as goals. As a result of specifying a time period and a target amount, this goal is capable of giving specific guidance to various senses of management planning. Objective setting of a firm is very difficult task. Unfortunately, most top management fails to develop a clear and operational statement of company objectives. More carefulness is necessary for this tedious job and it stated from firm's objectives. More carefulness is necessary for this tedious job. Carefully stated firm's objectives would yield at least the following benefits.

1. Company objectives provide the ultimate criteria for resolving difficult company decisions and
2. Company objectives are the basis for long-range profit planning.

Planning is the process of developing enterprises objectives and selecting future course of action to accomplish them. It includes (Welsch, et al., 1992:127).

1.   Establishing enterprises objectives,

2.   Developing premises about the environment in which they are to be accomplished,

3.   Decision making,

4.   Identifying activities necessary to translate plans in to action, and

5.   Current re-planning to current deficiencies.

The planning processes both short and long term is the most crucial component of the whole system. It is both foundation and the bond for the other elements because it is through the planning process that we determine what we are going to do, how we are going to do it and who is going to do it. It operates as the brain centre of an organization and like the brain it both reason and communicate (Welsch, et al., 1992:73). Planning is the conscious recognition of the futurity of present decision (Drucker, et al., 1989:87). Planning is the feed forward process to reduce uncertainty about the future. The planning process is based on the conviction that management can plan its activities and condition that state of the enterprise that determines its density (Pandey, 1991:325).

Planning could be taken as the tools of achieving organizational goals efficiently and effectively from the selection of various alternatives with in a acceptable time frame. The essence of planning is:

1.   To accomplish goals

2.   To reduce uncertainty

3.   To provide direction by determining the course of action in advance.

Planning is determined course of action for achieving organizational goals or objectives effectively and efficiently at a fluid environment with a certain time frame through the selection of various alternatives. On the other hand it holds accountability and responsibility about result to individual. A full appreciation of the firm task requires distinguishing among three types of company's activities which we call strategic planning, management control and operational control. The strategic planning is a important function of top management. Planning requires the

management to setting a future state toward which effort will be directed i.e. objective, assessing the organization's resources, i.e. what the organization is going to work with, assessing the current and future environment with which the organization must connected to achieve its goals and lately determine how and when to allocate resource accomplish the objective. Planning on the other hand is selecting objective and determining a course of action including allocation of resources in order to achieve those objectives in a specific time period. Planning states what, when, and how things will be accomplished. An adequate planning is necessary for control of operations.

2.1.4 Types of Planning

Corporate Planning

The concept of corporate planning was first introduced and started in the United State in the late 1950's and nowadays it has been using in several companies in all over the world. The premises of the corporate planning are as follows (Robertson, et al., 1968:245).

1. Before drawing up a plan which is designed to decide some thing what the corporation wants to do.

2. In these days of rapid change it is necessary to look ahead as for as possible to anticipate these changes.

3. Instead of treating a company as a collection of departments treat it as a corporate whole, and

4. Take full accounts of the company's environment before drawing up and plan.

He has also defined corporate planning as, it is to determine the long term goals of a company as a whole and then to generate plans designated to achieve these goals bring in mind probable change in its environment.

Strategic Long-Range Planning

Strategic planning is a top management function in which the organization's purpose, mission and overall objectives and policies are developed to position the organization advantageously in its operating environment. It refers to the selection of company objective and the determination of the growth or at least constant and competitive policies that are most likely to accomplish those objectives. It is carried out the highest policy making level of the organization will travel.

Management planning and control is the process carried on within the framework established by strategic planning. "Long range 5 to 10 years varying with the enterprise sometimes extended to 10 years. It is one of the most difficult times span involved in planning as many problems in short range planning can be traced to the absence of clear sense of direction and the practice which a comprehensive long-range plan provides. Basically, the long-range planning is more important for broad and long living enterprises. 'A long-range planning is closely concerned with the concept of the corporation as a long living institution (David, et al.,1964:298).The planner must include the following factors in his/her plan from the analysis of available information.

a.   Probable future opportunity

b.   Uncertainty and

c.   Challenges

Long range planning is the continuous process of making present entrepreneurial (risk taking) decision. Systematically and best possible organizing efforts is need to carry out these decisions and measuring the result of these decisions against the expectations through organized systematic feed back (Drucker, et al.,1964:165). It is a decision making process. Such decision should be related about:

⟩ Determination of goals, objectives and strategies.

⟩ Level and direction of capital expenditure.

⟩ Accession of new sources of funds.

⟩ Organization design and structure etc.

Tactical Short Term Planning

A tactical planning is done at all level and involves directing the organizations activities to achieve overall strategic objectives with the organization's mission and policies. Standing plans provide consistency and efficiency for non going operations, and single use plans are developed for unique situation. Projects are short term plans designed to achieve objective within large scale programs. Short term plans cover about a year, and are less formal and detailed than long range plans, which usually cover more than three months. The short range planning is selected to conform to fiscal quarters or years because of the practical need for conforming plans to accounting periods and the some. What arbitrary limitation of the long range to three to five years is usually based as has been indicated on the prevailing belief that the degree of uncertainty over along period makes planning of questionable value (Horold et al., 1964:45).

2.1.5 Role of Forecasting in Planning

Forecasting is an integral part of decision making activities of management. An organization establishes goals and objectives seek to predict the environmental factors. The need for forecasting is increasing as management attempts to decrease its dependence on change and become more scientific in dealing with its environment. Since each area of organization is related to others. A good or bad for cast can effect the entire organization. Planning or budgeting is not nearly forecasting although forecasts from the basis of budgeting. Forecasting is the estimate of the future environment with in the company will operate. Budgeting or planning on the other hand involves the determination of what should be done, how the goals may be reached and what individual or units are to assume responsibility and be held accountable.

Forecasting is indispensable in planning. Forecast is statement of expected future conditions definite statements of what will actually happen are patently impossible. Expectation depends upon the assumptions made. If the assumptions are possible the forecast has a better chance of being useful forecasting assumptions and techniques vary with the kind of planning needed.

The short-term forecasting is needed in budget making. A budget set for the following year will be much useful. It is regarded to sales levels, which will eventuate rather than current sales level. As budget distributed according to current sales may establish policy as to lines of emphasis, but will obviously required successive adjustment if sales levels changes (Bratt, 1985:246).

2.1.6 Planning Verses Forecasting

Planning is clearly district from forecasting. Forecasting one of the essential elements of planning is a prediction of what will happen on the basis of certain assumption. Planning is an attempt to determine what should happen and what will make it likely to happen. A forecast is not a plan, rather it is a statement of and or quantified assessment of future conditions about a particular subject (sales revenue) based on one of more explicit assumption. A forecast should be viewed as only one input into the development of a sales plan. The management of a company may accept modify or eject the forecast. In contrast a sales plan incorporates management decision that are based on the forecast, other inputs and management judgment about such

related items as sales volume, price, production and sales, effort and financing (Welsch, et al., 2001:109).

2.1.7 Purposes of Profit Planning
Some purposes for the application of profit planning are:
1.   To state the firms expectations in clear and facilitate for attainability.
2.   To communicate expectations to all concerned with the management of the firm so that they are understood, supported and implanted.
3.   To provide a detail plan of action for reducing uncertainty and for the proper direction of individual and group efforts to achieve goals.
4.   To coordinate the activities and efforts in such as way the use of resource in maximized.
5.   To provide a means of measuring the performance of individuals and units and to supply information on the basis of which the necessary corrective action can be taken.

Usually profits does not just happen, profits are managed. Before we can make intelligent approaches to the management concept of profit, there are after all, several different interpretations of the term. Profit, an economist says that profit is the reward of entrepreneurship for risk taking. A labour leader might say that it is a measure of how efficiently labour has produced and that it provides a base for negotiating a wage increase. An inverter views it as a gauge for return on his/her investment. An internal revenue agent might regard, it is the base for determining income taxes. The accountant will define it simply as the excess of firm's revenue over the expenses of producing revenue in a given period. Management thinks of profit as a tangible expression of the goals it has set for the firm, a measure of the performance towards the achievement of it, as a means of measuring the health, growth and continuity of the economy (Lynch et al., 1989:249).

2.1.8 Long Range and Short Range Profit Plan
There are two types of profit plans developed; one strategic (long-range) and another tactical (short-range). The former profit plan takes a time horizon of 5 to 20 years and the later for short period. The long range planning is a picture of more summary data. A part of this plan is more or less informal as presented by tentative commitments made by the executive committee in the

organizational planning seasons. The formal portion of long-range profit plan includes the following component detailed by each year.

- Income Statement
- Balance Sheet
- Capital Expenditure Plan
- Personnel Requirements
- Research Plan and
- Long Range Market Penetration Plan

Thus the long range profit plan covers all the key areas of anticipated activity; sales, expenses, research and development, capital expenditure, cash, profit and return on investment. The short range tactical profit plan shows the primarily annual results, the detail by months, responsibility and products. In an organization these annual summaries should be prepared to provide a general understanding of the profit plan and to provide an overall view of the comprehensive short range profit plan.

It is possible for the firms to develop these two profit plans for all aspects of the operations (Welsch, et al., 2001:524). Assuming participatory planning and receipt of the executive instruments, the manager of each responsibility center will immediately initiate activities within his or her responsibility center to develop strategic profit plan and tactical profit plan. Certain format and normally the financial function should establish the general format, amount of detail, and other relevant procedural and format requirements essentially for aggregation of the plan. All these activities must be coordinating among the centers in conformity with the organization structure (Welsch, et al., 2001:523).

The preparation of long-range profit planning in addition to short range profit planning is also viewed as a total planning concept of business. Long range planning is essential to maintain the annual profit at improving level. The ultimate measure of the success of a business in generally based on growth in the volume of sales, increasing return on capital investment, efficient organization and these are all long-term consideration.

2.1.9 Budgeting and Budget

Budgeting is a forward planning and involves the preparation in advance for the quantitative as well as financial statement in indicate the intention of the management in respect of the various aspects of the business. A budget is a comprehensive and coordinated plan expressed in financial term for the operation and source of an enterprise for some specific period in the future (Pandey, 1991:98).

As regards the term 'Budget' it can be visualized as the end result of the budgeting. If Budgeting is the procedure for preparing plan in respect of future financial requirements, the plan when presented in written form is called budget. Budgeting in facts is a managerial technique and a business budget is such a written plan in which all aspects of business operations with respect to a definite future period are included. It is a formal statement of policy, plan, objectives and goals established by the top-level management in respect of some future period (Gupta, 1981:136).

A budget is forecast, in detail, of the results of an officially recognized programmed of operations based on the highest reasonable expected operating efficiency.

Budget is defined as a comprehensive and coordinated plan, expressed in financial terms for the operations and resources of enterprises for some specified period in the future (Fregmen, 1976:256). According to his definition the essential elements of a budget ate:

- Plan
- Operations and Resources
- Financial Terms
- Specified Future Period
- Comprehensiveness
- Co-operation

Therefore, we can say that budget is a tool, which may be used by the management in planning the future course of action-and in controlling the actual performance.

2.1.10 Budgeting: As a Device of Profit Plan

Budgeting is a forward planning. It serves basically as a device (tool) for management, control; it is rather pivot of any effective scheme of control. Budgeting is the principal tool of planning and control offered to management by accounting functions (Welsch, et al., 1999:346). The prime objective of budgeting is to assist in systematic planning and in controlling the operations of the enterprises. In fact budgeting is best sources of communication and an important tool in the hands of management. Since, budgeting deals with fundamental polices and objectives, it is prepared by top management. A formal budget by itself will not ensure that a firm's operations will be automatically geared to the achievement of the goals set in the budget. For this to happen, the top-level managers and lower level employees have to understand the goals and support them and co-ordinate their efforts to attain them.

Budgeting is a device of a planning and control that serves as a guide to conduct operation and a basis for evaluating actual results. Actual results can be judged being satisfactory or unsatisfactory in the light of the relevant budgeted data and also in the light of changes in conditions. Company controls operations through its budgeting and responsibility reporting system. Top executive are able to control every area of the organization through a systems of budgetary planning and control reporting by responsibility area.

Budgets are an important tool of profit planning. The main objectives of budgeting are:
- Explicit statement of expectations
- Communication
- Co-ordination
- Expectation as a framework for judging performance.

2.1.11 Essentials of an Effective Budgeting

An effective budgeting system should have some essential feature to ensure best results. The following are the chief characteristics of an effective budgeting.

Sound Forecasting

Forecasts are the foundation of budgets, these forecasts are discussed by the executives and when most profitable combinations of forecasts are selected they becomes budgets. The sounder are the forecasts better result would come out of the budgeting system.

An Adequate and Planned Accounting System

There should be proper flow of accurate and timely information in the enterprise which is, must for the preparation of budgets. This can be ensured only by having an adequate and planned accounting system in the firm.

Efficient Organization with Definite Lines of Responsibility

An efficient adequate and best organization is imperative for budget preparation and its operation. Thus a budgeting system should always be supported by a sound organization structure demarcating clearly the lines of Authority and responsibility. Not only this, there should be a true delegation of authority from top to low levels of management. This will provide adequate opportunity to all executives to make decisions and also to participate in the function of budget preparation. Thus, an efficient organization helps not only in budget co-ordination but it also plays important role in budget co-ordination and operation.

Formation of Budget Committee

As mentioned earlier, budget committee receives the forecasts and targets of each department as well as periodic reports and finalizes. And also approves the departmental budgets. Thus in order to make a budgeting system more and more effective, a budget committee should always be set up.

Clearly Defined Business Policies

Every budget reflects the business policies formulated by the top management. In other words budgets should always prepare talking in to account the policies set for particular department or functions. But for this purpose, policies should be precise and clearly defined as well as free from any ambiguity.

Availability of Statistical Information

Since budgets are always prepared and expressed in quantitative terms. It is necessary that sufficient and accurate relevant that should be made available to each department. Such data may not be available from accounting system alone and therefore they may be processed through statistical technique. These data should be as far as possible, reliable accurate and adequate.

Support of Top Management

If a budget program is to be made successful, the sympathy of each member of the management team, it should start preferably from top level (chairman). The enthusiasm for budget operation as well as direction for it should initiate and come from top.

Good Reporting System

An effective budgeting system also requires the presence of a proper feedback system. As work proceeds in the budget period, actual performance should not only be recorded but it should also be compared with budgeted performance. The variations should be reported promptly and clearly to the appropriate levels of management.

Motivational Approach

All the employees or staff other than executives should be strongly a properly motivate towards budgeting system. In an organization it is needed to make each staff member feel too much involved in the budgeting system. To meet this end motivational approach towards budgeting should be followed.

2.1.12 Fundamental of PPC

Comprehensively profit planning and control is one of the more important approaches that has been developed to facilitate effective performance of the management process. The concepts and techniques of PPC have wide application in individual business enterprises, government units, charitable organizations and virtually all group endeavors. "The fundamental concepts of PPC include the underlying activities or tasks that must be carried out to attain maximum usefulness from PPC. The fundamentals of PPC are (Welch, et al., 2001:235):

1. A management process that includes planning organizing, staffing, leading and controlling.
2. A managerial commitment to effective management participation by all levels in the entity.
3. An organization structure that clearly specifies assignments of management authority and responsibility at all organization levels.
4. A management planning process.
5. A management control process.
6. Continuous and consistent co-ordination of all the management functions.

7. Continuous feed forward, feedback, follow up, and re-planning through defined communication channels (both downward and upward).

8. A strategic profit plan.

9. A tactical profit plan.

10. A responsibility accounting system.

11. A continuous use of the exception principle.

12. A behavior management program

2.1.13 Profit Planning and Control Process

A PPC program includes more than the traditional idea of a periodic or master budget. Rather, it encompasses the application of a number of related management concepts through a variety of approaches techniques and sequential steps. These steps are out lined in this study in the following manner.

Identification and Evaluation of External Variables

The variable identification phase of the PPC process focuses on (1) identifying and (2) evaluating the effects of the external variables. Management planning must focus on how to manipulate controllable variables and how to work with the existing situation of non-controllable variables. Variables, which have a direct and significant impact on the enterprises, are called relevant variables. Variables may have their different relevancy according to the market nature. For the enterprises purpose the external relevant variables are, population, G.N.P. competitive activities product line, and industry sales. And so far internal variables are concerned employees, capital, research productivity, pricing, operating costs, advertisements etc. A particularly significant phase of this analysis includes an evaluation of the present strength and weakness of the enterprises. The comprehensive PPC approach is based on the expectation that these significant aspects of operations will be critically analyzed and evaluated periodically and in an orderly manner (Welch, et al., 2001:235).

Development for the Board Objectives of the Enterprises

Development of the broad objectives of the enterprises is a responsibility of executive management. Based on a realistic evaluation of the relevant variables and an assessment of the strength and weakness of the organization, executive management, can specify or restate this phase of the PPC process.

The statement of broad objectives should express the mission, vision and ethnical character of the enterprise. Its purpose is to provide enterprise identify continuity of purpose is to provide and identification. One research study listed the purpose of the statement essentially as follows.

1.   To define of the purpose of the Co.
2.   To clarify the philosophy character of the Co.
3.   To create particular climate with in the business.
4.   To set down a guide for managers so that the decisions they make will reflect the best interest of the business with fairness and justice to those concerned.

Development of Specific Goals for the Enterprises

This component of a comprehensive PPC process is to bring the statement of broad objectives into sharper focus and to move from the realm of general information to more specific planning information. It provides both narrative and quantitative goals that are definite and measurable. These are specific goals that relate to the enterprises as a whole and to the major responsibility centers.

These goals should be developed by executive management as the second component of the substantive plan for the up coming budget year. Executive management should exercise leadership in this planning phase so that there will be a realistic and clearly articulated framework with in which operations will be conducted toward common goals.

Development and Evaluation of Company Strategy

Companies' strategies are the basis thrusts ways and tactics that will be used to attain planned objectives and goals. Some examples of basic strategies are:

- Increase long-term market penetration by using technology to development new products and innovation the product.
- Emphasize product equality and price for the top market.
- Expand market the company will not enter foreign markets in the foreseeable future.
- Market with low price to expand value.
- Use both institutional and local advertisement program to build market share.
- Improve employee moral and productivity by initiating a behavior management program.

Executive Management Planning Instruction

Executive management explicitly establishes a planning foundation that is a condition precedent to the movement in the planning foundation the statement of planning guidelines is set as executive management instructions and is disseminated in order to initiate a sophisticated and potent move from broad corporate planning to the development of profits plans by each major responsibility center in the enterprises. It is simply a communication steps from executive management to the lower levels of management and it should adopt the fundamentals of full communication.

Preparation and Evaluation of Project Plans

Periodic plans and project plans are different in feature and functions. It will be recalled that project plans encompasses different time horizons because each project has a unique time dimension, they encompasses such items as plans for improvements of present, products, view and expanded physical facilities, entrance in to new industrial unit from products and industries and new technology and other major activities that can be separately identified for planning purpose. The nature of projects is such that they must be planned as separate units.

Consistent with this approach during the formal planning cycle, management must evaluated decide up on the plan status of each project in process and select any new projects to be initiated during time dimension covered by the up coming strategies and tactical profit plans.

Development of Strategies and Tactical Profit Plan

When the managers of the various responsibility centers in the enterprises receive the executive management planning instruction and the projects plans, they can begin intensive activities to develop their respective strategic or tactical profit plans. The strategic and tactical profit plans are usually developed concurrently. Certain format and procedural instructions should be provided by a centralized source, normally the financial functions, to establish the general format, amount of detail and other relevant procedural and format requirement essential for aggregation of the plans of the responsibility centers, into the overall profit plans. All of this activity must be coordinated among the centers in conformity wit the organization structure. When the two profit plans for the overall enterprises are completed, executive management should subject the entire planning package to a careful analysis and evaluation to determine whether overall plans are the most realistic set that can be developed under the circumstances. When this point reaches the two profit plans should be formally approved by the top executive and distributed to the appropriate managers.

Implementation of Profits Plans

That profit plans strategies should be implemented by every level management is an accepted norm. Implementation of management plans that have been developed and approved in the planning process, involves the management functions of leading subordinates in attaining enterprises objectives and goals. Thus effective management at all levels requires that enterprises objectives, goals, strategies, and policy to be communicated and understood by subordinates. There are many facets involved in management leadership. However the comprehensive PPC program may aid substantially in performing this function, plans, strategies and policies foundation for effective communication. The plan should have been developed with the managerial conviction that they are going to be met or exceeded in all major respects. If these principles are effective in the development process, the various effective and supervisor will have a clear understanding of their responsibilities and the expected level of performance.

Use of Periodic Performance Reports

Only implementing the strategy will be on no meaning when the implementation is not checked and trial whether used appropriately. So that the significance has been raised that monthly and three monthly performance reports are to be prepared.

Follow Up

It is an important part of control. Because of performance reports are based on assigned responsibilities, they are the basis for effective follow up actions. Finally, there should be a special follow up of the prior follow up actions. This step should be designed to:

- Determinate the effectiveness of prior corrective action and
- Provide a basis for improving future planning and control procedures.

2.1.14 Basic Assumptions and Limitations of Profit Plan

Profit planning systems are more common in business organizations and non-business organization. But there are so many assumptions of using profit-planning program. Firstly, the basic plans of the business must be measured in items of money, if there is to be any assurance that many will be available for the needs of the business. Secondly, it is possible to plan for the future of a business in a comprehensive way, coordinating every aspect of the business, with every other aspect to establish optimum profits goals. Thirdly, profit planning is preplanning not merely what to do if things workout as forecasted, but also what to do if things work out differently from the forecast. In developing and using a profit planning and control (PPC) program, the following limitations should consider:

1. Profit plan is based on estimates.
2. A PPC program must be continually adapted to fit changing circumstances.
3. Execution of a profit plan will not occur automatically the profit plan is not a substitute for management.

The profit plan should be regarded not as a master but as a servant. It is not one of the best tools yet devised for advancing the affairs of a company and the individuals in their various spheres of managerial activity. It is not assumed that any profit plan is perfect. The most important consideration is to make sure, by intelligent use of profit plans that all possible attainable benefits are derived from the plans as rendered and to re-plan when there are compelling business reasons (Welsch, et al., 1998:265).

2.1.15   Development of Profit Plan

Development of profit plan in commercial Bank begins with the preparation of various functional budgets. Those functional budgets are in fact the picture of various activities of the Bank to be performed during a particular period of time. Therefore the functional budgets of a Bank are activity based such as budget for deposit collection, budget for lending and investments, budget for non-fund based business, budgets for expenditures and revenues. The development of profit plans process that involves managerial decisions and ideally a high level of management participation. The following are the budgets, which are developed in a bank while making a profit plan.

2.1.16   Resources Mobilization Plan or Budget

Planning for resources mobilization is the foundation for planning in a bank. The all other planning is based on it. The major and the sustainable resource of a bank are the customer deposits. Therefore, the plan for resources mobilization has a primary focus on the customer deposit mobilization. The lending and investment activities are depended on the deposit mobilized by the Bank. So the deposit mobilization or collection plan is the starting point in preparing the other different plan.

Deposit mobilization is the primary function of a bank, which has major contribution in the total resources of the bank. In terms of cost for the Bank, customer's deposit are of two kinds, viz. (i) interest free deposits i.e. current deposits, margin deposits etc. and (ii) interest bearing deposit i.e. saving deposits, fixed deposits of various tenure, call deposits etc. The interest free deposits are cost free but are generally volatile in nature. Those can be withdrawn without restriction from the bank, thus can not be invested into higher income yielding assets. Further, interest bearing deposits involve cost of deposit but their retention ratio with the bank are much better so they can be put to high income yielding assets having longer tenure. Therefore, a proper mix of cost free and costly deposits corresponding to short term and longer term deposits are to be maintained by the bank in its deposit mix in order to minimize its average cost of deposit at the same time having comfortable mix of income yielding assets. The cost of deposit of banks is also affected by the prevailing deposit interest rate of other banks in the market.

Budgeted targets for deposit mobilization during a particular year is set in advance with each view of optimizing the cost of deposit and the same are allocated to the different branches of the banks. Such allocations may be regarded as the tactical plan for deposit mobilization of the banks. Banks resources other than customer deposits are the borrowing from other banks and the capital fund. Generally banks borrows from other banks to meet temporary requirement of liquidity which may occur, sometimes, during the occurs of banking operation caused due to unexpected withdrawals of deposit or deferment in loan repayments by the borrower by some reason or other. Such activities are managed from the Head Office with the least possible cost.

Among the capital fund, the equity capital is formed generally one time during opening of the bank. The central bank (NRB) may from time to time instruct the bank to enhance the paid up capital to improve the capital adequacy of the bank.

Further, the bankers may choose by themselves whether or not to increase the owner's capital by raising the other item included in capital funds beside paid up capital and general reserves. It is always better to have a higher capital fund base of a bank because, creation of bank's assets, and the size of lending to any particular borrower are tried up with the capital adequacy requirement by the central Bank. As per NRB directives, banks shall have to build their capital base at least of 12 percent by the end of FY 2060/61. And a bank can take the size of exposure per borrower equivalent to maximum of 25 percent of its core capital in fund based, and 50 percent of than in non-fund based exposure (Welsch, et al., 1998:126).

2.1.17   Resources Deployment Plan or Budget

Planning for development of resources starts from assessment of nature of resources to be mobilized. That is the assets are allocated on the basis of the nature of resources. This approach of deployment of resources is called asset allocation approach. The fundamental criterion which must be followed in allocating funds for acquiring different types of assets is that the velocity-turnover rate of different sources of supply of fund determines the appropriate maturity of the assets acquired through fund utilization, for instance while relatively stable fund, like saving deposits, fixed deposits and paid up capital could be used to buy long dated high yielding securities, demand deposit which are more volatile, could be used to acquire relatively liquid

assets like cash or money at call and short notice on which little or no return is made by the bank (Vaish, 1996:365). Funds kept as cash in vault and as balance with NRB and other banks in current account are the most liquid assets of the bank. Normally banks have to maintain certain fixed percentage of their deposit liability in this form as directed by the Central Bank from time to time. There is no yield in the fund deployed as liquid assets.

