# DIVIDEND POLICY AND IT'S EFFECT ON STOCK PRICE (A case Study of SCBNL, EBL, NABIL, HBL & NSBI)

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> A Thesis Submitted to: Office of the Dean Faculty of Management Tribhuvan University

In Partial Fulfillment of the Requirements for the degree Of Master of Business Studies (MBS)

> Putalisadak, Kathmandu February, 2010

# Chapter-I Introduction

### 1.1 Back ground of the study:

Nepal is the landlocked and developing country. It is divided in to three ecological regions on the basis of geographically, Mountain region, Hilly region and Terai region. Financial institution plays as a catalyst in the process of economic growth of the country. The economic structure of Nepal is mix-economy.

The financial institution play vital role in capital formation and proper utilization of collective fund by providing service in economic growth of the Nations. So, if there is insufficient of bank and financial institution, the growths of the economy development become slow. The main objective of the commercial bank is to earn profit by proper mobilization of resources. Commercial Banks have different function like as accepting deposit, providing loan. After the Formulation of capital and credit creation, which make business easier. In the case of economic boom bank increase interest rates which increase the profitability of banks and in case of depression banks reduce the interest rate.

Now in Nepal here is 31 commercial banks are aiming to contribute the economy of the country. The financial institution has remarkably developed in a short span of one decade. The development has notably help to mobilize the internal resources as well as external resource for economic development of the nation.

The history of the securities market began with the flotation of shares by Biratnagar Jute Mills Ltd. The history if modern banking in Nepal began in 1937 A.D. When Nepal Bank was establish as a first bank in nongovernmental sector and it became Public Limited Company. It performed as Central Bank until NRB was established in 1956 A.D. After end of the Ranas Era in Nepal the government of Nepal adopted policy of the liberalization and it became globalize after the re-establishment of democracy. For the foreign investment government of Nepal permitted to establish joint venture bank in, the first joint venture bank is Nepal Arab Bank Ltd.(NABIL) was established in Nepal in 1984 A.D. They assist in the economic growth by mobilize scattered funds.

#### **Dividend policy and market price of stock**

Dividend is the portion of net profit, the BOD declare dividend to share holder. The payment of corporate dividend is at the discretion of BOD. Most corporate pays dividend quarterly. Generally dividend is paid as a cash or stock in Nepalese prospective. Minority shareholders are not seeker of the dividend rather than they expect growth of share price. The BOD can not declare any kind of dividend without concerning to creditor and preference shareholder .Dividend decision is the major decision of the firm. The Net Profit contains Retain Earning as well as Dividend

The retained earning is the most important source of long term capital for using in profitable investment alternatives. Retained earnings are the most significant internal sources of financing for growth of firm. On the other hand, dividends are desirable from shareholder point of view as it tends to increase their current wealth. Dividends constitute the use of the firm's funds. Dividend policy is a major decision of firm, there is always conflict in management and executive level whether to distribute dividend or not. There is reciprocal relationship between retained earning and cash dividends. A higher dividend rate means less retained earning and lesser dividend rate means high retained earning. If retained earning is less the growth will be slower and lower market price per share. So, the financial manager must decide very carefully the allocation of earning between dividends and retained earning. R/E affect the value of firm, it's directly impact on cost of capital.

Generally dividend policy and stock price has always positive correlation; if the company pays high dividend the stock price increase and vice-versa. But in some cases because of their interrelation, the price may remain constant or decrease low. Therefore the lack or flow of information for the stakeholder plays a vital role in the analysis of MPS.

#### **1.2 Focus of the study:**

The main Focus of the study is dividend policy practice in Nepalese commercial Bank. But for whole these purpose different other studies are going to be done i.e. comparison of EPS, DPS, MPS other relevant studies as per requirement. There is always confusion in people about dividend payment has no impact on valuation of stock price.

# **1.3 Statement of Problem :**

Dividend is the motivating factor for the investor. But Nepalese commercial Bank has no satisfactory result on dividend decision. The dividend decisions are affecting by government rules regulations.

- ) What is the relationship of dividend with EPS, MPS, Net Profit and Net Worth of commercial bank?
- ) What is the inspiring factor to distribution of cash or stock dividend?
- ) What effect on MPS after the dividend payment?
- ) What is the policy of Nepalese commercial bank toward dividend policy is there is uniformity.
- ) What are the reasons behind stock price increase after the announcement of dividend?

# **1.4** Objectives of study :

The major objectives of study are

- ) To find out impact of dividend policy of market price of stock.
- ) To evaluate the relationship on dividend decision market price of share of selected commercial bank.
- ) To analysis the relationship of dividend with EPS, MPS, DPS and DPR.
- ) To provide suggestion to the policy maker management of select commercial banks for improvements.

# **1.5 Significance of the study:**

Dividend decision is the one of the most important decision. It play vital role in every organization. Investor of the organization expect return from there past investment as dividend. By the dividend policy it became an effective way to attract new investors. This study is helpful to understand the dividend payment policy of the commercial bank in Nepal. It will helpful to the policy maker, share holder and management of the selected commercial bank. It is also important for the government policy maker, controller, monitor and supervising department to regulate the commercial Bank in Nepal. This study will help to the further researchers too.

### **1.6 Limitation of study:**

- ) Most of the data are used secondary nature; therefore it might be reporting errors.
- ) The analysis of the study covers only five years period that may not represented the whole.
- ) There are many factors that affect the dividend decision valuation of the firm. However we consider only dividend related factor.
- ) This study covers only dividend policy of selected commercial bank and its impact on market price of share.

### **1.7 Organization of the study:**

This study has been organized into five chapters.

#### **Chapter 1 Introduction:**

This chapter deals with subject matter of the study consisting background of study, focus of study, statement of the objective of study, significance of the study, limitation of the study and organization of study.

### **Chapter 2 Review of Literature:**

This chapter deals with the review of the different literature of the study field. Therefore it includes conceptual framework along with the review of major books, journal, research work and thesis etc.

#### **Chapter 3 Research Methodology:**

This chapter deals with research population and sample, source and technique of data collection, data analysis tools and limitation of the methodology.

#### **Chapter 4 Data Presentation & analysis:**

This chapter deals with presentation and analysis of data and information through a define course of research methodology.

#### **Chapter 5 Summary, Conclusions & Recommendations:**

This chapter deals with summary of study, the conclusion and major finding of the study. The bibliography, annexes are incorporated at the end of the study.

# **Chapter II**

# **Review of Literature**

This Chapter Highlight on literature that is available in this topic. Literatures that are concern to this subject .Similarly, what other have said or written about the dividend policy are also reviewed. Which provide the useful input in this study .we should study in this chapter what factors are affected to dividend and what are the types of dividends?

#### 2.1 Conceptual Framework:

How much desirable to pay as dividend a matter is always disputed, because shareholder expects higher dividend from corporation and want to re-invest its profit for maximizing the overall shareholder's wealth. "Financial management is therefore concerned with the activities of corporation that affect the well-being of shareholder. That well being can be particularly measured by the dividend received, but a more accurate measure is market value of stock" (*Weston & Copeland, 1973:1*).

"The Company should adopt that dividend policy which should be minimizing the market price of share. "The objective of dividend policy should be to maximize a shareholder's return so that value of investment is maximized" (*Pandey: 672*). Dividend policy of the firm has a long term impact on financial structure, the flow of funds, corporate liquidity, net profit, Share Price and earning per share. The more of the company distribute cash dividend the lesser will be earning available for investment, weather dividend will increase value or not may depend on the profitable investment opportunities available to the firm.

Dividend policy decision is the one of the major decision of the financial management. which affects financial structure, the flow of the fund, corporate liquidity investor's attitudes. The dividend policy adopted by the firm should be such that strikes a proper balance between the financing decision and wealth maximization decisions. There is reciprocal relationship between the retained earning and cash dividend. If retained earning is kept more by the company less will be dividend and vice-versa. It is in the sense that the firm has to choose between distribution profits of shareholders and plowing them back in to the business. The decision depends up on

the objectives of the management for wealth maximization .The firm will use the net profit for paying dividends to the shareholder.

### 2.1.1. Common Stocks

Common Stock has one important investment characteristics one important speculative characteristic. Their investment value average market price tend to increase regularly but persistently over the decades as their network builds through the reinvestment of undistributed earnings however, most of the time common stocks are subject to irrational excessive price fluctuation in both directions, as the consequence of the ingrained tendency of most people to speculate or gamble, i.e. to give way to hope, fear, greed"(*Chand, 1995:98*).

A firm can collect funds required, by issuing shares and debentures as long term sources of fund. Common stocks are ownership capital where as debentures are creditor ship capital. In between of ownership and creditor ship capitals, preference share capital also exists, which is regarded as a hybrid source of financing common stock is "finance an equity share in the ownership of a company that gives the owner the right to participate in electing the board of director voting on other matter brought before the stockholders, in proportion to the number of shares hold" (*Webster Dictionary*).

A banker is one who in the ordinary course of his business receives money, which he repays by honoring Cheque of persons from whom or on whose account he receives it. Therefore a commercial bank is a financial institution that accepts the demand and time deposit from the business, institution and individuals engaged in both business consumers lending. It uses funds raised from the public deposits providing loans to different sectors with the prime objectives of profit maximization. Moreover, commercial bank provides technical administrative assistances to industries, trade and business persons.

A bank is an institution that establish for provide safety of deposit and providing required fund as per individual or corporate need as per agreement. Not only in the highly developed industrial an non-industrial economics of the world where in a way the commercial industrial activities are paralyzed in the absence of banks keeping their doors open, even in the developing countries most economic activities, particularly in the economy's organized section or, are bank based''(*Sinkey*, 1988:12-14).

Management should try to maintain regular dividend. If the firms have adequate earning management set a lower regular dividend.

"Higher dividends can directly benefit shareholder because they reduce the free resources, with manager can use sub-optimally. Some economists believe that management decides to pay dividend in order to pay dividend in order to reduce agency cost" (*Easter*, 1984:650).

"Dividend refers to that portion of firm's net earning, which are payout to the shareholders" (*Bhattarai*, 2002:12).

"Dividend policy is concerned with determining the portion of firm's earning to be distributed in the form of cash dividend the portion of earning to be retained. Dividend policy decision is yet crucial area of financial management. There are two major schools of thought (relevant and irrelevant theory) among finance scholars regarding the effect of dividend policy has on a firm's value. The underlying goal of this chapter is to examine these theories of dividend<sup>"</sup> (*Gautam &Thapa, 2008:335*).

Dividend policy determines the decision of earning between payments to shareholders reinvestment in the firm. Retained earning is one of the most significant sources of funds for financing corporation growth, but dividend constitutes the cash flow that accrues to shareholder'' (*Weston & Copel: 657*).

### **2.1.2 Commercial Banks**

The size and composition of commercial bank's transactions is mirror of economic happening in the country. For example, the mass failure of commercial banks during the 1930's reflected the phenomenon serve global depression in the world. Commercial banks have played the vital role in giving a direction financing the requirements of trade and industry in the country.

The history of banking section in our country is not of far time interval. With an establishment of Nepal Bank Ltd, in 1937, the commercial banks history was opened. At that time 51% government 49% by public held equity in general. After then, Rastriya Banijya Bank came in existence in 1966 as the second commercial bank but with 100% government ownership. After 1980, many foreign joint venture banks were introduced in Nepal. It could be, only when the government applied the financial liberalization policy. Many of new banks to registered to open even today.

"The common stock represents equity or an ownership position in a corporation. It is a residual claim, in the sense that creditors preferred stockholders must be paid as scheduled before common stockholders can receive any payments. In bankruptcy common stockholders are in principle entitled to any value remaining after all other claimants have been satisfied (However, in practice courts sometimes violate this principal). The great advantage of the corporate firm of organization is the limited liability of its Owners. Common stocks are generally "fully paid non assessable" meaning that common stockholders may loose their initial investment but not more. That is the corporation fails to meet its obligations, the stockholders cannot be forced to give the corporation the funds that are needed to pay off the obligations. However, as result of such a failure, it is possible that the value of a corporation's share will be negligible. This outcome will result in the stockholders having lost an amount equal to the price paid to buy the shares " (*Van Horne & Wachowicz, 2000: 246*).

Commercial banks are among the base pillar of economic development of any nation. Especially in the developed countries, the operations of commercial banks record the economic pulses of the economy.

Commercial bank not only generates the small savings from the nook corner of the country, it in the border sense, help to promote secondary as well as primary security markets. Initial public offering (IPO), underwriting security and collateral loans are the examples. Similarly, it draws the community savings into the organized sectors, which can then be allocated among the different economic activities according to the priorities laid down by the planning authorities in the nation.

Basically in the planned economy, commercial bank not only provides economic resource but also provides assists with technical know-how. They in other hands also

do not discriminate the investment areas and organization, whether the organization is public, joint venture, private sector or government. All these sectors are equally subsumed into the production plans for bank finance.

A bank is a financial institution that trade money. It accepts deposit from the public as fixed, current and saving. The bank gives money in the form of loans and advances to the needy persons and organization. It provides to customers a cheap medium of exchange like Cheques. It gives the facilities transfer of funds, collecting customer's funds, purchase of shares, collecting dividend and purchase and sell foreign exchange etc.

#### 2.2 Form of Dividends:

Through the most popular forms of dividend is cash dividend. The market price of the share drops in most cases by the amount of cash dividend distributed. Firms need to follow various types of dividend in view of the firm objective and policies which they implement in Nepalese context, the type of dividend that corporations follow in partly a matter of various circumstances and other financial Constraints that bound corporate plan policies. Based on the financial suitability of corporation, dividend may be distributed in various forms like cash dividend, property dividend, stock dividend and Bond dividend. In our country, only cash and stock dividend are declared and paid.

#### 2.2.1 Cash Dividend

It is a kind of dividend, which is distribution to the shareholder in the form of cash out of the earning of the company. If dividend is paid, it will be reduce the cash and reserve account. The market price of the share drops in most cases by the amount of the cash dividend distribution. The firm has to maintain adequate level of liquidity position for distribution of the cash dividend otherwise the company should borrow the needed fund externally.

Cash is a major form of the dividend .Most of company pay dividend in cash .A Company should have enough cash in its bank account, when Cash dividends are declared .To pay cash as a dividend, the company should have enough cash. If the company has not sufficient cash then the company should made arrangement to borrow funds. When the company follows the stable dividend policy, it should prepare a cash budget for coming period to indicate the necessary funds, which would be needed to meet the regular dividend payment of the company. The cash account and reserve account of the Company will be reduced when the cash dividend is paid. Thus, both the total assets and the total worth of the company are reduced when the cash dividend is paid. The market price of the share drops in most cases by the amount of the cash dividend is distributed.

# 2.2.2 Stock Dividend (Bonus Shares) and Shares Split

Another expect of the dividend policy is stock dividend and stock split .A stock dividend is paid in additional shares of stock instead of in cash and simply involves bookkeeping transfer from retain earning to the capital account instead a larger no. of share of common stock is issued .In a two for one stock split, stock holder received two share for each previously held. The book Value per share is cut in half, and the par, or stated, value of share of stock in similarly changed. In Nepal most of the commercial bank paying cash as well as stock dividend.

One of the common forms of the stock dividend referred as bonus share, are the subscription receipt (Script) provided to the shares holders as additional shares. Bonus share has attribute buoyancy so that it is more preferred by the stock share holders.

The effect of the stock dividend or stock dividend or stock split can be summarized as follows (*Lawrence & Charles, 1991:448*).:

- ) There is no changed in the firm assets and liabilities or on share holders' equity (assets less liabilities).
- ) There is fall in per share earnings, book value and market price offsetting rise in the no of shares held by each shareholder.

# 2.2.3 Property Dividend

This involves payment of assets or property in any form other then cash. This Form dividend may be following when there are assets that are no longer necessary operation of business or extra ordinary circumstances. Property dividends are least used practices and only used when extra ordinary circumstances exist. Companies on product and securities of subsidiaries are the examples that have been paid as property dividend.

### 2.2.4 Bond Dividend

Bond dividend by its name is a dividend that is distributed to share holders in form of the bond .Bond dividend helps to postpone the payment of cash. These are given when the firms unable to take the burden of interest of loans. In other words, company declared dividend in the form of its own bond with a view to avoid cash outflows.

#### 2.2.5 Script Dividend

A dividend paid in the form of promissory notes is called script dividend. "Script dividend is those paid in company's promises to pay instead of cash"(*Encyclopedia Americana, 1997:322*). It is paid when earnings of the company justify dividends but the company's cash position is temporarily weak and doesn't permit cash dividend .It may declare dividend in form of script. Script dividends may bear a definite maturity date or the disbursement date may be left to the directors. Such dividends may be interest bearing or non interest bearing.

#### 2.3 Dividend Payout Scheme:

In general, firms can pay dividends using either residual dividend policy or stable dividend policy. Dividends are increased along with the increase in earnings. If future earning is not expected to grow, the companies at least try to maintain the dividends at present level and they are increased only after an increase in earnings appears to be sustainable and relatively permanent.

#### 2.3.1 Residual Theory of Dividend

Under the residual dividend policy dividend are paid out from after meeting equity financing requirements. In other word, the shareholder get dividend only when there exist balance of earning after paying fixed obligation financing all profitable investment area. In this theory dividend paid is set equal to actual earning minus the amount of retained earnings necessary to finance for the firm's new investment. It assumes that the internally generated funds (retained earning) are comparatively cheaper than the funds obtained from external sources due to floatation cost. This dividend policy is influence by (I) the company's investment opportunity, and (ii) the availability of internally generated capital. Under residual theory amount of dividend is computed using following equation.

Amount of Dividend = Net income – Equity capital component of new project

Hence, in this theory dividend paid is set equal to actual earning minus the amount of retained earnings necessary to finance for the firm's new investment. If net i9ncome is more than the amount of equity financing the firm pays dividend. Otherwise dividend is not paid, Deficit amount is raised from external equity.

### 2.3.2 Stability of Dividend

The common stockholder generally prefers a stable dividend income on their investments. The term dividend stability refers to the consistency or lack of variability in the stream of dividends. Many firms prefer stability in dividend payment, the stability of dividends can take any of the following three forms.

#### 2.3.2.1 Constant Dividend per Share

Constant dividend policy is based on the payment of fixed amount per share in each period. A number of companies follow the policy of paying fixed amount per share as dividend every period. The policy doesn't imply that the dividend per share or dividend rate will never be increased .When the company reaches new level of earning expect to maintain it the annual dividend per share may increased .Investor who have dividends as the only source of their income prefer the constant dividend policy.

#### 2.3.2.2 Constant Payout Ratio

Constant payment means paying a fixed percentage of net earnings as dividend payment every year. Under this policy, the dividend fluctuates in direct proportion to the volatility of earnings. It reflects company's ability to pay dividends. If the company generates profits, dividend shall be paid otherwise not. At any given payout ratio, the amount of dividends and addition to retained earning increasing with earning decrease with decreasing earnings. So it guards against over payments as well as underpayments of dividends. Earn and avoided when it incurs losses (*Brantd, 1972:448-449*). However shareholders argue that this policy poses uncertainty and irregularity in regards to expected dividends. There is much Irregularity in payment of dividends in our country.

# 2.3.2.3 Low regular dividend Plus Extra

Under this policy a minimum constant per share plus some extra amount of dividends paid depending upon the earnings. This policy is appropriate when there is volatile earning of the firms. Shareholder also favor this policy because they are benefited in prosperity and continual depression .In other word, the shareholders like this policy because of normal or minimum regular low dividend per share and option of extra dividends occasionally. So, this policy is compromise between first two.

# 2.4. Dividend Payment Procedure

Firms usually pay dividends on a quarterly basis in accordance with the following payment procedure:

# **Declaration Date:**

This is the date on which the board of directors declares the dividend. At this time they set the amount payment of the dividend to be paid.

# **)** Holder – of – record Date:

This is the date the company opens the ownership books to determine who will receive the dividend. The stockholders of record on this date receive the dividend.

# ) Ex- dividend Data:

This date is four days prior to the record date. Share purchased after the ex-dividend date are not entitled to the dividend.

