

# CHAPTER-I

## INTRODUCTION

### 1.1 Background of study:-

Financial Management is the major parameter that determines the workability of any firm. Likewise working capital management is an important factor within financial management. Any company or factory needs to purchase fixed assets and current assets, on the other hand, it also have to pay various liabilities or expenses during its various transitional activities . In those activities, company uses certain amount of their capital in fined assets, termed as long-term capital certain amount in current assets liabilities, which is known as working capital management deals with the current assets and liabilities of a firm. As working capital is involved in every day-to-day activities of a firm; So WCM plays a vital role in the operation of the firm.

Proper financial management is an essential thing for every private firm from the view of achieving its objectives. In this respect, management of working capital is a part of decision-making process of business organization. In manufacturing firm the role of working capital is more important than service oriented type business firm.

The study of working capital management in any firm is very important mainly for these for reasons. Firstly, business firm must determine the adequacy of investment in current assets; otherwise it would seriously erode their liquidity base. Secondly, they must select the types of current assets suitable for investment so, as to raise their operational efficiency. Thirdly they are required to ascertain to turnover the current working capital. It is the sign of poor management assets that greatly determine the profitability of business firm and lastly. They must find out the appropriate

source, they must find out the appropriate source of funds to finance current assets.

Role of working capital is more in manufacturing type of industries because they must have capacity to grant credit to its customers. Adequacy of working capital in a manufacturing business is the most for maintaining solvency and continuing the business, particularly in era of cutthroat competition. If the firm has adequate working capital it would better terms on goods purchased, cash discount loan and reasonable rate of return. It creates feeling of securities and confidence due to adequacy of working capital, quick and steady return to the investors would be possible and also raise moral of the management. During the period of depression, more amounts would be locked up in the inventories and bare debits. During such period, if the working capital is not sound it may cause the firm to come to grief.

Again manufacturing business firm should not have the excess and it destroys the control of turnover, commonly used in conducting an efficient business. Both excessive and inadequate investment in working capital is dangerous to the firm.

Thus, in fact business concern should, try to maintain sound, proper and adequate amount of working capital so that total cost of the investment becomes minimum and the operational activities are performed regularly without any disturbances.

There is a controversy regarding the meaning of working capital because many writers define it in different ways mostly there are two schools of thought or concepts regarding the meaning of working capital. According to one school of thought, working capital is meant for the current assets only. It is concerned nothing on liabilities side. According to other

school of thought working capital is the excess of current liabilities. The former are is the gross concept and later one is net concept.

The gross working capital makes the implied meaning of working capital or current assets only. It is also called circulating capital. "It is equal to total sum of current assets only and it may represent both owned capital as well as loan capital assets used for current financing assets." (*Sherkelar:1982:878*)

Current assets are those assets, which can be converted into cash within an accounting cycle that is usually a period of one year. Current assets include cash, note receivable, marketable securities & other assets include cash notes receivable securities & other assets of quick & liquid nature, account receivable & inventory. Authors who support the gross concept argue that real working capital of business enterprises entirely depends on current assets. So, working capital is a total current asset only. "working capital is defied as all the short term assets used in daily operations. they consist primarily of cash, marketable securities, account receivable & investments" (Hambton, Dangol:2060:774)

The form net working capital can be defined in two ways: (I) the most common definition of net working capital is the difference between current assets & current liabilities, ( II) The alternative definition of net working capital is that "the portion of firm current assets, which is financed with long-term fund". It is a more important to the investors and lenders. (*Gitman:1976:150*)

The net working capital being the difference between current assts and current liabilities indicates the liquidity position and suggest the extent to which working capital needs may be financed by the permanent source of fund. Business enterprises must possess sufficient current assets to pay

current liabilities and maturing obligation within the operating cycle because cash outflows and inflows do not coincide. (*Pandey:1995:5*)

In other words, it is the non-synchronous nature of cash flows that makes net working capital necessary. Which inadequate investment in working capital threatens solvency of firm and excessive investment affects enterprises profitability, as idle investment yield nothing.