Deployment for lower income yielding assets are generally placing the funds in short term securities, treasury bills etc. which provides reasonable liquidity to be bank as well as yield some return although they are at very low rate. Major portion the income of the Bank comes as interest income from the resources deployed to loans advances and Bill discounting (LDO). As the most part of the resources are for LDO. Banks make its lending budgets in advance as per their lending policies. Lending targets and fixed at various sector of economy for various kinds of trades and commercial activities and to various borrowers ensuring well diversification of the assets. The targets are allocated to the branches, which are generally operated as separated profit centers.

2.1.18 Planning for Non-Funded Business Activities

Other activities of commercial banks where it does not have to involve its fund yet it can generate other income are called non-funded business activities of the Bank. They are usually letter of credit and Bank guarantee issuance business of the bank where the bank undertakes payment liabilities, which are contingent in nature and the banks charges certain percentage of commission on such transaction to their client whoa re availing these facilities from the bank. The bank fixes annual target for such business and those are allocated to the branches of the bank.

Expenditure Planning

Express planning and controlling are very necessary for supporting the objectives and planned programs of the firm. An expense is related with profit. It is real fact, that the minimization of cost is maximization profit. So the expenses must be planned carefully for developing a profit plan. In a Bank there are generally following types of expenses:

a.   Interest Expenses

b.   Personnel Expenses

c.   Office Operating Expenses

d.   Expenses meeting the loss in Exchange Fluctuation

e.   Non-operating expenses

f.   Expenses for provision for loan loss

g.   Expenses for provision for staff bonus

h.   Expenses for provision of income tax

The interest expenses are incurred while paying for the deposit mobilized by the bank and include the expenses incurred for interest payment in all kinds of interest bearing deposit as per the agreed rate between the bank and the borrower. In the total expenses of a bank, the portion of interest expenses is quite higher. Therefore, the expenses are categorized into interest expenses and other expenses while the later includes other expenses as mention above except the interest expense.

Interest expenses in a bank depend on the average cost of deposit (COD) mobilized by the bank. Lower the COD lower the interest expenses and thus higher the profitability. Therefore from profitability point of view banks plan their COD at lowest possible level. The nature of interest expense is that of a variable expense. The net earning from interest income of a bank deducting the interest expense for the deposit mobilized is called 'Spread' which is similar to the 'Contribution Margin' in sales of commodities by a manufacturing units.

Other expenses are the administrative expenses those are generally incurred by the bank during the course of its operation. Higher the volume of business transaction of a bank, higher will be the amount of its other expenses. Therefore, the expense should be related with the business activities, which ultimately should yield in income for the bank. Such other expenses from burden to the profitability as it consume the spread earned. Therefore budgets are prepared with an aim of reducing the burden as far as possible. The expenses budgets are formulated in co related with the activities of the bank and the targets are allocated to different branches.

Revenue Plan

Revenue of a bank is generated from the income yielding activities of the bank. Therefore while preparing the resources deployment plan and non-funded business activities plan, the banks make the estimation of the revenue in advance during the period for which the plan is developed. Revenues of a bank are generated in the following forms:

      a.   Interest income

      b.   Commission and discounts

      c.   Dividend

      d.   Other income

      e.   Foreign exchange income

      f.   Non-operating income

Generally the interest income of a commercial bank holds a major portion in total revenue of the bank and it provides the major source of earning of a bank. Therefore total income of a bank is categorized in two type viz. interest income and other income, while the later including other income items as listed above except the interest income.

The interest income is earned by charging interest on the fund deployed in interest earning assets such as loan and advances, overdraft, investments in government securities, debentures etc. For this study, the income from Bills discounting has also been treated as interest income, as we consider loans overdraft and bills discounting together as a single asset portfolio as LDO.

As the average rate of interest on LDO are comparatively higher than any other kind of income yielding assets, from the profitability point of view, higher asset allocation into LDO, higher will be the income. The other income are generate from other activities of the bank such as issuance of L/C Bank Guarantees, from remittance charges, cheque collection fee, locker charges, service charges, commitment charges, trading gain on foreign exchange, revaluation gain on foreign exchange reserves etc. The amount of other income of a bank greatly contributes in lowering the burden on the profitability. Higher the other income earned by the bank, lower will be the net burden amount and thus better will be the profitability of the bank.

Income of a bank is essentially activity based i.e. the volume of business. Higher the income generating activities of a bank, higher will be the amount of its revenue. Therefore the bank develops its plans for various activities in such a way that it optimizes its revenue.

2.1.19 Implementation of the Profit Plan

Development of an annual profit plan ends with the planned income statement, the balance sheet and the planned statement of changes in financial position. These three statements summaries and integrate the details of plans developed by management for the period. They also report the primary impact of detailed plans on the financial characteristics of the firm. Before redistributing the completed profit plan it is general desirable to recast certain budget schedules so that technical accounting mechanics and jargon are avoided as much as possible.

The redesigned budget schedules should be assembled in on logical order, reproduced and distributed before the first day of the upcoming budget period. The profit plan completion data is important. Issuance of a profit plan after the beginning of the budget period is one sure way of destroying much of the budget potential. Timely completion of the planning budget suggests the need for a budget calendar (Welch, et al., 1999:235).

The final test of whether the efforts and cost in developing a profit plan are worthwhile is its usefulness to management. The plan should be developed with the conviction that the enterprises are going to meet or exceed all major objectives. Participation enhances communication. If this principle is to be effective, the various executives and supervisors should have a clear understanding of their responsibilities. The copies of the complete profit plan be prepared and distributed to the member of executive management. The guiding principle in establishing the distribution policy might be to provide one copy to each member of the management team according to his/her overall responsibilities, while taking in to account the problem of security. After distribution of the profit plan a series of profit plan conferences should be held. The top executives discuss comprehensively the plans expectations and steps in implementation. At this top level meeting the importance of action, flexibility and continuous control may well be emphasized. In essence, each manager has to realize that the budget is a tool for his or her use. Conferences should be a held so as to convey the profit plan to each level of management.

The manager of each responsibility centre obtains an approved profit plan for this centre and it becomes the basis for current operations and excerpts considerable coordinating and controlling effects. Performance must be measured and reported to management. Execution of the plan is assured through control procedure must be established so that accomplishment, or failure is immediately known. On this basis action can be taken to correct or minimize and undesirable effects. Short term performance reporting is essential.

A budget program viewed and administrated in a sophisticated way does not hamper or restrict management, instead, it provide definite goals around which day today and mouth to mouth decisions are made. Flexibility in the use and application of both the profit plan and variable budgets also should be considered in detail. Flexibility in budget application is essential and it increases the probabilities of achieving or bettering the objectives (Welsch, et al., 1999:238).

2.1.20 Performance Reports

Performance reporting is an important part of a comprehensive PPC system. Its phase of a comprehensive PPC program significantly influences the extent to which the organization's planned goals and objectives are attained. Performance reports deal with control aspect of PPC. The control function of management defined as the action necessary to assure the objectives plans, policies and standards are being attended. Performance reports are one of the vital tools of management to exercise its control function effectively.

Special external reports, reports to owner and internal reports are specially presented in the organization. Performance reports include in internal reports groups. It is usually prepared on an monthly basis and follows a standardized format. Such reports are designed to facilitate internal control by management. Fundamentally actual results of reports are compared with goals and budget plans. Frequently they identify problems that require special attention since these reports are prepared to pinpoint both efficient and inefficient performance.

Features of Performance Reports

In comprehensive PPC, performance report is very important. The main objective of performance reports is the communication of performance measurement, actual results and the related variances. Performance reports offer management essential insights in to all the facts of operational efficiencies. Performance reports should be:

1. Tailored to the organizational structure and focus of controllability (that is by responsibility centers).
2. Designed to implement the management by exception principle.
3. Repetitive and related to short term period.
4. Adapted to the requirements of the primary users.
5. Simple understandable and reports only essential information.
6. Accurate and designed to pinpoint significant distinctions.
7. Prepared and presently promptly.
8. Constructive in tone.

Aspects of Performance Reports

The various managers use their performance reports depends on many factors, some behavioral and some technical. One important factor is the extent to while the performance reports serves the management and decisions making needs of the users. Top management needs reports that give a complete and readily comprehensive summary of the overall aspects of operations and identification of major events. Middle management needs summary data as well as detailed data on day-to-day operation. Similarly lower level management needs reports that must be detailed, simple understandable and limited to items having a direct bearing on the supervisor's operational responsibilities.

In the design and preparation of performance reports careful attention must be given that titles and headings should be descriptive; column heading and side caption should clearly identify the data, and the technical jargon should be avoided. Reports should not be too long and complex; tabulations should be avoided. Performance reports should be standardized to a reasonable degree and if should be relevant.

Performance reports should be available on a timely basis. To attain a realistic balance between immediate reporting and the costs of detailed reporting, monthly performance reports are widely used in the organization.

2.1.21 Concept of commercials banks

The term 'Bank', signifies the place where we keep our money for safe keeping as well as for earning some interest or the place from where we borrow money as loan. As regard to the borrowing money from the Bank, we may consider its function as that of money lender in our society. But a bank a moneylender is different in the sense that the former lends the money which is principally collected from their depositors while later does so from its own resources. The Random House Dictionary of the English Language defines the bank as an institution for receiving money and is some cases, issuing notes and transiting other financial business (Stein and Urdang, 1985:29).

Banks refer to an institution, which perform the activities related with money and credit. Banks have been traditionally regarded as merely the purveyor of money. But today they are not merely purveyor of money but creator or manufacturer of money in an economic system. Maclead, in this book 'theory of credit' has defined the bank not only as an institution, that borrows and lend money but also the institution for creating credit. In the opinion of Sayers, Banks are the institutions whose debts usually are referred to as bank deposit and are commonly acceptable in final settlement of other people's debt. He has taken the bank deposit as the debt owe by bank and that particular depositor can set off his liability with his creditor by the deposit in the Bank to the extent of his deposit amount.

The Commercial Bank Act 2031, under which commercial banks in Nepal are established and operated, has defined Commercial Bank as a bank which exchanges money, accepts deposit, advances loans and performs other commercial transactions and which is not specially established with the objectives of co-operative, agricultural, industrial or any other of such kind of specified purpose. The Act has defined the commercial Bank on the basis of its objectives and activities. Referring to the act, a commercial bank:

- Should be established with a specified objective of co-operative, agricultural, industrial or any of such of specific purpose.
- Should accept customer deposit.
- Should advance loans and make investments.
- Perform commercial transactions.

The same Act has provided for the modalities of establishing a commercial bank, as per which a commercial bank can be established under the Company Act as a limited liability company only with the recommendations of Nepal Rastra Bank.

From the various definition made and opinion produced regarding commercial banking, it can be concluded that a commercial bank is set up to collect scattered funds and employ them to productive sector of economy.

2.1.22 Evolution of Commercial Bank

The world 'Bank' is derived from the word 'Banco', "Bancus' or 'Banque' all meaning to a bench. This refers that early bankers transacted their money lending activities on banches in the marketplace exhibiting the coins of different countries in different denominations for the purpose of changing and or lending money. Some writers are of the opinion that the word 'Bank' came from the German word 'Banc' meaning joint stock fund (Varshney, 1993:169).

In its native from, banking is as old as in the authentic history and origins of the modern commercial banking are traceable in ancient times. In ancient Greece, around 2000 B.C., the famous temples of Ephesus, Delphi and Olympia were used as depositories for people surplus fund and these temples were the centers for money lending transactions. The pries of these temples acted as financial agents until public confidence was destroyed by the spread of disbelief in the religion. Later, however, for a few centuries, banking as an organized system of money lending receded because of the religious belief that the charging of interest was immoral. However, the banking as we know today, made its first beginning around the middle of 12th century in Italy. The Bank of Venice, founded in 1157 A.D. was the first public banking

institutions. Following this, in 14th century, the Bank of Barcelona and the Bank of Genoa were established in 1401 A.D. and 1407 A.D. respectively (Vaish, 1996:192).

In England, start of Banking can be accounted for as far back as the region of Edward III. Those days, the Royal Exchanger used to exchange the various coins into British money and also used to supply foreign money to the British men going out of the country. The bankers of Lombardy were famous n medieval Europe as the credit of planning the seed of modern banking in England goes to them when they settled in London in the locality now famous as the Lombard Street.

The goldsmiths can be considered as the initial Bankers in England as they used to keep strong rooms with watchmen employed. People entrusted their cash to them. The goldsmiths used to issue duly signed receipt of the deposits with the undertaking to return the money on demand charging some fee for safe keeping. These undertaking helped in gaining a further confidence of the public therefore the money were kept with them for longer periods. They were thereby encouraged to lend some part of these funds, which became profitable business to them. Therefore they started offering interest on the deposits to attract more funds. In the course of time independent banking concerned were set up. The Bank of England was established in 1694, under a special Royal Charter. Further in 1833 legislative sanction was granted for establishment of joint stock banks in London, which served as a big impetus to the development of joint stock banking. These banks took the initiative for extending current account facilities and also introduced the facilities of withdrawals through cheques.

In India, the ancient Hindu scriptures refer to the money lending activities in the Vedic period. During the Ramayan and Mahabharata eras, banking had become a full-fledged business activity and during the smiriti period (after the Vedic period), the business of Banking was carried on by the members of Vanish community. Manu, the great law giver of the time speaks of the earning of interest as the business of Bishyas. The bankers in the Smriti period performed most of those functions which the banks in modern times performs such as the accepting of deposits, granting loans, acting as the treasurer, granting loans to the king in times of grave arises and banker to the state and issuing and managing the currency of the country (Vanish, 1992:183).

In Nepal, although the monetary history dates back to 1ˢᵗ century (Lichhavi Dynasty), the banking history is comparatively very short. The development of organized banking has started in Nepal only from around the starting of 20ᵗʰ century of Bikram Sambat. Nepal Bank Limited, established in B.S. 1994 with an authorized capital of Rs.1 crore and paid up capital of Rs.8 lacs 42 thousand is the first organized bank established in Nepal (NRB, 2045). Although during the Prime Minister-ship of Rana Prime Minister Ranadwip Singh an office called "Tejarath Adda" was established for granting loans to government officials and also to the general public against the security of gold, silver and other valuables, it could not be considered as Bank in real sense as it did not collect deposit. Later after establishment of Nepal Bank, the functions of "Tejarath Adda' were limited upto providing loans to government officials only (NRB Report, 2045:12).

Banking development in Nepal found another break after the establishment of Nepal Rastra Bank, the Central Bank of Nepal in 2013 B.S. (NRB, 2045:14). This has helped organizing the monetary system in the country before which the duel currency system (Indian and Nepalese currency) was prevailing in the system. Larger sector of economy was none monetized. In the course of organized development of banking sector, second commercial bank, Rastriya Banijya Bank was established in 2022 B.S. at the state ownership (NRB Report, 2045:16). Later on, in FY 2039/40, the policy for allowing establishment of foreign joint venture banks was taken with an aim of having fair competition and skill development in banking sector, which had added a new dimension in development of banking in Nepal. Accordingly, Nepal Arab Bank Ltd. (presently renamed as Nabil Bank) has been established as the first joint venture bank in Nepal in 2041 B.S. (NRB Report, 2045:17).

Afterward, various commercial banks were opened with foreign joint venture under private sectors in Nepal which had contributed a lot to bring the commercial banking at present day position. Nepal Bangladesh Bank has established in the year 2051 B.S.

2.1.23 Role of Commercial Banks in the Development of Economy

Commercial Banks play an important role in facilitating the affairs of the economy in various ways. The operations of commercial Banks record the economic pulse of the country. The size and composition of their transaction reflect the economic happening in the country. Commercial Banks have played a vital role in giving the direction in economic growth over the time by

financing the requirement of industries and trade in the country. By encouraging thrift among the people, banks have fostered the process of capital formation in the country. In the context of deposit mobilization, commercial banks induce the savers to hold their savings in the form of bank deposits thus help bringing the scattered resources into the organized banking sector which can be allocated to the different economic activities. In his way they help in country's capital assets formation. Through their advances, banks also help the creation of income out of which further saving by the community and further growth potentials emerge for the good of the economy. In a planned economy, banks make the entire planned productive process possible by providing funds to the public sector, joint sector or private sector for any type of organization. All employment income distribution and other objectives of the plan as far as possible subsumed into the production plan which banks finance (Vaish, 1996:265).

The importance of commercial banks in directing the economic activities in the system is immense. Not only in the highly developed economies where the commercial and industrial activities are paralyzed in the absence of banks, even in the developing countries' economy are most of the economic activities particularly of organized sectors bank based. Therefore, in a nutshell it can be said that the growth of the economy is tied up with the growth of the commercial banks in the economy.

2.2 Review of Previous Studies

A comparative study on profit planning, in the context of particularly commercial banks seems to be a new subject of study for research analysis. So far as the study concerned with the profit planning of commercial banks. "Profit planning in commercial banks with a case study of Nepal Bangladesh Bank" for the purpose of the partial fulfillment of the requirement for Master Degree in Business Administration. He has studied the profit planning in commercial banks with a case study of NB Bank. The main objective of this study is to trace out the situation of profit planning in Nepalese commercial banks. His major findings are:

1. NB Bank lacks active and organized planning department to undertake innovative products research and development works.

2. Objectives of the banks are expressed in literary form, and not specified clearly, therefore there is a danger if it being misinterpreted in the ways of one's benefit by the concerned.

3. Major concentration of resources mobilization of NB Bank is at deposit mobilization. In this respect they are incurring higher cost toward deposit mobilizations.

4. Bank's resources deployment for non yielding liquid assets (cash and bank balance) is increasing every year, which is detrimental to profitability objectives, but it is supportive to meeting liquidity requirement of the Bank.

5. Outstanding letter of credit liability of the bank is increasing every year however the growth is not consistent.

6. Interest expenses amount of the bank is the highest among other income items in the total revenue.

7. Interest income amount of the Bank is the highest among other income items in the total revenue.

8. The average current ratio of the bank has found to be always higher than standard ratio 2:1, which shows satisfactory liquidity position of the bank.

Sharma recommended following major points in his study for the consideration to improve the existing situations:

1. Bank management should adopt the policy of appropriate authority delegation at all level of management in order to save the valued time of the chief executive officer for other productivity use.

2. Objectives of the banks should be clearly defined in order to avoid the risk of it being misinterpreted.

3. The average cost of deposit of the bank is high, therefore bank should try to lower it by mobilizing more and more low cost or cost free deposit thereby reducing the interest cost because due to the high cost of deposit, bank is forced to invest its fund more on high yielding assets, which are generally not liquid and obviously risky for the bank.

4. The Nepal Rastra Bank has put the restriction on the difference of average rate of interest income and average rate interest expenses of the bank (i.e. spread) not to exceed 5 percent. Therefore the bank has to put more focus on the other kind of non founded activities by

which it shall increasing income from other sources than interest to increase its profitability.

5. Expenses can not be avoided and always are growing with increasing activities, but it should be optimize and should be related with the income generating activities. Bank should minimize those expenses which are not related to income earning. Other expenses than interest form a burden to the gross profit may in (interest margin) of the bank, therefore lowering the other expenses the bank shall enhance its profit.

6. Net profit of the bank is the amount, which is obtained by subtracting the amount of the net burden from the amount of gross interest margin. Therefore, NB Bank shall attempt to lower the burden cost by increasing the other income and decreasing the other expenses. At the same time it should take a policy to make the interest margin at the maximum extent as followed by the central Bank's norm.

Bhattrai, Bishnu Prasad (2005), has tried to investigate "*The sales budget of Manufacturing Public Enterprises"*. The fundamental objective of the study is to highlight and appraise the current practice of sales planning and it s effectiveness in manufacturing company. Other manor objectives are:

- To analyze the sales budget prepared by HPPCL.
- To evaluate the variance between standard and actual result.
- To comparison of sales with profit of the HPPCL.

Bhattarai concluded has research with some finding's and recommendations. His manor findings were:

- Actual sales are very below than the budgets sales.
- Sales foreasting is not based onrealistic ground. HPPCL only use the sales force composite method in sales forecasting but it has not practice of using statistical techniques in sales forecasting.
- Lack of proper management to supply the herbs and other herbal products in international market.
- There is no cost classification system in the company. The costs ar not segregated into fixed and variable in systematic manner.

There is a serious lack of management expertise, which has let to formulation of un-realistic, haphazard plans. The various are unfavorable very high.

Indra Mani Pandey (2008) conducted a research on the topic,*'A study on Profit Planning of Commercial Bank (In comparative study of SBI Bank Ltd. And Himalayan Bank Ltd.)*

Major Objectives of his study were;

- To highlight the current profit planning premises adopted and its effectiveness in HBL and SBI .
- To analyze the variance of budgeted and actual achievements.
- To study the growth of the business of the Banks over the period.
- To provide suggestion and recommendations for improvements of the overall profitability of the banks.

Major Findings of the study

Major concentration of the analysis on profit planning in commercial banks is at deposit mobilization. In this respect, they are incurring higher cost toward deposit mobilizations. The average growth rate of total deposit of SBI L is more than of HBL i.e. 17.0725% > 1.36%.

- The LABP of both banks are fluctuating rate over the study period, but in the FY 2002/03 is negative growth of SBI L by -1.54% (on the basis of FY 2001/02). Comparatively SBI L is good position than HBL. From the average growth rate i.e.
- 16.08% > 14.11% respectively.
- In the SBI L, NLABP has found high at first years and negative in second year then after fluctuate. At the last it growth rate is 22.19 percent (on the basis of 2004/05). Similarly the HBL, NLABP has found positive in 5 years and negative in two years. At last year it's growth rate is negative by -7.79 percent (on the basis of 2004/05)
- Expenditure of the both banks are increasing trend but in the FY 2002/03 of SBI L and FY 2001/02 of HBL is decreased. In comparatively more increasing trend in the HBL than SBI L.

Major Recommendations

The deposit collections of both the banks are increasing over the period but the collection of HBL is not satisfactory in comparison with SBI L. So, it is recommended to HBL to collect more amounts as deposit through large variety of deposit scheme and facilities, like cumulative deposit scheme, gift cheques recurring deposit scheme (life insurance), and monthly interest income. The minimum amount needed to open on account should be minimizes so that it will attract other small deposits.

- The average cost of deposit of SBI L is high than HBL. Therefore SBI L should try to lower it by mobilizing more and more low cost or lost free deposits thereby reducing the interest cost because due to high cost of deposit, bank is forced to invest its fund more on high yield assets, which are generally not liquid and obviously risky for the bank.
- Correlation between interest expenses and deposit of HBL is negative, it shows there is no relation between interest expenses and deposit but it is not possible. So HBL should increase its cost of deposit rate.

Narendra Kunwar (2009), has submitted thesis on the topic *'Profit Planning of Nabil Bank Limited.'*

Major Objectives of the study

To find out the relationships between total investment loan and advances, deposit, net profit and outside assets.

- To identify the investment priority sectors of commercial Bank
- To assess the impact of investment on profitability.
- To analyze and forecast the trend and structure of deposit utilization and its projection or five years of Commercial Bank
- To provide suggestion and possible guidelines to improve investment policy and its problems.

Conclusion of the study

The study is conducted on profit planning of Nabil Bank, which is one of the leading banks in Nepal. NABIL has been maintaining a steady growth rate over this period. NABIL has earned a net profit of Rs 747 million for the fiscal year 2007/08 and this comes to be 10.83% more as

compared to the same period in the previous fiscal year. NABIL earned a operating profit of Rs 1122.7 million for the fiscal year 2007/08 and this comes to be 8.19% more as compared to the same period in the previous fiscal year. Similarly total deposit is Rs 31915 million for the fiscal year 2007/08 and this comes to be 36.72% more as compared to the same period in the previous fiscal year. Similarly total loan is Rs 21759 million which is increase by 36.8% compare as previous fiscal year. Nabil bank has adequate liquidity position. It shows that bank's investment is appropriate. Now in Nepal, many banks and other financial institution are functioning to collect deposits and invest money somewhere in the investigable sectors. Remittance has also help to increase the amount of deposit in bank. On the other hand due to political crisis economic sectors have been damaged. Most of the projects have been withdrawn due to security problem. So, banks are utilizing their fund in home loan, auto loan and share loan etc in consumer banking. Loan loss provision to total loan and advances ratio of NABIL is in decreasing trend. This shows that good quality of assets in total volume of loan and advances. Total non-performing assets to total assets ratio is also in decreasing trend. It indicates proper mange of total asset. This ratio indicates the more efficient operating of credit management. Ratios are decreasing trends it indicates the bank is decreasing the non-performing loan from total loan. Interest expenses to total deposit ratio of NABIL is increased in fiscal year 2007/08. That this ratio does not indicate higher interest expenses on total deposit. Equity portion of the bank is slightly increasing in the recent years due to issue of directives by Nepal Rastra Bank (NRB) the entire bank to increases it paid up capital. Every commercial has to meet 2000 million paid up capitals till 2070 B.S. Nabil Bank has currently Ordinary Shares of 6,892,160 Rs. 100 each 689,216,000 paid up capital. NRB has issued that direction to provide more safety to the customers. Therefore, bank has continuously increasing their capital every year.

Major Recommendations

Cash and bank balance of NABIL is high. Banks efficiency should be increased to satisfy the demand of depositor at low level of cash and bank balance does not provide return to the bank. Therefore some percentage of the cash and bank balance should be invested in profitable sectors.

- Bank is suggested to make policy to ensure rapid identification of delinquent loans. Bank should make immediate follow-up of loan until it is recovered. The recovery of loan is very

challenging as well as important part of the bank. Therefore bank must be careful to strengthen credit collection policy

- NABIL should avoid extending credits merely based on oral information presented at the credit interview. Historical financial and trade records should be obtained for proper assessment of the proposal.

Luna Maharjan (2009) conducted a study on the topic 'Profit Planning in a Commercial Bank (a case study of Standard Chartered Bank)'

Major Objectives of the study

To highlight the current profit-planning premises adopted and its effectiveness in Standard Chartered Bank.

- To observe Standard Chartered Bank's Profit Planning on the basis of overall managerial Budgets developed by Bank.
- To analyze the variance of budgeted and actual achievements
- To study the growth of the business of the Bank over the period.
- To make necessary suggestions and recommendations.