# **)** Payment Date:

This is the day when dividend checks are actually mailed to the stockholders of record.

# 2.5. Factors Affecting Dividend Policy

Many considerations may affect a firm's decision about its dividends. Some of them are unique to the company and some of the more general considerations are given subsequently. They are as follows more general considerations are given subsequently (Gautam & Thapa, 2008:337-338).

# ) Size of earnings:

A firm that has high level of earning will be generally pays a larger portion of bits earning in dividends. If the size of earning is small, a smaller amount of the profits may be distributed to shareholders. Thus, size of earnings affects the dividend policy of the firm.

# ) Liquidity position:

The cash or liquidity position of the firm influences its ability to pay dividends. A firm may have sufficient retained earning, but if they are invested in fixed assets, cash may not be available to make dividend payment. Thus, the company must have adequate cash available as well as retained earning to pay dividends.

# **|** Legal Rules:

Certain legal rules may limit the amount of dividends a firm may pay. These legal constraints fall into two categories. First, statutory restriction may prevent a company from paying dividends. While specific limitations vary by state, generally a corporation may not pay a dividend (i) if the firm's liabilities exceed its assets, this provision is known as ' The insolvency Rule '. (ii) If the amount of the dividend exceeds the accumulated profits (retained earning), this legal provision is known as 'The Net Profit Rules ' and (iii) if dividend is proposed from capital invested in the firm. This provision is also known as 'The capital impairment rules'. The second types of legal restriction is unique to each firm and results from restrictions in debt and preferred stock contracts.

### ) Desire of shareholders:

Shareholder may be interested either in dividend incomes or capital gains. Wealthy shareholder in a high income tax bracket may be whose source of income is dividends. A retired and old person, whose source of income is dividend, would like to get regular dividend.

In a closely held company, management usually knows the desires of shareholders. So, they can easily adopt a dividend policy that satisfies all shareholder .But in a widely held company, number of the shareholder is very large they have diverse desires regarding dividends capital gains .Some shareholder want cash dividends, while other prefer bonus share .

# ) Need to repay debt:

The need to repay debt also influences the availability of cash flow to pay dividend.

# ) Restriction in debt contracts:

Restriction in debt contracts may specify that dividends may be paid only out of earning generated after signing the loan agreement and only when net working capital is above specified amount .Also, preferred dividends take precedence to common stock dividends.

# ) Rate of assets expansion:

A high rate of assets expansion creates a need to retained earnings rather than to pay dividends.

# **) Profit rate:**

A high rate of profit on net worth makes its desirable to retain funds rather than to pay them out if investor will earn less on them.

# ) Stability of earning:

A firm that has a stable earnings trend will generally pay a larger portion of its earning in dividends. If earning fluctuates significantly, a larger amount of the profit may be retained to ensure that enough money is available for investment projects when needed.

# **)** Tax position of shareholders:

The tax position of stockholders also affects dividend policy. Corporation owned largely by taxpayer in high income tax brackets tend toward lower dividend payout where as corporation owned by small investors tend toward lower higher dividend payout.

# / Control:

For many small firms, and certain large ones, maintaining the controlling vote is very important .These owners would prefer the use of debt and retained profits to finance new investment rather than issue new stock. As a result dividend payout will be reduced.

### ) Access to the capital markets:

A firm's access to capital markets will be influenced by the age and size of the firm, therefore a well – established firm is likely to have a higher payout ratio than a smaller, newer firm.

#### 2.6. Legal Provisions Regarding Dividend Practices in Nepal

In Nepal, the company Act-1997 has made some legal provisions regarding dividend payment. These provisions are as under:

# Section 2:

Section 2 (M) states that bonus shares (stock dividends) means shares issued in the form of additional share to shareholders by capitalizing the surplus from the profit or the reserve fund of a company. The term also denotes and increases in the paid up values of the shares after capitalizing surplus or reserve funds (*Ibid: 43*).

#### Section 47:

Section 47 has prohibited company from purchasing its own shares. This section states that no company shall purchase its own shares or supply loans against the security of its own shares (*Ibid: 60*).

#### Section 137:

Bonus shares and sub section (1) states that the company must inform the office before issuing bonus shares. Under sub-section (1), this may be done only according to a special resolution passed by the general meeting (*Ibid: 94*).

#### Section 140

Dividends and Sub-Sections of this section are as follows:

#### 1. Sub-Section -1:

Except in the following circumstances, dividends shall be distributed among the shareholders within 45 days from the date of decision to distribute to them (*Ibid: 95*).

) In case any law forbids the distribution of dividends.

) In case the right to dividend is disputed.

) In case dividends cannot be distributed within the time limit mentioned above owing to circumstances beyond anyone's control without any fault on the part of the company.

#### 2. Sub-Section -2:

In case of dividends are not distributed within the time limit mentioned in sub- section (1), this shall be done by adding interest at the prescribed rate.

#### 3. Sub-Section -3:

Only the person whose name stands registered in the register of Existing shareholder at the time the dividend shall be entitled to get it.

The above rules indicated that Nepalese law prohibits repurchase of stock which is against the theory of finance .The reason for this kind of provision is not known.

#### 2.7 Review of Major International Studies:

Various studies have been made concerning the dividend and stock prices. Some of the major international studies on the relating to dividend are stated as follows:

### 2.7.1 Modigliani and miller's study

Modigliani and Miller's (1961) article is the most comprehensive argument for irrelevance of dividend, i.e. dividend policy has no effect on the share price of the firm. They argue that the value of the firm depends on the firms earning ,which result from its investment policy .Thus, when investing decision of the form is given dividend decision , the split of earnings between dividend retain earning has no significance in determining the value of the firm.

In general, the argument supporting the irrelevance of dividend valuation is that dividend policy of the firm is a part of its financing decisions. As a part of the financing decision of the firm, the dividend policy of the firm, the dividend policy of the firm is a residual decision and dividend are passive residual.

M-M's hypothesis of irrelevance is based on the following assumptions:

- ) The firm operates in perfect capital markets where investors behave rationally, Information is freely available to all and transactions and flotation costs do not exist. Perfect capital markets also imply that no investor is large enough to affect the market price of a share.
- ) Taxes do not exist; or there are no differences in the tax rates applicable to capital gains and dividends. This means that investors value of rupee of dividend as much as a rupee of capital gains.
- ) The firm has a fixed investment policy which is not subjected to change.
- ) It was also assumed that the investors are able to forecast the future earnings, the dividends and share value of the firm with certainty. This assumption was however, dropped out of the model.

MM provides the proof in support of their argument in the following ways;

#### Step-1:

The market price per share of the firm at the beginning of the period is defined as an equal to present value of the dividend paid at the end of the period.

Symbolically,

Where,

 $P_0$  = Current market price per share.

 $P_1$  =Market price of share at the end of the period (t=1)

 $D_1$  =Dividend to be paid at the end of the period (t=1)

K<sub>e</sub> =Cost of equity capital (assumed constant)

### Step -2:

If no new external financing exists the market value of a firm can be computed by multiplying both sides by the number of shares outstanding (n).We obtained the total value of the firm as follows:

Where,

n = No. of outstanding of the share at the zero period.

### Step -3:

If the firm sells no of new share (m) at the end of the period at a price  $P_{1}$ , the value of the firm at the time will be;

$$n P_{o} = \frac{n D_{1+} P_{1}(n+m) M P_{1}}{1 + K_{e}}$$

Where,

 $\mathbf{n} = \mathbf{No.}$  of shares outstanding at the beginning

n = No. of shares issued at the end of the period

#### **Step -4:**

If the firm finances its investment decision by rising additional capitals issuing  $n_1$  new share at the end of the period (t=1), then the capitalized value of the firm will be the sum of the dividends received at the end of the period and the value of the total outstanding shares at the end of the period less the value of the new share remain same. The total amount of the new share issued will be;

MP1 = I- (E - n D1)....(4)

Where,

MP1 =Amount obtained from the sale of new sharesI = Total new investments during the period. (Investment need)E = Earning of the firm during the period. (Earning available)nD1 =Total dividend paid

#### Step -5:

The total amount of the financing by the sale of the new share is found by the amount of investments during the period 1 not financed by the retained earnings .By subtracting the value of  $mp_1$  from equation (4) to equation (3) ,then Substituting the value of MP1 of equation (4) to equation (3) we get,

$$n P_0 = \frac{n D_1 + P_1 (n + m) - I + E - n D_1}{1 + K_e}$$
$$= \frac{P_1 (n + m) - I + E}{1 + K_e}$$

Therefore MM conclude that dividend policy does not affect the value of the firm or it is irrelevant factor. Firm that pays dividends will have to raise fund externally to finance its investment plans. MM hold that when the firm pays dividends external financing effect its advantages. Thus, the stockholder are indifferent between retention and the payment of the dividends in all future period and stockholder wealth is unaffected by current and future dividend decisions.

#### 2.7.2 Walter's study

Professor James E. Walter studies on dividend and stock price on 1966. According to him, the dividend policy of the firm affects of the value of the share. So, the dividends are relevant. He argues that the choice of dividend policies always affect the value of enterprises.

The key argument in support of the relevance proposition of Walter's model is the relationship between the rate of return on the firm's investment or its internal rate of the return (r) its cost of capital or required rate of return (k). The firm would have an optimum dividend policy which will be determined by the relationship of r and k *(Khan & Gain: 13.12).* 

The assumptions of the Walter's model are as follows:

- ) The firm finance all investment through retain earning. The external fund (i.e. debt, new equity) are not used for new investment.
- ) The firm's internal rate of return (r) their costs of capital (k) are constant.
- All earning are either distributed as dividend or retained internally.
- ) There is no change in value of earning per share & dividend per share.
- ) The firm has perpetual or infinite life.

Based on above assumptions, the market price of share is determined by the following formula:

$$P = \frac{DPS + \frac{r}{K_e}(EPS - DPS)}{K_e}$$

Where,

P= Market price per share.
DPS = Dividend per share.
EPS = Earning per share.
r = Internal rate of return of retained earning.
k e = cost of equity or market capitalization rate.

According to this study the given firm may have three probable conditions which are as follows:

#### Growth Firm $(r > k_{e})$ :

The firms that have profitable investment opportunities are growth firms. Such firms reinvest retain earning at a rate which is higher then rate expected by shareholders. These firms would maximize the value per share if they follow the policy of retaining all earning for reinvestment. In this case optimum payout ratio for this types firm (growth) is zero. Thus the correlation between dividend and stock price is negative when  $r > k_{e}$ .

#### Normal Firm $(r = k_{e})$ :

In normal firm the market value of share is constant irrespective of dividend payout ratio; there is no optimum dividend policy. Or the market price of share is not affected by D/P ratio. One dividend policy is good as other and the market value per share is not affected by the payout ratio when r=k.

#### **Declining firm** $(r < k_{e})$ :

If the internal rate of return (r) is less than cost of capital (k); it indicates that the share holders can earn a higher return by investing elsewhere. In such a case for maximizing the value of share, dividend also should be maximized .By distributing the entire earning as dividend; the value of share will be at optimum value. The relation between dividends stock price is 100% the market value per share increases as payout ratio increases when r < k.

By studying the Walter's model, the dividend policy of the firm depends on the availability of investment opportunities the relationship between the firms cost of capital (k<sub>e</sub>) internal rate of return(r) (*Ezara*, 1963:139). The firm should use all earnings for reinvestment in growth firm  $r > k_e$ , distribute all earnings as dividends in decreasing firm  $r < k_e$ , be indifferent between payment and retention of earning in normal firm  $r = k_e$ . Thus dividend decision is a financial decision when dividend decision is treated as a financial decision and the payment of cash dividend is positive residual.

#### Conclusion

- (r > K) = Dividends are negatively correlated with stock price
- (r < K) = Dividends are positively correlated with stock price
- (r = K) = Dividend is indifferent to variation in the market price of the share.

#### 2.7.3 Gordon's study

Myron Gordon concluded that in his study in 1963, the dividend policy of a firm influences the value of the shares. According to him, a corporation's share price is not independent of the dividend rate. The conclusion of this study is that investor's value of the present dividend more than future capital gain. This is to say current dividends are considered certain and risk less. So, it is preferred by rational investors as

compared to differed dividend in future. The future is uncertain. The investor would naturally like to avoid uncertainty. He argued that an increase in dividend pay out ratio leads to increase in the stock price for the reason that investors consider the dividend yield  $(D_1/P_0)$  is less risky than the expected capital gain (*Gordon*, 1962). His model is based on the following assumptions;

- ) The firm is an all equity firm and there is no leverage in its capitalization.
- ) There is no outside financing and corporate growth is expected to derive from retain earnings.
- ) Internal rate of return (r) and the cost of equity capital ( $k_e$ ) are constant.
- ) The corporate taxes ignored.
- Firm has an infinite life & earning are perpetual.
- ) The retention ratio 'b' once declared is constant .Thus, the growth rate 'g' =  $b_r$  is constant.
- $\int 'K_{e}'$  must be greater than 'g' (b<sub>r</sub>).

$$P = \frac{E (1 - b)}{K_e - b_r}$$

Considering the above assumptions, Gordon has given the following formula for finding out the market value per share.

Where,

P = Market price per share.

E = Earning per share.

B = Retention ratio or percentage of retained earning.

(1-b) = Percentage of earning as dividends.

E(1-b) = Dividend per share.

 $k_e = Cost$  of capital or Capitalization rate.

 $b_r = g = Growth rate$ 

According to this model, the following facts are reveled:

#### Growth firm $(r > k_e)$ :

In the case of firm, share price tends to decline in corresponding with increases in pay out ratio, i.e. high dividend leads to decrease in share price. Therefore, dividend and stock prices are negatively correlated in growth firms.

#### Normal firm $(r = k_{e})$ :

Dividend pay out ratio does not affect the value of share in normal firm. In other words, share value remains constant regardless of changes in dividend policies. It means dividend and stock price are free from each other in normal firm i.e.  $r = k_{e}$ .

### **Decline form** $(r < k_e)$ :

In the case of decline firm, share price tends to rise with the rise in dividend pay out ratio. It means dividend and stock price are positively correlated with each other decline firms.

Gordon assumes that the investors are rational and avoid risk. Retained earning involves risk and so the investor discounts the future dividends. This risk will also affect the stock value of firm.

- ) Investors give more value to the current dividend than the future capital gain,
- ) Investors pose these views because they do not want to bear the future uncertainty rather than enjoying the current earnings (dividend)
- Payment of more dividends increases the market value of the share (i.e. investors find more dividend yield.)

#### 2.7.4 Van Horne and Mc- Donald 's study :

Van Horne and Mc- Donald (*Van Horne and Mc-Donald, 1971: 507*) conducted a Comprehensive study on dividend policy and new equity financing. The purpose of this study was to investigate the combined effect of dividend policy and new equity financing decision on the market value of the firm's common stocks. For their investigation they selected two investors. They did the investigation by a gross section regression model during the year end 1968. The performed the Empirical tests .The required data are collected from 86 electricity utility firms included on the

COMPUSTAT utility database 39 firms from the electronic component industries as listed on the COMPUSTAT industrial database.

They tested two regression models for the utilities industries.

The first Model was,

 $P_o / E_o = a_o + a_1(g) + a_2(D_o / E_o) + a_3(Lev) + U$ 

Where,

 $P_o / E_o =$  Closing Market price in 1968 dividend by average EPS for 1967 & 1968. Do / E o = Dividend payment, measured by the cash dividend in 1968 divided by earning in 1968.

Lev = Financial risk, measured by interest charge dividend by the different of operating revenues and operating expenses

g= Expected growth rate, measured by the compound annual rate of growth in assets per share for 1960 through 1968.

U = Error term

The second model was,

 $P_{o}/E_{o} = a_{o} + a_{1}(g) + a_{2}(D_{o}/E_{o}) + a_{3}(Lev) + a_{4}(f_{a}) + a_{5}(F_{b}) + a_{6}(F_{c}) + a_{7}(F_{d}) + u$ 

Where,

F  $_{a}$ , F  $_{b}$ , F  $_{c}$  and F  $_{d}$  are dummy variables corresponding to "new issue ratio" (NIR) group a through d.

It is noted that they had grouped the firms in five categories A, B, C, D and E by NIR. For each firm the value of dummy variables representing its NIR group is one and the values of remaining dummy variables are zero.

Again,

They tested the following regression equation for electronic components industry.  $P_o / E o = a_o + a_1 (g) + a_2 (Do / E o) + a_3 (Lev) + a_4 (OR) + U$ 

#### Where,

Lev = Financial risk, measured by long- term debt plus preferred stock dividend by net worth as of the end of 1968.

OR = Operating risk, measured by the standard error for the regression of operating earnings per share on time of 1960 through 1968, rest are as in first Model above.

By using these models, they compared the result obtained form the firms, which both paid dividends and engaged in new equity financing with other firms in the industry sample. They concluded that for the electric utility firms in 1968, share value was not adversely affected by new equity financing in the presence of cash dividends, except for those 48 firms in the highest new issue group and it made new equity a more costly financing than the retention of earnings. They also indicated that the payment of dividend through excessive equity financing reduces share prices. For electronic component industries, a significant relationship between new equity financing and value was not demonstrated.

#### 2.7.5 Linter's Study:

An American financial analyst J. Linter's (*Linter*, 1956:97-11) conducted an important highlighting on the behavior aspect of dividend. He investigated a partial adjustment model as he tested the dividend patterns of some 28 companies. He concluded that a major portion of dividend of a firm could be expressed in the following ways.

 $DIV_t^* = P. EPS_t$ 

And,  $DIV_t - DIV_{t-1} = a + b (DIV_t^* - DIV_{t-1}) + e_1$ 

Or,  $DIV_t - DIV_{t-1} = a + b DIV_t^* + (1-b) DIV_t^* - 1) + e_1$ 

Where,

*DIV*  $t^*$  = Firm's Desired dividend *EPS*  $_t$  =Earning per share P =Targeted payment ratio. a =Constant relating to dividend growth b =Adjustment factor relating to previous period's dividend and new desired level of the dividend where (b > 1).

Major findings of this study were as follows;

- ) Firm generally think in term of proportion of earnings to be paid as dividend.
- ) Investment opportunities are not considered for modifying the pattern of dividend behavior.
- ) Firm generally have target payout ratios in view while determining change in dividend behavior (Policy) or dividend per share.

#### 2.7.6 Nils H. Hankinson's Study:

The study made by Hankinson Nil's was conducted on daily share prices changes around the announcement of a dividend change and that have found that the result consist with a dividend announcement effect of the organization. And it clearly shows that increase in dividend leading to positive excess returns and decrease in dividend to negative excess returns. "Such effects seem to be more applied for these companies that previously over reinvested free cash flow in projects with returns less that what the financial market requires. After a long interruption of payment of dividend of the firm's, they were found to earn significant excess returns. The companies omitting dividends because of poor present earnings future prospects suffer a decline share price in such way the study concludes dividend effect on change of daily share prices" (*Hankinson*; 1981).

#### 2.7.7 R. Michaely, Richard H. Thaler L. Womack's Study:

R. Michaely, Richard H. Thaler L. Womack (*Michaely, Rechard & Womack, 1995:605*) had jointly preformed a study relating, " Price reactions to dividend initiations omissions" in 1995. They investigated the immediate and long-term effect of dividend initiations and omission announcement.

They found that the short-run price impact of dividend omission was negative and that of initiations was negative .Initiation reactions were about on half the magnitude of the market reaction to omission announcement. They found that the market reaction to the dividend omission announcement was no greater than to an ignition for a given change yield.

#### 2.8. Review of Articles:

Nepalese capital market is in the early stage of development. There are only few studies done in this field. Due to the lack of information and expertise, no sufficient studies have been carried out in regards to the dividend policy. However, recent developments in the field of capital markets have shown some rays of hope for the future. There are few articles relating directly or indirectly with dividend and stock price are published in Nepal. Some of the studies done in the field of dividend policy and stock prices have been reviewed in this topic.

; **Manandhar** (2000) has made a research on the topic of "*dividend policy and stock price*". The main statement of the problem of the study is to test weather Nepalese corporate firms consider the lagged earning and dividend paid to pay the dividend in current year.