Due to the lack of basic knowledge of working capital most of the business enterprises in Nepal are unable to maintain the best level of working capital. Deficiency of knowledge about working capital concept has often brought a lot of liquidity crises, which should have been avoided in the presence of knowledge among enterprises manager.

In literature, Industry means “The production of goods from raw material especially in factories.” Hence industry refers to the people & activities involved in producing a particular thing or in producing a particular service in a small or large scale by the use of skill & other means. In other words an industry is a group of business that make or sell similar products or perform similar services. Farms are part of agricultural industries, factories are part of manufacturing industry. Schools are part of educational service industry. Industries are important to every country’s economy.

The first Human industry was agriculture. Most developing countries still depend on agriculture as main industry. Another early industry was mining or the removal of metals & other materials from the earth. Since prehistoric times, humans have mined metals to make tools other goods.

Until about 200 years ago people made most goods either at home or in small workshops. They made products one at a time, by hand. During the 1800s the industrial revolution changed. How goods were made.

In the revolution Tory period great changes took place in the way farming was practiced & the way products were made. These changes were called the industrial revolution. The industrial revolution began in England & spread to all parts of the world. It greatly affected the way people lived as well as the way they worked.

Before the industrial revolution, people made products by hand. Making cloth that was widely practiced that time was a slow process. After wool was gathered it had to be spun into yarn & then woven into fabric by hand.

The industrial revolution began in the textile industry. A tool called the flying shuttle was invented in 1733. It made weaving easier & cheaper. As a result, the demand for cotton yarn increased. It allowed workers to spin yarn much faster than they could by hand other inventions followed, in all kinds of areas farmers for instance began using machinery to plow fields & plant crops.

The development of the steam-powered engine also changed the nature of work. The first steam engines, early in the 1700s, were used mainly for pumping water out of mines. In 1782 James Watt invented a steam engine that could run factory machines. After this, the use of machines increased greatly. Coal was needed to power the steam engines & iron was needed to make the steam engines. The coal & iron industries therefore became the most important of Great Britain.

Now in this modern era, industries became widely popular & whole world is industrialized today most of the developed countries made industries as the ladder to development & natural resources are dwelt used to enhance the national economy. As industry requires raw materials skilled manpower,

labors, capital modern & sophisticated machines, transport, communication of good market. Raw materials are the major prerequisites for any industry. Raw materials means the goods produced from agriculture, found in nature or obtained by mining which are changed into a new ones these by increasing the value of the products during the industrial processes. Many of the industrial activities triggered on the forest products as raw material. While other development on agriculture & mining. Industrial development paves the path of development of other activities. For example industry provides agricultural tools, fertilizers & so on for farming forestry, fishing etc.

Chemical industry is entirely based on minerals products. So mining is the basis of modern manufacturing technology. Nepal is mountainous developing & economically weak country. So various tremendous reasons handicap the country leading to low production & roll down towards the least developed countries list in the world. This miserable condition of the country can only be improved if the present structure of the economy with predominated dependence on traditional agriculture can be gradually transformed through the process of industrialization.

But industries are being developed at a snail's pace in Nepal. Even the traditional small & cottage industries have not achieved much progress. Due to lack of infrastructure, raw materials & others services industries have not been developed at the desired pace. The so-called well established industries of our country are not developed enough to compete with foreign industries. Lack of essential prerequisites like capital, infrastructure technological knowledge, market, banking institution, favorable industrial policy, unskilled manpower, frequent political changes, unstable & unplanned govt. activities topography of land etc. as well as lack of facilities of communication & transportation are the factors that have hampered

industrial growth. At percent, the industrial sector contributes only 10-12% to the GDP.

Government of Nepal has given due emphasis on the industrial sector. The economic survey report ( 1990-91) states that the emphasis on industrialization for the creation of enough job opportunities for the people & for raising their economic levels through a sizable increase in GDP is quite relevant at a time, when the growth of population of the country is pushing the rural economy down to the subsistence level.