Major Findings of the study

The decision making process is highly centralized however, management takes the feed forwards for annual planning and strategy building through manager conferences and trategy building through manager conferences and strategic meeting organized twice in every year at the head office.

- Interest expenses amount is the highest among total expense items of the bank every year.
- The total deposit of the bank is found increasing every year corresponding to the increase in interest expenses the total deposit is perfectly and positively correlated with total interest expenses.
- The Profitability ratio shows that it is a useful measurement for all financial researchers invested in the assets. As Return on assets is high during 2005/06 with 2.55% and return on equity is high in same fiscal year with 37.55%. This shows that overall efficiency of the SC Bank and better utilization of total resources available is higher and strong.

Major Recommendations

Profit Planning & control technique should be used for making long term banking strategies and managerial decisions.

- Employee training & career planning at advance level should be given more focus in order to keep the man power updated with the changing practices and the technologies.

- The average cost of deposit of the Bank is high. Therefore, bank should try to lower it by mobilizing more and more low cost or cost free deposits thereby reducing the interest cost due to high cost of deposit, bank is forced to invest its liquid and obviously risky for the bank.

- Bank CD ratio is high, which is rather a compulsion to meet the cost of high cost deposits. Higher CD ratio although gives better return in short term, it hampers the liquid and is more risky for the bank and calls for more provision for loan loss. In this way, the profitability of the bank also get hampered on the long run. Therefore, the bank should improve its position from lowering the deposit cost and increase the investments in liquid assets although they are of low yield.

2.3 Research Gap

This study shall be a new study in this field as no study has been made so far in the profit planning of commercial banks i.e. comparative study on profit planning in Nepal Investment Bank Limited Limited, NABIL Bank Limited and Himalayan Bank Limited. This study has tried to indicate the implementation of profit planning system as well as to see how far the banks are practicing. This study has analyzed the financial position of NIBL, NABIL and BOK by applying the tools of ratio analysis and other mathematical and statistical tools. Finally it concludes the various findings of research and recommendations to the NIBL, NABIL and BOK.

Most of the past research studies about profit planning system are basically related to profit planning system of manufacturing sectors or production oriented activities. The researcher could find only one study so far that has been related to profit planning system of a commercial bank i.e. in NB Bank. All the research have pointed out that there is no proper profit planning system

and recommend for the effective implementation of profit planning system in the concerned institutions.

CHAPTER – III

RESEARCH METHODOLOGY

This chapter describes the methodology employed in this study. Research methodology is the systematic method of finding solution to a problem i.e. systematic collection, recording, analysis, interpretation and reporting of information about various facts of a phenomenon under study. In this study research methodology describe the methods and processes applied in the entire aspect of the study. This chapter describes research design, population, sampling procedure, sources of data and analysis of data.

3.1 Research Design

The research design is the conceptual structure within which research is conducted. It constitutes the blueprint for the collection, measurement and analysis of data. As such the design includes an outline of what the researcher will do from writing the hypothesis and its operational implications to the final analysis of data.

This study is an examination and evaluation of budget process in profit planning program of NIBL, NABIL and BOK. Various functional budgets and other related accounting information and statement of the banks are materials to analyze and evaluate the profit planning system of banks. Descriptive as well as analytical approaches have been adopted in this research. This is a comparative study research of commercial banks.

3.2 Population and Sample

As this research aims at studying the profit planning aspect of the commercial bank taking the reference of NIBL, NABIL and BOK and data have been analyze for several years of its operation. Here, all the commercial banks are population of the study and NIBL, NABIL and BOK have been selected as sample for the present study.

3.3 Data Collection Procedures and Sources of Data

This study is mostly based on secondary data. However, primary data and information have been obtained through informal discussions with the staffs of the bank. Secondary data have been collected from the annual published accounting and financial statement of the banks. Similarly other necessary data have collected from website, newspapers and related publications.

3.4 Research Variables

Loans/Advances overdrafts and Bills discounted (LDO), customer deposits, total resources, total deployment interest expenses, other expenses, interest income, other income etc. of the banks are the research variables of this study.

3.5 Analysis of data

Analysis is the careful study of available facts so that one can understand and drew conclusion from them on the basis of established principles and sound logic (Cottle etal; 1988, 29). This study mostly based the analysis of secondary data with the help of different statistical tools. Therefore the data have been collected accordingly and managed, analyzed and presented in suitable tables, formats, diagrams, graphs and charts. Such presentations have been interpreted and explained wherever necessary. Financial, mathematical and statistical tools are used to analyze the presented data, which includes ratio analysis, percentage, regression analysis, correlation, mean, standard deviation, coefficient of variance, percentile increment, etc.

3.6 Statistical tools

To draw the conclusion by analyzing the collected data simple statistical tool like arithmetic mean, multiple bar diagram, pie-chart are used and tabulation are used to implicit the comparative results.

3.6.1 Arithmetic mean average

The central values that represent the characteristics of the whole distribution or the values around which all items of the distribution tend to concentrate are called average. Arithmetic mean or arithmetic average is one of the important statistical measures of average. The arithmetic mean of a given set of observation is their sum divided by the number of observations.

3.6.2 Multiple Bar- diagrams and graphs

Diagrams and graphs are visual aids which give a bird's eye view of a set of numerical data which show the information in a way that enables us to make comparison between two or more than two sets of data. Diagrams are in different types. Out of these various types of diagram one of the most important form of diagrammatic presentation of data is multiple bar diagram which is used in cases where multiple characteristics of the same set of data have to be presented and compared.

3.6.3 Percentage

Percentage is one of the most useful tools for the comparison of two quantities or variables. Simply, the word percentage means per hundred. In other words, the fraction with 100 as its denominator is known as a percentage and the numerator of this fraction is known as rate of percent.

3.6.4 Coefficient of correlation(R)

Correlation analysis is the statistical tools use to describe the degree to which one variable is linearly related to another. The coefficient of correlation measures the direction of relationship between the two sets of figures. It is the square root of the coefficient of determination. Correlation can either be negative or positive. It always lies between +1 to -1. The degree of association between the two variables, say X and Y, and is defined by correlation coefficient (R)

$$R = \frac{xy}{\sqrt{x2}\sqrt{y2}}$$

Where,

$$X = X - \overline{X} \quad \text{and } Y = Y - \overline{Y}$$

3.6.5 Regression analysis

Regression is the statistical tool which is used to determine the statistical relationship between two (or more) variables and to make estimation (or prediction) of one variable on the basis of the other variable(s).In other words, regression is that statistical tool with the help of which the unknown value of one variable can be estimated on the basis of known value of the other variable.

3.6.6 Standard deviation ( )

The standard deviation is the absolute measure of dispersion. It is defined as the positive square root of the mean of the square of the deviation taken from the arithmetic mean. The greater the amount of dispersion or variability, the greater the standard deviation, the greater will be the magnitude of the deviation of the values from their mean. A small standard deviation means a high degree of uniformity of the observation as well as homogeneity of a series and a large standard deviation means just the opposite.

3.6.7 Coefficient of variation (C.V.)

The relative measure of dispersion based on the standard deviation is known as the coefficient of variation. It is independent of unit. So, two distributions can bitterly be compared with the help of C.V. for their variability. Less the C.V., more will be the uniformity, consistency, stable and homogeneous etc. and vice versa.

CHAPTER-IV

PRESENTATION AND ANALYSIS OF DATA

This chapter implies the presentation and analysis of data collected from various secondary sources. The chapter has been divided into two main sections. The first section of the chapter includes the presentation and analysis of data while the second section includes major findings of the study.

4.1 Financial Analysis of Commercial Bank

Financial analysis of the process of identifying the financial strength and weakness of the firm by properly establishing relationship between the items of the balance sheet. Here relevant ratio is calculated and appropriate interpretations are made. Analysis of financial ratio shows the performance of the concern banks.

Liquidity Ratio

Commercial Banks must maintain its satisfactory liquidity position to satisfy the credit needs of the commercial to meet demands for deposits, withdrawals, pay nation by obligation in time and convert non-cash assets into cash to fulfill immediate needs without loss of bank and consequent impact on long run profit.

Current Ratio

It is the relationship of current assets and current liabilities. Current assets can be converted in to cash with in short period of time normally not exceeding one year. Current liabilities are those obligation which are payable within short period. Current assets consist of cash and bank balance, money at call or short terms notice, loan & advances, investment in government securities and other interest receivable and other miscellaneous current assets. Current liabilities consist of deposits, loan and advances, bills payable. Tax provision, staff bonus, dividend payable and miscellaneous current liabilities.

Table 4.1

Current Ratio (Times)

Bank	Fiscal Year						Mean	S.D	C.V
	2000/01	2003/04	2004/05	2005/06	2006/07	2007/08			%
NIBL	1.04	1.05	1.06	1.05	0.94	2.38	1.25	0.5055	40.33
NABIL	0.76	1.27	0.92	0.94	0.97	2.08	1.16	0.4398	38.02
BOK	1.03	1.06	1.05	1.06	1.02	1.21	1.07	0.0636	5.94

(Source: Annual Report of Bank)

In the table 4.1 current ratio of commercial banks are analyzed. The table reflects that the current assets of all commercial banks have exceeded the current liabilities during the five years period. In general it can be said that all the banks have sound ability to meet their short term obligations in other words bank is capable of discharging the current obligations.

In case of NIBL, the current ratios are in increasing trend from fiscal year 2003/04 to 2004/05 but it has slightly decreased in the year 2005/06 by 0.01. NABIL has also increasing trend from fiscal year 2003/04 to 2007/08. Similarly BOK has a fluctuating trend ratio. In an average, NABIL has maintained lower current ratio, which states that liquidity position of NABIL is fair. The value of coefficient of variation of NIBL is 40.33% which is comparatively lower than NABIL and greater than BOK i.e. 40.33% < 38.02% > 5.94%. Thus it can be said that current ratio of NIBL is less consistence than BOK and is slightly consistence than NABIL.

4.1.1 Cash and Bank Balance to Total Deposit Ratio

Cash and bank balance are assets that constitute the banks first live of defense and consist of cash and hand foreign cash on hand cheques and other cash items balance with demotic banks and balance help aboard. This ratio measures the promotion of most liquid assets i.e. cash and balance among the total current asset of bank. Higher ratio shows the bank ability to meet demand for cash.

The table below shows cash and bank balance to total deposit ratio of NIBL. NABIL and BOK from the FY 2000/01 to 2007/08.

Table 4.2

Cash and Bank Balance to Total Deposit Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	18.25	11.03	17.02	7.84	10.39	11.25	12.63	3.7256	29.50
NABIL	5.13	6.78	8.51	6.87	3.83	3.26	5.73	1.8349	32.02
BOK	19.68	11.95	11.23	10.11	8.28	6.95	11.37	4.0842	35.93

(Source: Annual Report of Bank)

The table 4.2 shows the percentage of cash and bank balance to total deposit ratio position of NIBL, NABIL and BOK. The mean standard deviation and coefficient of variation of cash and bank balance to total deposit ratios of all banks are better. The above table reflects NIBL has fluctuating trend like wise 18.25%, 11.03%, 17.02%, 7.84%, 10.39% and 11.25% from the FY 2000/01 to 2007/08 respectively. It has maintained highest ratio in the FY 2000/01 i.e. 18.25% and lowest ratio in the FY 2006/07 i.e. 7.84%. Similarly NABIL and BOK have maintained fluctuating trend from the FY 2000/01 to 2007/08. In average NIBL has higher cash and bank balance to total deposits ratio than BOK and NABIL. It states that the liquidity position of NIBL is better in this regard.

The above analysis helps to conclude that, the cash and bank balance position of NABIL with respect to deposits is not better against the readiness to serve its customers deposits than that of the NIBL. So NABIL may invest in more productive sectors like short-term marketable securities, treasury bills etc ensuring enough liquidity which will helps the bank to improve its profitability.

4.1.2 Cash and Bank Balance to Current Assets Ratio

This ratio measures the proportion of most liquid assets i.e. cash and bank balance among the total current assets of bank. Higher ratio indicated the banks ability to meet the daily cash requirement of their customers' deposit. Bank has to balance the cash and bank balance to

adequate cash for the customers demand against deposit when required and less interest is required to be paid against the cash deposit.

The table below show the Cash and bank balance to current asset ratio of NIBL, NABIL and BOK from the FY 2000/01 to 2007/08.

Table 4.3

Cash and Bank Balance to Current Assets Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	16.53	9.48	14.54	6.72	10.13	13.62	11.84	3.3457	28.27
NABIL	6.18	7.90	8.25	6.81	3.74	4.55	6.24	1.6447	26.36
BOK	17.96	11.04	9.59	8.36	7.95	8.17	10.51	3.4948	33.25

(Source: Annual Report of Bank)

This table 4.3 shows the mean standard deviation and coefficient of variance of cash and bank balance to current asset ratio of all three banks are in fluctuating trend during the study period. They show the ability to manage the deposit with drawls from the customers. NIBL has maintained a highest ratio of 16.53% in the year 2000/01. Similarly NABIL and BOK have a highest ratio of 8.25% and 17.96% in the year 2004/05 and 2000/01 respectively. The mean value of NIBL is highest in comparisons to other banks. Similarly the coefficient of variation of NIBL is 28.27%, which is higher than NABIL and lower than BOK, it reflects that the current ratio is less heterogeneous than NABIL bank.

Lastly, the analysis reveals that NIBL is better position during the study period as the bank shows the ability to manage the deposit with drawl from the customers although it has the fluctuating trend.

4.1.3 Investment on Government Securities to Current Assets Ratio

The ratio examines portion of a commercial banks current assets which invested in different government securities i.e. treasury bills and government bonds. Commercial banks are interested to invest their collected fund on different securities issued by government to utilize their excess funds. Even governments securities are not so liquid as cash and bank balance of commercial bank, they can easily be sold in the market or it can also be converted into cash in other ways. The ratio is computed as:-

Table 4.4

Investment on Government Securities to Current Assets Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	16.30	24.20	20.41	26.24	20.29	29.15	22.77	4.2499	18.67
NABIL	20.76	30.95	25.88	25.78	16.12	16.61	22.68	5.3511	23.59
BOK	4.80	8.76	20.91	25.33	23.06	29.81	18.78	8.9746	47.79

(Source: Annual Report of Bank)

The above table 4.4 reflects that investment in government securities to current asset ratio of NIBL is fluctuating trend, where as BOK in increasing trend and NABIL is in decreasing trend.

The mean ratio of NIBL is lesser than NABIL and higher than BOK. It means that NIBL has invest it's as much as portion of its current assets as government securities than that of BOK and less than of NABIL. The coefficient of variation of NIBL is lower in comparison to the other banks.

Lastly it can be conclude that it has invested its more of portion assets as government securities than other banks and investment made is consistence of coefficient of variation reveals. But its liquidity portion is slightly poor than other banks ion view point of investment on government securities.

4.1.4 Loans and Advances to Current Assets Ratio

Loan and advances include short and long term loan overdrafts and cash credit. Commercial banks should not keep its all collected funds as cash and banks balance in order to invest as loan and advances to the customers. If sufficient loan and advances cannot be granted, it should pay interest on those un-utilized deposits funds. Even high loan and advances may also effects to keep the bank in most liquid position because they can only be collected at the time of maturity. This, a bank must maintain its loan and advances on proper way.

Table 4.5

Loan and Advances to Current Assets Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	59.52	62.09	62.63	62.60	73.60	85.99	67.74	9.3043	13.74
NABIL	58.75	55.87	55.93	57.50	70.71	93.25	65.34	13.4841	20.64
BOK	65.92	74.51	62.88	60.30	63.51	81.39	68.09	7.4344	10.92

(Source: Annual Report of Bank)

The table shows the percentage of loan and advances ratio to current assets ratio position of NIBL, BOK and NABIL. The loan and advances to current assets ratio of all banks are in increasing trend. The mean ratio of NIBL is slightly less than BOK and higher than NABIL.

It reflects that loan and advances to current asset ratios of the NIBL has maintained a highest ratio of 85.99% in the FY 2007/08. Similarly NABIL and BOK have in 93.25% and 81.39% in the FY 2007/08.

The coefficient of variation among ratio is lower in case of NIBL, which indicates uniformity of NIBL in comparison to other banks. So it can conclude that it is better to mobilize its funds as loan and advances. On the other hand satisfactory than that of other banks from the view point of mean ratios.

Figure 4.1

Loan and Advances to Current Assets Ratio
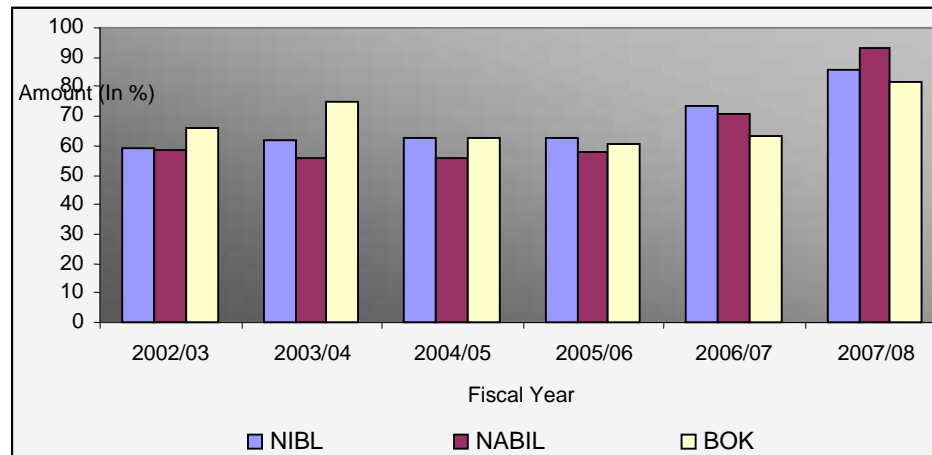
4. 2 Asset Management Ratio

Commercial bank must be managed its assets very well to satisfy its customers to earn high profit and for its own existence. It measures the efficiency of the bank.

4.2.1 Loans and Advances to Total Deposits Ratio

This ratio measures how successfully the banks are able to mobilize the total deposit on loan and advances for profit generating purpose. Higher the ratio indicates the better mobilization of total deposits, but too high is not be better from its liquidity point of view. This table 4.6 eflects the percentage of loan and advances to total deposit ratios position of NIBL, NABIL and BOK.

Table 4.6

Loan and Advances to Total Deposit Ratio

| Bank | Fiscal Year | | | | | | Mean | S.D | C.V |
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	65.71	72.23	73.32	72.97	75.45	71.01	71.78	3.0248	4.21
NABIL	48.82	47.97	57.68	58.01	72.57	66.79	58.64	8.8701	15.13
BOK	72.23	80.61	73.62	72.94	66.12	69.23	72.46	4.4475	6.14

(Source: Annual Report of Bank)

The ratio of NIBL and NABIL have in increasing trend where as BOK ratio is in decreasing trend for 2000/01 to 2006/07. In the case of NIBL has maintained higher loan and advances to total deposit i.e. 75.45% in a year 2007/08, likewise NABIL has maintained higher ratio in a year 2006/07 and BOK is in 80.61% in a year 2003/04 respectively. The mean value of NIBL i.e. 71.78 is less than BOK and higher than NABIL i.e. 58.64. The CV of NIBL is lower than that of the other banks which indicate that loan and advances of it is stable and consistent.

Lastly it can be concluded that NIBL is in strong position or in better position regarding the mobilization of total deposits on loan and advances and acquiring higher profit in comparison with BOK and lower than NABIL. Higher ratio is not good from the view point of liquidity as the loan and advances are not a liquid as cash and bank balance.

4.2.2 Relationship between Deposit and Loan and Advances

It measures the intensity or magnitudes or degree of relationship between the two variables. In the analysis, deposit is independent variable (X) and loan and advances are dependent variable (Y). The objectives of computing coefficient of correlation (r) between the two variables are to justify whether deposit is significantly used as loan and advances or not.

The table 4.29 shows the value of 'r', r^2, P. Er and 6. P. Er between deposit and loan and advance of NIBL in comparison with NABIL and BOK.

Table 4.7

Correlation between Deposit and Loan and Advances

Banks	Evaluation criterions			
	R	r^2	P.Er	6P.Er
NIBL	0.996406	0.992825	0.001976	0.011854
NABIL	0.735985	0.54167374	0.126206	0.757238
BOK	0.981195	0.96274302	0.010259	0.061555

(Source: Annual Report of Bank)

The table 4.29 shows the value of 'r', r^2, P. Er, 6P. Er between deposit and loan and advances of NIBL with comparison to BOK and NABIL from the 2000/01 to 2007/08. In case of NIBL, it is

found that coefficient of correlation between deposit and loan and advances is 0.996406. It shows the positive relationship between two variables. The value of coefficient of determination (r^2) is 0.992825, which means 99.28% of the variation in the dependent variable (loans and advances), has been explained by the independent variable (deposit). Similarly, considering the value of 'r' i.e. 0.996406 and comparing it with 6 P.Er i.e. 0.011854, we can find, it is greater than the value of 6P.Er which reveals the value of 'r' is significant. Or there is significant relationship between deposit and loan and advances.

In the case of NABIL and BOK, have positive correlation between deposit and loan and advances when we consider the value of coefficient of determination (r^2) it indicated than NABIL and BOK are 54.16% and 96.27% respectively of the variation in the dependent variable has been explained by the independent variable. Since the value r^2 of NABIL is less than 6P.Er, so its value of r is not significant i.e. there is no significant relationship between deposit and loan and advances.

After analyzing, the conclusion can be drawn that in NIBL and BKO there is significant relationship between deposit and loan and advances because 'r' is greater than 6P.Er where as, in case of NABIL 'r' is less than 6P.Er. So there is no significant relationship between deposit and loan and advances. This indicates that NIBL has higher correlation between deposit and loan and advances as well as higher value of (r^2) than NABIL and BOK. It can conclude that it is successful to grant loan and advances to mobilize the collected deposits in a proper way.

4.2.3 Total Investment to Total Deposit Ratio

The commercial banks must mobilize its deposit fund by investing in different securities issued by government and other financial, non financial sectors. This ratio measures the extent to which the banks are capable to mobilize their deposits on investment in various securities. This ratio is computed by dividing total investment by total deposit ratio. The table 4.8 shows the total investment to total deposit ratio of the banks NIBL, NABIL & BOK.

Table 4.8

Total Investment and Total Deposit Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	19.71	30.97	24.70	31.45	21.08	30.43	26.39	4.8058	18.21
NABIL	48.64	52.88	44.85	41.33	29.25	31.93	41.48	8.4988	20.49
BOK	7.35	11.66	29.43	32.00	29.05	32.22	23.62	10.1257	42.87

(Source: Annual Report of Bank)

From the table 4.8, it is found that, total investment to total deposit ratio all three banks are in increasing and decreasing trend or in fluctuating trend during study period 2000/01 to 2007/08. The total investment to total deposit ratio of NIBL has highest ratio of 30.97% in FY 2003/04 and lowest ratio 19.71% in FY 2000/01. Similarly NABIL has highest and lowest ratio of 52.88% and 29.25% in FY 2003/04 and 2006/07. BOK has highest and lowest ratio of 32.22% and 7.355 in FY 2007/08 and 2000/01 respectively.

In comparison with mean value, NIBL has lesser than NABIL mean value and higher than that a BOK i.e. 26.39 < 41.48 > 23.62. Likewise the value of coefficient of variation on NIBL is lower than that of both banks. After analysis it is clear that the investment policy of NIBL is in better position in comparisons to both banks. The total investment to total deposits ratio of NIBL is more homogeneous because it has low coefficient of variation.

Figure 4.2

Total Investment Total Deposit Ratio
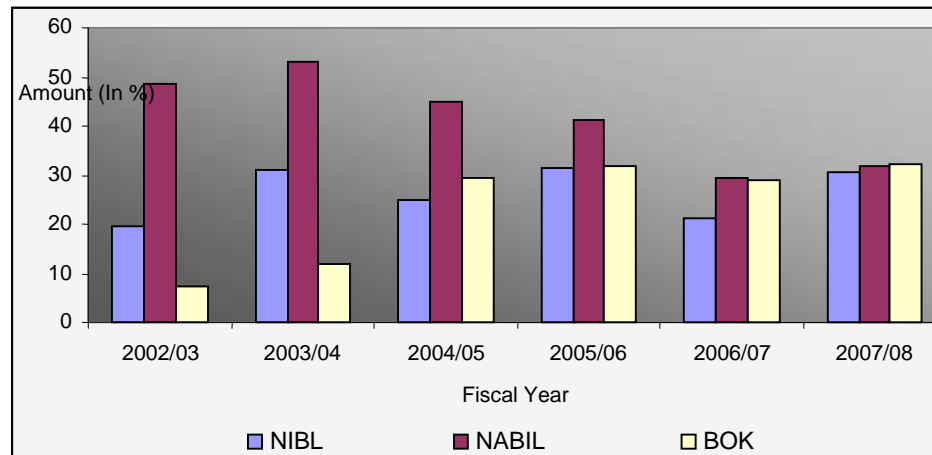
4.2.4 Relationship between Deposit and Total Investment

Coefficient of correlation between deposit and total investment measure the degree of relationship between these two variables. Deposit is independent variables (X) and total investment is dependent variable (Y). The purpose of computing it is to find out whether deposit is significantly used as investment or not.

The table 4.9 shows the value of 'r', r^2, P.Er, 6P.Er between out side asset and net profit of NIBL, NABIL and BOK for the study period 2000/01 to 2007/08.

Table 4.9

Coefficient of Correlation Deposit and Total Investment

Banks	Evaluation criterions			
	R	r^2	P.Er	6P.Er
NIBL	0.935074	0.87436424	0.03459	0.207573
NABIL	0.208485	0.04346604	0.263395	1.580367
BOK	0.925525	0.856596	0.039488	0.236929

(Source: Annual Report of Bank)

The table 4.9 shows the value of 'r', r^2, P.Er, 6P.Er between deposit and total investment of NIBL with comparison of BOK and NABIL. From table, it is found that coefficient of correlation between deposit and total investment of NIBL is 0.935074. It shows the positive relationship between two variables i.e. deposit, independent (X) and total investment, dependent (Y). Moreover, when we consider the value of coefficient of determination (r^2) it is 0.87436424 and it means 87.43% of the variation in the dependent variable is explained by the independent variable. Similarly considering the value of 'r' and comparing with 6 P.Er, it is lesser than 6P.Er, which reveals that the value is not significant. Likewise in the case of NABIL value of 'r' is less than 6P.Er so we can say that there is also not significant relationship between total deposit and total investment.