For the test, 17 samples Nepalese corporate firm has seen taken and different hypothesis have been tested.

The conclusions drown by the study is;

- ) There is significant relationship between change in dividend policy in terms of DPS and change in lagged earnings.
- ) In overall there is positive relationship between change in lagged consecutive earnings and dividend per share.
- ) There is relationship between distributed lag profits and dividend.
- ) When change in lagged consecutive earnings is greater than zero is 65% of the case change in dividend per share.
- ) Overall increase in EPS has resulted to increase in the dividend payout ratio by 66.6% of the cases while decrease in EPS decrease in dividend payments.
- ) Nepalese corporate firms have followed the practice of maintaining constant dividend payment per share.
- ) Corporate firm do not take into account that one year and two year lagged earnings.

; **Dr. Pradan (1993)** has made a research on the topic of "*Stock Market Behavior in small capital market: a case of Nepal*". He has conducted a landmark study in the field of dividend policy. It is pertinent to put forth here because he has analyzed various ratios related to the dividend and market price of the shares. The study was based on pooled-cross sectional data of the 17 enterprises covering the year from 1986 to 1990.

### The objectives of this study were as follows;

- ) To assess the stock market behavior in Nepal.
- ) To examine the relationship of market equity, market value to book value, price earnings and dividend with liquidity, profitability, leverage, assets, turnover and interest coverage.

#### The major findings of this study were as follows;

- ) Stock with larger market value than the book value of the equity have larger price earning ratio lower dividend .Price earning ratios are more variable for stock with larger market value to book value ratio dividend ratios are more variable for stock with smaller market value of book value.
- ) Larger stock have larger price equity ratio, larger ratio of market value to book value of equity and smaller dividends. However price earning ratio and dividend ratio are more variable for smaller stocks whereas market value to book value of equity is more variable for larger stock.
- ) Stock with larger ratio of dividend per share to market price per share has higher liquidity .Liquidity position of the stocks paying lower dividends is also more inconsistent as compared to stock s paying higher dividend.
- ) Smaller dividends, lower profitability, lower assets turnover and lower interest coverage for larger stocks may be attributed to the fact that most of larger stocks are at their initial stage of operation.
- ) Stock with larger price earning ratios, larger market value to book value of equity and smaller dividends ratios. But there ratios of market value to book value of equity and dividends are more variable for smaller stocks than for larger stocks.

- ) Stocks with larger price earning ratios have lower liquidity, higher leverages, lower profitability, lower assets turnover and lower interest coverage. However, Liquidity, leverage, earnings, turnover and interest coverage are all more variable for stock with smaller price earnings ratio.
- ) Stock with larger market value to book value ratios have lower liquidity, higher leverage, lower earnings, lower turnover lower interest coverage: however, liquidity are more variable for stocks with the larger market value to book value ratios. While earning assets turnover and interest coverage are more variable for stock with smaller market value to book value ratios.

So, in conclusion, it indicates positive relationship of dividend per share to market price per share per share with liquidity, profitability, assets turnover and interest coverage; and negative relationship with leverage.

**\*Dr. Shrestha (1992)** has made research on the topic of *"Shareholder's Democracy and Annual General Meeting Feedback"* on fifth annual general meeting of Nepal Arab Bank's Study: which has been presented here.

In his view, the common problems and constraints of the shareholders are as follows:

- ) The cost-push inflation at exorbitant rate has made the shareholders to expect higher return from their investment.
- ) Multiple decrease in the purchasing power of the Nepalese currency to the extent that higher return by way of dividend is just a natural economic consequence of it.
- ) Erosion in the purchasing power of the income has made it clear that dividend payment must be directed to enhance shareholder's purchasing power by raising dividend payment ratio on the basis of both earnings and cost theory.
- ) Indo-Nepal trade and transit deadlock has become a sort of economic welfare putting rise in the cost of living index to a considerable extent. This is the reason, which made shareholders to expect higher demand for satisfactory dividend.
- ) The waiting of 5 years with payment of dividend in previous years is equally a strong enforceable reason of the bank's shareholders to expect handsome

dividend already assumed and committed in various reports of the earlier annual general meeting.

) One way to encourage risk taking ability and preference is to have proper risk return trade off by bank's management board is a way that higher return must be the investment rule for higher risk takers that comprise bank's shareholders.

### 2.9. Review of Previous Research Works:

; **Bhattarai** (2002) has conducted a research on "*Dividend Policy and its impact on Market price of Stock*" with the data taken from two commercial banks and two insurance companies, and analyzed the data of five years from 1995 to 2000 by using simple multiple regression equations.

### **His Main Objectives:**

- ) To study the prevailing practices and efforts made in dividend policy in the Nepalese firms with the help of sample firms.
- ) To find out the impact of dividend policy on market price of stock.
- ) To analyze if there is any uniformity among DPS, EPS, MPS and DPR in the sample firms.

#### **His Major findings:**

- ) There is not any consistency in dividend policy in the sample firms. It has Indicated the need of dividend strategy as well as the need of proper analysis of the respectively sector of the firms.
- ) Most of the Nepalese firm from the very past did not have profit planning and investment strategy, which has imbalanced the whole position of the firms. It means there is no consistency even in the earnings.
- ) The MPS is affected by the financial position the dividend paid by the firms in this regards the MPS of the sample firms is seem to be fluctuated. It denotes that Nepalese investor is not treated fairly.
- ) The lack of financial knowledge and the market inefficiency has affected the market price of the share in all the firms.

- ) The psychological value of the shareholder is also valued as the assets of the firm.
- Higher CV of MPS indicates the greater variability of MPS .So; company should try to balance between dividend policy and MPS.
- ) The firm should try to increase DPS to better uplift the MPS in future.
- ) If the firm has negative correlation they should search investment opportunity rather than increasing DPS.
- ) The other variables affected MPS rather than DPS.
- ; **Prasain** (2010) has conducted a research on "*Impact of dividend on market price of share*" and the data are taken from the NABIL Bank, Siddhartha Bank and NCC Bank and analysis of the data from 2004 to 2009 by using various tools.

### **His Main Objectives:**

- ) To analyze the impact of dividend policy on market price of share.
- ) To examine the direction and magnitude of relation between financial variables of selected banks.
- ) To analyze and explain the relation of MPS with EPS and retained earning of the selected commercial banks.

### **His Major findings:**

- ) Significant difference in DPS among the selected bank. It is also found that dividend payment is neither consistent nor regular in these banks.
- ) There is positive correlation of MPS with other variables except RR.
- ) The relation of MPS with DPS is more significant than other.
- ) The simple regressions between sample banks are not statistically significant but they correlated in positive direction.

- ) The payout ratio of sample bank is fluctuating from year to year; there is no rational approach to deciding the payout.
- ) The entire firm must accept one major fact EPS is to be considered for determining dividend amount.
- ) The legal rules and regulation must be in favor of investor to exercise the dividend practice and protect the shareholder right.
- Banks should have target rate of earning i.e. profit planning and target payout ratio because the fluctuation in EPS and DPR may cause confusion in the mind of shareholder.
- ) Each and every company should provide information regarding their activities and performance, So that investor can analyze the situation and invest their money in the best company.
- ; **Bhattarai** (2009) has conducted a research on "*Dividend Practice of Commercial Banks and Its impact on Stock Price*" and the data are taken from six banks they are SCBL, HBL, EBL, BOKL and DCBL and analysis of data from 2003 to2008 by using various statistical and financial tools.

# **His Main Objectives:**

- ) To analyze the impact of dividend on stock price.
- ) To identify the determinant DPS and MPS.
- ) To analyze the relationship of DPS with EPS and MPS.
- ) To compare dividend practices of selected commercial banks.

# **His Major findings:**

- ) Higher the dividend payout ratio indicates that the firm is paying higher dividend to its shareholder and lower DP ratio implies that the firm is retaining its profit to profitable investment opportunities.
- ) MPS trend of all banks is in increasing trend over the sample period.
- Higher dividend implies that it is performing better.
- Correlation matrix of some banks shows that the positive correlation between DPS and MPS but they are statistically insignificant.

- ) Company should clearly define their dividend policy and communicate to investors.
- ) Consistency in dividend payout ratio helps in gaining to shareholders' confidence and then maximizing the firm's value.
- ) The legal rule and regarding dividend should not clear for smooth growth of the enterprises as well as growth of national economy.
- Current and lagged earning as well as expected future earning should be taken in account while changing dividend policy.
- ; **Yadav** (2007) has conducted a research on "*Dividend Policy and its impact on Market Price of Stock*" based on two commercial banks and two insurance company listed in the NEPSE they are NABIL, HBL and HGICL, UICNL .The analysis of data from 2001 to 2006 by using various tools

# **His Main Objectives:**

- ) To study the prevailing practices and effort made in dividend policy among the firms.
- ) To find the impact of dividend policy on market price of stock.
- ) To analyze the uniformity among DPS, EPS, MPS and DPR.
- ) To provide suggestions and recommendations.

# **His Major finding:**

- ) There is no consistency in dividend policy.
- ) Most of the Nepalese firm does not have profit planning and investment strategy.
- Dividend payout ratio is almost 40% each year.
- ) MPS is affected by the financial and dividend payment.
- ) The lack of the financial knowledge and the market inefficiency has affected the market price of share.

- Banks are paying dividend without adopting any appropriate policy.
- ) It is necessary to enact legal rules that bind the Companies to pay dividend.
- ) Banks should have long term vision regarding earning and dividend payment that helps to cope with challenging competitive situation of present world.
- ) Shareholders should be given option to choose between stock dividend and cash dividend instead of declaring stock or cash dividend arbitrary.
- All the firms must accept one major fact that EPS is to be considered for determining dividend amount.

#### 2.10 Research Gap:

There have been various National and International studies are conducted about the dividend policy and its impact on stock price. The research made on limited time and resources constraint it gives different result due to the period of study and updated data. So the updated comprehensive result must. Nepalese capital market is in the early stage of development, the conclusion of the international studies may not be relevant in the Nepalese context. In the Nepalese context there are some studies done by the Pradhan's and Manandhar's, which can be considered to be landmark in the field of dividend policy; but many more changes have taken place in Nepalese capital market in last few years and the validity of the past results are doubtful in the present context. Besides this, some researchers have taken only few firms of the same sector as sample and so, from those studies may not be provide accurate results to represent the present practices and efforts made in the Nepalese capital markets. So, it is necessary to carry out a updated study related to dividend policy of Nepalese commercial banks.

The study has covered 5 joint venture commercial banks and five years data have been analyzed with due consideration of EPS, DPS, DPR and MPS by using financial indicators as well as Statistical tools for analyze the date of specific period of time. So, the researcher believed that this study will be different and comprehensive study than the earlier study.
# Chapter III Research Methodology

#### **3.1 Introduction**

Research Methodology describes the methods and process applied in the entire aspects of study. Every research should be outline in the systematically solve the research problem.

"Research methodology is defined as a systematic process adopted by the researcher in studying a problem with certain objectives in view"(*Kottari, 1978: 19*).

This study is based on secondary data only but also some relevant questions would be asked to the concerning bodies for the purpose of practical study. This data are used to analysis the dividend policy of joint venture bank of Nepal. This chapter the basic objective of this study is to explain, test and analysis is to find out the relationship between dividend with market Price of Stock, net profit, EPS and net worth of the bank, therefore, some systematic research methodologies has been used. This chapter describes the methodology employed till the entire study will be conducted.

#### **3.2 Research Design**

Research design is the plan, structure and strategy of investigation concerned so as to obtain answer to research questions to control variances .The research design of this study basically follows the impact of dividend policy on the market price. In other words, this research is designed so as to find out the effect on the market price of the company when dividend is paid to the shareholders and also how the market price responds when dividend is not paid to the shareholders. Various analytical and descriptive approaches are used to determine the impact of dividend policy followed by an organization and its market price.

#### **3.3 Sources of Data**

The study is mainly depending upon the secondary data of the selected companies. But, both primary as well as secondary data are used. Whose sources may include the Annual Reports of the corresponding companies under study, Economic Report published by Nepal Rastra Bank, the stock price for the whole year listed in the Nepal stock exchange (NEPSE), Economic Survey published from Government of Nepal, Ministry of Finance, Financial Reports published by NEPSE Securities Exchange Board, T.U. Library, Previous Thesis, people directly concerned with selected commercial bank, financial others relevant data regarding the dividend policies practices of the Banks. Besides this, the data are also collected from various newspapers, magazines booklets and journals published by the concerned governmental and non-governmental organizations.

#### **3.4 Population and Sample:**

There are various commercial banks like government owned; Private and Joint venture are operating in Nepal .And more than hundred companies that have shares trading actively in stock market. Hence, it does not seem reasonable to study all the companies regarding the study topic. 31 Commercial bank got a permission to work till mid- Jan 2011.They are as follows:

S.N.	Commercial Banks	Estd. (B.S.)	Head Office
1.	Nepal Bank Ltd.	1994	Kathmandu
2.	Rastriya Banijya Bank	2022	Kathmandu
3.	Nabil Bank Ltd	2041	Kathmandu
4.	Nepal Investment Bank Ltd.	2042	Kathmandu
5.	Standard Chartered Bank Nepal Ltd.	2043	Kathmandu
6.	Himalayan Bank Ltd.	2049	Kathmandu
7.	Nepal SBI Bank Ltd.	2050	Kathmandu
8.	Nepal Bangladesh Bank Ltd.	2050	Kathmandu
9.	Everest Bank Ltd.	2051	Kathmandu
10.	Bank of Kathmandu Ltd.	2051	Kathmandu
11.	NCC Bank Ltd.	2053	Siddhartha Nagar
12.	Lumbini Bank Limited.	2055	Narayanghat
13.	Nepal Industrial & Commercial Bank Ltd.	2055	Biratnagar
14.	Machapuchhre Bank Ltd.	2057	Pokhara
15.	Kumari Bank Ltd.	2056	Kathmandu

Table No: 3.1Lists of Licensed Commercial Banks (Up to Mid-Jan 2011)

16.	Laxmi Bank Ltd.	2058	Birgunj
17.	Siddhartha Bank Ltd.	2058	Kathmandu
18.	Agriculture Development Bank	2062	Kathmandu
19.	Global Bank Limited	2063	Birgunj
20.	Citizens Bank International Limited	2063	Kathmandu
21.	Prime Commercial Bank limited	2064	Kathmandu
22.	Bank Of Asia Nepal Limited	2064	Kathmandu
23.	Sunrise Bank Limited 2064	2064	Kathmandu
24.	DCBL Bank Ltd.	2057	Kathmandu
25.	NMB Bank Ltd.	2064	Kathmandu
26.	Kist bank Ltd.	2059	Kathmandu
27.	Janata Bank Nepal Ltd.	2066	Kathmandu
28.	Mega Bank Nepal Ltd.	2066	Kathmandu
29.	Commerz and Trust Bank Nepal Ltd.	2067	Kathmandu
30.	Civil Bank Ltd.	2067	Kathmandu
31.	Century Commercial Bank Nepal Ltd.	2067	Kathmandu

Due to the limited time and resource factors too, it is not possible to study all of them; so sampling will be done. There should be no confusion with parameters size of the companies since the topic is not related to comparison of sizes, but the dividend policy its effect on market price of shares or simply, the valuation of shares.

This study has covered altogether 5 Joint Venture Commercial banks as follow:

- Standard Chartered Bank Nepal Limited.
- Everest Bank Limited.
- NABIL Bank Limited
- Himalayan Bank Limited.
- Nepal SBI Bank Limited.

It is not possible to study all the banks because we have lack of time period. So, we should study only five joint venture banks (SCBNL, EBL, NABIL, HBL and NSBI) among the listed are taken as sample for this study.

#### 3.5 Data Processing Technique:

Collected data, relevant facts and figures are systematically tabulated under the different heads for the purpose of analysis. So far as computation is concerned; it has done with the help of scientific calculator and computer.

#### **3.6 Data Analysis Tools:**

Data collected from various sources have been properly organized, analyzed and presented in appropriate tables and formats. Such tables and formats are subjected to interpretation and explanation as necessary. Specific financial tools and statistical tools are used to analyze variables. Mainly, there are two types of analytical tools used for this study .A brief explanation of financial as well as statistical tools is as follows:

#### **1. Financial tools:**

Financial tools are those, which help to study the financial position of the firms. The financial tools used in the study are as follows:

#### 3.6.1.1 Earning Per Share (EPS):

Earning per Share refers to the rupee amount earned per share of common stock outstanding. It measures the profitableness of the shareholders investment. It shows the profitability of the companies on a per share basis. The higher earning indicates the better achievements in terms of profitability of the companies by mobilizing their funds and vice versa. Earning per share is one of the factors that affect the dividend policy and stock price of firm. If the EPS is greater than the dividend will be larger and the market price also will be raised. EPS is computed by dividing net profit after taxes by the total number of common stocks outstanding. Thus,

Earning Per Share (EPS) =  $\frac{\text{Earning available to common Shareholders}}{\text{No. of common Stock Outstanding}}$ 

#### 3.6.1.2 Dividend per share (DPS):

Dividend per share also affects the market price of the stock, but it does not affect the earning per share. So, it is assumed as an independent variable to determine the market price of stock and also assumed as dependent to the EPS. If EPS is greater, the dividend per share will automatically be greater. Dividend per share indicates the

rupee earnings distributed to common stockholders per share held by them. It measures the dividend distribution to each equity shareholders. Dividend per share shows the portion of earning distribution to the shareholders on per share basis. Generally, the higher DPS creates positive attitude of the shareholders toward the bank is common stock, which consequently helps to increase the market value of the shares. It also works as the indicator of better performance of the bank management. It is computed by dividing the total dividend distributed to equity shareholders by the total number of equity shares outstanding. Thus,

 $DPS = \frac{Total Amount of Dividend paid to Ordinary Shareholders}{Number of Ordinary shares Outstanding}$ 

#### 3.6.1.3 Dividend Pay Out Ratio (DPR):

It is the proportion of earning paid in the form of dividend. This ratio shows what percentage of profit is distributed as dividend and what percentage is retained as reserve and surplus for the growth of the bank. Higher earning enhances the ability to pay more dividends and vice versa. It is computed by dividing DPS by EPS.

 $DPR = \frac{\text{Dividend per Share}}{\text{Earning Per Share}}$ 

And, Retention Ratio = (1-Dividend payout ratio) = (1-DPR)

#### 3.8.4 Market Price of Share (MPS):

Market price per share is that Value of stock, which can be obtained by a firm from the market. Market value of share is on of the variables which are affected by the dividend per share and earning per share and earning per share of the firm. If the earning per share and dividend per share is high, the market value of share will also be high. Market value of share may be lower and higher than the book value. If the firm is growing concern and its earning power is greater than the cost of capital, the market value of share will be higher than the book value .If firms earning capacity is lower than the cost of capital the market price of share will also be lower. The capital market determines MPS.

#### **3.6.1.5 Price Earning Ratio:**

Price-earning ratio is also called the earnings multiplier; Price- earning ratio is the ratio between market price per share and earning per share. In other words, this represents the amount which investors are willing to pay for each rupee of the firm's earnings. Fundamental analysts estimate the value of the stock by multiplying the expected earning per share and the normal price earning ratio of the stock. Moreover, the P/E ratio is the relationship between the price and earnings of the share .P/E ratio change or with every new piece of information that comes in the market .It is an important measure of the price of share.

P/E Ratio =  $\frac{Earning \text{ per Share}}{Market Price \text{ per Share}}$ 

#### **3.6.1.6 Dividend Percentage (DP) per share:**

Dividend percentage is the ratio of dividend per share to paid –up price per ordinary share. It is calculated as:

 $DP = \frac{\text{Dividend per share}}{\text{Paid- up price per share}}$ 

#### 3.6.1.7 Dividend Yield:

Dividend Yield is a percentage of dividends per share on market price per share .It measure the dividend in relation to market value of share. So, dividend yield is the dividend received by the investors as a percentage of market prices per share in the stock market.

This ratio shows the relationship between dividend per share and market value per share .It is calculated by dividing dividend per share by market value per share.