On the other hand, in case of BOK has positive correlation between deposit and total investment. By considering the probable error since the value of 'r' i.e. 0.925525 is more than 6P.Er i.e. 0.236929, so it indicates that there is significant relationship between total deposits and total investment. Likewise by the application of coefficient determination i.e. r^2 which indicates BOK to be 85.65 of the variation in the dependent variable has been explained by the independent variables.

The above analysis clears that in case of NIBL there is not significant relation between total deposit and total investment because 'r' is less than 6P.Er. That means NIBL has not able to follow the policy of maximizing the investment of their deposits. It has not certain investment policy to invest their deposit where their as BOK there is significant relationship between deposit and total investment. Lastly we can say that BOK has followed the policy of maximizing the investment of their deposits or BOK is successful in maximizing the investment of their deposit.

4.2.5 Loan and Advances to Total Working Fund Ratio
Loan and advances is the major components of the total working fund, which indicate the ability of banks to utilize its deposits in the form of loan and advances to earn high return. It is an appropriate level to generate profit. The ratio reflects the extend to which the commercial banks are able to utilizing their assets loan and advances for the purpose of profit generation.

Total working fund is the total assets. It is composed up of current assets, fixed assets, miscellaneous assets and investment, loan and advance and interest receivable.

The table 4.10 shows the loan and advance to total working fund ratio of NIBL, NABIL and BOK.

Table 4.10

Loan and Advances to Working Fund Ratio

Bank	Fiscal Year						Mean	S.D	C.V %
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			
NIBL	57.77	59.67	60.96	61.24	64.61	61.41	60.94	2.0592	3.38
NABIL	43.51	42.43	46.83	48.91	61.60	57.87	50.19	7.1524	14.25
BOK	66.54	72.58	61.02	59.46	59.98	59.12	63.12	4.9135	7.78

(Source: Annual Report of Bank)

This reflects that loan and advances to working fund ratio of NIBL and NABIL is an increasing trend. BOK is in decreasing trend during the study period. NIBL has the highest ratio 61.41% in the FY 2007/08, NABIL and BOK has the highest ratio i.e. 61.60% and 66.54% in the FY 2006/07 and 2000/01.

The mean value of NIBL has maintained average loan and advances to total working fund ratio than that of NABIL and BOK. This regard, NIBL is in better position among other banks. The coefficient of variation of NIBL is lower than that of both banks i.e. 3.38% < 14.25% > 7.78% respectively, which clear that loan and advances to total working fund ratio is less variable than other banks.

4.2.6 Investment on Government Securities to Total Working Funds Ratio.

The commercial banks should never use all the total deposits resources as loan and advances and other credit from security and liquidity point of view. So to some extent commercial bank seem to be interested to utilize their resources by purchasing government securities. This ratio reflects

the relationship between the banks investment securities in comparison to the total working funds.

The table 4.11 shows the investment on government securities to total working fund ratio of NIBL, NABIL and BOK.

Table 4.11

Investment on Government Securities to Total Working Fund Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	158.19	23.26	19.86	25.67	17.81	20.82	20.54	3.2657	15.90
NABIL	15.38	23.51	21.67	21.93	14.05	10.31	17.81	4.8418	27.19
BOK	4.85	8.54	20.29	24.98	21.78	21.65	17.02	7.5074	44.12

(Source: Annual Report of Bank)

The comparison of mean ratio of NIBL with other two banks reveal that NIBL is successful; to mobilize their working fund as investment in government securities. Similarly NIBL is also variability between ratios during the study period is greater mean value than that of NIBL and BOK.

The table 4.9 reflects that investment on government securities to total working fund ratio of all three banks are in fluctuating trend. Likewise the coefficient of variation is higher than that of other two banks i.e. 15.90% < 27.19% < 44.12%. This means NIBL has invest its more portion of working funds on government securities as than other banks.

Figure 4.3

Investment on Government Securities to Total Working Fund Ratio
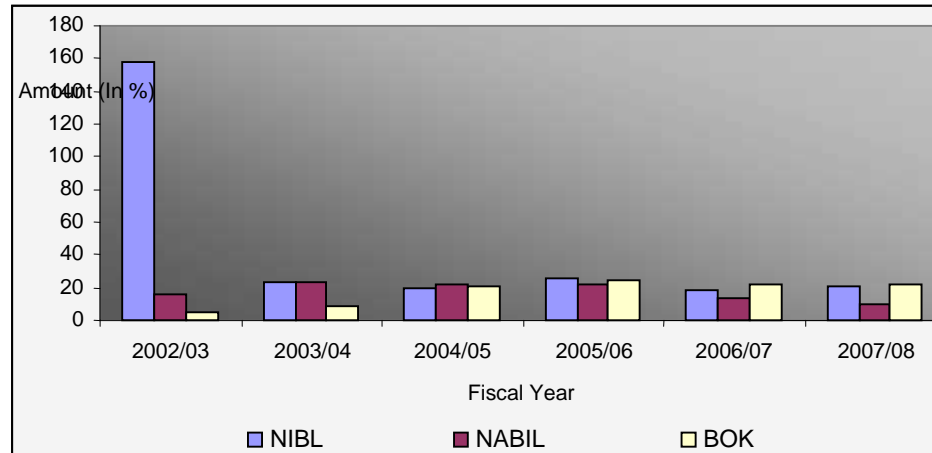
4.2.7 Investment on Shares and Debentures to Total Working Fund Ratio

This ratio shows the banks investment in share and debentures of subsidiary and other companies. Now a day, commercial banks are interested to invest its fund not on government securities. They are interested to invest in shares and debenture of different types of companies and also in most of commercial banks in Nepal have purchased shares of regional development banks and some of them have purchased the share of other companies too.

This ratio reflects the extent on which the banks are able to mobilize their total assets on purchase of share and debenture of other companies to generate income and utilize their excess fund. A higher ratio indicated more portion of investment on shares and debenture out of total working fund. The table 4.12 shows the investment ob shares and debenture to total working fund ratio of NIBL, NABIL and BOK from the FY 2000/01 to 2007/08.

Table 4.12

Investment on Shares and Debentures to Total Working Fund Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	0.07	0.26	0.21	0.18	0.16	0.12	0.17	0.0610	36.61
NABIL	0.11	0.13	0.13	0.13	0.16	0.12	0.13	0.0153	11.75
BOK	0.40	0.60	0.31	0.24	0.23	0.19	0.33	0.1390	42.33

(Source: Annual Report of Bank)

The table depicts that NIBL has ion decreasing trend in the FY 2004/05 to 2007/08. NABIL has maintain same position up to 2005/06 then it has increasing trend in 2006/07 i.e. 0.13%, 0.13%, 0.13%, 0.16%. Similarly BOK has also in decreasing trend to investment on shares and debenture to working fund ratio.

In an average, NIBL has maintained medium investment on shares and debentures to total working fund ratio than other. The coefficient of variation of NIBL is higher than that of other two banks which indicate that NIBL is more variable and less consistent.

4.2.8 Total off Balance Sheet Operation to Loan and Advances Ratio

This ratio shows the proportion of free based off balance sheet activities are very much dependent on made operation management strategy banking net work with foreign banks etc. Commercial banks should not concentrate only on fund based activities such as loan and advances, investment on different sectors and so on. It should pay its attention to increase free based off balance activities. Income generated through the fee based off balance sheet activities constitutes a significant proportion in the total income of most of the commercial banks statement. A high ratio indicates the highest OBS transaction or vice versa.

Table 4.13

Total OBS Operation to Loan and Advances Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	856.64	3005.76	28.50	0.00	7732.64	0.00	2093.85	4127.05	50.73
NABIL	940.05	3948.48	23.81	4992.55	7437.89	67.12	1336.51	4613.61	28.97
BOK	2317.3	4908.46	47.21	5492.35	7755.95	70.81	1977.18	4542.7	43.52

(Source: Annual Report of Bank)

The total OBS operation to loan and advances ratio of NIBL is in decreasing trend in FY 2003/04 and stepped up again in FY 2004/05 from 23.80%, to 47.21%, then again decrease. Similarly NABIL and BOK have maintained the maximum ratio of 70.81% and 50.76% in the FY 2004/05 and 2000/01 respectively.

The mean if NIBL is lower than that of other banks i.e.33.022 < 61.73 > 38.26, which indicates that, NIBL has lowest OBS transaction or vice versa. Has highest mean ratio than NIBL and BOK. The coefficient of variance of NIBL is lower than that of other banks, which indicated that it is giving attention to increase free based off balance activities.

4.2.9 Loan Loss Relation

It is occurred when the debtors fail to pay their loan. Loss of the loan is not only the default of debtors but it is because of the failure of recovery of loan by the bank. Negligence in its part makes a negative impact on the earning and capital of a bank very badly. Greater loan loss provision is made in income statement if high loss is expected. But this will lead to low profit and possible losses and produces low increase or decrease in capital. The loan loss ratio shows how efficiently the bank manages its loan and advances and makes effort for timely recovery of loan.

Table 4.14

Loan Loss Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	1.11	0.88	0.93	1.39	1.17	0.72	1.03	0.2176	21.06
NABIL	2.14	0.00	0.00	0.01	0.04	0.03	0.37	0.7917	213.97
BOK	1.53	2.76	1.82	1.79	2.27	1.08	1.88	0.5324	28.39

(Source: Annual Report of Bank)

The table 4.14 reflects that NIBL has fluctuating trend, it has the maximum ratio of 1.39% in the FY 2005/06 and minimum ratio of 0.72% in the FY 2007/08. Similarly, in case of NABIL it has made any provision in the FY 2003/04 and 2004/05. It has also followed the fluctuating trend. Likewise in the case of BOK, it has followed the fluctuating trend. It has the maximum ratio of 2.76%, which is highest ratio among three banks.

The mean value of NIBL is average, which indicated that its position is better in this regard. It has managed its loan and advances and makes effort for timely recovery of loan. Similarly, the coefficient of variance of NIBL is lower than that of BOK and highest than NABIL. In average, NIBL has no highest loan loss ratio in comparing with two other banks. So it shows that its performance in terms of recovery of loan is satisfactory in comparison to NABIL and BOK.

4.3 Profitability Ratio

Profitability ratios are useful to measure the efficiency of operation of a firm in term of profit. Profit is the indicator of the financial performance of any firm. Commercial banks acquire profit by providing different kinds. Higher the profitability ratio shows the efficiency of the management. The following profitability ratios are related to study under this heading.

4.3.1 Return on Loan and Advances Ratio

Return on loan and advances ratio measures the earning capacity of banks on its total deposits mobilized on loan and advances. Mostly loan and advances included loan, cash credit, and

overdraft, bills purchased and discounted. In other words return on loan and advances ratio indicates how efficiently the banks have employed its resources in the firm of loan and advances.

Table 4.15

Return on Loan and Advances Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	2.32	2.16	1.92	2.44	2.24	2.42	2.25	0.1765	7.85
NABIL	3.77	3.65	5.37	5.56	4.90	4.92	4.70	0.7353	15.66
BOK	1.58	0.20	1.81	2.26	2.36	2.79	1.83	0.8274	45.13

(Source: Annual Report of Bank)

The table 4.15 reveals that NIBL return on loan and advances ratio has decreasing trend in the beginning years and after 2005/06 it is increase from 1.92% to 2.44% to 2.24% and 2.42% in 2007/08. NABIL has maintained fluctuating trend where BOK has also decreasing trend in the first two years and after 2005/06 it able to upgrade it net profit.

The mean of NIBL is lesser than NABIL and higher than that of BOK i.e. 2.25 < 4.70 > 1.83 respectively. The standard deviation of NIBL is lesser than both banks. Similarly the coefficient of variation of NIBL is less than other two banks i.e. 7.85% < 15.66% < 45.13%. NABIL has maintained average C.V. and BOK are in highest C.V value. Thus it can be concluded that NIBL is in average position in earning loan and advances in comparison to NABIL and BOK.

4.3.2 Return on Total Working Fund Ratio

It also known as return on asset. This ratio measures the profit earning capacity by mobilizing available resources (total assets). The bank has to earn satisfactory return on assets or working funds are well manage and are efficiently utilized, maximizing taxes with in the legal options available will also improve the available will also improve the return or return will be higher. Net profit includes the profit that is left to the internal equities after all charge and expenses cost.

The table below shows the return on assets of NIBL, NABIL and BOK.

Table 4.16

Table 4.16

Return on Total Working Fund Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	1.34	1.29	1.17	1.49	1.45	1.49	1.37	0.1172	8.55
NABIL	1.64	1.55	2.51	2.72	3.02	2.85	2.38	0.5773	24.24
BOK	1.05	0.15	1.10	1.34	1.42	1.65	1.12	0.4771	42.66

(Source: Annual Report of Bank)

The table 4.16 reflects the mean, S.D and C.V of NIBL, NABIL, BOK banks from FY 2000/01 to 2007/08. NIBL has the fluctuating trend which indicates that its profitability ratio is not consistent. It has highest profit ratio is 1.49% in the FY 2005/06 and 2007/08 and minimum profit ratio is 1.17% in the FY 2004/05. Similarly NABIL and BOK has maintained increasing trend of profit ratio. In average, NIBL, NABIL, BOK banks have able to maintain a net profit during the stuffy period.

If the mean values are observed NIBL is slightly higher than BOK and lower than NABIL i.e. 1.37 < 2.38 > 1.12 respectively. The coefficient of variation of NIBL is lesser than that of NABIL and BOK i.e. 8.56% < 24.24% < 42.66% it indicate, the return on total working fund ratio of NIBL is stable and consistent in comparison to NABIL and BOK. The analysis clear the profitability ratio with respect to financial resources investment of NIBL is better as well as stable.

4.3.3 Total Interest Earned to Total outside Assets Ratio

It measures the interest earning capacity of the banks through efficient utilization of all the out side assets. Higher the ratio indicates better us of outside assets of a commercial bank. Total outside assets includes loan and advances, investment on government securities, share and debentures and other all types of investment.

The table below exhibits total interest earned to total outside assets ratio of NIBL, NABIL and BOK.

Table 4.17

Total Interest Earned to Total outside Assets Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	9.85	7.87	7.93	7.81	7.38	6.45	7.88	1.0152	12.88
NABIL	8.21	7.17	7.38	7.14	7.20	6.86	7.33	0.4235	5.78
BOK	10.23	8.96	7.81	6.98	7.13	6.75	7.98	1.2441	15.60

(Source: Annual Report of Bank)

The comparison of mean ratios of NIBL with other two banks reveal that total interest earned to total outside assets ratio of NIBL is lowest, which indicate that it has not able to use its fund (outside assets) to earn high interest income in comparison to other banks.

The total interest earned to total outside assets ratio of NABIL and BOK has fluctuating trend. In case of NABIL it increase at FY 2000/01 i.e. 8.21% and decrease in the year 2004/05 i.e. 7.14%. Similarly BOK has decrease from 10.23% to 6.75%. If the coefficient of variation is observed NABIL has the lowest of all banks i.e. 5.78% < 12.88% < 15.60% respectively. This reflects that earned to total outside assets of NIBL is consistent. In other words it is satisfactory in compared to other banks. So it can conclude that NIBL has better position with respect to the income earned from the total outside assets.

4.3.4 Total Interest Earned to Total Working Fund Ratio

This ratio is calculated to find out the percentages of interest earned to total assets. It reflects the extent to which the banks are success in mobilizing their to total assets to gain higher income as interest. Higher ratio indicated higher earning power of the banks of its total working fund. The table below shows the interest earned to total working fund ratio of NIBL, NABIL and BOK.

Table 4.18

Total Interest Earned to Total Working Fund Ratio

Fiscal Year				

Bank	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)	Mean	S.D	C.V %
NIBL	7.40	6.71	6.46	6.84	6.10	5.66	6.53	0.5526	8.46
NABIL	7.13	6.39	6.15	5.98	6.22	5.87	6.29	0.4108	6.53
BOK	7.50	7.45	6.67	5.97	6.16	5.85	6.60	0.6696	10.15

(Source: Annual Report of Bank)

The table 4.18 reveals that the ratio of NIBL is in decreasing trend, where the ratio of NABIL is decreasing at the first three years and increases in the fifth year i.e. 7.13% > 6.39% > 6.15% > 5.98% < 6.22% > 5.87% respectively. The BOK has maximum ratio is 7.50% in the FY 2000/01 and minimum ratio is 5.85% in the FY 2007/08. On the other hand the mean value of NIBL has average of other two banks. It has the mean of 6.53 which is higher than NABIL i.e. 6.29 and less than BOK i.e. 6.60. Similarly the coefficient of variation of NIBL is 8.46% which is also more than NABIL and less than BOK.

After analysis it can be concluded that total interest earned to total working fund of NIBL is satisfactory in compared to other banks. It indicates the total interest earned to total working fund ratio is stable. NABIL has higher coefficient of variation among other two banks. That means it is not successful in earning interest income because high ratio is an indicator of high earning power of the bank on its total working fund and vice versa.

4.3.5 Total Interest Paid to Total Working Ratio

This ratio is calculated to find out the proportion of interest paid against the total working fund. Higher ratio indicated the higher interest expenses on total working fund and vice-versa. The table below reflects the mean, S.D and C.V of total interest paid to total working fund ratio.

Table 4.19

Total Interest Paid to Total Working Fund Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	4.54	3.88	3.82	3.29	2.54	2.52	3.43	0.7333	21.37
NABIL	3.25	2.64	1.92	1.69	1.42	1.60	2.09	0.6488	31.09
BOK	5.01	4.48	3.72	3.01	2.45	2.51	3.53	0.9666	27.38

(Source: Annual Report of Bank)

In the listed table 4.19, total interests paid to working fund ratio of the all banks are in decreasing trends during the study period. NIBL has variable trend from 4.54% to 2.52% in the FY 2000/01 to 2007/08. NABIL and BOK have also variable trend from 3.25% to 1.60% and 5.01% to 2.51% respectively.

In comparison of mean value of NIBL with other reveal that NIBL is in average between NABIL and BOK i.e. 3.43 > 2.09 < 3.53. It means NIBL has paid average interest. Similarly the coefficient of variance of it has lower among both banks which indicates that total interest and to total working fund ratio is inconsistent than that of NABIL and BOK.

After analysis it can be concluded that NIBL is in better position from payment of interest point of view. It seems to be successful to collect its working fund from less expensive sources in comparison to others.

4.4 Risk Ratio

Risk taking is the prime business of banks investment management which increases effectiveness and profitability of the bank. Bank has to take risk to get return on investment. Risk taken is compensated by the increase in profit. So a bank has to take higher risk if it expects higher return on its investment.

Through these ratios, focus has been made to measure the level of risk inherent in the NIBL in comparison to the NABIL and BOK.

4.4.1Credit Risk Ratio

Bank utilized its collected funds in providing credit to different sectors while making investment. It is essential for a bank to examine the credit risk involved in the project. This ratio shows the proportion of non performing assets in total loan and advances of the bank. Due to the unavailability of the relevant data the ratio is measure with the help of loan and advances to total assets.

Table 4.20

Credit Risk Ratio

| Bank | Fiscal Year | | | | | | Mean | S.D | C.V |
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	59.52	62.09	62.63	62.60	73.60	61.50	63.66	4.5691	7.18
NABIL	58.75	55.87	55.93	57.50	70.71	56.96	59.29	5.2014	8.77
BOK	65.92	74.51	62.88	60.30	63.51	63.13	65.04	4.5383	6.98

(Source: Annual Report of Bank)

The table 4.20 shows the percentage of credit risk ratio of NIBL, NABIL and BOK. The credit risk ratio of NIBL is in fluctuating trend during the study period i.e. it has maintained maximum ratio of 73.60% in the FY 2006/07 and it has minimum ratio of 59.52% in the year 2000/01. Similarly NABIL credit risk ratio is increasing trend it has maintained maximum ratio of 70.71% and BOK credit risk ratio is decreasing trend i.e. from 74.51%, 62.88%, and 60.30% and increasing 63.51%, 63.13% respectively.

The mean of NIBL is between NABIL and BOK which mean NIBL has average credit in comparison to both banks. The coefficient of variance of NIBL is 7.18% NABIL has 8.77% and BOK has 6.98%. Among three banks BOK has less C.V, it indicates that its credit policy is consistent than other banks.

4.4.2 Liquidity Risk Ratio

The liquidity risk of the bank defines it liquidity need for deposit. A higher liquidity indicates less risk and less profitable bank and vice-versa. The ratio of cash and bank balance to total

deposits is the indicator of the bank liquidity needed. The cash and bank balance are the most liquid assets and they are considered as bank liquidity sources and deposits as the liquidity needs.

Table 4.21

Liquidity Risk Ratio

| Bank | Fiscal Year | | | | | | Mean | S.D | C.V |
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	18.25	11.03	17.02	7.84	10.39	11.25	12.63	3.7256	29.50
NABIL	5.13	6.78	8.51	6.87	3.83	3.26	5.73	1.8349	32.02
BOK	19.68	11.95	11.23	10.11	8.28	6.95	11.37	4.0842	35.93

(Source: Annual Report of Bank)

In the table shows the percentage of liquidity risk ratio of NIBL, NABIL and BOK. This table reflects the liquidity risk ratio of NIBL is fluctuating trend i.e. it has maintained a maximum ratio of 18.25% in the FY 2000/01 and the minimum ratio of 7.84% in the FY 2005/06. Similarly NABIL and BOK liquidity risk ratio is in decreasing trend. The minimum ratios of both banks are 3.26% and 6.95 in the FY 2007/08.

While comparing the mean of three banks, NABIL is between NIBL and BOK i.e. 12.63 > 5.73 < 11.37 which indicates that NIBL liquidity risk is average in compare to other banks. The coefficients of variance of three banks are 29.50%, 32.02%, 35.93% respectively. In comparison them, NIBL has less C.V which indicates that liquidity risk ratio of it's in consistent. The C.V ratio of NIBL is slightly lowers than that of BOK i.e. 29.50% < 32.02%.

4.4.3 Capital Risk Ratio

The capital risk ratio indicates how much assets value may decline by bank before the position deposition and other creditors is jeopardized. So a bank needs to maintain adequate capital in relation to the nature and condition of its assets, its deposits liabilities and other corporate responsibilities. This ratio measures ability of bank ti attract deposits and inter-bank funds. It also determines the level of profit. A bank can earn if a bank choose to take high capital risk.

Table 4.22

Capital Risk Ratio

Bank	Fiscal Year						Mean	S.D	C.V
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)			%
NIBL	10.63	13.73	10.74	9.82	8.37	6.82	10.02	2.1470	21.43
NABIL	15.74	4.99	11.78	12.48	11.68	9.76	11.07	3.2495	29.35
BOK	7.69	10.25	10.60	10.32	10.41	9.50	9.80	1.0022	10.23

(Source: Annual Report of Bank)

From the table 4.22, it is clearly seen that the percentage of capital risk ratio of NIBL is decreasing from 13.73% to 6.82% in the FY 2003/04 to 2007/08 during the study period. NIBL has maximum ratio of 13.73% and minimum ratio of 6.82%. Similarly NABIL and BOK have followed the fluctuating trend. They have maximum ratio of 15.74 and 10.60% in the FY 2000/01 and 2004/05 respectively.

The mean value of NIBL has average capital risk ratio in comparison with other two banks. The coefficient of variance of a NIBL is 21.43% that is higher than that of BOK's C.V and lesser than NABIL i.e. 21.43% < 29.35% > 10.23% respectively. Among three banks BOK has less C.V.

Thus it can be concluded that NIBL is stable and heterogeneous than NABIL but less stable and less heterogeneous in comparison to the BOK because it has maintained less C.V among three banks.

4.5 Growth Ratio

It represents how well the commercial banks those growth ratios are maintaining their economic and financial position. Here those growth ratios are analyzed and interpret ate, which are related to the fund mobilization and investment management of a bank. In this topic, there are four types of growth ratio and under this section growth ratio of total deposit, total investment, loan and advances and net profit are calculated.

4.5.1 Growth ratio of total deposit

The comparative table 4.23 shows that the growth ratio of NIBL deposit is higher than that of NABIL & BOK. NIBL has maintained ratio of 24.72% where as NABIL and BOK 4.08% and 12.91% respectively. This means the performance of Everest Bank Limited to collect greater deposit compared to other banks. NABIL and BOK are improving year by year. Among three banks NABIL has lowest growth ratio i.e. 4.08%.

Table 4.23

Growth Ratio of Total Deposit

Bank	Fiscal Year						Growth rate (%)
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)	
NIBL	4574.51	5466.60	6694.96	8063.90	10097.69	13802.44	24.72
NABIL	15839.00	15506.40	13447.70	14119.03	14586.60	19347.40	4.08
BOK	5713.49	5723.29	6170.71	7741.65	8942.75	10485.00	12.91

(Source: Annual Report of Bank)

Figure 4.4

Growth Ratio of Total Deposit
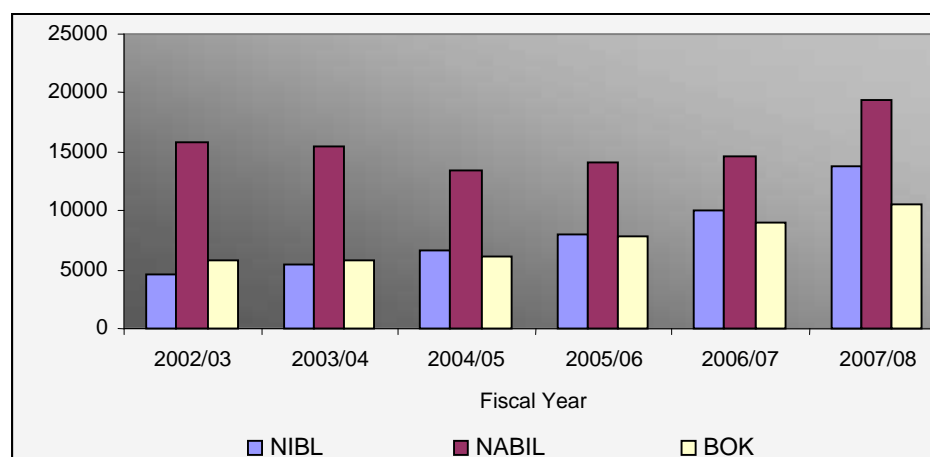
4.5.2 Growth ratio of loan and advances

The comparative table 4.24 shows that the growth ratio of NIBL loan and advances is higher than that of other banks. NIBL has able to maintain of 26.67%, where as NABIL and BOK able to have maintained 10.82% and 11.96% respectively. The performance of NIBL to grant loan and advances is better in comparison to other banks i.e. NABIL and BOK. The highest growth ratio is 26.67% and lowest growth ratio is 10.82%. The above table clearly has shown that. NIBL in comparison to other banks is better year by year.

Table 4.24

Growth Ratio of Loan and Advances

Bank	Fiscal Year						Growth Ratio (%)
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)	
NIBL	3005.76	4044.23	5049.58	6095.84	7900.00	9801.31	26.67
NABIL	7732.64	7437.89	7755.95	8189.99	10586.17	12922.50	10.82
BOK	4127.05	4613.61	4542.70	5646.69	5656.69	7259.08	11.96

(Source: Annual Report of Bank)

Figure 4.5

Growth Ratio of Loan and Advances
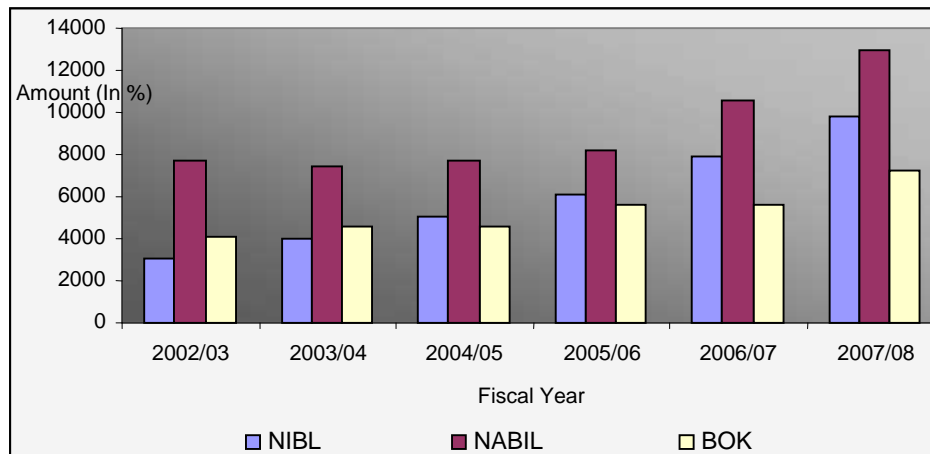
4.5.3 Growth ratio of total Investment

The comparative table 4.25 show that the growth ratio of NIBL total investment is lower than BOK and higher than NABIL i.e. 36.03 > 4.31 < 51.74%. The total investment of NIBL has average position in comparison to the NABIL and BOK.

Table 4.25

Growth Ratio of Total Investment

Bank	Fiscal Year						Growth Ratio (%)
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)	
NIBL	901.72	1779.17	1654.00	2535.70	2128.90	4200.52	36.03
NABIL	7704.31	8199.51	6031.17	5835.95	4267.23	6178.53	4.31
BOK	419.82	667.46	1816.15	2477.40	2598.25	3378.13	51.74

(Source: Annual Report of Bank)

Figure 4.6

Growth Ratio of Total Investment
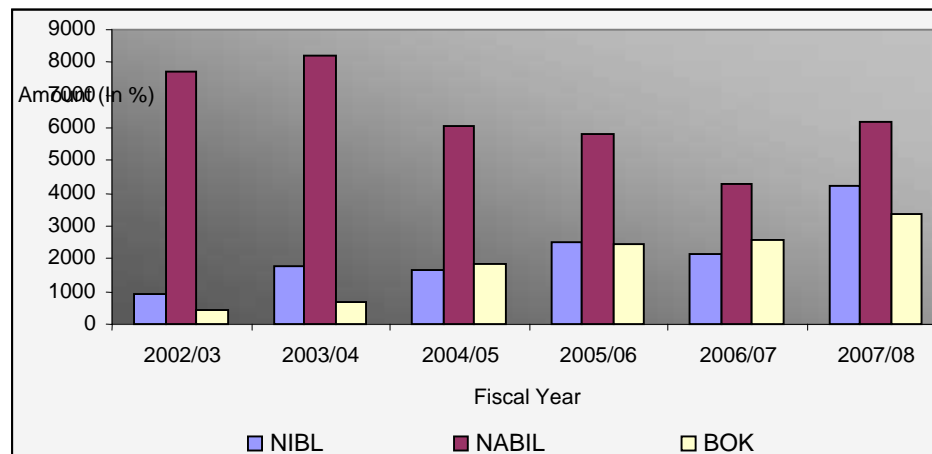
4.5.4 Growth ratio of total net profit

The comparative table 4.26 shows that the growth ratio of BOK total net profit is higher than two banks. (NABIL and NIBL) Net profit of NABIL is poor in comparison with NIBL and BOK.

NIBL has able to maintain the growth ratio in average position. So it clear that BOK has high growth rate in comparison to other bank.

Table 4.26

Growth Ratio of Total Net Profit

Bank	Fiscal Year						Growth Ratio (%)
	2002/03 (%)	2003/04 (%)	2004/05 (%)	2005/06 (%)	2006/07 (%)	2007/08 (%)	
NIBL	69.70	85.33	94.17	143.57	170.80	237.38	22.77
NABIL	291.38	271.64	416.24	455.31	518.64	635.30	16.87
BOK	65.36	9.28	82.13	127.48	139.52	202.44	25.37

(Source: Annual Report of Bank)

Figure 4.7

Growth Ratio of Total Net Profit
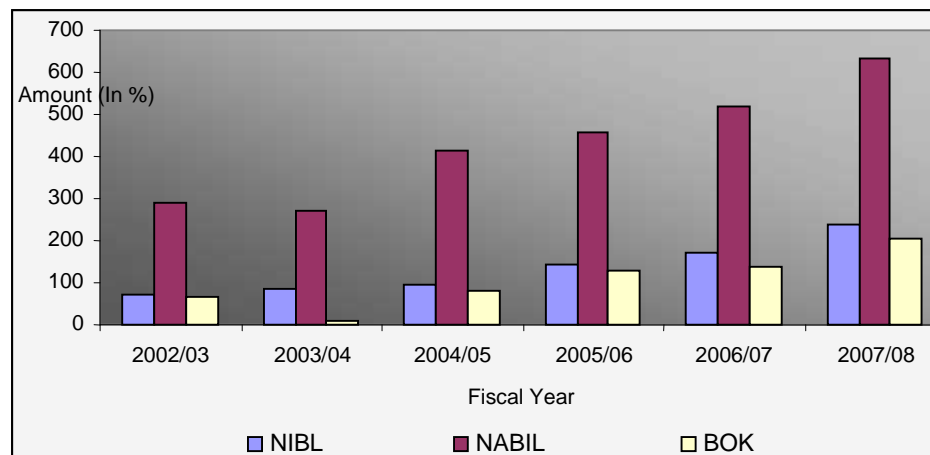
From the above analysis of all tables, it can be concluded that NIBL performance regarding the collection of deposit, granting loan and advances on total investment and net profit is comparatively better.

4.6 Statistical Tools

4.6.1 Trend Analysis of Total Deposit

Under this topic an efforts has been made to calculate the trend values of deposits of NIBL, NABIL and BOK for five years from mid July 2000/01 to 2007/08 and forecast for next five years from the mid July 2007/08 to 2010/11.

Table 4.27

Trend Value of Total Deposit of NIBL, NABIL and BOK

(Rs. In Million)

Fiscal Year	Trend value of NIBL	Trend value of NABIL	Trend value of BOK
2001	2321.84	9774.35	3259.46
2002	5219.26	12624.4	5361.14
2003	8116.68	15474.4	7462.82
2004	11014.1	18324.4	9564.49
2005	13911.5	21174.4	11666.2
2006	16808.9	24024.4	13767.8
2007	19706.4	26874.4	15869.5
2008	22603.8	29724.4	17971.2
2009	25501.2	32574.4	20072.9
2010	28398.6	35424.4	22174.6
2011	31296.0	38274.4	24276.2

(Source: Appendix)

The table 4.27 shows the trend value of total deposit from 2007/08 to 2010/11 of three banks. The total deposits of NIBL, NABIL and BOK have in the increasing trend. If all other things remain the same the total deposits of the NABIL will be highest deposit among the three banks, under the study period. Same as the total deposit of the BOK will be 24276.20 million in the mid July 2011. The total deposit of NABIL will be 38274.40 million in the mid July 2011. The total deposit of NIBL will be 31296.0.

By analyzing the above trend value, it is found that the total deposit position collection of NABIL is better in comparison to BOK. The deposit position NABIL, NIBL and BOK are increasing in the same proportion

Figure 4.8

Trend Value of Total Deposit of NIBL, NABIL and BOK
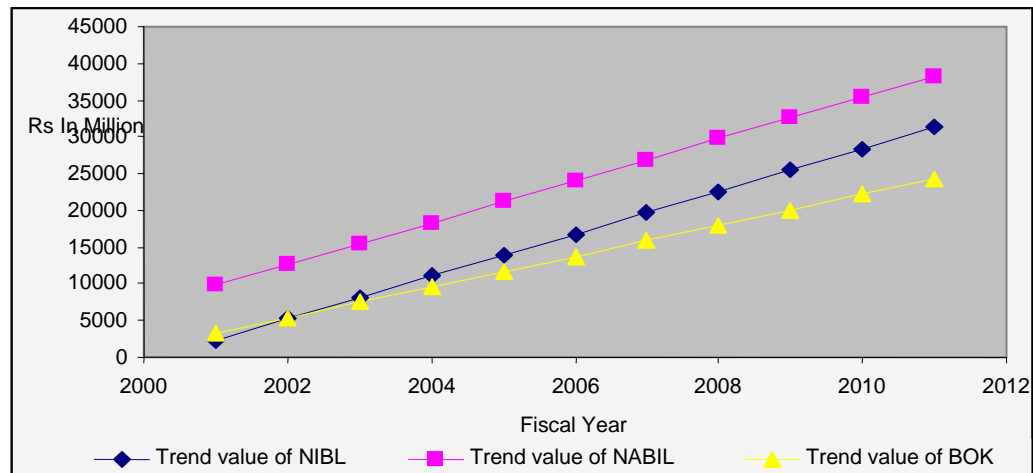
4.6.2 Trend Analysis of Loan and Advances

Here the trend values of loan and advances of NIBL, NABIL and BOK have been calculated for five years from mid July 2000/01 to 2007/08. The forecast for next five years up to 2011 have been done.

The table 4.26 reveals that the trend value of loan and advances of the three banks have been in increasing trend. If other things remain same, total loan and advances of NIBL will be 22941.30 million by 2010. Similarly the total loan and advances of BOK will be 16458.20 million. Total loan and advances of NABIL will be 28147.10, which is the highest among the study period.

Table 4.28

Trend Values of Loan and Advances of NIBL, NABIL and BOK

(Rs. In Million)

Fiscal Year	Trend value of NIBL	Trend value of NABIL	Trend value of BOK
2001	1591.09	4343.48	2573.3
2002	3726.11	6723.84	3961.79
2003	5861.13	9104.2	5350.29
2004	7996.15	11484.6	6738.78
2005	10131.2	13864.9	8127.27
2006	12266.2	16245.3	9515.77
2007	14401.2	18625.6	10904.3
2008	16536.2	21006	12292.8
2009	18671.3	23386.3	13681.2
2010	20806.3	25766.7	15069.7
2011	22941.3	28147.1	16458.2

(Source: Appendix)

From the above analysis it is found the loan and advances position of NIBL is comparatively lower than NABIL and is better in comparison to BOK i.e. 22941.30 > 16458.20 < 28147.10 million respectively. NIBL and BOK may use the skill for the other option of secured loans that is quite appreciable. NABIL is tilted towards the secured loan because of less risk due to the sufficient collateral of its clients.

Figure 4.9

Trend Values of Loan and Advances of NIBL, NABIL and BOK
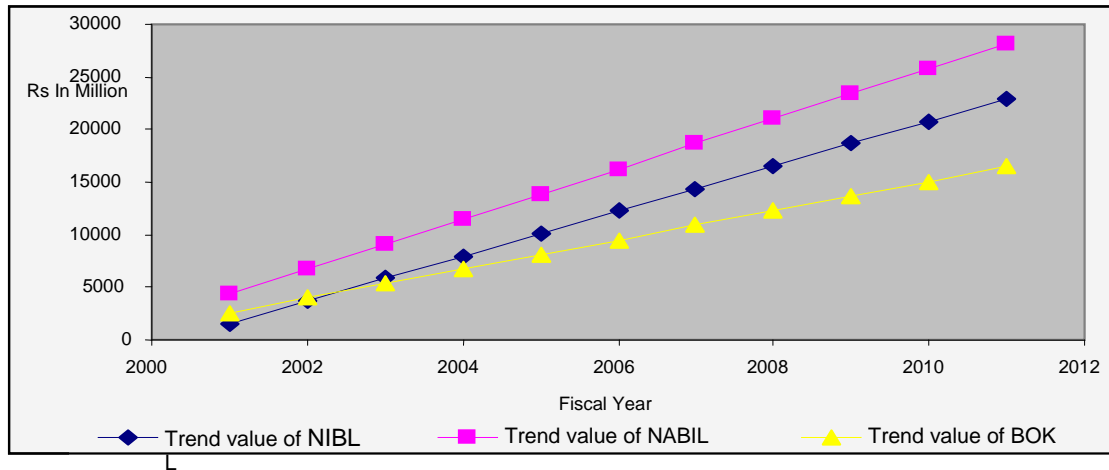
4.6.3 Trend Analysis of Total Investment

In this topic, an effort has been made to calculate the trend values of total investment from the mid July 2000/01 to 2007/08 have been calculated and forecasted from July 2006 to 2011. The table 4.27 shows the trend values of total investment from mid July 2000/01 to 2010/11 of the NIBL, NABIL and BOK.

Table 4.29

Trend Values of Total Investment of NIBL, NABIL and BOK

(Rs. In Million)

Fiscal Year	Trend value of NIBL	Trend value of NABIL	Trend value of BOK
2001	512.106	5390.73	176.95
2002	1348.87	5880.09	1034.91
2003	2185.64	6369.45	1892.87
2004	3022.41	6858.81	2750.83
2005	3859.18	7348.18	3608.78
2006	4695.95	7837.54	4466.74
2007	5532.71	8326.9	5324.7
2008	6369.48	8816.26	6182.66
2009	7206.25	9305.62	7040.61
2010	8043.02	9794.98	7898.57
2011	8879.79	10284.3	8756.53

Total investments of NIBL, NABIL and BOK have the increasing trend value. The total investment of BOK will be 8756.53 million in the mid July 2011, which lowest in comparison with NIBL and NABIL i.e. 8756.53 million < 8879.79 million < 10284.30 million.. The total investment trend of NABIL is satisfactory among the two banks. From the above analysis it can be concluded that BOK has not maintained well investment but in case of NIBL and NABIL it is predicted to be good total investment trend up to the 2010/11 years.

Figure 4.10

Trend Value of Investment of NIBL, NABIL and BOK
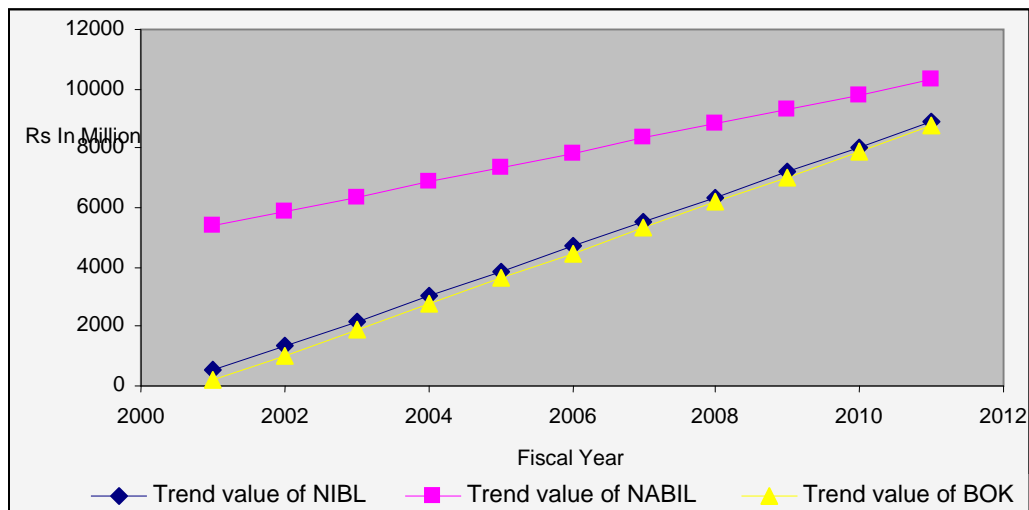
4.6.4 Trend Analysis of Net Profit

Under this topic, an effort had been made to analyze net profit of NIBL, NABIL and BOK from the mid July 2000/01 to 2007/08 and forecast from the mid July 2007/08 to 2010/11. The table 4.30 shows the trend values of net profit for ten years from mid July 2000/01 to 2010/11 of NIBL, NABIL and BOK.

<p align="center">**Table 4.30**</p>

<p align="center">**Trend Value Net Profit of NIBL, NABIL and BOK**</p>

<p align="right">(Rs. In Million)</p>

Fiscal Year	Trend value of NIBL	Trend value of NABIL	Trend value of BOK
2001	31.12	163.62	12.39
2002	82.31	297.52	58.38
2003	133.5	431.42	104.37
2004	184.68	565.32	150.36
2005	235.87	699.22	196.35
2006	287.06	833.12	242.34
2007	338.25	967.02	288.33
2008	389.43	1100.92	334.33
2009	440.62	1234.82	380.32
2010	491.81	1368.71	426.31
2011	543.0	1502.61	472.3

(Source: Appendix)

The above table 4.30 shows the net profit all three banks have the increasing trend value. The net profit of NIBL will be 543 million in the mid July 2011. Similarly net profit of NABIL will be 1502.61 million, which is the highest amount among the three banks. Net profit of BOK will be 472.30 million, which is lowest value among three banks during the study period.

Figure 4.11

Trend Value of Net Profit of NIBL, NABIL and BOK
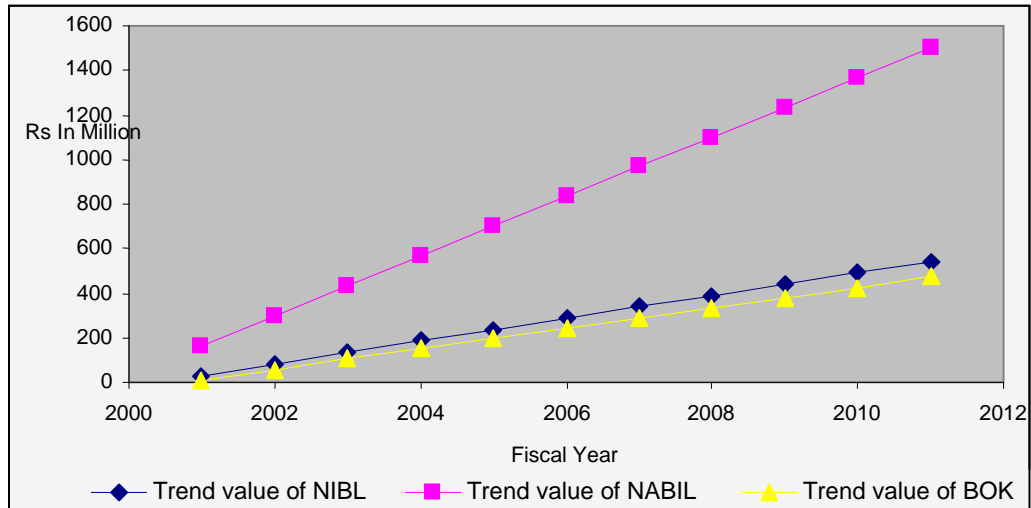
From this trend analysis it can be said that the net profit of NIBL in the medium among the banks which shows i.e. 1502.61 > 543 > 472.30 million in the year 2011. The above calculated trend values of all three banks are fitted in the trend line.

4.6.5 Coefficient of Correlation Analysis

In this heading Karl Pearson coefficient of correlation (Direct Method) is used to find out the relationship between deposit and loan and advances. Deposit and total investment and outside assets and net profit and so on.

4.6.6 Client of Correlation between outside Asset and Net Profit

It measures the degree of relationship between two variables. Here outside assets (x) are independent variables and net profit is dependent variable (y). The objective of computing coefficient of correlation between outside asset and net profit is to find out whether net profit is significantly correlated with respect to total assets or not.

The table 4.31 shows the value of 'r', r^2, P.Er, 6P.Er between outside asset and net profit of NIBL, NABIL and BOK.

Table 4.31

Coefficient of Correlation between outside Asset and Net Profit

Banks	Evaluation criterions			
	R	r^2	P.Er	6P.Er
NIBL	0.991132	0.98234334	0.004862	0.029172
NABIL	0.703899	0.4954735	0.138928	0.833569
BOK	0.931841	0.868326862	0.036258	0.217548

(Source: Appendix)

The table 4.31 shows the value of r, r^2, P.Er, 6P.Er between deposit and loan and advances of NIBL with comparison to NABIL and BOK for the study period 2000/01 to 2007/08. From this table, it has been found that the coefficient of correlation between total outside i.e. independent variable and net profit dependent variable is 0.991132 in case of NIBL. It shows positive relationship between these variables. By considering the value of coefficient of determination (r^2), is 0.98234334 indicated that 98.23% of the variation in the dependent variable has been explained by the independent variable. Similarly considering the value of r is greater than the value of 6P.Er, which reveals NIBL is capable to earn net profit by mobilizing in total outside assets.

Likewise, the coefficient of correlation between total outside assets and net profit in the case of NABIL and BOK are 0.703899 and 0.931841. Again when we consider the value of coefficient determination (r^2) i.e. 0.4954735 and 0.868326862, it means 49.54% and 86.83% respectively in the dependent variable has been explained by the independent variable.

On the basis of comparison between the value of 'r' and 6P.Er there is no significant correlation between two variables because the value of 'r' i.e. 0.703899 and 0.931841 is lesser than that of the value 6P.Er i.e. 0.833569 and 0.217548. The above analysis clears that; the value of 'r' in case of NIBL is significant correlation between mobilizations of funds return. But in the case of NABIL and BOK the value of 'r' is far less than 6P.Er, so both banks have no significant correlation between mobilization of funds and returns.

Coefficient of Correlation between Deposit and Net Profit

The coefficient of correlation between deposit and net profit measures the degree of relationship between these two variables. Here deposit (X) is independent variable and net profit (Y) is dependent variable. The objectives of computing between these two variables are to justify whether net profit is significantly correlated with deposits or not. The following table 4.32 shows the value of 'r', r^2, P.Er, 6P.Er between deposit and net profit of NIBL, NABIL and BOK during the stuffy period.

Table 4.32

Coefficient of Correlation between Deposit and Net Profit

Banks	Evaluation criterions			
	R	r^2	P.Er	6P.Er
NIBL	0.992623	0.985300	0.004048	0.024286
NABIL	0.453762	0.2058996	0.218666	1.311997
BOK	0.941281	0.886009909	0.031389	0.188332

(Source: Appendix)

From this table 4.32, it has been found that the coefficient of correlation between total deposits and net profit in the case of NIBL is 0.992623, which indicated the position relationship between these variables. The coefficient of determination (r^2) is 0.985300, which indicates 98.53% of the variation of the dependent variable has been explained by the independent variable. Similarly, the value of 6P.Er is lesser than the value of r i.e. 0.024286 < 0.992623, which states that there exists a significant relationship between deposits and net profit.

The coefficient of correlation between deposits and net profit incase of NABIL 0.453762 which indicated a positive relationship between deposit and net profit. The value of (r^2) is 0.2058996 indicates that 20.58% of the variation of the dependent variable has been explained by the independent variable. The value of 'r' is greater than that of the value of 6P.Er. This states that there is significant relationship between these variables.

Similarly the coefficient of correlation between these variables in case of BOK is 0.941281, which indicated positive relation. The value of 6P.Er are lesser than the value of r i.e. 0.188332 < 0.941281 that means there is significant correlation relationship between two variation.

The above analysis clear that, the value of r in case of NIBL is significant relationship between deposit and net profit. BOK also shows the positive relationship. The value of (r^2) in case of NABIL shows lower percentages of dependency than BOK and higher percentage of dependency than NIBL i.e. 0985300 > 0.88600 > 0.2058996. The increase in net profit in case of NABIL is due to effective mobilization of deposits and other factor have a less or role to play in increase in net profit. NABIL has not been more successful as NIBL in mobilization of its deposits.

Coefficient of Correlation between Deposit and Interest Earned

The coefficient of correlation between deposits and interest earned measure the relationship between these two variables. Deposits are independent variable (X) and an interest earned is dependent variable (Y). The objectives of calculating r between two variables are to justify whether deposit is significantly used to earn interest or not. The table 4.33 shows the value of 'r', r^2, P.Er and 6P.Er of NIBL, NABIL and BOK during the study period.

Table 4.33

Coefficient of Correlation between Deposit and Interest Earned

Banks	Evaluation criterions			
	R	r^2	P.Er	6P.Er
NIBL	0.988856	0.977836244	0.006103	0.036619
NABIL	0.887261	0.78723161	0.058589	0.351532
BOK	0.973789	0.948264	0.014246	0.085476

(Source: Appendix)

The coefficient of correlation 'r' between deposit and interest earned in case of NIBL is 0.988856, which indicates a positive relationship between these variables. When deposits increase the interest earned subsequently increased but when it fall the interest earned also fell. The coefficient of determination (r^2) is 0.977836244 which indicate that 97.78% of the variation

of dependent variable has been explained by independent variable. Similarly considering the value of 'r' and comparing with 6P.Er it has been found that the value of r is greater than the value of 6P.Er. This shows that it has significant relationship between deposit and interest earned.