 $DY = \frac{\text{Dividend per share}}{\text{Market Value per share}}$ 

#### **3.6.1.8 Earning Yield:**

Earning yield is the important measure of earning provided by the company both ratios are based on EPS and MPS. So they also convey the same information.

This ratio shows the relationship between dividend per share and market value per share.

$$EY = \frac{Earning \text{ per share}}{Market Value \text{ per share}}$$

#### **3.6.1.9** Net-Worth per share (NWPS):

It is a rupee value per share. It is calculated by dividing Book Value of Net Worth by total numbers of Shares outstanding. Thus,

 $NWPS = \frac{Net worth}{Number of shares Outstanding}$ 

#### **3.6.1.10** Market Value per Share (MVPS) to Book Value per Share (BVPS):

This ratio measure the market situation per share in the competitive open market with respect to book value per share of joint Venture banks .This ratio indicates the price that the market is paying for the share that is reported from the net worth of the banks. This ratio indicates the price that the market is paying for share that is reported from the net worth of the banks. This ratio can be derived by dividing market price per share by book value per share.

 $MVPS = \frac{Market Price per Share}{Book Value per Share}$ 

#### **3.6.2 Statistical Tools:**

There are financial tools as well as statistical tools are necessary for this study. The result of analysis has been properly tabulated, compared, analyzed and interpreted. In this study, the following statistical tools are used

#### 3.6.2.1 Arithmetic Mean:

An average value is a single value with in the range of data that is used to represent all of the values in the series since an average is somewhere with in the range of the data, it is also called a measure of central value (*Gupta*, 2000:178).

Arithmetic Mean 
$$= \frac{X_1 + X_2 + X_3 + \dots + X_n}{N}$$
$$= \frac{X}{N}$$

Where,

x=Sum of the size of the items. N= Number of items.

#### 3.6.2.2 Standard Deviation:

Karl Person first introduced the concept the concept of standard deviation in 1983. Standard deviation is the positive square root of the arithmetic average of the squares of all the squares of all the deviation measured from the arithmetic average of the series. The standard deviation measures the absolute dispersion of a distribution. The greater the amount of dispersion the greater the standard derivation, i.e. greater will be the magnitude of the greater the values from their mean. A small standard deviation means a high degree of uniformity of the observation as homogeneity of a series. Standard Deviation is by a Greek letter ' ' (Sigma) is calculated as follows.

Standard Deviation () = 
$$\frac{(X - X)}{N}$$

Where,

N = Number of items in the series. X = mean

X = Variable

#### 3.6.2.3 Coefficient of variation (C.V.)

The corresponding relative measure is known as the coefficient of variation. This measure developed by Karl Pearson is the most commonly used measure of relative variation. It is used in such problems where we want to compare the variability of two or more than two serious. That series for which the coefficient of variation is greater is said to be more variable or conversely less consistent, less uniform, less stable or less homogeneous .On the other h, the series for which coefficient of variation is less is said to be less variable or more consistent, more uniform more stable of more homogeneous(*Ibid:193*).

In symbol;

$$C.V. = \frac{SD}{X} \times 100$$

#### **3.6.2.4** Coefficient of Correlation (r):

If two or more quantities vary in sympathy so that movements in tend to be accompanied by corresponding movements in the outers then they are said to be correlated (*Ibid: 178*). Correlation analysis is the statistical tools that can be used to describe the degree one variable are linearly related to another. The coefficient of correlation measures the direction of relationship between two sets of figures. It is the square roots of the coefficient of determination .correlation can either be positive or it can be negative. If both variables are changing in the same direction, the correlation is said to be positive but when the variations in the two variables take place in opposite direction, the correlation is termed as negative. In this study, coefficient of correlation is calculated between stock prices and dividends, stock prices and retained earning, stock prices and lagged earning.

The value of coefficient of correlation always lies between  $\pm 1$ . A value of -1 indicates a perfect negative relationship between the variables and a value of +1 indicates a perfect positive relationship. A value of zero indicates that there is no relation between the variables. The zero correlation coefficient means the variables are uncorrelated. The closer r is to +1 or -1, the closer the relationship between the

variables closer r is to zero (0), the less close relationship. The algebraic sign of the correlation coefficient indicates the direction of the relationship between two variables, whether direct or inverse, while the numerical value of the coefficient is concerned with the strength, or closeness of the relationship between two variables.

The correlation coefficient can be calculated as follows;



Where,

x, y are the standard deviation of the distributions of X and Y values respectively. Cov (X, Y) = Covariance of X and Y values.

$$= \frac{(X - X) (Y - Y)}{(N - 1)}$$

In this study, the coefficient of correlation is calculated to know the relationship as follows:

- a) Market price per share and dividend per share.
- b) Market price per share and dividend payout ratio.
- c) Market price per share and dividend percentage.
- d) Market price per share and earning per share.

#### **3.6.2.5** Coefficient of Determination (r<sup>2</sup>):

One of very convenient and useful way of interpreting the value of coefficient of correlation between two variables is to square of coefficient of Correlation, which is called coefficient of determination. The coefficient of determination thus equals  $R^2$ . If the value of r =0.90 r<sup>2</sup> will be 0.81 and this word mean that 81 percent of variation in the dependent variable has been explained by independent variable (*Ibid: 543*). In the other word,  $R^2$  measures the percentage total variation in dependent variables explained by independent variable the coefficient of determination can have value ranging from zero to one. The coefficient of determination is a measure the association or correlation between two variables, one of which happens to be independent and other being dependent variable. A value of one can occur only if the unexplained variation is exactly on the regression line.

The  $R^2$  is defined as the ratio of explained variance to the total variance. Thus,

Coefficient of Determination 
$$(r^2) = \frac{\text{Explained Variance}}{\text{Total Variance}}$$

Coefficient of Determination 
$$(r^2) = \frac{1 - \text{Explained Variance}}{\text{Total Variance}}$$

#### 3.6.2.6 Probable Error [PE (r)]:

Probable error of correlation coefficient, usually denoted by PE (r) is an old measure of testing the reliability of an observed value of correlation coefficient in so far as it depends upon the conditions of random sampling (*Gupta*, 2002:541). The probable error of the coefficient of correlation is obtained as follows.

Probable Error (P.E.) = 0.6745 
$$\times \frac{1 - r^2}{N}$$

Where,

r = correlation coefficient between X and Y.

N = number of pairs of observations.

- ) If the value of r is less than the probable error [i.e. r < PE(r)]; there is Insignificant relation between X and Y.
- ) If the value of r is greater than 6 times of the probable error [i.e. r < 6PE(r)]; there is significant relation between X and Y.
- ) If PE(r) < r < 6PE(r); there is moderate relation between X and Y.
- ) In this Study; probable error has been calculated to determine the reliability of the value of coefficient of DPS & MPS, DPS & EPS, DPS ,NWPS and EPS & MPS.

#### 3.6.2.7 Test of Hypothesis:

#### **Two- Way ANOVA**

In two way classification, the statistical data are classified on the basis of two factors i.e. the effects of two factors are simultaneously taken in to consideration in two –way ANOVA.

#### **Presentation and Analysis of Data**

Presentation and analysis of data is the major part of this research study. Using the various financial variables and statistical tools discussed in research methodology; we analyze the data achieve our objectives of the study.

#### 4.1 Presentation of Financial Indicators:

#### 4.1.1. Earning Per Share (EPS):

Generally, the performance and achievements of business organization are measured in term of their capacity to generate earnings. Earning per share refers the rupee amount earned per share of common stock outstanding. It measures the profitableness of the shareholder's investment. It measures the profitableness of the shareholders investment on a per share basis .It is computed by dividing net profit after taxes by the total number of common stocks outstanding. The higher earning indicates the better achievements of the profitability of the banks by mobilizing their funds and vice versa. The earning per share of the concerned banks under study is tabulated as follows;

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	143.14	54.22	105.49	47.91	13.29
2005/06	175.84	62.78	129.21	59.24	18.27
2006/07	167.37	78.42	137.08	60.66	39.35
2007/08	131.92	91.82	108.31	62.74	28.33
2008/09	109.99	99.99	106.76	61.90	36.18
Mean	145.65	77.45	117.37	58.49	27.08
S.D.	21.21	15.24	13.15	5.42	10.03
C.V.	14.56	19.68	11.20	9.27	37.04

# Table: 4.1Earning per share of Concerned Banks

Sources: Annual report of concerned banks.

The Earning per Share of banks under study are also presented in graphical form as below.



Figure: 4.1 Earning per Share

The Earning per share of Standard Chartered Bank Nepal Ltd. (SCBNL) range between from Rs. 109.99 to 175.84 during the period of study. During the period, the average EPS is Rs.145.65 and standard deviation of EPS during the period of study is 21.21.The CV of 14.56 % indicates that there is variability in EPS.

During the period of study, Everest Bank Ltd. (EBL) has an average EPS of Rs.77.45 its Standard Deviation is 15.24 .The EPS is range between 54.22 to Rs.99.99.The coefficient of variation of 19.68 indicates that there is a fluctuation of 19.68 % in EPS of Everest Bank Ltd., during the period of study.

NABIL Bank Ltd. has Rs.117.37 average EPS. The EPS is range between Rs.105.49 to Rs.137.08 .The Standard Deviation of EPS is 13.15 whereas the coefficient of variation is 19.42 which shows the fluctuation of 19.42 in EPS of NABIL bank Ltd.

The average EPS of Himalayan Bank Ltd. (HBL), during the period of study is Rs.58.49.It stayed within range from Rs.47.91 to Rs.62.74. The Standard Deviation of EPS is Rs.5.42.The Coefficient of variation shows the fluctuation of 9.27 % in EPS of HBL.

During the period of Study, Nepal SBI Ltd. (NSBI) has an average EPS of Rs. 27.08 with a Standard Deviation of 10.03 .The EPS range between Rs.13.29 to 39.35.The coefficient of variation shows the fluctuation of 37.04 % in EPS of NSBI.

From the above data and calculations, it can be seen that the average EPS of SCBNL is highest and that of NSBI is the lowest. The Value of EPS range of the banks under the study is Rs.175.84 of SCBNL and Rs.13.29 of NSBI during the period. Similarly, the standard deviation of SCBNL is the highest and HBL is the lowest, the coefficient of variation of these banks shows the fluctuation in EPS. If compared the HBL has the most consistent EPS among all sample banks.

#### 4.1.2 Dividend Per share (DPS):

Dividend per share is that amount, which is paid to common shareholders on a per share basis. DPS shows the portion of earning distributed to the shareholder on per share basis .Generally, the higher DPS creates positive attitude among the shareholder towards the bank, which accordingly helps to increase the market value of shares. It also works as the indicator of better performance of the bank management. The dividends per share of the banks under study are stated in the table below

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	120.00	20.00	70.00	31.58	0.00
2005/06	140.00	25.00	85.00	35.00	5.00
2006/07	130.00	40.00	140.00	40.00	47.59
2007/08	130.00	50.00	100.00	45.00	0.00
2008/09	100.00	60.00	85.00	43.56	42.11
Mean	124	39	96	39.03	18.94
S.D.	13.56	14.97	23.36	5.08	21.30
C.V.	10.94	38.38	24.33	13.02	112.46

# Table: 4.2Dividend per share of Concerned Banks

Sources: Annual report of concerned banks.

The dividends per share of concern bank under the study period of are present in the graphical form as follows:



Figure: 4.2 Dividend per share of concerned banks

The highest and lowest DPS of Standard Chartered Bank Nepal Ltd. (SCBNL) are Rs.140 and Rs 80 respectively, during the period of study .The average DPS of SCBNL is Rs. 124 with the standard deviation of 13.56 .The coefficient of variation is 10.94%, which indicates that there is a little fluctuation in the DPS of SCBNL during the period of study.

The average DPS of the Everest Bank Ltd. (EBL) is Rs.39 with Standard Deviation of 14.37 and coefficient of variation is 38.38. The C.V indicates the DPS of HBL is quite fluctuating during the period.

NABIL Bank has paid highest DPS Rs.140 and lowest DPS is Rs. 70 during the period of study. The average DPS of NABIL Bank has Rs. 96 .The standard deviation coefficient of variation of the bank is 23.36 24.33 respectively, during the period of study. The C.V.24.33% indicates that there is moderate fluctuation in DPS of NABIL Bank during the period of Study.

Himalayan Bank Ltd. (HBL) paid the highest DPS Rs.45 and lowest DPS is Rs.35 during the period of study. The average DPS of HBL has Rs.39.03 .The standard deviation and coefficient of variation of the bank is 5.08 and 13.02 respectively. The

C.V. 13.02 Indicate it has also little fluctuation in the DPS of HBL during the period of study.

Nepal SBI Bank Ltd. (NSBI) paid the highest DPS is Rs.47.59 and no dividend paid in the year 2004/05 and 2007/08 .This bank was paid dividend only 3 years, during the five years period of study .An average DPS of Rs.18.94 has been seen during the period of study. The standard deviation of DPS is 21.30 and coefficient of variation of 112.46% indicates the highest fluctuation in DPS of NSBI.

From the above analysis SCBNL has the highest average DPS and NSBI has lowest .The standard deviation of NABIL has highest and HBL has lowest. Similarly, the C.V. indicates that among the banks under study during the period SCBNL has the highest Consistency in paying dividend where as the DPS of NSBI is most highly fluctuating during the period of study of five joint venture Banks of Nepal.

#### 4.1.3. Dividend Percent (DP):

Dividend percentage (DP) is the ratio of DPS to the paid of price (face value) per share .It is measured in percentage .The dividend percent during the period of study are presented in the following table.

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	120.00	20.00	70.00	31.58	0.00
2005/06	140.00	25.00	85.00	35.00	5.00
2006/07	130.00	40.00	140.00	40.00	47.59
2007/08	130.00	50.00	100.00	45.00	0.00
2008/09	100.00	60.00	85.00	43.56	42.11
Mean	124	39	96	39.03	18.94
S.D.	13.56	14.97	23.36	5.08	21.30
C.V.	10.94	38.38	24.33	13.02	112.46

## Table: 4.3

**Dividend Percent of Concerned Banks on face value** 

Sources: Annual report of concerned banks.

The dividends percent of the banks under the study are presented in the graphical form as follows:



Figure: 4.3 Dividend Percent of Concerned Banks

All the banks under the study have same paid of price of Rs.100 per share but the DPS is different. From the above data SCBNL and NABIL pays the highest percent dividend on the face value of share and NSBI has the lowest. The C.V. indicates that among the banks under study during the period, SCBNL has the highest consistency in dividend percent whereas dividend percent of NSBI is highly fluctuating.

#### 4.1.4. Dividend Payout Ratio (DPR):

It is the proportion of earning paid in the form of dividend. This ratio shows what percentage of profit is distributed as dividend and what percentage is retained as reserve and surplus for the growth of the bank. Higher earning enhances the ability to pay more dividends and vice versa.

There is an inverse relationship between dividends and retained earnings. The higher the dividend payout ratio, the lower will be the proportion of retained earnings and vice versa. The capacity of financing of the firm is checked by the retention ratio. It is calculated as the percentage of the percentage of the profit that is distributed as dividend. This ratio is calculated by dividend per share by the earning per share. Thus,

#### **Table: 4.4**

Dividend Payout Ratio of concerned Banks:

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	83.83	36.90	66.36	65.92	0.00
2005/06	79.62	39.82	65.78	59.08	27.37
2006/07	77.67	51.01	102.13	65.94	120.94
2007/08	98.54	54.45	92.33	71.72	0.00
2008/09	90.92	60.01	79.62	70.37	116.39
Mean	86.12	36.44	81.24	66.61	29.66
S.D.	7.70	14.86	14.30	4.42	59.34
C.V.	8.94	40.78	17.60	6.64	200.07

Sources: Annual report of concerned banks.

The dividend payout ratios of the banks under study during the period are presented in the graphical form as follows:

#### Figure: 4.4





The above table shows the dividend payout ratios of five banks respectively. The above table shows the percentage of dividend paid out of the total earnings made by each banks for each year during the period of study.

From the above table it can be observe that in the year 2005/06, the DPR of EBL and NSBI have increase than previous year. The DPR of SCBNL, NABIL and HBL have decreased than previous year .In the year 2006/07 the DPR of EBL, NABIL, HBL and NSBI has decreased but the DPR of SCBNL has decreased. In the same way in the year 2007/08 the DPR of SCBNL, EBL and HBL has increased but the DPR of NABIL has decreased and NSBI has not paid the dividend. Similarly, in the year 2008/09 the DPR of EBL & NSBI has increased but SCBNL, NABIL & HBL has decreased than previous year.

The average DPR of SCBNL, EBL, NABIL, HBL and NSBI are 86.12, 36.44, 81.24, 66.61 & 29.66 respectively. Similarly, the standard deviation of HBL is lowest than other banks and coefficient of variation of DPR of HBL is lowest among all. Therefore it can be shows the HBL is the comparatively able to maintain stable dividend payout ratio (DPR). Whereas DPR of NSBI range from 0 to 120.94 % which is highest fluctuation as indicated by C.V. of 200.07%.

#### 4.1.5. Market Price per Share (MPS):

The MPS of a share is current market price at which can be sold. MPS of share should depend upon the firms return. If the firm returned is increased the MPS also increased vice versa .So we can say that the MPS of firms shows the position .In other words the MPS is the price of share on which share are traded in the secondary market .The average market price of share of banks under study is presented in the table as follows:

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	2345	870	1505	920	335
2005/06	3775	1379	2240	1100	612
2006/07	5900	2430	5050	1740	1176
2007/08	6830	3132	5275	1980	1511
2008/09	6010	2455	4899	1760	1900
Mean	4972	2053.2	3793.8	1500	1106.8
S.D.	1656.79	815.08	1590.37	412.80	572.33
C.V.	33.32	39.70	41.92	27.52	51.71

Table: 4.5

Market Price per Share of concerned Banks

Sources: Annual report of concerned banks.

The market price of share of banks under study is also presented in graphical form as below.

## Figure: 4.5

Market Price per Share of concerned Banks



During the period of study, Standard Chartered Bank Nepal Ltd. (SCBNL) has an average MPS of Rs 4972 with a standard deviation of 1656.79.The coefficient of variation shows the fluctuation of 33.32 % in MPS of SCBNL.

The average MPS of the Everest Bank Ltd. is Rs 2053.2 .It states with in the range of Rs.870 to Rs 3132.The standard deviation of MPS is 815.08 .The coefficient of variation is 39.70 which shows the fluctuation of 39.70 % in MPS of EBL.

The average MPS of NABIL Bank Ltd. is Rs 3793.8.It states in the range of RS 1505 to Rs 5275.The standard deviation of MPS is 1590.37.The CV 41.92% indicates the moderate fluctuation in the MPS of the Bank.

Himalayan Bank Ltd. has an average MPS of Rs 1500.It states in the range of RS 920 to Rs 1980.The standard deviation of MPS is 412.80.The CV indicates the Lowest fluctuation in the MPS of the Bank during the study period than other four.

The average MPS of the Nepal SBI Bank Ltd. during the period of study is Rs.1106.8.The standard deviation of MPS is Rs.572.33.The coefficient of variation is 51.71 % it indicate that there is a fluctuation of 51.71 % in the MPS of NSBI during the period of study. Which is quite higher than other banks?

From the above data and calculation, it can be seen that the average MPS of SCBNL is highest and NSBI is the Lowest. The standard deviation of SCBNL is the highest and that of HBL is lowest. The coefficient of variation of these banks shows that there is moderate level of fluctuation in MPS .Also the MPS of the banks SCBNL, EBL, NABIL and HBL reaches in the highest point in FY 2007/08 during the period of study. In fiscal year the MPS of NSBI is highest point in FY 2008/09 in the period of study.

#### 4.1.6. Price Earning Ratio (P/E Ratio):

The Price Earning Ratio is the ratio between Market Price per Share and Earning Per share. PE Ratio is also known as earning multiplier .The PE Ratio used to evaluate the performance of any organization by investor for security analysis point of view. It indicates investor's expectation toward firm's performance. Managerial level of firm's also watching this ratio for find out the performance and find the causes if the PE Ratio declines. The Price Earning Ratio of the banks under study is presented in table as follows.