The coefficient of correlation 'r' between two variables in case of NABIL and BOK are 0.887261 and 0973789 which indicates that 88.72% and 97.37% of the variation of dependent variable has been explained by independent variables. The value of 'r' in case of NABIL has higher than that of 6P.Er. This states that there is a significant relationship between deposit and interest earned. Where as the value of r in case of NABIL has lesser value of 6P.Er i.e. 0.887261 > 0351532 which states that there is no significant relation between deposit and interest earned.

After above analysis it can be concluded that the relationship between deposit and interest earned incase of NIBL is highly significant with showing higher dependency. It has effectively mobilization of deposits which has had a major role to play in its earning; where as other factors are responsible in the earnings of NABIL.

Coefficient of Correlation between Loan and Advances and Interest Paid
It measures the relationships between these variables. Here, loan and advances is independent variables (X) and interest paid in dependent variable (Y). The purpose of calculating 'r' between these variables is to established whether increase in loan and advances has play any role in decreasing in interest expenses.

The table 4.34 shows the values of 'r', r^2, P.Er and 6P.Er of NIBL, NABIL and BOK during the study period.

Table 4.34

Coefficient of Correlation between Loan and Advances and Interest Paid

Banks	Evaluation criterions			
	R	r^2	P.Er	6P.Er
NIBL	0.913502	0.83448	0.045577	0.273461
NABIL	-0.38218	0.146060	0.235144	1.410862
BOK	-0.02945	0.0008671	0.275125	1.650748

(Source: Appendix)

The coefficient of correlation between loan and advances and interest paid in the case of NIBL is 0913502. It shows the positive relationship between two variables. The coefficient of determination (r^2) in case of NIBL shows a higher degree dependency than NABIL and lower degree dependency than BOK. The value of r is greater than value of 6P.Er in case of NIBL which states that there is significant relationship between loan and advances and interest paid.

Similarly the coefficient of correlation between loan and advances and interest paid in the case of NABIL and BOK are -0.38218 and -0.02945. They show the negative relationship between these variables. The values of coefficient of determination (r^2) are 0.146060 and 0.0008671 it means 14.60% and 0.086% of the variation in the dependent variable is explained by the independent variable. Again considering, the value of r and comparing with 6P.Er in both cases it is lesser than 6P.Er which reveals that the value is not significant relationship between two variables.

In conclusion, it can be clear that the relationship between loan and advances and interest in case of NIBL is highly significant than both other banks. It is successful to utilize the loan and advances. In case of NABIL and BOK have no relationship could be established between the loan and advances and interest paid.

Coefficient of Correlation between Total Working Fund and Net Profit

The coefficient of correlation between the total working fund and net profit measures the degree of relationship between them. Here, total working fund is taken as independent variable (X) and net profit is taken as dependent variable(Y). The main purpose of calculating 'r' is to justify

where total working fund is significantly used to generate earnings or in other words whether these variables are significantly correlated or not.

The table 4.35 shows the value of 'r', r^2, P.Er, 6P.Er between these two variables of NIBL, NABIL and BOK.

Table 4.35

Coefficient of Correlation between Total Working Fund and Net Profit

Banks	Evaluation criterions			
	R	r^2	P.Er	6P.Er
NIBL	0.991184	0.982448	0.004834	0.029004
NABIL	0.611661	0.374128	0.172342	1.034053
BOK	0.955852	0.913653499	0.023777	0.14266

(Source: Appendix)

The coefficient of correlation 'r' between total working fund and net profit in case of NIBL is 0.991184 which indicates positive relationship between these variables. The coefficient of determination (r^2) is 0.982448, which states that 98.24% of the variation of the dependent variable has been explained by independent variable. Similarly considering the value of 'r' 0.991184 and comparing it with 6P.Er 0.029004, the value of 'r' is greater than the value of 6P.Er, so it is significant relation between these variables.

Similarly the value of 'r' between these variables in case of BOK is 0.955852, which shows the positive relationship. In case of NABIL its value is 0.611661 that means it has significant relation between these variable. The coefficient of determination r^2 in case of NABIL and BOK are 0.374128 and 0.913653499, which shows that only 37.41% and 91.36% of the variation of the dependent variables have been explained by independent variables. The value of 6P.Er is greater than 'r' i.e 0.611661< 1.034053 in case of NABIL. So there is significant relation. But, the value of 'r' is lesser than 6P.Er in case of BOK, so there is significant relationship between these variables.

After analysis the conclusion can be drawn that NIBL and BOK are significant relationship between these variable, which indicated that total working fund is significantly used to generate earnings. In case of NABIL there is significant relation so fell to generate earnings or in other words these variables are significant correlated.

4.7 Regression Analysis

Regression of Networking Capital and Net Profit

Regression is the statistical tool which is used to determine the statistical relationship between two or more variables and so make estimate of one variable on the basis of the other variable. Regression is the line which gives the best estimate of one variable for any given value of the other variable. The regression line of Y on X estimate the most probable values of Y for given values of X.

X is independent variable

Y in dependent variable

The regression equation of Y on X expressed as $Y = a + bx$

Where, a and b are parameters of the line.

To find out the exact relationship between different variable simple regressions analysis has been done and results of the analysis have been table.

Table 4.36

Calculation of Regression Equation between Net Profits on Total Working Fund

Banks	Regression equation	Value (a) constant	Regression coefficient (b)
NIBL	$Y = -20.85 + 0.0161822X$	$a = -20.85$	$b = 0.0161822$
NABIL	$Y = 272.50495 + 0.0390619X$	$a = 272.50495$	$b = 0.0390619$
BOK	$Y = 128.40 + 0.027048X$	$a = 128.40$	$b = 0.027048$

Source: Appendix

The table shows the regression equation of net profit and net working fund in NIBL, NABIL and BOK. According to the table regression equation of net profit on net working fund $Y = -20.85 +$

0.0161822X in NIBL is negative. The regression coefficient is positive i.e. 0.0161822 which indicates the positive relationship exists between net profit and net working fund. In other word, one million increase in net working funds leads to average about 0.0161822 million increase in net profit. The value of constant (a) is relatively low. The value of (a) indicates that if net working fund is 0 then the value of net profit is -20.85 million. So from analysis it shows that the net profit will be decrease and net working fund also decrease.

On the other hand, regression coefficient of (b) is positive in case of NABIL which indicates that one million increase in net working fund lead to an average about Rs. -0.0390619 increases in net profit. According to the above table regression equation of net profit on net working fund regression coefficient is positive which reveals the positive relationship between net and working fund.

The test of t statistics helps us to conclude that in all three cases the results are not statistically significant at 5% level of significance since the value of t is small than tabulated value.

Table 4.37

Calculation of Regression Equation between Net Profits on Total Deposit

Banks	Regression equation	Value (a) constant	Regression coefficient (b)
NIBL	Y = 17.129 + 0.0185X	a = 17.129987	b = 0.0185577
NABIL	Y = 31.68 +0.0299X	a = 31.681826	b = 0.0299269
BOK	Y = 136.08 + 0.0322X	a = 136.08	b = 0.0322197

(Source: Appendix)

The above table is the collection of major output of simple regression analysis of net profit on total deposit.

The regression equation of net profit (Y) dependent variable on total deposit (X) independent variable Y = 17.129987 = 0.0185577 in NIBL is positive i.e. 0.0185577 which indicates the positive relationship exists between net profit and total deposit or it can be said that one million increase in total deposit leads to average 0.0185577 million increase in net profit. The value of

constant (a) is relatively high. Similarly in case of BOK the regression coefficient is positive or in other words one million increases in total deposit leads to average about 0.0322197 million increase in net profit. The value of constant (a) indicates that the net profit can be increase and total deposit also increase. The regression coefficient of (b) is positive in case of NABIL i.e. 0.0299269 which indicates that one million increase in total deposit leads to an average about 0.0299269 increases in net profit. The regression coefficient is positive which reveals the positive relationship between net profit and total deposit.

From the test of 't' statistics it can be concluded that in all three cases the results are not statistically significant at 5% level of significance since the value of t is smaller than tabulated value.

4.8 Major Findings of the Study

1. The cash and bank balances to total deposit ratio of NIBL has fluctuating trend. The main ratio of this bank is higher than NABIL and BOK which indicates that its liquidity position is better to serve its customers deposits withdrawal demands. The C.V. between the ratios is found to be 29.50%, which shows that the ratios of NIBL aren't consistent and more variable.

2. The mean ratio of cash and bank balance to current assets of NIBL is higher than NABIL and BOK. It states that liquidity position of NIBL is better in this regard. The C.V between them is 31.02%. On the basis of C.V the ratios are seemed to be variable. NIBL is better position in maintaining its cash and bank balance to meet its daily requirement to make the payments on customers deposit withdrawal in comparison with NABIL and BOK.

3. The loans and advances to total deposit ratio of NIBL has in increasing trend. The mean ratio of NIBL is higher than NABIL and lower than BOK. The mean ratio is 71.78% with 4.21% C.V which shows that the ratios are satisfactory consistent over the study period.

4. Investment to total deposit of all three banks has in fluctuating trend during the study period. The mean ratio of total investment to total deposit of NIBL is in between the NABIL and BOK. The highest ratio is 31.45% and lowest is 19.71% with mean ratio 26.39% and C.V of 18.21%. It is in between NABIL and BOK so the ratio is less consistent and more variable.

Its overall figure suggests that the banks have not mobilized significant amount of fund on the government securities and shares and debentures of other companies.

5. In case of investment on government securities to total working fund mean ratio, NIBL is higher than that of other compared banks. The mean of the ratio is 20.54% with lowest C.V of 3.26% between them indicates that its ratio is variable and consistent over the study period.

6. The investment on shares and debenture to total working fund ratios of NIBL and BOK have fluctuating trend but NABIL has increasing trend. The mean ratio of NIBL is found to be 17.0 with 36.61% C.V between the other compared banks. It shows the ratio of NIBL is very stable over the study period.

7. Total off balance sheet operation to loan and advances ratios of all three banks have decreasing trend. The mean of the ratio of NIBL is found to be 2093.85 with C.V 50.73%. It has highest C.V. than that of others compared a bank which indicates that the ratio is not consistent during the study period. The analysis of the ratios shows that OBS operation of the bank is in decreasing trend. It may be due to competition in the banking sector or bank is not getting enough attention towards non-funded business.

8. The mean ratio of return on loans and advances ratio of NIBL is higher than BOK and is lower than NABIL. The mean of the ratio is found to be 2.25% with C.V of 7.85%, which indicates that the ratios are less variable. The average ratio of 2.25% suggests that the earning capacity of the banks loan and advances is satisfactory.

9. Return on total working fund ratios are in fluctuating trend during the study period. Its ratio ranges from 1.17% to 1.49%. The mean ratio of NIBL is in between NABIL and BOK i.e. NIBL ratio is 1.37% with C.V of 8.55%. This indicates that the ratios are less variable and consistent than that of other compared banks.

10. The mean ratio of total interest earned to total outside assets of NABIL is lowest of all. The total interest earned to total outside assets ratio of the NABIL is less variable in comparison to NIBL and BOK. Its lowest C.V indicates that the ratios are satisfactory consistent during the study period.

11. The total interest paid to working fund ratios has decreasing trend during the study period. The mean ratio of total interest paid to total working fund of NIBL is average than NABIL lower than BOK, which means it has paid average interest than NABIL and BOK. The total interests paid to working fund ratios are lesser than to total interest earned to total fund ratio. This indicates that the bank is in profitability position as it is earning higher return than it interest cost.

12. Credit risk ratios of the banks are fluctuating trend. The mean of the ratios of NIBL is found to be 63.66% which are higher than NABIL and lower than BOK. Similarly its C.V is 7.18% which is less in compared with other banks. It indicates that its credit policy is consistent than other banks.

13. Liquidity risk ratio of the banks are decreasing trend. The mean liquidity risk ratio of NIBL is highest of all and C.V of its also lowest in comparison with other banks. So the ratio of NIBL is less variable than NABIL and BOK.

14. The mean capital risk ratio of NIBL is in between the compared banks. The ratio of NIBL is less variable, which indicates that the capital risk ratio is consistent.

15. The analysis of the growth ratio of total deposits total loan and advances, total investments, and net profit of NIBL in comparison with NABIL and BOK during the study period shows that the total deposits of the bank is in increasing trend with the net growth rate of 24.72%. It has maintained growth rate highest that other compared banks. This means the performance of NIBL to collect deposit in comparison to other banks is better year by year.

16. The growth rate of NIBL is higher than that of NABIL and BOK. It has maintained growth rate of 26.67%, where as NABIL and BOK has 10.82% and 11.96% respectively. So the performance of NIBL to grant loan and advances in comparison to other bank is year by year.

17. The trend analyses of total deposit of NIBL and BOK have increasing trend and NABIL has decreasing trend. From the trend analysis it is forecasted that the total deposit of NIBL in 2009/10 will be Rs. 31296 million. Similarly the total deposit of NABIL and BOK will be 38274.4 and 24276.2 million in the third mid July of 2010 respectively. The deposit collection of NABIL is better than that of NIBL and BOK.

18. From the trend analysis of total loan and advances it has been seen that the total loan advances of all the three banks have increasing trend. The total loan and advance of NABIL will be 28147.1 million in the mid July 2010, which is highest amount than that of NIBL i.e.22941.3 million and BOK i.e. 16458.2 million.

19. Total investments of NIBL NABIL and BOK have in increasing trend. The total investment of the NIBL by the year 2010 is projected to be 8879.79 million. Similarly the total investment of NABIL will be 10284.3 million which is highest among the study period. The total investment of BOK will be 8756.53 million.

CHAPTER –V

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

5.1 Summary

Commercial banks are major financial institutions, which occupy quite an important place in the framework of every economy because they provide capital for the development of industry trade and business and other resources deflect sectors investing the saving collected as deposit commercial banks , by playing active role have changed the economic structure of the world. Commercial banks have its own role and contribution in the economic development; it maintains economic confidence of various segments and extends credit to people. The banking sector has to play developmental role to boost the economy by adopting the growth oriented investment policy and building up the financial structure for future economic development formulation of sound investment policies and planned effort pushed forward the force of economic growth.

The income and profit of the bank depends upon its lending procedure, lending policy and investment of its fund utilize in different securities. Commercial banks able to utilize its deposits properly i.e. providing loans and advances or lending for a profitable project, the reason behind it is lack of sound investment policy. The main objective of this study is to evaluate the profit planning policies adopted by NIBL, NABIL and BOK. The study is totally based on secondary sources of data and required data have been collected by using various published and unpublished sources.

There are 27commercial banks have been operating in Nepal which are considered to be the population of the study and out of them three commercial banks i.e. NIBL, NABIL, BOK has been taken as a sample of the study and the collected data have been analyzed by using various financial tools and statistical tools like ratio analysis, correlation coefficient, regression equation etc.

Regarding the profit planning policies of commercial banks there are basically five basic principles of the bank follow while providing the loans i.e. liquidity, profitability, security and

suitability diversification. Various process while making investment decision are applied in the study i.e. set investment process, security analysis, portfolio construction, revision, performance evaluation .The data obtained from annual reports of the concerned banks, likewise the financial statements of six years (from 2000/01 to 2007/08) were selected for the purpose of evaluation.

5.2 Conclusion

The liquidity position of NIBL is comparatively better than that of NABIL and BOK. In spite of the current ratio is average among the other two banks NIBL has maintained the cash and bank balance to meet the customers demand. All the three banks have met the normal standard current assets ratio to meet the short term obligation of its customers. NIBL has invested highest sectors like government securities than BOK and lesser portion than that of NABIL. BOK had mobilized lots of its funds in order to gain the high profit.

From the analysis of assets management ratio it can be found that NIBL is in better position as compared to that of NABIL and BOK. The loans and advances to total deposit ratio, loan and advances to total working fund ratio of NIBL lies In between those of NABIL and BOK. NIBL has invested the highest portion of total working fund on government securities as compared to NABIL and BOK. Due to more efficient loan policy, NABIL suffers less from loan loss provision. It takes low credit risk and has sufficient deposits of none bearing interest which can be used in a creation period. Any how NIBL has also trying to best in loan loss provision. Investment on shares and debentures to total working fund ratio is higher in BOK.

The interest earned to total outside assets and return on total working fund ratio of NIBL is lowest of all. But overall analysis of profitability ratios, NIBL is average profitable in comparison to other compared bank i.e. NABIL and BOK. To make the profit BOK is taking highest risk by providing the higher portion of its deposit as a loan.

The return on loan and advances ratio and return on assets of NIBL is lowest of all. The ratio suggests that the earning capacity of the banks loan and advances is satisfactory. The return on assets of the bank is good in average; it indicates the good earning capacity of the bank assets and good utilization of its assets.

The total interest paid to working fund ratio is less than the interest earned to total working fund ratio. So it is profitable position as it is getting higher return that is interest cost.

The degree of risk is average on NIBL. The credit risk ratio is higher than the compared banks. However the lowest C.V. of credit ratio and average C. V. of liquidity risk ratio and capital ratio over the study period provides for the assurance of consistency of the degree of risk. NIBL has showing its good performance by increasing the total deposit, loan and advances and investment in profitable sectors interested earnings by providing loan to clients. The trend of the total investment, total deposit, loan and advances and net profit of NIBL shows better position than that of NABIL and BOK.

5.3 Recommendations

On the basis of the findings of the study, following recommendations can be drawn:-

1. In commercial banks the liquidity position affects external and internal factors such as saving for investment situations, central banks requirements, the leading policies management capacity etc. In this study it should try to lower the current liabilities to improve its liquidity position. Current ratio of all three banks is not satisfactory. It is below its standard rate 2:1. So the banks are suggested to improve current assets. The ratio of cash and bank balance to total deposit and current assets of NIBL is higher than that of NABIL and BOK. It means NIBL has higher cash and bank balance which decrease profit of bank, so it is recommended to mobilize cash and bank balance in profitable as loan and advances.

2. In practice joint ventured banks are urban based; service quite a few elite, a fluent big customer are heavily dependent on free based activities. To overcome its situation they should be accessible to rural areas and possible loan and advances to its deposit. So the customers is enjoying by getting deposit borrowing and other services.

3. NIBL has invested its more of the funds that is total investment on total deposit ratio but the percentages of investment on share and debenture is nominal. So it is suggested to invest more of its fund in share and debenture of different companies.

4. NABIL loan and advances to total deposit ratio is lowest in compared to other banks. To overcome from the situation it is recommended to follow liberal lending policy and invest

more and more of total deposit in loan and advances and maintain stability on the investment policy.

5. Profitability ratios of banks are not satisfactory, if resources held idle bank have to bearded more cost and result would be lower profit margin. So portfolio condition of a bank should be regularly revised from time to time. It should always try to maintain the equilibrium in the portfolio condition of the bank. The bank should use its funds in more portfolio sectors. It should utilize its risky assets and shareholders funds and it should reduce its express and should try to collect cheaper fund being more profitable.

6. NABIL has taken the low credit risk as NABIL is one of the largest commercial bank in Nepal. It must also interest as NIBL and BOK do. The risk taken by NIBL from the angle of credit risk and capital risk are in an average but the consistencies of the same are highly volatile which may result higher loss. So it should not test such risk on an experiment basis it should carefully study it so as to achieve higher return from the above risk.

7. In the light of growing competition in the banking sector the business of the bank is customer oriented. It should strengthen and active its marketing function, as it is an effective tool of attracting and retaining customers. The bank should develop on "Innovative approach to bank marketing and formulate new strategies of serving customers in a more convenient way.

8. The investment policy of NIBL is good in every aspect as studied above but the consistency in the above investment sectors is in equilibrium states. It is found that at time bank focuses much of its attention to one sector leaving other sector untouched, so it is recommended to touch all the sectors and balance it effectively as to have the optimal performance of the bank.

To get success itself and to encourage financial and economic development of the country Through industrialization and commercialization a commercial bank must mobilize its fund and debentures of other financial and non financial companies. And if other sectors go up positively then bank can utilize its fund more and more by providing them loan or getting sufficient dividend on their share or interest on their debentures. Commercial banks needed to strengthen its economic structure to achieve piped overall development. They have to resort to innovative approach of banking there by bringing professionalism in their business. If they follow those suggestions they can have better reach to the modern innovative and competitive banking markets.

BIBIOGRAPHY

Books:

Baidhya, Shakespeare, (1996). *Banking Management*, Kathmandu: Monitor Nepal.

Bexley, James B. (1987). *Banking Management*, New Delhi: Sujeet Pulication

Charles, P. Jones, (1991). *Investment Analysis and Management*, Bombay: Himalyan Publishing House.

Crosse, H.D. (1963). *Management Policies for Commercial Banks*, 2nd Ed. Engle cwood cliffs, Prentic Hall Inc. N.J.

Frank, K. Reily, (1999). *Inestment.* The Dryden Press, CBS Publishing Japan Ltd.

Gitman, L.J. and Joehnk. (1990). *Fundamentals of Investing*, 4th Edition Harper and Row Publishers.

John, M. Cheney and Edward, A. Moses (1998). *Fundamentals of Investment*, St. Pant: West Publishing Company

Kothari, C.R. (1984). **"*Quantitative Techniques*",** (New Delhi, Vikash Publishing House)

Sharpe J. William and Gordon, J. Alexander, (1999). *Investment*, New Delhi Prentice Hall of India Pvt. Ltd.

Shrestha Monohar Krishna, (1994). *Financial Management*, Theory and Practice, 1st Ed, Curriculum Development Center, T.U. Kathmandu.

Singh, Preeti, (1991). *Investment Management*, Bombay Publishing House Himalayan.

Sing, S.P. and Sing. (1983). *Financial Analysis for credit Management in Banks*, Vikash Publishing House.

Balla, V.K. (1993). *Investment Managements*, New Delhi: S. Chand and Company.

Van Horne, James C. (1985). *Fundamentals of Financial Management*, 5th Ed. New Delhi: Prentice Hall of India Ltd.

Van Horne, James C. (1998). *Financial Management and Policy*, 10th Ed. New Delhi: Prentice Hall Pvt. Ltd.

Weston and Bigham, (1980). *Managerial Finance*, 7th Ed., U.S.A, The Dryden Press, Hinsdale Illinois.

Wolf, Howard K. Pant, P.R. (1999). *Social Science Research and Thesis Writing,* Second Edition, Kathmandu, Buddha Academic Enterprises Pvt. Ltd.

Journals and Articles

Agriculture Projects Services, "On – Going Evaluation of Intensive Banking program in October 1995.

Annual Reports of Bank of Kathmandu Ltd. 2062

Annual Reports of Everest Bank Limited, 2062

Annual Reports of NABIL Bank Ltd. 2062

Bajracharya, Bodhi B. (2047). *Monetary Policy and Deposit Mobilization in Nepal.* Rajat Jayanti Smarika, RBB, Kathmandu.

Bista, Bhagat, (2001). *Issues in Banking Reform.* Nepal Rastra Bank Samachar, p.33. Gorkhapatra, 2059 Poush 7th

J. Hadlock Charles and M. James Christopher (2002). *Do Banks Provide Financial Slack***?** The Journal of Finance Vol. VII No. 3.

Kisshi, Dev Lal. (1996). *The Changing Face of the Banking Sector and the Nepal Govt. Recent Budgetary Policy.* Nepal Bank Patrika, NBL, Vol, 25, pp. 27-32.

Morris F. (1990). *Latin Americas Banking System in the 1980*. World Bank Discussion paper – 81, The World Bank, Washing Ton DC.

Murrain R. Sharma (1988). **"*A Study of Joint Venture Banks in Nepal: Co-Exiting and growing Out,*"** Pradharshan Nepal Govt. 5[2nd], Kathmandu.

Nepal Rastra Bank Publication, (Dec.2001), **"*Basic Socio-Economic Indicators of Nepal"*.

Pradhan, K. (1991). *Nepalma Banijya Banking, Upalabdhi Tatha Chunauti*, Nepal Bank Patrika, p.13.

Shrestha, Dr. Sunity. (2055). *Lending Operations of Commercial Banbks of Nepal its Impact on GPD*. The Business Voice of Nepal The Special Issue of Banijya Sansar, T.U., Kritipur, pp. 23-27.

Shrestha Ramesh Lal (2055), *A study on Deposit and Credits of Commercial Banks in Nepal*. Nepal Rastra Bank Samachar, NRB.

Shrestha, (Dr.) Monohar Krishna *"Shareholders Democracy and annual metting feedback portfolio analysis*", Nepal Publication, Kathmandu P$_p$50

Thesis

Bhattrai, B. P. (2005), *the sales budget of Manufacturing Public Enterprises.* An Unpublished Master Degrees Thesis, T.U.

Kunwar, S. (2005), Cash Management of Manufacturing Companies. An Unpublished Master Degrees Thesis, Shankar Dev Campus.

Raymajhi, A. (2006), *Cash management of Nepalese Commercial Banks*, An Unpublished Master Degrees Thesis, Shankar Dev Campus.

Pandey, I. M. (2008), *A study on Profit Planning of Commercial Bank* An Unpublished Master Degrees Thesis, T.U.

Kunwar, N. (2009), *Profit Planning of Nabil Bank Limited.* An Unpublished Master Degrees Thesis, Shankar Dev Campus.

Maharjan, L. (2009), *Profit Planning in a Commercial Bank.* An Unpublished Master Degrees Thesis, Shankar Dev Campus.