## Table: 4.6

#### P/E Ratio of concerned Banks

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	16.38	16.04	14.27	19.20	25.21
2005/06	21.47	21.97	17.34	18.57	33.49
2006/07	35.25	30.99	36.84	28.69	29.89
2007/08	51.77	34.11	48.70	31.56	53.34
2008/09	54.64	24.55	45.89	28.43	52.52
Mean	35.90	25.53	32.61	19.60	38.89
S.D.	15.44	6.44	14.30	7.76	11.76
C.V.	43.01	25.23	43.85	39.59	30.24

Sources: Annual report of concerned banks.

The price Earning Ratios of banks under study are also presented in graphical form as below.

#### Figure: 4.6

#### P/E Ratio of concerned Banks



The average P/E Ratio of SCBNL is 35.90; range between from 16.38 to 54.64 during the period of study. The standard deviation of PE is 15.44 and Coefficient of variation of 43.01 indicates the fluctuating nature of P/E ratio.

The average P/E Ratio of EBL, during the period of study is 25.53. It is ranging between 16.04 to 34.11. The standard deviation is 6.44 and its coefficient of variation is 25.23. The C.V. indicates the P/E Ratio of EBL is Least fluctuating .

The average P/E Ratio of NABIL, during the period of study is 32.61. It is ranging between 14.27 to 48.70. The standard deviation is 14.30 and its coefficient of variation is 43.85. The C.V. indicates the P/E Ratio of EBL is quite fluctuating.

The average P/E Ratio of HBL, during the period of study is 19.60.It is ranging between 19.20 to 31.56.The standard deviation is 7.76 its coefficient of Variation is 39.59.The C.V. indicates the P/E Ratio of HBL is fluctuating nature.

The average P/E Ratio of HBL, during the period of study is 38.89.It is ranging between 25.21 to 53.34.The standard deviation is 11.76 its coefficient of variation is 30.24.The C.V. indicates the P/E Ratio of HBL is fluctuating nature.

By the above data analysis, we observed that the average P/E Ratio of the NSBI has highest and the HBL has lowest .The standard deviation of SCBNL has highest the EBL has the lowest. Similarly, the coefficient of variance of these banks shows that there is a moderate fluctuation in P/E Ratio of all banks under study.

#### 4.1.7. Earning Yield (EY):

The Earning Yield evaluates the shareholder's return in relation to the market value of share. Earning Yield is the percentage of earnings per share to the market price per share. It gives the result for investor how much they can get from their invested rupee. The share with higher earning yield is worth buying earning yield of the banks under study is presented in the table below.

**Earning Yield of concerned Banks** 

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	6.10	6.23	7.01	5.21	3.97
2005/06	4.66	4.55	5.77	5.39	2.99
2006/07	2.84	3.23	2.71	3.49	3.35
2007/08	1.93	2.93	2.05	3.17	1.87
2008/09	1.83	4.07	2.18	3.52	1.90
Mean	3.47	3.39	3.94	4.15	2.82
S.D.	1.66	1.42	2.05	0.94	0.82
C.V.	47.84	41.89	52.03	22.65	29.08

Sources: Annual report of concerned banks.

The Earning Yield of banks under study is also presented in graphical form as below.



Earning Yield of concerned Banks

Figure: 4.7

The average earning yield of Standard Chartered Bank Nepal Ltd. (SCBNL) has 3.47% with the standard deviation of 1.66.The highest and lowest Earning Yield is 1.83% and 6.10% respectively. The coefficient of variation is 47.84%, during the period of study.

Everest Bank Ltd.(EBL) has an average EY of 3.39%. The EY ranging from 2.93% to 6.23%. The standard deviation is 1.42 coefficient of variation is 41.89%. The CV of 41.89% indicates the moderate fluctuation in EY of EBL.

The average earning yield of NABIL Bank Ltd. has 3.94% with the standard deviation of 2.05%. The highest and lowest Earning Yield is 7.01% and 2.05% respectively. The coefficient of variation is 52.03%, during the period of study.

Himalayan Bank Ltd.(HBL) has an average EY of 4.15%. The EY ranging from 23.17% to 5.39%. The standard deviation is 0.94 coefficient of variation is 22.65%. The CV of 22.65% indicates the least fluctuation in EY of EBL than other bank during the period of study.

Nepal SBI Bank Ltd. has an average EY of 2.82%, range between from 1.87% to 3.97% during the period of study. The standard deviation of EY is 0.82 whereas coefficient of variation of 29.08%. The C.V. of 29.08% indicates fluctuation in EY of NSBI.

From the above data analysis, we can show that HBL has highest EY and lowest of NSBI. Similarly, the standard deviation of NABIL Bank Ltd. has highest and NSBI has lowest under the study. In the same way the C.V. of NABIL has highest and HBL has lowest than other bank during the study period.

#### 4.1.8. Dividend Yield (DY):

Dividend Yield is the ratio of DPS MPS it measures the dividend in relation to market value of share .This ratio highly influences the market price per share because a small change in dividend per share can bring effective change in market price of share in secondary market.

The dividend yield of the banks under study is presented in the table as follow.

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	5.12	2.30	4.65	3.43	0.00
2005/06	3.71	1.81	3.79	3.18	0.82
2006/07	2.20	1.65	2.77	2.30	4.05
2007/08	1.90	1.60	1.90	2.27	0.00
2008/09	1.66	2.44	1.74	2.48	2.22
Mean	2.92	1.96	2.62	2.73	1.42
S.D.	1.31	0.34	1.17	0.48	1.55
C.V.	44.86	17.35	44.66	17.58	109.15

Table: 4.8Dividend Yield of concerned Banks

Sources: Annual report of concerned banks.

The DY of banks under study is also presented in graphical form as below.



Figure :4.8 Dividend Yield of concerned Banks

The dividend yield of Standard Chartered Bank Nepal Ltd. (SCBNL) ranges from 6% to 12% during the period of study. The average dividend yield of SCBNL is 2.92% the standard deviation of DY under the study period is 1.31.The CV of 44.86% indicates that the fluctuation of DY of SCBNL is moderate.

During the period of study ,the average DY of Everest Bank Ltd. has 1.96% with standard deviation of 0.34. The DY ranging between 1.60 % to 2.44%. The coefficient of variation of 17.35% indicates that there is least fluctuation during the period of study.

The DY of NABIL Bank Ltd. ranges from 1.74% to 4.65% during the period of study. The average DY of NABIL is 2.62%. The standard deviation of DY is 1.17 whereas the coefficient of variation is 44.665. The CV indicates the moderate fluctuation in the DY of NABIL during the study period.

The average DY of Himalayan Bank Ltd. is 2.73% with standard deviation of 0.48. The DY ranges between 2.27% to 3.43%. The coefficient of variation of 17.58% indicates that there is least fluctuation during the period of study.

The average DY of NSBI has Rs 1.42% with a standard deviation of 1.55. The DY ranges between 0.00% to 4.05%. The dividend yields of two years (FY 2004/05 and 2007/08) are Zero because the dividend was not paid in those two years period. The coefficient of variation of NSBI is 109.15% during the period of study. The CV indicates the highest fluctuation in DY of the Bank.

From the above table figure shows the average dividend yield (DY) of banks under the study range between 2.92% (SCBNL) 1.42% (NSBI).The EBL,NABIL HBL has the average DY of 1.96%, 2.62% 2.73% respectively.

Similarly, the coefficient of variation of the highest consistency in the DY of EBL (17.35%) where as the DY of NSBI has the highest fluctuation (109.15%) among the banks. The CV of SCBNL, NABIL and HBL are 44.86%, 44.66% and 17.58 % respectively.

#### 4.1.9. Net Worth Per Share (NWPS):

The Net Worth per Share is the value per share of total net worth in book value. It is calculated dividing total net worth by total no. of share outstanding. This is stated in the table as follows.

#### Table: 4.9

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	422.38	219.87	337.00	239.59	159.54
2005/06	468.22	217.67	381.00	228.72	151.73
2006/07	512.12	280.82	418.00	264.74	178.04
2007/08	401.52	321.77	354.00	247.95	160.57
2008/09	327.53	313.64	324.00	256.52	194.68
Mean	426.35	270.76	362.80	247.50	168.91
S.D.	62.46	44.61	33.55	12.60	15.49
C.V.	14.65	16.48	9.25	5.09	9.17

Net worth per Share (NWPS) of concerned Banks

Sources: Annual report of concerned banks.

The Net worth per Share of banks under study is also graphical form as follows.



# The net worth per share of Standard Chartered Bank Nepal Ltd. ranges between Rs.327.53 to Rs.512.12 during the period of study. The average NWPS of SCBNL has Rs.426.35 with the standard deviation of NWPS under the period of study is Rs.62.46The coefficient of variation is 14.65% shows the moderate fluctuation of NWPS of SCBNL.

Figure :4.9 Net Worth per Share (NWPS) of concerned Banks The Everest Bank Ltd. has average NWPS is Rs.270.76 its ranges between Rs 217.67 to 321.77.The standard deviation of NWPS of EBL is 44.61 .The coefficient of variation of 16.48 shows the fluctuation of NWPS is highest fluctuation of EBL during the period of study.

During the period of study, NABIL Bank Ltd. (NABIL) has average NWPS is 362.80.It ranges between Rs.324 to Rs.418.The standard deviation of NWPS of NABIL is 33.55.The coefficient of variation of 9.25 shows that consistency fluctuation on NWPS during the period of study.

Similarly the NWPS of HBL is ranges between Rs.228.72 to Rs.264.74. The standard deviation of NWPS is 12.60 and coefficient of variation of NWPS of HBL is 5.09%. Which indicates that there is lowest fluctuation in NWPS of HBL during the period of study.

In the same way, the average NWPS of NSBI is Rs.168.91.The range of NWPS of NSBI has from Rs. 151.73 to 194.68.The standard deviation of NWPS of NSBI is 15.49 its CV 9.17% indicates the fluctuation of NWPS of NSBI is moderate level in the period of study.

The above date analysis figure shows that NWPS of the bank under study period range between Rs.426.35 (SCBNL) to Rs. 168.91(NSBI) .EBL, NABIL HBL has an average NWPS of RS.270.76, 362.80 247.50 respectively. Similarly, the CV shows the highest consistency in NWPS of EBL (16.48%).whereas the NWPS of SCBNL, NABIL and NSBI are 14.65 %, 9.25 % 9.17 % respectively. This shows a moderate level of fluctuation over the study period.

#### 4.1.10. Market Value per Share (MVPS) to Book Value per Share (BVPS):

From this table the data is important to compare share price of different stocks on the basis of book value per share .It shows the market share price of a stock as a percentage of book value per share and the better performance of joint venture banks in terms of market value per share to book value per share .

The MVPS to BVPS ratio of the banks under study are presented in the table as follows.

#### **Table: 4.10**

Market value per Share (MVPS) to Book Value per Share (BVPS) of concerned Banks

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	5.55	3.96	4.47	3.84	2.10
2005/06	8.06	6.34	5.88	4.81	4.03
2006/07	11.52	8.65	12.08	6.57	6.61
2007/08	17.01	9.73	14.90	7.99	9.41
2008/09	18.35	7.83	15.12	6.86	9.76
Mean	12.10	7.30	10.49	6.01	6.38
S.D.	4.95	2.00	4.49	1.49	2.98
C.V.	40.91	27.40	42.80	24.79	46.71

Sources: Annual report of concerned banks.

The market value per share to book value per share of banks under study is presented in graphical form as follows.

#### Figure: 4.10

## Market Value per Share (MVPS) to Book Value per Share (BVPS) of concerned Banks:



The average ratio of MVPS to BVPS of Standard Chartered Bank Nepal Ltd.(SCBNL) is 12.10.the standard deviation of the ratio is 4.95.The coefficient of variation is 40.91.The value indicates that there is 40.91% fluctuation in the ratio of MVPS to BVPS of the bank over the study period.

The average ratio of MVPS to BVPS of EBL has 7.30 with standard deviation of the ratio is 2.00.The coefficient of variation is 27.40.The CV indicates that there is 27.40% fluctuation in the ratio of MVPS to BVPS. The CV shows moderate fluctuation in the ratio.

The average ratio of MPS of BVPS of NABIL bank is 10.49 with standard deviation of 4.49. The coefficient of variation 42.80. The CV indicates that there are higher fluctuation of 42.80% during the period of study.

Similarly the average ratio of MVPS to BVPS of HBL has 6.01 with standard deviation of 1.49. The coefficient of variation is 24.79. The CV indicates that there are least fluctuation of 24.79 % during the period of study.

In the same way the average ratio of MVPS to BVPS of NSBI is 6.38 with the standard deviation of 2.98. The coefficient of variation is 46.71 . The CV indicates that there is highest fluctuation of 46.71 % during the period of study.

The above calculation shows the average ratio of MPS to BVPS of SCBNL has highest among the banks under the study and HBL has the lowest this ratio.

#### 4.2 Company Wise Analysis:

In the earlier section, the different types of financial variables of the concerned banks have been presented. For keep in mind the need for more elaborate and extensive analysis of the company wise has been presented in this section.

#### 4.2.1 Standard Chartered Bank Nepal Ltd. (SCBNL)

Financial Situation of SCDNL					
Variables	Min.	Max.	Mean	S.D.	C.V.
EPS	109.99	175.84	145.65	21.21	14.56
DPS	100	140	124	13.56	10.94
DP Ratio	77.67	98.54	86.12	7.70	8.94
MPS	2345	6830	4972	1656.79	33.32
PE ratio	16.38	54.64	35.90	15.44	43.01
EY	1.83	6.10	3.47	1.66	47.84
DY	1.66	5.12	2.92	1.31	44.86
NWPS	327.53	512.12	426.35	62.46	14.65

#### **Table: 4.11**

**Financial Situation of SCBNL** 

Sources: Annual report of concerned banks.

SCBNL has average EPS of Rs .145.65 and its standard deviation is 21.21 .The coefficient of variation of 14.56 indicates the consistency in EPS of this bank. The range of EPS of this bank is between Rs. 109.99 to Rs.175.84.DPS of this bank range between Rs.100 to Rs.140 and average DPS is Rs.124. Its standard deviation is 13.56 and CV of this bank is 10.94%, which is very low fluctuation. The DP ratio of this bank range between 77.67 % to 98.54 % and its average DP ratio is 86.12% .The standard deviation is 7.70 and C.V. is 8.94% of DP ratio. This also shows consistency of DP ratio.

The MPS of this bank range between Rs.2345 to Rs. 6830 and average MPS of Rs .4972.The standard deviation C.V. are 1656.79% and Rs.33.32% respectively. The price earning ratio is range between from 16.38 to 54.64, its average PE ratio is 35.90.The standard deviation is 15.44 coefficient of variation of 43.01% indicating the moderate fluctuation. Similarly the average earning Yield (EY) is 3.47% which is

range between 1.83% to 6.10 %. The standard deviation of EY is 1.66 and C.V. 47.84%. The dividend yield (DY) is range between 1.66% to 5.12% average dividend yield is 2.92 %. The standard deviation is 1.31 with its CV of 44.86%. In the same way the net worth per share of SCBNL is range between Rs.327.53 to Rs. 512.12 with average NWPS of Rs 4265.35 standard deviation of NWPS is 62.46 with the CV is 14.65%.

From the above table we show the consistency in the all the financial indicators. The bank is paid dividend continuous during the period of study. There is positive relation ship between DPS and MPS.

#### 4.2.2 Everest Bank Ltd. (EBL)

Variables	Min.	Max.	Mean	S.D.	<b>C.V.</b>
EPS	54.22	99.99	77.45	15.24	19.68
DPS	20	60	39	14.57	38.38
DP Ratio	36.90	60.01	36.44	14.86	40.78
MPS	870	3132	2053.2	815.08	39.70
PE ratio	16.04	34.11	25.53	6.44	25.23
EY	2.93	6.23	3.39	1.42	41.89
DY	1.60	2.44	1.96	0.34	17.35
NWPS	217.67	321.77	270.76	44.61	16.48

# Table: 4.12Financial Situation of EBL

Sources: Annual report of concerned banks.

The average earning per share of EBL is Rs77.45 over the period of study ranges between Rs.54.22 to Rs.99.99.The standard deviation of EPS is 15.24 CV is 19.68% .The CV indicates the little fluctuation of EPS. The DPS of EBL is ranges between Rs.20 to Rs.60 with the average of Rs.39 it's standard deviation is 14.57.The CV 38.38% indicates that there is moderate fluctuation .The DP ratio is ranges between 36.90 to 60.01 its average DP ratio is 14.86 with its CV is 40.78%.The CV shows the highest fluctuation in DP ratio of EBL.

The average MPS is Rs 2053.2. It ranges between from Rs.870 to 3132. The standard deviation of MPS is 2053.2 and coefficient of variation is 39.70. Which indicate the moderate fluctuation of MPS of the EBL. The average PE ratio is 25.53 the standard deviation and CV of PE ratio of EBL is 6.44 and 25.23% respectively.

Similarly, the average Earning Yield (EY) of EBL standard deviation of EBL has 3.39% and 1.42 respectively. Which has CV of 41.89%.CV is indicating it has moderate fluctuation in EY. The DY of EBL range between 1.60 % to 2.44% with average of 1.96% its standard deviation CV is 0.34 and 17.35% respectively. The NWPS of EBL is stay within the range between Rs.217.67 to Rs.321.77 with standard deviation of 44.61 and CV of NWPS of EBL is 16.48%, which indicates that there is consistency fluctuation in NWPS of EBL.

After the studying the above table, we can found that the bank is paying dividend continue but there is high fluctuation in paying dividend. In this table we can see that increase in DPS as well as increase in MPS and Vice Versa.

But the increasing ratio of MPS is greater than the increasing ratio of DPS and same condition seen in NWPS of NABIL Bank Ltd.

#### 4.2.3 NABIL Bank Ltd. (NABIL)

#### **Table: 4.13**

**Financial Situation of NABIL** 

Variables	Min.	Max.	Mean	S.D.	C.V.
EPS	105.49	137.08	117.37	13.15	11.20
DPS	70	140	96	23.36	24.33
DP Ratio	65.78	102.13	81.24	14.30	17.60
MPS	1505	5275	3793.80	1590.37	41.92
PE ratio	14.27	48.70	32.61	14.30	43.85
EY	2.05	7.01	3.94	2.05	52.03
DY	1.74	4.65	2.62	1.17	44.66
NWPS	324	418	362.80	33.55	9.25

Sources: Annual report of concerned banks.

The average EPS of NABIL Bank Ltd. has Rs.117.37 and it ranges between Rs.105.49 to Rs.137.08. The standard deviation of EPS is 13.15 CV is 11.20%. The CV indicates the little fluctuation in EPS. The DPS of NABIL is range between Rs.70 to Rs.140 with the average Rs.96. The standard deviation of DPS is 23.36 and CV has 24.33 %. The CV 24.33 % indicating the moderate fluctuation in DPS. The DP ratio of the NABIL is range from between 65.78 to 102.13. Its average DP ratio is 81.24. The standard deviation of DP ratio is 14.30 with the CV of 17.60. The CV shows the consistency in DP ratio of NABIL.

The average MPS of NABIL is Rs.3793.80 and it ranges between Rs. 1505 to Rs. 5275.The standard deviation of MPS is 1590.37 and CV is 41.92%, which indicate the moderate fluctuation of MPS of the NABIL Bank. The average of PE ratio is 32.61 and the standard deviation and CV of PE ratio of NABIL bank is 14.30 and 43.85 % respectively.

Similarly, the average of earning yield (EY) of NABIL is ranges between 2.05% to 7.01% average of EY is 3.94%. The standard deviation is 2.05. The CV of EY 52.03% shows that there is over moderate fluctuation of EY of NABIL bank. The dividend yield (DY) of NABIL ranges from between 1.74 % to 4.65% with an average is 2.62%. The standard deviation of DY of this bank 1.17 its coefficient of variation of 44.66% is indicating the moderate level of fluctuation. The average of Net worth per Share is Rs.362.80 it is range between Rs.324 to Rs.418. The standard deviation of NWPS is 33.55 the CV of NWPS of 9.25% is indicating the consistency of NWPS of NABIL Bank Ltd.

From the above table analysis we can see that relationship of dividend per share (DPS) and Market Price per Share (MPS) is Positive. Increasing DPS as well as increasing in MPS and VICE versa.
# 4.2.4 Himalayan Bank Ltd. (HBL)

#### **Table: 4.14**

Variables	Min.	Max.	Mean	S.D.	C.V.
EPS	47.91	62.74	58.49	5.42	9.27
DPS	31.58	45	39.03	5.08	13.02
DP Ratio	59.08	71.72	66.61	4.42	6.64
MPS	920	1980	1500	412.80	27.52
PE ratio	18.57	31.56	19.66	7.76	39.59
EY	3.17	5.39	4.15	0.94	22.65
DY	2.27	3.43	2.73	0.48	17.58
NWPS	228.72	264.74	247.50	12.60	5.09

# **Financial Situation of HBL**

Sources: Annual report of concerned banks.

HBL has an average EPS is Rs.58.49 it is ranges between Rs.47.91 to Rs.62.74.The standard deviation of EPS is 5.42 its CV shows little fluctuation of EPs of HBL during the period of study. The DPS is ranges between Rs.31.58 to Rs.45 and the average of DPS is Rs.39.03.The standard deviation of DPS is 5.08 with CV of 13.02%.The CV is indicating that there is little fluctuation in DPS .During the period of study, the average DP ratio is 66.61 with the standard deviation of 4.42 and the CV of DP ratio is 6.64% shows there is also little fluctuation in DPR.

The MPS is ranges between Rs.920 to Rs.1980 average of MPS is Rs.1500.The standard deviation of MPS is 412.80 the CV is 27.52%.The CV indicate the moderate level of fluctuation in MPS of HBL. The PE Ratio is ranges from between 18.57 to 31.56 its average is 19.66.The standard deviation CV of PE Ratio is 7.76 39.59 respectively.

Similarly, the average of earning yield (EY) is 4.15%, which ranges between 3.17% to 5.39 %. The standard deviation is 0.94 with the CV 22.65%. The DY ranges between 2.27% to 3.43% with the average of 2.73%. The standard deviation of DY is 0.48 its coefficient of variation 17.58% indicating the little fluctuation in DY under the period of study. The NWPS of HBL ranges between Rs.228.73 to Rs.264.74 the

average of NWPS is Rs.247.50.The standard deviation CV is 12.60 5.09% respectively of NWPS of HBL.

From the analyzing the above table we found that the bank paying dividend continue but there is little fluctuation in paying dividend. We can see that relationship of dividend per share (DPS) and Market Price per Share (MPS) is Positive. Increasing DPS as well as increasing in MPS and Vice-versa.

# 4.2.5 Nepal SBI Bank Ltd. (NSBI)

Variables	Min.	Max.	Mean	S.D.	C.V.
EPS	13.29	39.35	27.08	10.03	37.04
DPS	0	47.59	18.94	21.30	112.46
DP Ratio	0	120.94	29.66	59.34	200.07
MPS	335	1900	1106.8	572.33	51.71
PE ratio	25.21	53.34	38.59	11.76	30.24
EY	1.90	3.97	2.82	0.82	29.08
DY	0	4.05	1.42	1.55	109.15
NWPS	151.73	194.68	168.91	15.49	9.17

# **Table: 4.15**

**Financial Situation of NSBI** 

Sources: Annual report of concerned banks.

The Earning per Share (EPS) of NSBI has ranges between Rs.13.29 to Rs.39.35 and its average EPS is Rs 27.08. The standard deviation of EPS is 10.03 and the CV is 37.04%. The CV indicating the high fluctuation of MPS of this bank. The DPS of this bank is ranges between Rs.0.00 to Rs.47.59 but its average DPS is Rs.18.94. The standard deviation of DPS is 21.30 and CV of 112.46% shows the highly fluctuation in DPS of NSBI. Therefore we can seen in DP ratio and Dividend Yield are also fluctuates. Dividend is directly affected to DP Ratio and DY, so the fluctuation in DP Ratio and DY are also very high. The MPS ranges between Rs. 335 (2004/05) to Rs.1900 (2008/09) but the DPS is Zero in 2004/05. The PE Ratio range from between 25.21 to 53.34 with an average PE Ratio is 38.59 and standard deviation is 11.73. The CV of PE Ratio 30.24% shows the moderate fluctuation in PE Ratio.

Similarly, the earning yield (EY) of NSBI ranges between 1.90 to 3.97. The average of EY is 2.82 whereas standard deviation of earning yield is 11.76. The average dividend Yield is 1.42% and standard deviation is 1.55. The C.V. of 184.10% is shows highest fluctuation in DY. The Net Worth per Share (NWPS) is ranges between from Rs 151.73 to Rs.194.68. The average of NWPS is Rs.168.91 and the standard deviation of NWPS 15.49 and C.V. of NWPS is 9.17%. The NSBI has not paid the dividend at two year during the five year period of study, so we find that the banks DPS, DPR and DY is very high fluctuate.

## **4.3 Statistical Tools:**

The statistical tools are used as follows;

#### 4.3.1. Correlation Analysis:

The correlation coefficient may be defined as the degree of linear relationship existing between two or more variables. Two variables are said to be correlated when the change in the value of one variable is accompanied by the change of another variable .It also measures the extent to which one variable affects the other one. The correlation coefficient lies between +1 and -1. If the +1 correlation Coefficient indicates that the variables are perfectively positive correlated and -1 correlation coefficient is 0, it means that the variables are not related to each other. The negative correlation indicates that increase in value of one variables lead to decrease in the value of the other positive correlation indicates that increase in the value of the other positive correlation. The number indicates that the degree of correlation between the variables also.

## 4.3.1.1 Correlation between DPS and MPS:

Banks	Correlation	Relationship	R <sup>2</sup>	Probable	Significant/			
	coefficient			error	Insignificant			
SCBNL	-0.150	Negative	0.022	0.295	Insignificant			
EBL	0.862	Positive	0.743	0.078	Significant			
NABIL	0.659	Positive	0.434	0.171	Moderate			
HBL	0.974	Positive	0.949	0.015	Significant			
NSBI	0.561	Positive	0.315	0.207	Moderate			

Table No. 4.16

Correlation between DPS and MPS of Concerned Banks

The above table 4.3.1.1 shows the relationship between DPS and MPS of five joint venture banks .The coefficient of correlation between DPS and MPS of SCBNL, EBL, NABIL, HBL and NSBI are -0.150, 0.862, 0.659, 0.974 and 0.561 respectively. The correlation of SCBNL shows the negative relationship between DPS and MPS

but correlation of EBL, NABIL, HBL and NSBI shows positive relationship between DPS and MPS. The above table shows that the lower degree of negative correlation between DPS and MPS in case of SCBNL (-0.150).Where as strongly higher degree of positive correlation in case of HBL (0.974).Thus this implies that MPS is not only affected by DPS but other factor also determine the MPS of the joint venture banks. However, the DPS also plays the role to determine the MPS, we can't ignore this matter.

The coefficient of determination  $(r^2)$  is a measure of the degree of linear association or Correlation between two variables, one of which is the independent variables and the other is dependent variable. The coefficient of determination between DPS and MPS of the SCBNL is -0.150., which means that the independent variable (DPS) explains 2.2% variation in MPS. Thus, this shows that the variables of DPS have little effect on the variations of MPS in the case of SCBNL. In the same way, In case of EBL, the variation in DPS determines 43.4% of the variation in MPS. The coefficient of determination of HBL has 0.949, which indicates that the variation in DPS determines 94.9% of the variation in MPS in case of HBL, Which is very high among other joint venture bank. Finally, figure 31.5 % variation in MPS in case of the NSBI.

The significance of the relationship between DPS and MPS is measured by calculating probable error of coefficient from the above table; we can conclude that the relationship between DPS and MPS of SCBNL is insignificant. Since the coefficient of correlation (r) is smaller than the probable error. In case of SCBNL the MPS depends heavily on other variables except the DPS. The relationship between DPS and MPS is significant in case of EBL and HBL (Where r is greater than 6PE).But the relationship between DPS and MPS of NABIL and NSBI is moderate (or neither significance nor insignificance).Since the coefficient of correlation though greater than PE, is still less than 6PE.

## **4.3.1.2** Correlation between DPS and EPS:

Banks	Correlation coefficient	Relationship	r <sup>2</sup>	Probable error	Significant/ Insignificant
SCBNL	0.863	Positive	0.745	0.077	Significant
EBL	0.997	Positive	0.994	0.002	Significant
NABIL	0.715	Positive	0.511	0.135	Moderate
HBL	0.863	Positive	0.745	0.077	Significant
NSBI	0.864	Positive	0.746	0.077	Significant

Table No. 4.17

Contraction Deviced Di D'una Di D'una Di Concernea Dunis	Correlation	between	<b>DPS</b> and	EPS of	<b>Concerned Banks</b>
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From the above we can see the relationship between EPS and DPS of five concerned joint venture bank. It can be observed that the coefficient of correlation (r) is highest positive for EBL, which indicate higher degree of correlation between EPS and DPS .The correlation coefficient of SCBNL, NABIL, HBL and NSBI is 0.863, 0.715, 0.863 0.864 respectively in positive degree of correlation.

The coefficient of determination  $(r^2)$  for SCBNL is 0.745, which means that the variation in EPS explain 74.5% variation in DPS, which is considerable high than others. The figure 0.511 indicates that the variation in DPS determine 51.1% variation in EPS in case of NABIL .In the same way, the coefficient of determination  $(r^2)$  of HBL and NSBI is 0.745 and 0.746 respectively, which indicate that variation in DPS determine 74.5% 74.6% variation in EPS respectively, which is considerable.

As far as significance of relationship is concerned, it is hard to define that the relationship being significant or insignificant, in case of HBL. Since the coefficient of correlation (r) though greater than PE, is still less than 6PE. However in case of SCBNL, EBL, HBL and NSBI, there is significance relationship between DPS and EPS as coefficient of correlation (r) is greater than 6PE.Thus, In case of SCBNL, EBL, HBL and NSBI .We can say that earning per share is major factor in determining the dividend per share.

# 4.3.1.3 Correlation between DPS and NWPS:

Banks	Correlation	Relationship	$\mathbf{r}^2$	Probable	Significant/
	coefficient			error	Insignificant
SCBNL	0.808	Positive	0.653	0.105	Significant
EBL	0.953	Positive	0.908	0.028	Significant
NABIL	0.580	Positive	0.336	0.200	Moderate
HBL	0.609	Positive	0.371	0.190	Moderate
NSBI	0.869	Positive	0.755	0.074	Significant

#### **Table No. 4.18**

Correlation between DPS and NWPS of Concerned Banks

The above table 4.3.1.3 shows the relationship between DPS and NWPS of five concerned banks. The coefficient of correlation between DPS and NWPS of SCBNL, EBL and NSBI are 0.808, 0.953 and 0.869 .Which indicates positive relationship .The above figure indicates that the strong higher degree of positive correlation shows incase of EBL. And the coefficient of correlation of NABIL and HBL is positive and moderate.

The coefficient of determination  $(r^2)$  between DPS and NWPS of SCBNL shows that the variation in DPS explains 65.3% variation in NWPS, which is considerable high. Similarly, the DPS of EBL explain 90.8% variation in NWPS, which is considerable high than others. The figure 0.336 indicates that the variation in DPS determine 33.6% variation in NWPS in case of NABIL. In the case of HBL of coefficient of determination  $(r^2)$  of HBL is 0.371, which indicates that variation in DPS determine 37.1% variation in NWPS, which is considerably low. Finally, the coefficient of determination being 0.755 in case of NSDBI indicates that DPS explains 75.5% variation in NWPS, which is considerable.

The significant of relationship between DPS and NWPS is measured by calculating probable error of correlation from the above table .We can conclude that the relationship between DPS and NWPS of SCBNL, EBL and NSBI is significant, since the correlation coefficient (r) is greater than 6PE.Which indicate that the dividend per share. In the case of NABIL and HBL the relationship between DPS and NWPS is

neither significant nor insignificant because the correlation coefficient (r) though PE is still less than 6PE.

# **4.3.1.4 Correlation between EPS and MPS:**

#### Table No. 4.19

Banks	Correlation	Relationship	r <sup>2</sup>	Probable	Significant/
	coefficient			error	Insignificant
SCBNL	-0.364	Negative	0.132	0.262	Insignificant
EBL	0.891	Positive	0.794	0.062	Significant
NABIL	0.080	Positive	0.006	0.300	Insignificant
HBL	0.830	Positive	0.689	0.094	Significant
NSBI	0.822	Positive	0.676	0.098	Significant

#### **Correlation between EPS and MPS of Concerned Banks**

The above table 4.3.1.4 shows the relationship between EPS and MPS of concerned banks. The correlation coefficient (r) of SCBNL is lower degree of negative correlation EPS and MPS. The correlation coefficient between EPS and MPS of EBL, NABIL, HBL and NSBI are 0.891, 0.080, 0.830 and 0.822, which indicates positive relationship. The strong and higher degree of positive correlation shows in case of EBL. The positive correlation coefficient of all banks shows that it the EPS increases in MPS also increases and vice –versa.

The coefficient of determination  $(r^2)$  for SCBNL is 0.132, which means that the variation in EPS explains 13.2% variation in MPS. In case of EBL, the coefficient of determination is 0.794, which indicates that the variation in EPS explains 79.4% variation in MPS, which is quite considerable. Similarly, in case of NABIL the EPS explains 0.6% variation in MPS, which is not considerable. The coefficient of determination of HBL is 0.689, which means that the variation in EPS explains 68.9% variation in MPS, which is considerable. Finally, the coefficient of determination being 0.676 in case of NSBI indicates that EPS explains 67.6% variation in MPS, which is considerable.

In the above table, in case of SCBNL and NABIL, the relationship is said to be insignificant because of correlation (r) is less than probable error (PE). Thus, we can say that the MPS is dependent heavily on other variable than EPS., in case of EBL, HBL and NSBI, there is significant relation of correlation (r) is greater than 6PE, which indicates that the EPS is major factor to determining the MPS.

## 4.3.1.5 Correlation between MPS and DPR:

# Correlation between MPS and DPR of Concerned BanksCorrelationRelationshipr<sup>2</sup>ProbableSign

Table No. 4.20

Banks	Correlation	Relationship	$\mathbf{r}^2$	Probable	Significant/
	coefficient			error	Insignificant
SCBNL	0.533	Positive	0.284	0.216	Moderate
EBL	0.884	Positive	0.781	0.066	Significant
NABIL	0.870	Positive	0.757	0.073	Significant
HBL	-0.202	Negative	0.041	0.289	Insignificant
NSBI	0.558	Positive	0.311	0.208	Moderate

The above table 4.3.1.5 shows the relationship between MPS and DPR of five joint venture bank respectively. The above table shows clearly positive correlation between MPS DPR of SCBNL, EBL, NABIL and NSBI but the coefficient of correlation of HBL is negative it shows a lower degree of negative relation between MPS and DPR. There is higher degree of positive correlation (0.884) in case of EBL.

The coefficient of determination  $(r^2)$  between MPS and DPR of SCBNL, EBL, NABIL, HBL and NSBI are 0.284, 0.781, 0.757, 0.041 and 0.311 respectively. The coefficient of determination for SCBNL is 0.284, which means that variation in DPR explains 28.4% variation in MPS, which is considerable .In case of EBL; DPR explains 78.1%, which is very considerable.

The coefficient of determination of NABIL is 0.757, which indicates that the variation in MPS explains 75.7% variation in DPR, which is not considerable. Similarly, the coefficient of determination of NSBI is 0.311, which indicates that the variation in DPR explains 31.2% variation in MPS, which is considerable.

As far as significance of relationship is concerned, the relationship between MPS and DPR of HBL is insignificant because correlation is less than probable error. This implies that the MPS is dependent on other variable than the DPR. In case of SCBNL and NSBI the relationship between MPS and DPR is neither significant nor insignificant because the correlation coefficient (r) though greater than PE, is still less than 6PE.

The significant of relationship between MPS and DPR is measured by calculating probable error of correlation of EBL and NABIL. There is significant relationship between MPS and DPR as coefficient of correlation (r) is greater than 6PE, which indicates that the DPR is major factor to determining MPS.

# 4.3.2 Test of Hypothesis:

# F-test:

The following tests have been done under two way ANOVA analysis:

First ANOVA test on Dividend per Share (DPS) of 5 banks over the 5 years.

N				1	·
Banks	SCBNL	EBL	NABIL	HBL	NABIL
Years	(A)	<b>(B)</b>	(C)	( <b>D</b> )	( <b>E</b> )
2004/05 (1)	120	20	70	31.58	0
2005/06 (2)	140	25	85	35	5
2006/07 (3)	130	40	140	40	47.59
2007/08 (4)	130	50	100	45	0
2008/09 (5)	100	60	85	43.56	42.11

DPS of five Banks over five years.

# Null Hypothesis:

H<sub>0</sub>:  $\hat{\uparrow}_A = \hat{\uparrow}_B = \hat{\uparrow}_C = \hat{\uparrow}_D = \hat{\uparrow}_E$ , There is no significant difference between DPS of SCBNL, EBL, NABIL, HBL and NSBI.

H<sub>0</sub>:  $\hat{\Pi}_1 = \hat{\Pi}_2 = \hat{\Pi}_3 = \hat{\Pi}_4 = \hat{\Pi}_5$ , There is no significant difference between DPS of 2004/05, 2005/06, 2006/07, 2007/08 and 2008/09.

# Alternative hypothesis:

H<sub>1</sub>:  $\hat{\uparrow}_A \mid \hat{\uparrow}_B \mid \hat{\uparrow}_C \mid \hat{\uparrow}_D \mid \hat{\uparrow}_E$ , There is significant difference between DPS of SCBNL, EBL, NABIL, HBL and NSBI.

H<sub>1</sub>:  $\hat{\Pi}_1 \mid \hat{\Pi}_2 \mid \hat{\Pi}_3 \mid \hat{\Pi}_4 \mid \hat{\Pi}_5$ , There is significant difference between DPS of 2004/05, 2005/06, 2006/07, 2007/08 and 2008/09.

Test statistic:

Under H<sub>o</sub>

$$F = \mathbf{\bigstar} \mathbf{\bigstar} \mathbf{\bigstar} \mathbf{\bigstar} \mathbf{\bigstar}$$
$$MSE$$
And, 
$$F = \mathbf{\bigstar} \mathbf{\bigstar} \mathbf{\bigstar} \mathbf{\bigstar}$$
$$MSR$$

Where,

MSC= Mean sum square of variation between different banks.

MSR= Mean sum of squares of variations between years.

MSE= Mean sum of squares of variations due to error.

In order to find MSC, MSR and MSE we need to find SSC, SSR, SST and SSE.

The data are coded by subtracting 60 from each figure.

Calculation	of MSC,	<b>MSR</b>	and	MSE.