Calculation of Growth Ratio

Let,

D_n = Variable in the nth year

D_0 = Variable in the initial year

n = no of period study

g = Growth rate

Total deposit growth ratio of NIBL

$$D_n = D_0(1+g)^n$$

$$13802.44 = 4574.51(1+g)^5$$

$$1+g = \left(\frac{13802.44}{4574.51}\right)^{1/5}$$

$$g = 24.72\%$$

Total deposit growth ratio of NABIL

$$D_n = D_0(1+g)^n$$

$$19347.4 = 15839(1+g)^5$$

$$1+g = \left(\frac{19347.4}{15839}\right)^{1/5}$$

$$g = 4.08\%$$

Total deposit growth ratio of BOK

$$D_n = D_0(1+g)^n$$

$$10485 = 5713.49(1+g)^5$$

$$1+g = \left(\frac{10485}{5713.49}\right)^{1/5}$$

$$g = 12.91\%$$

Total Loans and advances growth rate of NIBL

$$D_n = D_0(1+g)^n$$

$$9801.31 = 3005.76(1+g)^5$$

$$1+g = \left(\frac{9801.31}{3005.76}\right)^{1/5}$$

$$g = 26.67\%$$

Total Loans and advances growth rate of NABIL

$$D_n = D_0(1+g)^n$$

$$12922.5 = 7732.64(1+g)^5$$

$$1+g = \left(\frac{12922.5}{7732.64}\right)^{1/5}$$

$$g = 10.82\%$$

Total Loans and advances growth rate of BOK

$$D_n = D_0(1+g)^n$$

$$7259.08 = 4127.05(1+g)^5$$

$$1+g = \left(\frac{7259.08}{4127.05}\right)^{1/5}$$

$$g = 11.96\%$$

Total investment growth ratio of NIBL

$$D_n = D_0(1+g)^n$$

$$4200.52 = 901.72(1+g)^5$$

$$1+g = \left(\frac{4200.52}{901.72}\right)^{1/5}$$

$$g = 36.03\%$$

Total investment growth ratio of NABIL

$$D_n = D_0(1+g)^n$$

$$6178.53 = 7704(1+g)^5$$

$$1+g = \left(\frac{6178.53}{7704}\right)^{1/5}$$

g = -4.31%

Total investment growth ratio of BOK

$$D_n = D_0(1+g)^n$$

$$3378.13 = 419.82(1+g)^5$$

$$1+g = \left(\frac{3378.13}{419.82}\right)^{1/5}$$

g = 51.74%

Total net profit growth ratio of NABIL

$$D_n = D_0(1+g)^n$$

$$635.3 = 291.38(1+g)^5$$

$$1+g = \left(\frac{635.3}{291.38}\right)^{1/5}$$

g = 16.87%

Total net profit growth ratio of NIBL

$$D_n = D_0(1+g)^n$$

$$237.38 = 69.70(1+g)^5$$

$$1+g = \left(\frac{237.38}{69.70}\right)^{1/5}$$

g = 27.77%

Total net profit growth ratio of BOK

$$D_n = D_0(1+g)^n$$

$$202.44 = 65.36(1+g)^5$$

$$1+g = \left(\frac{202.44}{65.36}\right)^{1/5}$$

g = 25.37%

Trend analysis of total deposit of NIBL

Fiscal Year(t)	Total Deposit (Y)	X = t-2003	X^2	XY	Y_c = a + bx
2002/03	4574.51	-2	4	-9149.02	2321.84
2003/04	5466.60	-1	1	-5466.60	5219.26
2004/05	6694.96	0	0	0.00	8116.68
2005/06	8063.90	1	1	8063.90	11014.10
2006/07	10097.69	2	4	20195.38	13911.52
2007/08	13802.44	3	9	41407.32	16808.94
Total	48700.10		19	55050.98	

$$a \text{ X} \frac{y}{n} \text{ X} \frac{48700.1}{6} \text{ X} 8116.68 \qquad b \text{ X} \frac{xy}{x^2} \text{ X} \frac{55050.98}{19} \text{ X} 2897.42$$

Appendix:-2

Trend analysis of total deposit of NABIL

Fiscal Year(t)	Total Deposit (Y)	X = t-2003	X^2	XY	Y_c = a + bx
2002/03	15839	-2	4	-31678	9774.348
2003/04	15506.43	-1	1	-15506.43	12624.354
2004/05	13447.66	0	0	0.00	15474.36
2005/06	14119.03	1	1	14119.03	18324.366
2006/07	14586.66	2	4	29173.32	21174.372
2007/08	19347.40	3	9	58042.20	24024.378
Total	92846.18		19	54150.12	

$$a \text{ X} \frac{y}{n} \text{ X} \frac{92846.18}{6} \text{ X} 15474.36 \qquad b \text{ X} \frac{xy}{x^2} \text{ X} \frac{54150.12}{19} \text{ X} 2850.006$$

Appendix:-3

Trend analysis of total deposit of BOK

Fiscal Year(t)	Total Deposit (Y)	X = t-2003	X^2	XY	$Y_c = a + bx$
2002/03	5713.49	-2	4	-11426.98	3259.459
2003/04	5723.29	-1	1	-5723.29	5361.137
2004/05	6170.71	0	0	0.00	7462.815
2005/06	7741.65	1	1	7741.65	9564.493
2006/07	8942.75	2	4	17885.50	11666.171
2007/08	10485	3	9	31455	13767.849
Total	44776.89			19	39931.88	

$a \text{X} \dfrac{y}{n} \text{X} \dfrac{44776.89}{6} \text{X} 7462.815$ $b \text{X} \dfrac{xy}{x^2} \text{X} \dfrac{39931.88}{19} \text{X} 2101.678$

Appendix:-4

Trend analysis of Loan and advances of NIBL

Fiscal Year(t)	Loan & advances(Y)	X = t-2003	X^2	XY	$Y_c = a + bx$
2002/03	3005.76	-2	4	-6011.52	1591.093
2003/04	3948.48	-1	1	-3948.48	3726.113
2004/05	4908.46	0	0	0	5861.133
2005/06	5884.12	1	1	5884.12	7996.153
2006/07	7618.67	2	4	15237.34	10131.173
2007/08	9801.31	3	9	29403.921	12266.193
Total	35166.797			19	40565.381	

$a \text{X} \dfrac{y}{n} \text{X} \dfrac{35166.797}{6} \text{X} 5861.133$ $b \text{X} \dfrac{xy}{x^2} \text{X} \dfrac{40565.381}{19} \text{X} 2135.02$

Appendix:-5

Trend analysis of Loan and advances of NABIL

Fiscal Year(t)	Loan & advances (Y)	X = t-2003	X^2	XY	$Y_c = a + bx$
2002/03	7732.64	-2	4	-15465.28	4343.483
2003/04	7437.89	-1	1	-7437.89	6723.84
2004/05	7755.95	0	0	0	9104.197
2005/06	8189.99	1	1	8189.99	11484.554
2006/07	10586.17	2	4	21172.34	13864.911
2007/08	12922.5	3	9	38767.62	16245.268
Total	54625.18		19	45226.78	

$$a \, \text{X} \frac{y}{n} \, \text{X} \frac{54625.18}{6} \, \text{X}19104.197 \qquad b \, \text{X} \frac{xy}{x^2} \, \text{X} \frac{45226.78}{19} \, \text{X}2380.357$$

Appendix:-6

Trend analysis of Loan and advances of BOK

Fiscal Year(t)	Loan & advances (Y)	X = t-2003	X^2	XY	$Y_c = a + bx$
2002/03	4127.05	-2	4	-8254.1	2573.297
2003/04	4613.61	-1	1	-4613.61	3961.791
2004/05	4542.70	0	0	0.00	5350.285
2005/06	5646.69	1	1	5646.69	6738.779
2006/07	5912.58	2	4	11825.16	8127.273
2007/08	7259.08	3	9	21777.246	9515.767
Total	32101.712		19	26381.386	

$$a \, \text{X} \frac{y}{n} \, \text{X} \frac{32101.712}{6} \, \text{X}5350.285 \qquad b \, \text{X} \frac{xy}{x^2} \, \text{X} \frac{26381.386}{19} \, \text{X}1388.494$$

Appendix:-7

Trend analysis of total investment of NIBL

Fiscal Year(t)	Total investment (Y)	X = t-2003	X^2	XY	Y_c = a + bx
2002/03	901.72	-2	4	-1803.44	512.1062
2003/04	1693.03	-1	1	-1693.03	1348.8741
2004/05	1653.98	0	0	0	2185.642
2005/06	2535.7	1	1	2535.7	3022.4099
2006/07	2128.9	2	4	4257.8	3859.1778
2007/08	4200.52	3	9	12601.56	4695.9457
Total	13113.85		19	15898.59	

$$a\ \text{X}\frac{y}{n}\ \text{X}\frac{1311385}{6}\ \text{X}2185.642 \quad b\ \text{X}\frac{xy}{x^2}\ \text{X}\frac{15898.59}{19}\ \text{X}836.7679$$

Appendix:-8

Trend analysis of total investment of NABIL

Fiscal Year(t)	Total investment (Y)	X = t-2003	X^2	XY	Y_c = a + bx
2002/03	7704.31	-2	4	-15408.62	5390.7288
2003/04	8199.51	-1	1	-8199.51	5880.0904
2004/05	6031.18	0	0	0	6369.452
2005/06	5835.95	1	1	5835.95	6858.8136
2006/07	4267.23	2	4	8534.46	7348.1752
2007/08	6178.53	3	9	18535.59	7837.5368
Total	38216.71		19	9297.87	

$$a\ \text{X}\frac{y}{n}\ \text{X}\frac{38216.71}{6}\ \text{X}6369.452 \quad b\ \text{X}\frac{xy}{x^2}\ \text{X}\frac{9297.87}{19}\ \text{X}489.3616$$

Appendix: 9

Trend analysis of total investment of BOK

Fiscal Year(t)	Total investment (Y)	X = t-2003	X^2	XY	$Y_c = a + bx$
2002/03	419.82	-2	4	-839.64	176.95
2003/04	667.46	-1	1	-667.46	1034.91
2004/05	1816.15	0	0	0	1892.87
2005/06	2477.4	1	1	2477.4	2750.83
2006/07	2598.25	2	4	5196.5	3608.78
2007/08	3378.13	3	9	10134.39	4466.74
Total	11357.21		19	16301.19	

$$a \, \text{X} \frac{y}{n} \, \text{X} \frac{11357.21}{6} \, \text{X} 1892.868 \quad b \, \text{X} \frac{xy}{x^2} \, \text{X} \frac{16301.19}{19} \, \text{X} 857.9574$$

Appendix: 10

Trend analysis of net profit of NIBL

Fiscal Year(t)	Net profit (Y)	X = t-2003	X^2	XY	$Y_c = a + bx$
2002/03	69.7	-2	4	-139.4	31.12
2003/04	85.35	-1	1	-85.35	82.31
2004/05	94.18	0	0	0	133.50
2005/06	143.57	1	1	143.57	184.68
2006/07	170.8	2	4	341.6	235.87
2007/08	237.38	3	9	712.14	287.06
Total	800.98		19	972.56	

$$a \, \text{X} \frac{y}{n} \, \text{X} \frac{800.98}{6} \, \text{X} 133.4967 \qquad b \, \text{X} \frac{xy}{x^2} \, \text{X} \frac{972.56}{19} \, \text{X} 51.18737$$

Appendix:-11

Trend analysis of net profit of NABIL

Fiscal Year(t)	Net profit (Y)	X = t-2003	X^2	XY	$Y_c = a + bx$
2002/03	291.38	-2	4	-582.76	163.62
2003/04	271.64	-1	1	-271.64	297.52
2004/05	416.24	0	0	0	431.42
2005/06	455.31	1	1	455.31	565.32
2006/07	518.64	2	4	1037.28	699.22
2007/08	635.3	3	9	1905.9	833.12
Total	2588.51		19	2544.09	

$$a \; X \frac{y}{n} \; X \frac{2588.51}{6} \; X431.4183 \qquad b \; X \frac{xy}{x^2} \; X \frac{2544.09}{19} \; X133.8995$$

Appendix:-12

Trend analysis of net profit of BOK

Fiscal Year(t)	Net profit (Y)	X = t-2003	X^2	XY	$Y_c = a + bx$
2002/03	65.36	-2	4	-130.72	12.39
2003/04	9.28	-1	1	-9.28	58.38
2004/05	82.13	0	0	0	104.37
2005/06	127.48	1	1	127.48	150.36
2006/07	139.52	2	4	279.04	196.35
2007/08	202.44	3	9	607.32	242.34
Total	626.21		19	873.84	

$$a \; X \frac{y}{n} \; X \frac{626.21}{6} \; X104.3683 \qquad b \; X \frac{xy}{x^2} \; X \frac{873.84}{19} \; X45.99158$$

Coefficient of correlation between deposit between and loan and advances of NIBL

Years	Deposit (x)	Loan & Advances (y)	$X = x - \bar{x}$	X^2	$Y = y - \bar{y}$	Y^2	XY
2002/03	4574.51	3005.76	-3542.17	12546991.9	-2855.37	8153154.97	10114226.10
2003/04	5466.60	3948.48	-2650.08	7022941.66	-1912.65	3658241.50	5068689.83
2004/05	6694.96	4908.46	-1421.72	2021297.23	-952.67	907585.84	1354437.43
2005/06	8063.90	5884.12	-52.78	2786.07993	22.99	528.40	-1213.33
2006/07	10097.69	7618.67	1981.00	3924387.43	1757.54	3088936.31	3481692.52
2007/08	13802.44	9801.31	5685.76	32327828.90	3940.18	15524971.20	22402870.60
Total	48700.10	35166.80	0.00	57846233.20	0.00	31333418.17	42420703.14
Mean	8116.68	5861.13					

Coefficient of Correlation (r):

$$r = \frac{n\sum xy - \sum x \sum y}{\sqrt{n\sum x^2 - (\sum x)^2}\sqrt{n\sum y^2 - (\sum y)^2}} = \frac{\sum XY}{\sqrt{\sum X^2}\sqrt{\sum Y^2}} = 0.996406$$

Coefficient of Determination $(r^2) = 0.996406 \times 0.996406 = 0.99282537$

$$\text{Pr}\,obable\,(P.Er) = 0.6745 \left| \frac{1 - r^2}{\sqrt{n}} = 0.6745 \left| \frac{1 - 0.99282537}{\sqrt{}} = 0.001976 \right. \right.$$

6 (P.Er) = 0.011854

Cofficient of correlation between deposit between and loan and advances of NABIL

Years	Deposit (x)	Loan & Advances (y)	$X \, Xx \, Z\bar{x}$	X^2	$Y \, Xy \, Z\bar{y}$	Y^2	XY
2002/03	15839.00	7732.64	364.64	132959.92	-1371.56	1881168.60	-500120.02
2003/04	15506.43	7437.89	32.07	1028.27	-1666.31	2776579.02	-53432.97
2004/05	13447.66	7755.95	-2026.70	4107526.27	-1348.25	1817769.97	2732496.64
2005/06	14119.03	8189.99	-1355.33	1836928.35	-914.21	835774.44	1239055.19
2006/07	14586.66	10586.17	-887.70	788017.15	1481.97	2196243.97	-1315552.32
2007/08	19347.40	12922.50	3873.04	15000413.30	3818.34	14579743.30	14788582.60
Total	92846.18	54625.18	0.00	21866873.24	0.00	24087279.27	16891029.10
Mean	15474.36	9104.20					

Coefficient of Correlation (r):

$$r \, X \frac{n \quad xy \, Z \quad x \quad y}{\sqrt{n \quad x^2 \, Zf \quad x}A \sqrt{n \quad y^2 \, Zf \quad y}A} \, X \frac{f6 \, |Azf|A}{\sqrt{f6 \, |Azf \, A}\sqrt{f6 \, |Azf \, A}} \, X 0.735985$$

Coefficient of Determination (r^2) = $0.735985 \times 0.735985 = 0.54167374$

$$\Pr obable(P.Er) \, X 0.6745 \, | \frac{1 \, Z r^2}{\sqrt{n}} \, X 0.6745 \, | \frac{1 \, Z 0.54167374}{\sqrt{6}} \, X 0.126206$$

6 (P.Er) = 0.757238

Coeicient of correlation between deposit between and loan and advances of BOK

Years	Deposit(x)	Loan & Advances (y)	$X X x Z \bar{x}$	X^2	$Y X y Z \bar{y}$	Y^2	XY
2002/03	5713.49	4127.05	-1749.32	3060137.96	-1223.24	1496303.87	2139835.57
2003/04	5723.29	4613.61	-1739.52	3025947.23	-736.67	542690.05	1281464.58
2004/05	6170.71	4542.7	-1292.11	1669535.33	-807.58	652193.53	1043484.62
2005/06	7741.65	5646.69	278.84	77748.96	296.40	87855.92	82648.09
2006/07	8942.75	5912.58	1479.94	2190207.60	562.29	316175.67	832160.05
2007/08	10485	7259.08	3022.19	9133602.17	1908.80	3643505.99	5768737.66
Total	44776.89	32101.71	0.00	19157179.25	0.00	6738725.03	11148330.56
Mean	7462.81	5350.28					

Coefficient of Correlation (r):

$$r X \frac{n \quad xy Z \quad x \quad y}{\sqrt{n \quad x^2 Zf \quad xÅ}\sqrt{n \quad y^2 Zf \quad yÅ}} X \frac{f6 \ |Azf|A}{\sqrt{f6 \ |Azf \ Å}\sqrt{f6 \ |Azf \ Å}} X 0.981195$$

Coefficient of Determination (r^2) = 0.981195 × 0.981195 = 0.96274302

$$\Pr obable (P.Er) X 0.6745 | \frac{1 Z r^2}{\sqrt{n}} X 0.6745 | \frac{1 Z 0.96274302}{\sqrt{6}} X 0.010259$$

6 (P.Er) = 0.061555

Appendix:-16

Coefficient of correlation between total deposit between and total investment of NIBL

Years	Deposit (x)	Total investment (y)	$X = x - \bar{x}$	X^2	$Y = y - \bar{y}$	Y^2	XY
2002/03	4574.51	901.72	-3542.17	12546991.90	-1283.92	1648455.70	4547874.27
2003/04	5466.60	1693.03	-2650.08	7022941.66	-492.61	242666.58	1305462.85
2004/05	6694.96	1653.98	-1421.72	2021297.23	-531.66	282664.48	755876.27
2005/06	8063.90	2535.70	-52.78	2786.07	350.05	122540.60	-18477.23
2006/07	10097.69	2128.90	1981.00	3924387.43	-56.74	3219.65	-112406.28
2007/08	13802.44	4200.52	5685.76	32327828.90	2014.88	4059733.35	11456106.00
Total	48700.10	13113.85	0.00	57846233.20	0.00	6359280.38	17934435.90
Mean	8116.68	2185.64					

Coefficient of Correlation (r):

$$ r = \frac{n \sum xy - \sum x \sum y}{\sqrt{n \sum x^2 - (\sum x)^2}\sqrt{n \sum y^2 - (\sum y)^2}} = \frac{\sum XY}{\sqrt{\sum X^2}\sqrt{\sum Y^2}} = 0.935074 $$

Coefficient of Determination (r^2) = $0.935074 \times 0.935074 = 0.87436424$

$$ \Pr obable (P.Er) = 0.6745 \times \frac{1 - r^2}{\sqrt{n}} = 0.6745 \times \frac{1 - 0.87436424}{\sqrt{6}} = 0.03459 $$

6 (P.Er) = 0.207573

Appendix:-17

Coefficient of correlation between deposit between and total investment of NABIL

Years	Deposit (x)	Total investment (y)	$X = x - \bar{x}$	X^2	$Y = y - \bar{y}$	Y^2	XY
2002/03	15839	7704.31	364.64	132959.92	1334.85	1781845.88	486738.22
2003/04	15506.43	8199.51	32.06	1028.27	1830.05	3349112.28	58683.92
2004/05	13447.66	6031.18	-2026.70	4107526.27	-338.27	114427.95	685576.98
2005/06	14119.03	5835.95	-1355.33	1836928.35	-533.50	284624.38	723073.02
2006/07	14586.66	4267.23	-887.70	788017.15	-2102.22	4419337.34	1866149.41
2007/08	19347.4	6178.53	3873.04	15000413.30	-190.92	36451.21	-739447.91
Total	92846.18	38216.71	0.00	21866873.24	0.00	9985799.04	3080773.64

Mean	15474.36	6369.45					

Coefficient of Correlation (r):

$$r = \frac{n\sum xy - \sum x \sum y}{\sqrt{n\sum x^2 - (\sum x)^2}\sqrt{n\sum y^2 - (\sum y)^2}} = \frac{\sum XY}{\sqrt{\sum X^2}\sqrt{\sum Y^2}} = 0.208485$$

Coefficient of Determination $(r^2) = 0.208485 \times 0.208485 = 0.04346604$

$$Probable(P.Er) = 0.6745 \times \frac{1 - r^2}{\sqrt{n}} = 0.6745 \times \frac{1 - 0.04346604}{\sqrt{6}} = 0.263395$$

6 (P.Er) = 1.580367

Appendix:-18

Coefficient of correlation between deposit between and total investment of BOK

Years	Deposit (x)	Total investment (y)	$X = x - \bar{x}$	X^2	$Y = y - \bar{y}$	Y^2	XY
2002/03	5713.49	419.82	-1749.32	3060137.96	-1473.05	2169870.41	2398637.40
2003/04	5723.29	667.46	-1739.52	3025947.23	-1225.41	1501624.77	3820067.10
2004/05	6170.71	1816.15	-1292.10	1669535.33	-76.718	5885.65	11206935.00
2005/06	7741.65	2477.4	278.83	77748.96	584.53	341677.66	19179164.00
2006/07	8942.75	2598.25	1479.93	2190207.60	705.38	497563.76	23235500.00
2007/08	10485.00	3378.13	3022.18	9133602.17	1485.26	2206003.21	35419693.00
Total	44776.89	11357.21	0.00	19157179.25	0.00	6722625.46	508540543.00
Mean	7462.815	1892.87					

Coefficient of Correlation (r):

$$r = \frac{n\sum xy - \sum x \sum y}{\sqrt{n\sum x^2 - (\sum x)^2}\sqrt{n\sum y^2 - (\sum y)^2}} = \frac{\sum XY}{\sqrt{\sum X^2}\sqrt{\sum Y^2}} = 0.925525$$

Coefficient of Determination $(r^2) = 0.925525 \times 0.925525 = 0.856596$

$$Probable(P.Er) = 0.6745 \times \frac{1 - r^2}{\sqrt{n}} = 0.6745 \times \frac{1 - 0.856596}{\sqrt{6}} = 0.039488$$

6 (P.Er) = 0.236929

Appendix:-19

Coefficient of correlation between outside assets and net profit of NIBL

Years	Outside assets (x)	Net profit (y)	$X = x - \bar{x}$	X^2	$Y = y - \bar{y}$	Y^2	XY
2002/03	3907.48	69.70	-4139.29	17133749.00	-63.80	4070.01	264073.25
2003/04	5641.51	85.35	-2405.26	5785291.54	-48.15	2318.10	115805.49
2004/05	6562.44	94.18	-1484.33	2203245.35	-39.37	1545.80	58359.08
2005/06	8419.82	143.57	373.05	139163.84	10.07	101.47	3757.81
2006/07	9747.57	170.80	1700.79	2892709.41	37.30	1391.54	63445.32
2007/08	14001.82	237.38	5955.05	35462581.20	103.88	10791.74	618629.90
Total	48280.64	800.98	0.00	63616740.37	0.00	20218.67	1124070.87
Mean	8046.77	133.50					

Coefficient of Correlation (r):

$$r = \frac{n\sum xy - \sum x \sum y}{\sqrt{n\sum x^2 - (\sum x)^2}\sqrt{n\sum y^2 - (\sum y)^2}} = \frac{\sum XY}{\sqrt{\sum X^2}\sqrt{\sum Y^2}} = 0.991132$$

Coefficient of Determination (r^2) = $0.991132 \times 0.991132 = 0.98234334$

$$\text{Pr}obable(P.Er) = 0.6745 \times \frac{1 - r^2}{\sqrt{n}} = 0.6745 \times \frac{1 - 0.98234334}{\sqrt{6}} = 0.004862$$

6 (P.Er) = 0.029172

Coefficient of correlation between outside assets and net profit of NABIL

Years	Outside assets (x)	Net profit (y)	$X \times x Z \bar{x}$	X^2	$Y \times y Z \bar{y}$	Y^2	XY
2002/03	15436.95	291.38	2308.91	5331065.388	-140.038	19610.7255	-323335.83
2003/04	1563.74	271.64	-11564.3	133733034.5	-159.778	25529.1052	1847724.19
2004/05	13787.13	416.24	659.09	434399.6281	-15.178	230.380791	-10003.86
2005/06	14025.94	455.31	897.9	806224.41	23.8917	570.813329	21452.3574
2006/07	14853.4	518.64	1725.36	2976867.13	87.2217	7607.62495	150488.832
2007/08	19101.08	635.3	5973.04	35677206.84	203.8817	41567.7476	1217793.55
Total	78768.24	2588.51	0.00	178958797.89	0.00	95116.40	2904119.24
Mean	13128.04	431.4183					

Coefficient of Correlation (r):

$$r \; X \; \frac{n \quad xy \, Z \quad x \quad y}{\sqrt{n \quad x^2 \, Zf \quad xÅ}\sqrt{n \quad y^2 \, Zf \quad yÅ}} \; X \frac{f6 \; |Azf|A}{\sqrt{f6 \; |Azf \, Å}\sqrt{f6 \; |Azf \, Å}} \; X 0.703899$$

Coefficient of Determination (r^2) = $0.703899 \times 0.703899 = 0.495473511$

$$\Pr obable(P.Er) \; X 0.6745 \; | \frac{1 \, Z r^2}{\sqrt{n}} \; X 0.6745 \; | \frac{1 \, Z 0.495473511}{\sqrt{6}} \; X 0.138928$$

6 (P.Er) = 0.833569

Appendix:-21

Coefficient of correlation between outside assets and net profit of BOK

Years	Outside assets (x)	Net profit (y)	$X = x - \bar{x}$	X^2	$Y = y - \bar{y}$	Y^2	XY
2002/03	4546.87	65.36	-2695.71	7266879.36	-39.01	1521.65	105155.26
2003/04	5281.07	9.28	-1961.51	3847541.09	-95.09	9041.78	186517.13
2004/05	6358.85	82.13	-883.73	780987.55	-22.24	494.54	19652.76
2005/06	8124.09	127.48	881.50	777051.06	23.11	534.15	20373.08
2006/07	8510.83	139.52	1268.24	1608445.38	35.15	1235.64	44580.97
2007/08	10633.8	202.44	3391.21	11500339.18	98.07	9618.06	332582.22
Total	43455.51	626.21	0.00	25781243.63	0.00	22445.83	708861.42
Mean	7242.58	104.37					