Years		Banks	5			Row	$X_{1}^{2}$	$X_{2}^{2}$	$X_{3}^{2}$	$X_4^2$	$X_{5}^{2}$
	SCBNL	EBL	NABIL	HBL	NSBI	Total					
	$\mathbf{X}_1$	$X_2$	<b>X</b> <sub>3</sub>	$X_4$	$X_5$	$T_{r}$					
2004/05	60	-40	10	-28.42	-60	-58.42	3600	1600	100	807.70	3600
2005/06	80	-35	25	-25	-55	-10	6400	1225	625	625	3025
2006/07	70	-20	80	-20	-12.41	97.59	4900	400	6400	6400	154.01
2007/08	70	-10	40	-15	-60	25	4900	100	1600	1600	3600
2008/09	40	0	25	-16.44	-17.89	30.67	1600	0	625	625	320.05
Column	320	-105	180	-104.86	-205.3	84.84	21400	3325	9350	2327.97	10699.06
Total											
T <sub>C</sub>							$X_1^2$	$X_{2}^{2}$	$X_{3}^{2}$	$X_4^2$	$X_{5}^{2}$

Now,

**T= Grand Total = 84.84**  
$$T_c = T_r = 84.84$$
 and  $n = 25$ 

Correlation Factor (C.F.) = 
$$\frac{T^2}{n} = \frac{(84.84)^2}{25} = 287.91$$

**R.S.S.** = Row sum of square

$$= X_1^2 + X_2^2 + X_3^2 + X_4^2 + X_5^2$$
  
= 21400+3325+9350+2327.97+10699.06  
= 47102.03

... SST= R.S.S. - C.F. =47102.03 – 287.91 = 46814.12

$$SSC = \frac{T^{2}c}{n_{r}} - C.F. + \frac{(320)^{2}}{5} + \frac{(-105)^{2}}{5} + \frac{(180)^{2}}{5} + \frac{(-104.86)^{2}}{5} + \frac{(-205.3)^{2}}{5} - 287.91$$

$$= 20480 + 2205 + 6480 + 2139.12 + 8429.62 - 287.91$$

$$= 33445.828$$

$$SSR = \frac{T^{2}c}{n_{c}} - C.F. + \frac{(-58.42)^{2}}{5} + \frac{(-10)^{2}}{5} + \frac{(97.59)^{2}}{5} + \frac{(25)^{2}}{5} + \frac{(30.67)^{2}}{5} - 287.91$$

$$= 682.58 + 20 + 1904.76 + 125 + 188.13 - 287.91$$

$$= 2632.56$$

$$SSE = SST-SSC-SSR$$

= 46814.12 - 33445.83 - 2632.56= 10735.73

Sources	Sum of Square	d.f.	Mean sum of	F- ratio
of	(S.S.)		square	
Variation			(M.S.S)	
Between	SSC = 33445.83	C-1=5-1=4	$MSC = \frac{SSC}{\dots}$	$F_{C}(4,16) = \frac{MSC}{MSC}$
Banks			C - 1	MSE
			33445.83	8361.46
			4	670.98
			= 8361.46	= 12.46
Between	SSR = 2632.56	r-1= 5-1= 4	SSR	MSR
Years			MSR =	$F_{r}(4, 16) = \frac{1}{MSE}$
			2632.56	658.14
			= $         -$	$=\frac{1}{670.98}$
			-659.14	- 0.08
			-038.14	- 0.98
			SSE	
Errors	SSE=10735.73	(r-1) (c-1)	$MSE = \frac{SSE}{(C-1)(r-1)}$	
		$-(5_{-1})(5_{-1})$	(C-1)(1-1)	
		-16	10735.73	
		-10	=	
			= 670.98	
Total	SST=46814.12	n-1 =25-1		
		=24		

Two – Way ANOVA table

# **Critical Value:**

For Banks : Tabulated F 0.05 (4, 16) = 3.01

For Years : Tabulated F 0.05 (4, 16) = 3.01

# **Decision:**

## For Bank Wise:

Since calculated  $F_c$  (4, 16) > tabulated F (4, 16), it is significant and  $H_o$  is rejected and hence  $H_1$  is accepted, which means that there is significant difference between DPS of SCBNL, EBL, NABIL, HBL and NSBI.

# For Year Wise:

Since calculated  $F_r(4,16)$  < tabulated f(4,16), it is not significant and  $H_o$  is accepted and hence  $H_1$  is rejected, which means that there is no significant difference between DPS of year 2004/05, 2005,06, 2006/07, 2007/08 and 2008/09 of the concerned banks.

Second ANOVA test on Market Price per Share (MPS) of five Banks over the 5 years.

Banks	SCBNL	EBL	NABIL	HBL	NABIL
Years	( <b>A</b> )	<b>(B)</b>	(C)	( <b>D</b> )	(E)
2004/05 (1)	2345	870	1505	920	335
2005/06 (2)	3775	1379	2240	1100	612
2006/07 (3)	5900	2430	5050	1740	1176
2007/08 (4)	6830	3132	5275	1980	1511
2008/09 (5)	6010	2455	4899	1760	1900

MPS of five Banks over five years.

# Null Hypothesis:

H<sub>0</sub>:  $\hat{\Pi}_A = \hat{\Pi}_B = \hat{\Pi}_C = \hat{\Pi}_D = \hat{\Pi}_E$ , There is no significant difference between MPS of SCBNL, EBL, NABIL, HBL and NSBI.

H<sub>0</sub>:  $\hat{\Pi}_1 = \hat{\Pi}_2 = \hat{\Pi}_3 = \hat{\Pi}_4 = \hat{\Pi}_5$ , There is no significant difference between MPS of 2004/05, 2005/06, 2006/07, 2007/08 and 2008/09.

#### Alternative hypothesis:

H<sub>1</sub>:  $\hat{\uparrow}_A \mid \hat{\uparrow}_B \mid \hat{\uparrow}_C \mid \hat{\uparrow}_D \mid \hat{\uparrow}_{E}$ , There is significant difference between MPS of SCBNL, EBL, NABIL, HBL and NSBI.

H<sub>1</sub>:  $\hat{\Pi}_1 \mid \hat{\Pi}_2 \mid \hat{\Pi}_3 \mid \hat{\Pi}_4 \mid \hat{\Pi}_5$ , There is significant difference between MPS of 2004/05, 2005/06, 2006/07, 2007/08 and 2008/09.

# **Test statistic:**

Under H<sub>o</sub>

$$HSC F = \texttt{\texttt{K}} \texttt{\texttt{K}} \texttt{\texttt{K}} \texttt{\texttt{K}} \texttt{\texttt{K}}$$
$$MSE$$
$$And, F = \texttt{\texttt{K}} \texttt{\texttt{K}} \texttt{\texttt{K}} \texttt{\texttt{K}}$$
$$MSE$$

Where,

MSC= Mean sum square of variation between different banks.

MSR= Mean sum of squares of variations between years.

MSE= Mean sum of squares of variations due to error.

In order to find MSC, MSR and MSE we need to find SSC, SSR, SST and SSE.

The data are coded by subtracting 100 from each figure.

Years		Banks				Row	$X_1^2$	$X_{2}^{2}$	$X_{3}^{2}$	$X_{4}^{2}$	$X_{5}^{2}$
	SCBNL	EBL	NABIL	HBL	NSBI	Total					
	$\mathbf{X}_1$	$X_2$	X <sub>3</sub>	$X_4$	X <sub>5</sub>	Tr					
2004/05	3.45	-11.3	-4.95	-10.8	-16.65	-40.25	11.90	127.69	24.50	116.64	277.22
2005/06	17.75	-6.21	24	-9	-13.88	-8.94	315.06	38.56	5.76	81	192.65
2006/07	39	4.3	30.5	-2.6	-8.24	62.96	62.96	1521	18.49	930.25	6.76
2007/08	48.3	11.32	32.75	-0.2	-4.89	87.28	2332.89	128.14	1072.56	0.04	23.91
2008/09	40.1	4.55	28.99	-2.4	-1.0	70.24	1608.01	20.70	840.42	5.76	1
Column	148.6	2.66	89.69	-25	-44.66	171.29	5788.86	333.58	2873.49	210.2	562.68
Total											
T <sub>C</sub>							$X_{1}^{2}$	$X_{2}^{2}$	$X_{3}^{2}$	$X_{4}^{2}$	$X_{5}^{2}$

Calculation of the MSC, MSR and MSE.

Now,

**T= Grand Total = 171.79** 

 $T_c = T_r = 171.79$  and n = 25

Correlation Factor (C.F.) =  $\frac{T^2}{n} = \frac{(171.79)^2}{25} = 1173.61$ 

**R.S.S.** = **Row sum of square** 

$$= X_1^2 + X_2^2 + X_3^2 + X_4^2 + X_5^2$$
  
=5788.869 + 333.58 + 2873.49 + 210.2 + 562.68  
=9768.81

...\$ST= R.S.S.- C.F. =9768.81-1173.61 = 8595.2

$$SSC = \frac{T^2c}{n_r} - C.F. + \frac{(148.6)^2}{5} + \frac{(2.66)^2}{5} + \frac{(89.69)^2}{5} + \frac{(-25)^2}{5} + \frac{(-44.66)^2}{5} - 1173.61$$
  
= 4416.39 + 1.42 + 1608.86 + 125 + 338.90 - 1173.61  
= 5316.96

 $SSR = \frac{T^{2}c}{n_{c}} - C.F. + \frac{(-40.25)^{2}}{5} + \frac{(-8.94)^{2}}{5} + \frac{(62.96)^{2}}{5} + \frac{(87.28)^{2}}{5} + \frac{(70.24)^{2}}{5} - 1173.61$ 

= 324.01 + 15.98 + 732.79 +1523.56 + 986.73 - 1173.61 =2409.46

SSE = SST-SSC-SSR

= 8595.2 - 5316.96 - 2409.46 = 868.78

Sources	Sum of Square	d.f.	Mean sum of	F- ratio
of	(S.S.)		square	
Variation			(M.S.S)	
Between Banks	SSC = 5316.96	C-1=5-1=4	$MSC = \frac{SSC}{C - 1}$ $= \frac{5316.96}{4}$ $= 1329.24$	$F_{C}(4,16) = \frac{MSC}{MSE}$ $= \frac{1329.24}{54.30}$ $= 24.48$
Between Years	SSR = 2409.46	r-1= 5-1= 4	$MSR = \frac{SSR}{r-1}$ $= \frac{2409.46}{4}$ $= 602.37$	$F_{r}(4,16) = \frac{MSR}{MSE}$ $= \frac{602.37}{54.30}$ $= 11.03$
Errors	SSE=868.78	(r-1) (c-1) =(5-1)(5-1) =16	$MSE = \frac{SSE}{(C-1)(r-1)} = \frac{868.78}{16} = 54.30$	
Total	SST=8595.2	n-1 =25-1 =24		
		1		

Two – Way ANOVA table

# **Critical Value:**

For Banks : Tabulated F 0.05 (4, 16) = 3.01

For Years : Tabulated F 0.05 (4, 16) = 3.01

# **Decision:**

#### For Bank Wise:

Since calculated  $F_c(4,16)$  > tabulated F (4,16), it is significant and  $H_o$  is rejected and hence  $H_1$  is accepted, which means that there is significant difference between MPS of SCBNL, EBL, NABIL, HBL and NSBI.

#### For Year Wise:

Since calculated  $F_r(4,16)$  > tabulated f (4, 16), it is significant and  $H_o$  is rejected and hence  $H_1$  is rejected, which means that there is significant difference between MPS of year 2004/05, 2005,06, 2006/07, 2007/08 and 2008/09 of the concerned banks. Or, the MPS is not same in the five years period.

## 4.4 The Result and major findings:

## 4.4.1 Findings from Analysis of the Financial Indicators

From the analysis of financial variables by using financial tools mean, standard deviation and coefficient of variation, the following finding has been drawn.

- ) The average earning per Share (EPS) of the banks under study shows a positive result. But the coefficient of variation indicates that EPS of the banks are not stable. The CV range from between 9.27% to 37.04%, among the bank under study. SCBNL has highest average EPS.
- ) The average Dividend per Share (DPS) of the banks under study shows a positive result except NSBI. But the coefficient of variation shows that DPS of the banks are not stable. The CV range from between 10.94% to 112.46%, among the banks under study, SCBNL has highest average DPS with lowest fluctuation. The NSBI has average DPS is Rs. 18.94 and its fluctuation is 112.46%, which is highest fluctuation. The NSBI is not distributing the dividend in two years within the five years study period.
- ) The average Dividend Percent (DP) of the concerned banks shows the highest average DP of SCBNL with lowest fluctuation and NSBI has lowest average DP with highest fluctuation. The ranges between CV are 10.94% (SCBNL) and 112.46 (NSBI).
- ) The average Dividend Payout Ratio (DPR) is positive except NSBI. But the coefficient of variation of concerned banks are not stable the CV ranges from between 6.64% to 200.07%. In the study of all five concerned banks we know that the SCBNL has highest average DPR the NSBI has lowest average DPR with highest fluctuation because of the NSBI has not distributed the distributed the dividend in two years with 5 years of the study period. The HBL has lowest fluctuation CV among other all.
- ) The average Market Price per Share (MPS) of 5 concerned commercial banks is ranges between Rs. 1106.8to Rs.4972 of NSBI and SCBNL respectively. The average MPS of 5 concerned banks is Rs.2685.16, which is standard value of MPS for this study. The SCBNL and HBL have greater average MPS than the standard value of MPS but it is lower in case of EBL, NABIL and NSBI. The coefficient of variation indicates that the Market Price of banks is not

stable. The fluctuation in MPS of HBL has lowest i.e. 27.52% and it is highest of NSBI i.e. 51.71%.

- ) The average Price Earnings Ratio of the banks range from between 19.60% to 38.89%. The coefficient of variation indicates the P/E ratios of the banks are not stable. The CV ranges from between 25.23% to 43.85%, among the bank under study NSBI has the highest average ratio and HBL has lowest P/E ratio overtime for any stock. In the period of study highest fluctuation in the NABIL and the lowest in the EBL.
- ) The average Earning Yield (EY) of the concerned banks ranges from between 2.82% to 4.15%. The CV indicates that the Earning Yield (EY) of the banks is not stable. The CV ranges between 22.65% to 52.03%. The HBL has highest average EY and lower fluctuations in EY than other banks. The lowest EY was found in case of NSBI.
- ) The average Dividend Yield (DY) ranges from between 1.42% to 2.92%. The coefficient of variation indicates that DY of the banks is not stable. The CV ranges from between 17.35% to 109.15%. Among the other banks under study period SCBNL has highest average DY. The NSBI has the lowest average dividend yield with the highest fluctuation.
- The average NWPS of SCBNL, EBL, NABIL, HBL and NSBI has Rs. 426.35, Rs 270.76, Rs 362.80, Rs 247.50 and Rs 168.91 respectively and CV is 14.65%, 16.48%, 9.25%, 5.09% 9.17% respectively. SCBNL has the highest NWPS and NSBI has lowest .The fluctuation in NWPS and NSBI has lowest. The fluctuation in NWPS is highest in case of EBL and lowest in case of HBL.
- ) The average MPS to BVPS ratio of SCBNL has highest and HBL is lowest. The fluctuation in this ratio NSBI is the highest and EBL is lowest. The CV ranges from between 27.40% to 46.71%.

# 4.4.2 Findings from Analysis of the Statistical Indicators

From the analysis of major statistical tools i.e. correlation and Hypothesis. We can summarize the relationship of various variables as follows.

- ) The correlation between Dividend per Share (DPS) and Market Price per Share (MPS) of EBL, NABIL, HBL and NSBI has positive. But MPS of SCBNL has negatively correlated with DPS. The correlation of NABIL and NSBI has moderate, EBL and HBL has significant correlation and it is insignificant in case of SCBNL.
- ) The correlation between Dividend per Share (DPS) and Earning per Share (EPS) of SCBNL, EBL, NABIL, HBL and NSBI has positive. The correlation of NABIL has moderate significant and it is significant in case of SCBNL, EBL, HBL and NSBI.
- J The correlation between Dividend per Share (DPS) and Net Worth per Share (NWPS) of SCBNL, EBL, NABIL, HBL and NSBI has significant.
- ) The analysis of correlation between Earning per Share (EPS) and Market Price per share (MPS) of EBL, NABIL, HBL and NSBI has positive. It is negative in case of SCBNL. The Correlation of EBL, HBL and NSBI has Significant and it is insignificant in case of SCBNL and NABIL.
- ) The correlation between Market price per share (MPS) and Dividend Payout Ratio (DPR) has positive for SCBNL, EBL, NABIL and NSBI. But its relationship is negative in case of HBL. The relationship is moderate for SCBNL and NSBI. The relationship is significant for EBL and NABIL it is insignificant in case of HBL.
- ) Test of Hypothesis has to help us to conclude that Dividend per Share of different five joint venture banks (i.e. SCBNL, EBL, NABIL, HBL NSBI) are significant difference at 5% level of significant . While MPS of these concerned banks also significant different at 5% level of significant and this test shows that DPS of different years are not significant different at 5% level of significant . Where as MPS of different year are significant different at 5% level of significant.

#### **4.4.2 Findings from Primary Data Analysis**

After the formulation of questionnaire, the major result of primary data analysis i.e. a survey on impact of dividend policy on market price of share are summarize as under.

- ) All the banks are gives less important for dividend decision. They give first and important for financing & investing decision and second is dividend decision.
- ) Majority of banks are highly concerned with dividend aspect and some banks moderately concerned but none of the banks are less concerned with dividend aspect.
- ) Majorities of the banks follow the earning based dividend policy but some banks follows residual dividend policy and some fixed plus extra dividend policy too.
- ) Majority of the banks distributed the cash dividend but some of them distribute stock dividend as well.
- ) The majority of the respondents agree that the dividend is taken as a residual decision.
- J 45% of the respondents agree that current earning is important factor while forming dividend policy. While 30% respondents thinks liquidity and 15% respondents considers net worth is important factors.
- ) 100% of the respondent believes that the forming dividend policy of company should take into account the shareholder expected return.
- ) Majority of respondents (75%) do not believe that the companies adopt consistent dividend policy and minority of respondents (25%) has consistency dividend policy.
- ) With respect to effective dividend policy the majority of respondents (65%) fell that the dividend should be paying higher then present dividend distribution level of dividend.
- ) With respect to the statement that Nepalese shareholders are indifferent either the company pays dividend or not, most of the respondents (45%+10) % are agree.

- ) We can say that company's announcement of earning and dividend will help to change the market price of share because 50% of respondents are agreed with this view.
- ) Only the dividend is not main effective factor the market price per share, another factor also affects the market price of share .Majority of respondent feel that not only dividend decision but also other factors affect the Market Price per Share.
- ) a) Favorable information about the stock will generally make positive impact on stock price.
  - b) Dividend payment directly affects the Market Price.

c) The Nepalese companies generally do not pay dividend, if they have profitable investment opportunities.

d) Shareholders prefer the stock dividend than cash dividend because of lower tax burden.

# **Primary Data Analysis**

This chapter reflects the methodology .To meet the objective of the study to evaluate the management view relating the dividend, a set of questionnaire is used, which consists of thirteen questions relating to dividend aspect of the banks. The questionnaire includes the management view relating to the present expectation, types of dividend and their present dividend policy.

# ) About the decision of finance manager.

1	Financing Decision	35%
2	Investing Decision	35%
3	Dividend Decision	30%

**)** About the bank concerned with dividend aspect.

1	Highly concerned	70%
2	Concerned	30%
3	Less Concerned	0%

# **)** About dividend policies.

1	Residual dividend Policy	35%
2	Steady dividend policy	5%
3	Earning based dividend policy	40%
4	Fixed plus extra dividend policy	20%
5	Other specifies	0%

# ) About types of dividend.

1	Cash Dividend	80%
2	Stock Dividend	20%
3	Script Dividend	0%
4	Other Specifies	0%

**)** About residual dividend policy.

1	Yes	45%
2	No	30%
3	To some extent.	25%

) About important factor while forming dividend policy.

1	Market Price	5%
2	Net worth	15%
3	Current Earning	45%
4	Liquidity	30%
5	Past Dividend	5%
6	Regularity Position	0%
7	Tax	0%

# ) About account the shareholders expected return.

1	Yes	100%
2	No	0%

**)** About consistency dividend policy.

1	Yes	25%
2	No	75%?

) About effective dividend policies for the Nepalese companies.

1	Dividends at current payout level.	15%
2	Dividend at a level lower than present level.	20%
3	Dividends at a level higher than present level.	65%

) About shareholder is indifferent whether the company pays dividend or not.

1	Agree	10%
2	Moderately Agree	45%
3	Disagree	30%
4	Don't Know	15%

) About company's announcement of earning and change in MPS.

1	Yes	48%
2	No	14%
3	To some extent	19%
4	Don't know	19%

) About the main effective factor for determining the MPS.

1	Agree	5%
2	Moderate agree	35%
3	Disagree	60%

How far do you agree / disagree with the following observation on corporate dividend policy in Nepal? (Please make a tick mark at the appropriate number as per following scheme: A= strongly agree, B=Agree, C=don't know, D= Disagree E= strongly disagree.)

S.	Statement	Α	B	С	D	Ε
No.						
1	Dividend payout affects the price the common	8	3	3	3	3
	stock.					
2	Dividend Payments convey future prospects.	7	5	4	2	2
3	Shareholders in high tax brackets are attracted to	7	6	4	2	1
	low dividends.					
4	A firm should avoid making changes in its	5	3	2	6	4
	dividend rate that might have to be reversed in a					
	year or so.					
5	Reasons for dividend policy changes should be	13	4	2	1	0
	adequately disclosed to Investors.					
6	Shareholders in high tax brackets prefer stock	9	4	2	3	2
	dividends.					
7	If a company provides information on favorable	7	6	3	2	2
	future prospect, it will increase market price of it's					
	share.					
8	Shareholders are indifferent whether company	6	6	4	2	2
	pays dividends or retains earnings.					
9	Company should not pay dividend if profitable	11	4	2	2	1
	investments are on h.					
10	In Nepal, most of the companies do not want to	5	4	4	5	2
	pay dividends.					

# **Chapter** – **V**

# Summary, Conclusion and Recommendation

#### 5.1 Summary:

Dividend policy decision is one of the crucial decisions of the financial management. It is an important decision it affects shareholder wealth and value of firm. Dividend policy is an integral part of the firm's financing decision as it provides internal financing. While making dividend decision, the financial manager should consider the preference of shareholders as well as the investment opportunities available within the firm. Dividend decision is an effective way of attract new investor and maintain current investors. It is important to have clearly defined and effectively managed dividend policy, So as to fulfill the shareholder's expectations and corporate growth.

Deciding how much to pay to shareholders by way of dividend and how much to retain in the business is dividend decision. Dividend paying ability of any business organization reflects the financial position of organization reflects the financial position of organization in market. It helps to attract the new investor from the market. Due to the division of earning between dividend payout and retention ratio the market price of the share also is affected, which is also crucial for the organization. So, the funds that could not be used due to the lack of investment opportunities would be better as dividend, since shareholders have investment opportunities elsewhere.

Shareholders have high expectation that market price of share will be significantly higher than net worth. The organization promoted by foreign entity are paying higher dividend than the companies promoted by the indigenous promoters. However, joint venture banks are also not followed by an appropriate dividend policy. This policy affects the market price but goodwill of such banks in the long run.

Dividend paying banks are analyzed to show the implication of dividend policy they have adopted in their market price per share. Even market price per share is directed by various factor, this study is made to analyze one of the important factor i.e. dividend. The study covers five joint venture banks (SCBNL, EBL, NABIL, HBL and NSBI) and only for the last five fiscal year from 2004/05 to 2008/09. The available

secondary dates have been analyzed using various financial and statistical tools the primary data has been analyzed by using collection of various answer of the questionnaire. So the reliability of the conclusions of this study is determined on the accuracy of secondary and primary data.

#### **5.2 Conclusions of the study:**

The result of this analysis is strong enough to establish the relationship between dividend policy and Market Price per Share of listed commercial banks. However this analysis cannot give as whole conclusion of present dividend scenario of the bank. After analyzing the data by using financial and statistical indicators of all the sample banks, following conclusion are drawn.

- ) The market price per share is affected by the dividend related financial variable i.e. DPS, DP, DY and DPR either positively or negatively. The nature of effect is different that might be positively or negatively. In case of same banks there exist positive relation between dividend per share and market price per share, which for other exist negatively relationship. Therefore the Market Price per Share is highly depends upon the dividend, which has been shown by coefficient of multiple determinations.
- ) After the study important of cash dividend on the Market Price per Share revealed that generally dividend per share has positive impact on market price per share in all banks except SCBNL.
- Dividend policy practices of sample banks are neither stable nor consistency growing. Dividend is distributed as an ad-hoc or situational basis.
- ) Beside dividend, other factors also effects the market price per share i.e. size of earning, liquidity position, net worth per share, price earning ratio, information value of dividend decision etc; their effect is differ for different banks.
- Market price per share (MPS) to Book value per share (BVPS) ratio greater than 1 for all banks in all FY under study. In other word the MPS of sample banks are higher than BVPS .This indicates that the investors are concern about BVPS but they are only concern with the transaction price per share. This shows the low consciousness and knowledge of shareholders.

- ) Dividend per Share is affected by earning per share, retention ratio and net profit per share.
- ) The situation of capital market of Nepal is improving day by day. As a result, the capital market seems to be more efficient than previous years. But it is reality that capital market of Nepal is still immature.
- Due to adequate time period, no. of sample is taken few from large population the result might be not representing wholesome. Hence, if large samples are taken from the whole population the result might have produced more accurate and absolute results.

# **5.3 Recommendations:**

On the basis of study of the different commercial banks the following recommendation made for the further applications of dividend of the banking sector. We found that there is lack of consistent dividend paying practices of sample joint venture bank of Nepal. This occurs due to lack of legal obligation toward shareholders. There is not clear provision was made in company and commercial act Nepal, and regulation act regarding the dividend policy.

- ) The uniformity and regularity in dividend payment practices should be adopted by the companies. In many cases, a small amount of dividend is paid without considering what is adequate or desired by the investors. This helps to investor in deciding whether to invest or not.
- ) Banks should have long-term vision regarding earning and dividend payment that helps to manage challenging competitive situation of present world various types of internal and external factor should be considered before taking decision.
- ) Shareholder should given option to choose between stock dividend cash dividend instead of declaring stock or cash dividend arbitrary .For this dividend declaration should be proposed to the annual general meeting of shareholders' for approval.
- ) The legal rules and regulation must be in favors of investors to exercise the dividend practice and protect the shareholders rights.

- EPS is to be considered for determining dividend amount. It is important to consider earning rather than neglecting it while making dividend decision.
- ) The dividend payout ratio of the sample firm is fluctuating from year to year; there is no rational approach in deciding the pay out. All the firms should analyze the internal rate of return cost of capital in deciding DPR, which helps to maximize the shareholders wealth
- ) The firm should follow the proper dividend policy. Dividend payment as a financing decisions need the formation of a comprehensive long term financial policy and optimal dividend policy to fulfill the investor's expectation and interest.
- ) Government, Nepal Rastra Bank, security exchange board and Nepal Stock Exchange should be conscious in discouraging market imperfect ion in dividend payment practices.
- ) Most of the banks seem to ignore the dividend expectation of the minority shareholders' association of Nepal should be encouraged to work against the management ignorance.
- ) The all information and policies should be transparent and within reach of the shareholder.
- ) If correlation between MPS and DPS is negative .The bank should search investment opportunity rather than increasing DPS.

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# Appendix-I

1.	Correlation	results between	DPS	and MPS	of SCBNL
----	-------------	-----------------	-----	---------	----------

Fiscal Year	DPS (X)	MPS (Y)	X <sup>2</sup>	۲²	XY
2004/05	120	2345	14400	5499025	281400
2005/06	140	3775	19600	14250625	528500
2006/07	130	5900	16900	34810000	767000
2007/08	130	6830	16900	46648900	887900
2008/09	100	6010	10000	36120100	601000
	ÿX=620	ÿY=24860	ÿX <sup>2</sup> =77800	ÿY <sup>2</sup> =137328650	ÿXY=3065800

Where,

N=5 Σx=620 ΣY=24860 ΣX<sup>2</sup>=77800 ΣY<sup>2</sup>=1373286550 ΣXY=3065800

#### Note:

Value of X represents market price per share : **DPS** Value of Y represents dividend price per share : **MPS** 

We Know,

= ---

389000-84400 686643250-618019600

$$= \frac{-84200}{561844.0976}$$
$$= -0.150$$
Then,

$$r^2 = (-0.150)^2$$
  
= 0.0225

Now,

Probable Error (P.E.) = 
$$0.6745 \times \frac{1 - r^2}{N}$$
  
=  $0.6745 \times \frac{1 - 0.0225}{5}$   
= 0.295

...r < PE, So correlation between DPS and MPS is Insignificant in case of SCBNL.

# Appendix-II

Earning p	oer share o	of Concerned	Banks
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Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	143.14	54.22	105.49	47.91	13.29
2005/06	175.84	62.78	129.21	59.24	18.27
2006/07	167.37	78.42	137.08	60.66	39.35
2007/08	131.92	91.82	108.31	62.74	28.33
2008/09	109.99	99.99	106.76	61.90	36.18
Mean	145.65	77.45	117.37	58.49	27.08
S.D.	21.21	15.24	13.15	5.42	10.03
C.V.	14.56	19.68	11.20	9.27	37.04

# Dividend per share of Concerned Banks

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	120.00	20.00	70.00	31.58	0.00
2005/06	140.00	25.00	85.00	35.00	5.00
2006/07	130.00	40.00	140.00	40.00	47.59
2007/08	130.00	50.00	100.00	45.00	0.00
2008/09	100.00	60.00	85.00	43.56	42.11
Mean	124	39	96	39.03	18.94
S.D.	13.56	14.97	23.36	5.08	21.30
C.V.	10.94	38.38	24.33	13.02	112.46

#### **Dividend Percent of Concerned Banks on face value**

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	120.00	20.00	70.00	31.58	0.00
2005/06	140.00	25.00	85.00	35.00	5.00
2006/07	130.00	40.00	140.00	40.00	47.59
2007/08	130.00	50.00	100.00	45.00	0.00
2008/09	100.00	60.00	85.00	43.56	42.11
Mean	124	39	96	39.03	18.94
S.D.	13.56	14.97	23.36	5.08	21.30
C.V.	10.94	38.38	24.33	13.02	112.46

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	83.83	36.90	66.36	65.92	0.00
2005/06	79.62	39.82	65.78	59.08	27.37
2006/07	77.67	51.01	102.13	65.94	120.94
2007/08	98.54	54.45	92.33	71.72	0.00
2008/09	90.92	60.01	79.62	70.37	116.39
Mean	86.12	36.44	81.24	66.61	29.66
S.D.	7.70	14.86	14.30	4.42	59.34
C.V.	8.94	40.78	17.60	6.64	200.07

## **Dividend Payout Ratio of concerned Banks:**

# Market Price per Share of concerned Banks

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	2345	870	1505	920	335
2005/06	3775	1379	2240	1100	612
2006/07	5900	2430	5050	1740	1176
2007/08	6830	3132	5275	1980	1511
2008/09	6010	2455	4899	1760	1900
Mean	4972	2053.2	3793.8	1500	1106.8
S.D.	1656.79	815.08	1590.37	412.80	572.33
C.V.	33.32	39.70	41.92	27.52	51.71

## P/E Ratio of concerned Banks

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	16.38	16.04	14.27	19.20	25.21
2005/06	21.47	21.97	17.34	18.57	33.49
2006/07	35.25	30.99	36.84	28.69	29.89
2007/08	51.77	34.11	48.70	31.56	53.34
2008/09	54.64	24.55	45.89	28.43	52.52
Mean	35.90	25.53	32.61	19.60	38.89
S.D.	15.44	6.44	14.30	7.76	11.76
C.V.	43.01	25.23	43.85	39.59	30.24

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	6.10	6.23	7.01	5.21	3.97
2005/06	4.66	4.55	5.77	5.39	2.99
2006/07	2.84	3.23	2.71	3.49	3.35
2007/08	1.93	2.93	2.05	3.17	1.87
2008/09	1.83	4.07	2.18	3.52	1.90
Mean	3.47	3.39	3.94	4.15	2.82
S.D.	1.66	1.42	2.05	0.94	0.82
C.V.	47.84	41.89	52.03	22.65	29.08

Earning Yield of concerned Banks

#### **Dividend Yield of concerned Banks**

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	5.12	2.30	4.65	3.43	0.00
2005/06	3.71	1.81	3.79	3.18	0.82
2006/07	2.20	1.65	2.77	2.30	4.05
2007/08	1.90	1.60	1.90	2.27	0.00
2008/09	1.66	2.44	1.74	2.48	2.22
Mean	2.92	1.96	2.62	2.73	1.42
S.D.	1.31	0.34	1.17	0.48	1.55
C.V.	44.86	17.35	44.66	17.58	109.15

## Net worth per Share (NWPS) of concerned Banks

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	422.38	219.87	337.00	239.59	159.54
2005/06	468.22	217.67	381.00	228.72	151.73
2006/07	512.12	280.82	418.00	264.74	178.04
2007/08	401.52	321.77	354.00	247.95	160.57
2008/09	327.53	313.64	324.00	256.52	194.68
Mean	426.35	270.76	362.80	247.50	168.91
S.D.	62.46	44.61	33.55	12.60	15.49
C.V.	14.65	16.48	9.25	5.09	9.17

Market value per Share (MVPS) to Book Value per Share (BVPS) of concerned Banks

Banks	SCBNL	EBL	NABIL	HBL	NSBI
2004/05	5.55	3.96	4.47	3.84	2.10
2005/06	8.06	6.34	5.88	4.81	4.03
2006/07	11.52	8.65	12.08	6.57	6.61
2007/08	17.01	9.73	14.90	7.99	9.41
2008/09	18.35	7.83	15.12	6.86	9.76
Mean	12.10	7.30	10.49	6.01	6.38
S.D.	4.95	2.00	4.49	1.49	2.98
C.V.	40.91	27.40	42.80	24.79	46.71

# Appendix-III

## **Company Wise Analysis:**

Variables	Min.	Max.	Mean	S.D.	C.V.
EPS	109.99	175.84	145.65	21.21	14.56
DPS	100	140	124	13.56	10.94
DP Ratio	77.67	98.54	86.12	7.70	8.94
MPS	2345	6830	4972	1656.79	33.32
PE ratio	16.38	54.64	35.90	15.44	43.01
EY	1.83	6.10	3.47	1.66	47.84
DY	1.66	5.12	2.92	1.31	44.86
NWPS	327.53	512.12	426.35	62.46	14.65

# **Financial Situation of SCBNL**

### **Financial Situation of EBL**

Variables	Min.	Max.	Mean	S.D.	C.V.
EPS	54.22	99.99	77.45	15.24	19.68
DPS	20	60	39	14.57	38.38
DP Ratio	36.90	60.01	36.44	14.86	40.78
MPS	870	3132	2053.2	815.08	39.70
PE ratio	16.04	34.11	25.53	6.44	25.23
EY	2.93	6.23	3.39	1.42	41.89
DY	1.60	2.44	1.96	0.34	17.35
NWPS	217.67	321.77	270.76	44.61	16.48

## **Financial Situation of NABIL**

Variables	Min.	Max.	Mean	S.D.	C.V.	
EPS	105.49	137.08	117.37	13.15	11.20	
DPS	70	140	96	23.36	24.33	
DP Ratio	65.78	102.13	81.24	14.30	17.60	
MPS	1505	5275	3793.80	1590.37	41.92	
PE ratio	14.27	48.70	32.61	14.30	43.85	
EY	2.05	7.01	3.94	2.05	52.03	
DY	1.74	4.65	2.62	1.17	44.66	
NWPS	324	418	362.80	33.55	9.25	

### **Financial Situation of HBL**

Variables	Min.	Max.	Mean	S.D.	C.V.
EPS	47.91	62.74	58.49	5.42	9.27
DPS	31.58	45	39.03	5.08	13.02
DP Ratio	59.08	71.72	66.61	4.42	6.64
MPS	920	1980	1500	412.80	27.52
PE ratio	18.57	31.56	19.66	7.76	39.59
EY	3.17	5.39	4.15	0.94	22.65
DY	2.27	3.43	2.73	0.48	17.58
NWPS	228.72	264.74	247.50	12.60	5.09

#### **Financial Situation of NSBI**

Variables	Min.	Max.	Mean	S.D.	C.V.
EPS	13.29	39.35	27.08	10.03	37.04
DPS	0	47.59	18.94	21.30	112.46
DP Ratio	0	120.94	29.66	59.34	200.07
MPS	335	1900	1106.8	572.33	51.71
PE ratio	25.21	53.34	38.59	11.76	30.24
EY	1.90	3.97	2.82	0.82	29.08
DY	0	4.05	1.42	1.55	109.15
NWPS	151.73	194.68	168.91	15.49	9.17

# **Appendix-IV**

#### 1. Which of the following decision do you think are more important?

- J Financing Decision
- J Investing Decision
- ) Dividend Decision

#### 2. How much is you bank concerned with dividend aspect?

- Highly concerned
- ) Concerned
- ) Less Concerned

#### 3. Among the various dividend policies, which policy does your company follow?

- J Residual dividend Policy
- ) Steady dividend policy
- J Earning based dividend policy
- J Fixed plus extra dividend policy
- ) Other specifies

#### 4. What kind of Dividend does your company distribute?

- ) Cash Dividend
- J Stock Dividend
- ) Script Dividend
- ) Other Specifies

5. Do you think that dividend is paid as a residual decision in Nepalese enterprises?

) Yes

) No

) To some extent

6. while forming dividend policy, which factor does you thinks is most important?

J Market Price

) Net worth

) Current Earning

/ Liquidity

- / Past Dividend
- J Regularity Position
- ) Tax

7. Do you take into account the shareholders expected return, while forming dividend policy?

) Yes ) No

8. Do you have Consistency in dividend policy?

) Yes ) No

#### 9. Which of the dividend policies would be effective for the Nepalese companies?

- ) Dividends at current payout level
- ) Dividend at a level lower than present level
- ) Dividends at a level higher than present level

10. Nepalese shareholder is indifferent about whether the company pays or does not pay dividend. Do you agree?

- ) Agree
- ) Moderately Agree
- ) Disagree
- ) Don't Know

# 11. Do you think that company's announcement of earning will help to change market price of share?

J Yes
J No
J To some extent
J Don't know

# 12. Dividend decision is the main effective factor for determining the market price of share. Do you agree?

*AgreeModerate agreeDisagree* 

13. How far do you agree / disagree with the following observation on corporate dividend policy in Nepal? (Please make a tick mark at the appropriate number as per following scheme: A= strongly agree, B=Agree, C=don't know, D= Disagree E= strongly disagree.)

<b>S.</b>	Statement	Α	B	С	D	Ε
No.						
1	Dividend payout affects the price the common					
	stock.					
2	Dividend Payments convey future prospects.					
3	Shareholders in high tax brackets are attracted to					
	low dividends.					
4	A firm should avoid making changes in its					
	dividend rate that might have to be reversed in a					
	year or so.					
5	Reasons for dividend policy changes should be					
	adequately disclosed to Investors.					
6	Shareholders in high tax brackets prefer stock					
	dividends.					
7	If a company provides information on favorable					
	future prospect, it will increase market price of it's					
	share.					
8	Shareholders are indifferent whether company					
	pays dividends or retains earnings.					
9	Company should not pay dividend if profitable					
	investments are on h.					
10	In Nepal, most of the companies do not want to					
	pay dividends.					

# **Respondent Profile:**

S.N.	Question N	0.	No of Respondent	Percentage
1.	1-	a.	14	35%
		b.	14	35%
		c.	12	30%
2.	2-	a.	28	70%
		b.	12	30%
		c.	-	0%
3.	3-	a.	14	35%
		b.	2	5%
		c.	16	40%
		d.	8	20%
		e.	-	0%
4.	4-	a.	32	80%
		b.	8	20%
		C.	-	0%
		d.	-	0%
5	5	9	18	15%
5.	5-	a. b	10	45%
		0. C	12	25%
		C.	10	2570
6.	6-	a.	2	5%
0.	Ũ	b.	6	15%
		с.	18	45%
		d.	12	30%
		e.	2	5%
		f.	-	0%
		g.	-	0%
7.	7-	a.	40	100%
		b.	-	0%
_	_			
8.	8-	a.	10	25%
		b.	30	75%
0	0			150/
9.	9-	а. ь	0	13%
		0.	8	20%
		ι.	20	0,5 %
10.	10-	a.	4	10%
101	10	b.	18	45%
		c.	12	30%
		d.	6	15%
11.	11-	a.	20	50%
		b.	6	15%
		c.	8	20%
		d.	6	15%
12	12-	a.	2	5%
		b.	14	35%
		c.	24	60%