Coefficient of Correlation (r):

$$r = \frac{n\sum xy - \sum x \sum y}{\sqrt{n\sum x^2 - (\sum x)^2}\sqrt{n\sum y^2 - (\sum y)^2}} = \frac{\sum XY}{\sqrt{\sum X^2}\sqrt{\sum Y^2}} = 0.931841$$

Coefficient of Determination $(r^2) = 0.931841 \times 0.931841 = 0.868326862$

$$\Pr obable (P.Er) = 0.6745 \times \frac{1 - r^2}{\sqrt{n}} = 0.6745 \times \frac{1 - 0.868326862}{\sqrt{6}} = 0.036258$$

6 (P.Er) = 0.217548

Appendix:-22

Coefficient of correlation between total deposit and Net profit of NIBL

Years	Deposit (x)	Net profit (y)	$X = x - \bar{x}$	X^2	$Y = y - \bar{y}$	Y^2	XY
2002/03	4574.51	69.70	-3542.17	12546991.69	-63.78	4070.02	225978.97
2003/04	5466.60	85.35	-2650.08	7022941.50	-48.15	2318.10	127592.77
2004/05	6694.96	94.18	-1421.72	2021297.14	-39.32	1545.80	55897.47
2005/06	8063.90	143.57	-52.78	2786.077	10.07	101.47	-531.70
2006/07	10097.69	170.80	1981.01	3924387.54	37.30	1391.54	73898.09
2007/08	13802.44	237.38	5685.76	32327829.25	103.88	10791.74	590655.17
Total	48700.10	800.98	0.00	57846233.20	0.00	20218.67	1073490.76

Mean	8116.68	133.49					

Coefficient of Correlation (r):

$$r \ \text{X} \ \frac{n \quad xy \, \text{Z} \quad x \quad y}{\sqrt{n \quad x^2 \, \text{Z} f \quad x \text{Å}} \sqrt{n \quad y^2 \, \text{Z} f \quad y \text{Å}}} \ \text{X} \ \frac{f6 \ |\text{Å} z f|\text{A}}{\sqrt{f6 \ |\text{Å} z f \ \text{Å}} \sqrt{f6 \ |\text{Å} z f \ \text{Å}}} \ \text{X} 0.992623$$

Coefficient of Determination (r^2) = $0.992623 \times 0.992623 = 0.985300858$

$$\Pr obable(P.Er) \ \text{X} 0.6745 \ | \ \frac{1 \, \text{Z} r^2}{\sqrt{n}} \ \text{X} 0.6745 \ | \ \frac{1 \, \text{Z} 0.985300858}{\sqrt{6}} \ \text{X} 0.004048$$

6 (P.Er) = 0.024286

<div align="center">

Appendix:-23

Coefficient of correlation between deposit and net profit of NABIL

</div>

Years	Deposit(x)	Net profit (y)	$X \ \text{X} x \, \text{Z} \bar{x}$	X^2	$Y \ \text{X} y \, \text{Z} \bar{y}$	Y^2	XY
2002/03	15839.00	291.38	364.64	132959.92	-140.04	19610.72	-51063.10
2003/04	15506.43	271.64	32.07	1028.27	-159.78	25529.10	-5123.56
2004/05	13447.66	416.24	-2026.70	4107526.27	-15.18	230.38	30761.91
2005/06	14119.03	455.31	-1355.33	1836928.35	23.89	570.81	-32381.22
2006/07	14586.66	518.64	-887.70	788017.15	87.22	7607.62	-77426.99
2007/08	19347.40	635.30	3873.04	15000413.28	203.88	41567.75	789641.30
Total	92846.18	2588.51	0.00	21866873.24	0.00	95116.40	654408.34
Mean	15474.36	431.42					

Coefficient of Correlation (r):

$$r \ \text{X} \ \frac{n \quad xy \, \text{Z} \quad x \quad y}{\sqrt{n \quad x^2 \, \text{Z} f \quad x \text{Å}} \sqrt{n \quad y^2 \, \text{Z} f \quad y \text{Å}}} \ \text{X} \ \frac{f6 \ |\text{Å} z f|\text{A}}{\sqrt{f6 \ |\text{Å} z f \ \text{Å}} \sqrt{f6 \ |\text{Å} z f \ \text{Å}}} \ \text{X} 0.453762$$

Coefficient of Determination (r^2) = $0.453762 \times 0.453762 = 0.205899635$

$$\Pr obable(P.Er) \ \text{X} 0.6745 \ | \ \frac{1 \, \text{Z} r^2}{\sqrt{n}} \ \text{X} 0.6745 \ | \ \frac{1 \, \text{Z} 0.205899635}{\sqrt{6}} \ \text{X} 0.218666$$

6 (P.Er) = 1.311997

Appendix:-24

Coefficient of correlation between total deposit and net profit of BOK

Years	Deposit(x)	Net profit (y)	$X\ X\ x\ Z\ \bar{x}$	X^2	$Y\ X\ y\ Z\ \bar{y}$	Y^2	XY
2002/03	5713.49	65.36	-1749.32	3060137.96	-39.01	1521.65	68238.19
2003/04	5723.29	9.28	-1739.52	3025947.23	-95.01	9041.78	165408.47
2004/05	6170.71	82.13	-1292.10	1669535.33	-22.24	494.54	28734.22
2005/06	7741.65	127.48	278.83	77748.96	23.11	534.15	6444.35
2006/07	8942.75	139.52	1479.93	2190207.60	35.15	1235.64	52022.23
2007/08	10485.00	202.44	3022.18	9133602.17	98.07	9618.05	296390.82
Total	44776.89	626.21	0.00	19157179.25	0.00	22445.83	617238.29
Mean	7462.81	104.37					

Coefficient of Correlation (r):

$$r\ X\ \frac{n\ \ xy\ Z\ \ x\ \ y}{\sqrt{n\ \ x^2\ Zf\ \ x\text{Å}}\sqrt{n\ \ y^2\ Zf\ \ y\text{Å}}}\ X\ \frac{f6\ |\text{Å}zf|\text{A}}{\sqrt{f6\ |\text{Å}zf\ \text{Å}}\sqrt{f6\ |\text{Å}zf\ \text{Å}}}\ X0.941281$$

Coefficient of Determination (r^2) = $0.941281 \times 0.941281 = 0.886009909$

$$\Pr obable(P.Er)\ X0.6745\ |\ \frac{1Zr^2}{\sqrt{n}}\ X0.6745\ |\ \frac{1Z0.886009909}{\sqrt{6}}\ X0.031389$$

6 (P.Er) = 0.188332

Appendix:-25

Coefficient of correlation between total deposit and interest earned of NIBL

Years	Total deposit (x)	Interest earned (y)	$X\ X\ x\ Z\ \bar{x}$	X^2	$Y\ X\ y\ Z\ \bar{y}$	Y^2	XY
2002/03	4574.51	385.02	-3542.17	12546991.90	-219.76	48293.71	778421.99
2003/04	5466.60	443.82	-2650.08	7022941.66	-160.96	25907.57	426552.91
2004/05	6694.96	520.17	-1421.72	2021297.23	-84.61	7158.56	120289.59

2005/06	8063.90	657.25	-52.78	2786.08	52.47	2753.28	-2769.63
2006/07	10097.69	719.3	1981.01	3924387.43	114.52	13115.22	226868.25
2007/08	13802.44	903.11	5685.76	32327828.91	298.33	89001.80	1696241.45
Total	48700.10	3628.67	0.00	57846233.20	0.00	186230.15	3245604.56
Mean	8116.68	604.78					

Coefficient of Correlation (r):

$$r = \frac{n\sum xy - \sum x \sum y}{\sqrt{n\sum x^2 - (\sum x)^2}\sqrt{n\sum y^2 - (\sum y)^2}} = \frac{\sum f6 - \sum f}{\sqrt{\sum f6 - \sum f}\sqrt{\sum f6 - \sum f}} = 0.988856$$

Coefficient of Determination (r^2) = 0.988856 × 0.988856 = 0.977836244

$$\Pr obable (P.Er) = 0.6745 \times \frac{1 - r^2}{\sqrt{n}} = 0.6745 \times \frac{1 - 0.977836244}{\sqrt{6}} = 0.006103$$

6 (P.Er) = 0.036619

Appendix:26

Coefficient of correlation between total deposit and interest earned of NABIL

Years	Total deposit (x)	Interest earned (y)	$X = x - \bar{x}$	X^2	$Y = y - \bar{y}$	Y^2	XY
2002/03	15839.00	1266.70	364.64	132960.14	135.76	18431.32	49503.85
2003/04	15506.43	1120.70	32.07	1028.29	-10.24	104.82	-328.30
2004/05	13447.66	1017.87	-2026.70	4107525.05	-113.07	12784.37	229155.25
2005/06	14119.03	1001.61	-1355.33	1836927.54	-129.33	16725.73	175282.50
2006/07	14586.66	1068.75	-887.70	788016.62	-62.19	3867.35	55204.47
2007/08	19347.40	1310.00	3873.04	15000415.60	179.06	32063.19	693513.75
Total	92846.18	6785.63	0.00	21866873.24	0.00	83976.79	1202331.53
Mean	15474.36	1130.94					

Coefficient of Correlation (r):

$$r = \frac{n\sum xy - \sum x \sum y}{\sqrt{n\sum x^2 - (\sum x)^2}\sqrt{n\sum y^2 - (\sum y)^2}} = \frac{\sum f6 - \sum f}{\sqrt{\sum f6 - \sum f}\sqrt{\sum f6 - \sum f}} = 0.887261$$

Coefficient of Determination (r^2) = 0.887261 × 0.887261 = 0.78723161

$$\Pr obable(P.Er) \; X0.6745 \mid \frac{1 Z r^2}{\sqrt{n}} \; X0.6745 \mid \frac{1 Z 0.78723161}{\sqrt{6}} \; X0.058589$$

6 (P.Er) = 0.351532

Coefficient of correlation between total deposit and interest earned of BOK

Years	Total deposit (x)	Interest earned (y)	$X \ X x Z \bar{x}$	X^2	$Y \ X y Z \bar{y}$	Y^2	XY
2002/03	5713.49	4546.87	-1749.32	3060137.96	-2695.72	7266879.36	4715681.64
2003/04	5723.29	5281.07	-1739.52	3025947.22	-1961.52	3847541.10	3412104.38
2004/05	6170.71	6358.85	-1292.10	1669535.33	-883.73	780987.55	1141878.41
2005/06	7741.65	8124.09	278.83	77748.96	881.50	777051.06	245794.47
2006/07	8942.75	8510.83	1479.93	2190207.60	1268.24	1608445.38	1876920.16
2007/08	10485.00	10633.80	3022.18	9133602.17	3391.21	11500339.20	10248879.10
Total	44776.89	43455.51	0.00	19157179.25	0.00	25781243.63	21641258.15
Mean	7462.81	7242.58					

Coefficient of Correlation (r):

$$r \ X \frac{n \ xy Z \ x \ y}{\sqrt{n \ x^2 Z f \ x Å}\sqrt{n \ y^2 Z f \ y Å}} \ X \frac{f6 \ |Az f|A}{\sqrt{f6 \ |Az f \ Å}\sqrt{f6 \ |Az f \ Å}} \ X 0.973789$$

Coefficient of Determination (r^2) = 0.973789 ×0. 973789 = 0.948264704

$$\Pr obable(P.Er) \ X 0.6745 \ | \frac{1 Z r^2}{\sqrt{n}} \ X 0.6745 \ | \frac{1 Z 0.948264704}{\sqrt{6}} \ X 0.014246$$

6 (P.Er) = 0.085476

Coefficient of correlation between loan and advances to interest paid of NIBL

Years	Loan and advances(x)	Interest paid (y)	$X \ X x Z \bar{x}$	X^2	$Y \ X y Z \bar{y}$	Y^2	XY
2002/03	3005.76	236.14	-2855.37	8153154.00	-66.885	4473.60	190981.61
2003/04	3948.48	257.05	-1912.65	3658240.85	-45.975	2113.70	87934.22
2004/05	4908.46	307.63	-952.67	907585.52	4.605	21.20	-4387.05
2005/06	5884.12	316.37	22.99	528.40	13.345	178.08	306.76
2006/07	7618.67	299.56	1757.54	3088936.90	-3.465	12.00	-6089.87
2007/08	9801.30	401.4	3940.17	15524972.49	98.375	9677.64	387614.63
Total	35166.80	1818.15	0.00	31333418.17	0.00	16476.25	656360.30
Mean	5861.13	303.02					

Coefficient of Correlation (r):

$$r \; X \; \frac{n \; xy \; Z \quad x \quad y}{\sqrt{n \quad x^2 \; Zf \quad xÅ}\sqrt{n \quad y^2 \; Zf \quad yÅ}} \; X \; \frac{f6 \; |Åz\,f|A}{\sqrt{f6 \; |Åz\,f \; Å}\sqrt{f6 \; |Åz\,f \; Å}} \; X0.913502$$

Coefficient of Determination (r^2) = $0.913502 \times 0.913502 = 0.834485072$

$$\Pr obable(P.Er) \; X0.6745 \; | \; \frac{1 \; Z \, r^2}{\sqrt{n}} \; X0.6745 \; | \; \frac{1 \; Z0.834485072}{\sqrt{6}} \; X0.045577$$

6 (P.Er) = 0.273461

Appendix:-29

Coefficient of correlation between loan and advances to interest paid of NABIL

Years	Loan and advances (x)	Interest paid (y)	$X \; X x \; Z\bar{x}$	X^2	$Y \; X y \; Z\bar{y}$	Y^2	XY
2002/03	7732.64	578.36	-1371.56	1881167.70	204.78	41934.85	-280867.3
2003/04	7437.89	462.08	-1666.31	2776577.92	88.50	7832.25	-147468.1
2004/05	7755.95	317.35	-1348.25	1817769.08	-56.23	3161.81	75811.91
2005/06	8189.99	282.95	-914.21	835773.84	-90.63	8213.80	82854.55
2006/07	10586.17	243.54	1481.97	2196244.95	-130.04	16910.40	-192715.8
2007/08	12922.54	357.20	3818.34	14579745.79	-16.38	268.30	-62544.46
Total	54625.18	2241.48	0.00	24087279.2	0.00	78321.41	-524929.3
Mean	9104.19667	373.58					

Coefficient of Correlation (r):

$$r \; X \; \frac{n \; xy \; Z \quad x \quad y}{\sqrt{n \quad x^2 \; Zf \quad xÅ}\sqrt{n \quad y^2 \; Zf \quad yÅ}} \; X \; \frac{f6 \; |Åz\,f|A}{\sqrt{f6 \; |Åz\,f \; Å}\sqrt{f6 \; |Åz\,f \; Å}} \; X\text{-}0.38218$$

Coefficient of Determination (r^2) = $-0.38218 \times -0.38218 = 0.146060711$

$$\Pr obable(P.Er) \; X0.6745 \; | \; \frac{1 \; Z \, r^2}{\sqrt{n}} \; X0.6745 \; | \; \frac{1 \; Z0.146060711}{\sqrt{6}} \; X0.235144$$

6 (P.Er) = 1.410862

Coefficient of correlation between loan and advances to interest paid of BOK

Years	Loan and advances(x)	Interest paid (y)	$X \ X x \ Z \bar{x}$	X^2	$Y \ X y \ Z \bar{y}$	Y^2	XY
2002/03	4127.05	310.48	-1223.24	1496304.67	25.77	663.92	-31518.74
2003/04	4613.61	285	-736.68	542690.54	0.29	0.08	-211.20
2004/05	4542.7	276.71	-807.59	652194.07	-8.00	64.05	6463.35
2005/06	5646.69	286.3	296.40	87855.73	1.59	2.52	470.31
2006/07	5912.58	241.64	562.29	316175.30	-43.07	1855.31	-24219.89
2007/08	7259.082	308.15	1908.80	3643504.73	23.44	549.28	44735.89
Total	32101.71	1708.28	0.00	6738725.03	0.00	3135.16	-4280.28
Mean	5350.28	284.71					

Coefficient of Correlation (r):

$$r \ X \frac{n \quad xy Z \quad x \quad y}{\sqrt{n \quad x^2 Zf \quad xA}\sqrt{n \quad y^2 Zf \quad yA}} \ X \frac{f6 \ |Azf|A}{\sqrt{f6 \ |Azf \ A}\sqrt{f6 \ |Azf \ A}} \ X\text{-}0.02945$$

Coefficient of Determination (r^2) = -0.02945 × -0.02945 = 0.000867175

$$\Pr obable(P.Er) \ X 0.6745 \ | \frac{1 Z r^2}{\sqrt{n}} \ X 0.6745 \ | \frac{1 Z 0.000867175}{\sqrt{6}} \ X 0.275125$$

6 (P.Er) = 1.650748

Appendix:-31

Coefficient of correlation between total working fund and net profit of NIBL

Years	Working fund (x)	Net profit (y)	$X \; X x \; Z \bar{x}$	X^2	$Y \; X y \; Z \bar{y}$	Y^2	XY
2002/03	5202.58	69.7	-4336.03	18801112.80	-63.80	4070.02	276624.09
2003/04	6616.89	85.35	-2921.72	8536418.54	-48.15	2318.10	140670.94
2004/05	8052.2	94.18	-1486.41	2209399.82	-39.32	1545.80	58440.54
2005/06	9608.56	143.57	69.95	4893.70	10.07	101.47	704.68
2006/07	11792.12	170.8	2253.52	5078329.86	37.30	1391.54	84063.55
2007/08	15959.28	237.38	6420.68	41225067.46	103.88	10791.74	667000.91
Total	57231.63	800.98	0.00	75855222.18	0.00	20218.67	1227504.69
Mean	9538.605	133.4967					

Coefficient of Correlation (r):

$$r \; X \; \frac{n \;\; xy \, Z \;\; x \;\; y}{\sqrt{n \;\; x^2 \, Zf \;\; x \AA}\sqrt{n \;\; y^2 \, Zf \;\; y\AA}} \; X \; \frac{f6 \; |\!\AA z f| A}{\sqrt{f6 \; |\!\AA z f \; \AA}\sqrt{f6 \; |\!\AA z f \; \AA}} \; X 0.991184$$

Coefficient of Determination (r^2) = 991184 × 991184 = 0.982444814

$$\text{Pr}\,obable\,(P.Er)\; X 0.6745 \; | \; \frac{1 Z r^2}{\sqrt{n}} \; X 0.6745 \; | \; \frac{1 Z 0.982444814}{\sqrt{6}} \; X 0.004834$$

6 (P.Er) = 0.029004

Appendix:-32

Coefficient of correlation between total working fund and net profit of NABIL

Years	Working fund (x)	Net profit (y)	$X \; X x \; Z \bar{x}$	X^2	$Y \; X y \; Z \bar{y}$	Y^2	XY
2002/03	17770.65	291.38	-250.07	62533.35	-140.04	19610.73	35018.92
2003/04	17529.25	271.64	-491.47	241539.52	-159.78	25529.11	78525.71
2004/05	16562.62	416.24	-1458.10	2126045.99	-15.18	230.38	22131.43
2005/06	16745.48	455.31	-1275.24	1626228.64	23.89	570.81	-30467.57
2006/07	17186.33	518.64	-834.39	696201.17	87.22	7607.62	-72776.63
2007/08	22329.97	635.3	4309.25	18569664.00	203.88	41567.75	878577.89
Total	108124.30	2588.51	0.00	23322212.67	0.00	95116.40	911009.75
Mean	18020.7167	431.4183					

Coefficient of Correlation (r):

$$r = \frac{n\,\Sigma xy - \Sigma x\,\Sigma y}{\sqrt{n\,\Sigma x^2 - (\Sigma x)^2}\,\sqrt{n\,\Sigma y^2 - (\Sigma y)^2}} = 0.611661$$

Coefficient of Determination (r^2) = 0.611661 × 0.611661 = 0.374128596

$$\text{Pr}\,obable(P.Er) = 0.6745 \times \frac{1 - r^2}{\sqrt{n}} = 0.6745 \times \frac{1 - 0.374128596}{\sqrt{6}} = 0.172342$$

6 (P.Er) = 1.034053

Appendix:-33

Coefficient of correlation between total working fund and net profit of BOK

Years	Working fund (x)	Net profit (y)	$X = x - \bar{x}$	X^2	$Y = y - \bar{y}$	Y^2	XY
2002/03	6201.93	65.36	-2403.94	5778911.51	-39.01	1521.65	93773.48
2003/04	6356.65	9.28	-2249.22	5058975.63	-95.09	9041.78	213874.19
2004/05	7444.82	82.13	-1161.05	1348029.37	-22.24	494.54	25819.70
2005/06	9496.34	127.48	890.47	792942.75	23.11	534.15	20580.35
2006/07	9857.13	139.52	1251.26	1565659.92	35.15	1235.64	43984.03
2007/08	12278.33	202.44	3672.46	13486986.91	98.07	9618.06	360164.72
Total	51635.20	626.21	0.00	28031506.09	0.00	22445.83	758196.48
Mean	8605.87	104.37					

Coefficient of Correlation (r):

$$r = \frac{n\,\Sigma xy - \Sigma x\,\Sigma y}{\sqrt{n\,\Sigma x^2 - (\Sigma x)^2}\,\sqrt{n\,\Sigma y^2 - (\Sigma y)^2}} = 0.955852$$

Coefficient of Determination (r^2) = 0.955852 × 0.955852 = 0.913653499

$$\text{Pr}\,obable(P.Er) = 0.6745 \times \frac{1 - r^2}{\sqrt{n}} = 0.6745 \times \frac{1 - 0.913653499}{\sqrt{6}} = 0.023777$$

6 (P.Er) = 0.14266

Appendix no:-34

Regression equation between net profit on total working fund of NIBL

Year	Working fund (X)	Net profit (Y)	X^2	Y^2	XY
2002/03	5202.58	69.70	27066838.66	4858.09	362619.83
2003/04	6616.89	85.35	43783233.27	7284.62	564751.56
2004/05	8052.20	94.18	64837924.84	8869.87	758356.20
2005/06	9608.56	143.57	92324425.27	20612.34	1379500.96
2006/07	11792.12	170.80	139054094.09	29172.64	2014094.10
2006	15959.28	237.38	254698618.12	56349.26	3788413.89
Total	57231.63	800.98	621765134.25	127146.83	8867736.53

X= independent variable

Y= dependent variable

Appendix no:-35

Regression equation between net profit on total working fund of NABIL

Year	Working fund X	Net profit Y	X^2	Y^2	XY
2002/03	17770.7	291.38	315796001.42	84902.30	5178012.00
2003/04	17529.3	271.64	307274605.56	73788.29	4761645.47
2004/05	16562.6	416.24	274320381.26	173255.74	6894024.95
2005/06	16745.5	455.31	280411100.43	207307.20	7624384.50
2006/07	17186.3	518.64	295369938.87	268987.45	8913518.19
2007/08	22330	635.3	498627560.20	403606.09	14186229.94
Total	108124.30	2588.51	1971799587.75	1211847.07	47557815.05

X= independent variable

Y= dependent variable

Appendix no:-36

Regression equation between net profits on total working fund of BOK

Year	Working fund X	Net profit Y	X^2	Y^2	XY
2002/03	6201.93	65.36	38463935.72	4271.93	405358.14
2003/04	6356.65	9.28	40406999.22	86.12	58989.71
2004/05	7444.82	82.13	55425344.83	6745.34	611443.07
2005/06	9496.34	127.48	90180473.40	16251.15	1210593.42
2006/07	9857.13	139.52	97163011.84	19465.83	1375266.78
2007/08	12278.33	202.44	150757387.59	40981.95	2485625.13
Total	51635.20	626.21	472397152.60	87802.32	6147276.25

X= independent variable

Y= dependent variable

Appendix no:-37

Regression equation between net profits on total deposit of NIBL

Year	Total deposit X	Net profit Y	X^2	Y^2	XY
2002/03	4574.51	69.7	20926141.74	4858.09	318843.35
2003/04	5466.6	85.35	29883715.56	7284.62	466574.31
2004/05	6694.96	94.18	44822489.40	8869.87	630531.33
2005/06	8063.9	143.57	65026483.21	20612.34	1157734.12
2006/07	10097.69	170.8	101963343.34	29172.64	1724685.45
2007/08	13802.44	237.38	190507349.95	56349.26	3276423.21
Total	48700.10	800.98	453129523.20	127146.83	7574791.77

X= independent variable

Y= dependent variable

Appendix no:-38

Regression equation between net profit on total deposit of NABIL

Year	Total deposit X	Net profit Y	X^2	Y^2	XY
2002/03	15839	291.38	250873921.00	84902.30	4615167.82
2003/04	15506.43	271.64	240449371.34	73788.29	4212166.65
2004/05	13447.66	416.24	180839559.48	173255.74	5597454.00
2005/06	14119.03	455.31	199347008.14	207307.20	6428535.55
2006/07	14586.66	518.64	212770649.96	268987.45	7565225.34
2007/08	19347.4	635.3	374321886.76	403606.09	12291403.22
Total	92846.18	2588.51	1458602396.68	1211847.07	40709952.58

X= independent variable

Y= dependent variable

Appendix no:-39

Regression equation between net profit on total deposit of BOK

Year	Total deposit X	Net profit Y	X^2	Y^2	XY
2002/03	5713.49	65.36	32643967.98	4271.93	373433.71
2003/04	5723.29	9.28	32756048.42	86.12	53112.13
2004/05	6170.71	82.13	38077661.90	6745.34	506800.41
2005/06	7741.65	127.48	59933144.72	16251.15	986905.54
2006/07	8942.75	139.52	79972777.56	19465.83	1247692.48
2007/08	10485	202.44	109935225.00	40981.95	2122583.40
Total	44776.89	626.21	353318825.59	87802.32	5290527.67

X= independent variable

Y= dependent variable