## **1.2 Statement of the problem:-**

Udayapur Cement Udhyog Limited (UCUL) is situated in eastern part of Nepal within the premises of udayapur district. It was established in 31<sup>st</sup> jetha 2044 after the feasibility study in 2035 by Japan international co-operation Agency (JAJCA). Japanese established it with the financial aid. Government and was constructed by Tomen co-operation & Hijama limited of Japan itself. Onoda Engineering company of Japan did supervision on construction & management. Total cost for establishing the industry was about Rs.6 Arabs, 20 corers. After the complete establishment of the industry, it was handed to Govt.of Nepal on 27<sup>th</sup> poush 2049; with the daily production capacity of 840 metric tons.

In its decade long service to the nation, nearly 4000 peoples are directly benefited through 800 workers & nearly ten thousands are indirectly depended upon this industry. But due weak management, lake of proper law, corruptions, political influence & un managed burocracy industry is able to utilize only about 40% of it potentiality till now. Meanwhile similar industry constructed by same Japanese company in Indonesia is utilizing 90% of its capacity. Looking towards the economic aid by the industry to Nepal, it has paid the amount of Rs.58 corer & 90 lakh as tax & Rs.62 corer as electricity

costs. As for raw material the industry uses lime stone. Form Sidhali (Udayapur), which is carried by ropeway. Similarly clay is brought from nearby hills within the district. By in fractures, this industry is only able to contribute about 10-15% of total nations Cementic demands, next 15-20% are contributed by other industries within Nepal & rest are imported from abroad.

### **1.3 Significance of study:-**

For the smooth operation of the firm in the short-run as well as long run sound working capital management is a prerequisite factor. Analysis of different components of current assets as well as current liabilities are important for the evaluation for working capital management of any firm. Working capital is a circulating capital, which is compared as lifeblood of the human being. It is very essential for any manufacturing & non-manufacturing organization because without investment in working capital production cycle is not possible. In the absence of production there is no question of distribution, marketing & profit.

Working capital is the size of investment in each type of current assets. Each of these current assets should be managed efficiently & effectively. It is because decision regarding working capital not only affects profitability of the firm in the short-run but also affects the survival in the long run.

The need of study is to find out Udayapur cement factory internal position of working capital under financial problem as well as to give an opportunity or correcting its shout-comings, so our study always focuses to analyze the situation of working capital management & give suitable suggestion to earn maximum profit. So this study is very useful for the industry, owner, employee & consumers who use the product of UCF.



#### **1.4 Objective of the study:-**

The main objective of this study is to examine of the management of working capital in UCF. The specified objectives of this are as follow:-

- 1) To know the working capital management of Udayapur cement factory.
- 2) To find out the net working capital of Udayapur cement factory.
- 3) To show the liquidity position of factory.
- 4) To analyze the current assets & current liabilities of the factory.
- 5) To show the condition of working capital of Udayapur cement factory.
- 6) To suggest & recommend.

#### **1.5 Limitation of study:-**

- 1)Due to less time & cost research is limit with in the working capital of Udayapur Cement factory.
- 2)To analyze 365 days are taken as a year. Which gives the result different form the one of taking 360 days as a year.
- 3)The study is based on only five years accounting statement form the F/Y 2061/2062 to 2056/2066.
- 4)Although government rules & regulations technological aspect of the industry also affect the financial position of the industry, this study is not concentrates in the government rules & regulations & technical aspects.
- 5) The study is focused on balance sheet & profit & account maintain by the Udhyog only.

#### **1.6 Organization of the study:-**

This study has been divided into five chapters they are:

- 1) Introduction by using different financial as well as statistical tools. i.e. ratio analysis fund flow analysis, trend analysis, correlation co-efficient etc & presented the results relating to the study.
- 2) Review of literature.

- 3) Research methodology
- 4) Presentation & Analysis of data
- 5) Summary, Conclusion & Recommendation

The introduction chapter covers introduction, background of study, statement of problem, significance of study, objective of study, Research methodology, limitation of study & organization of the study.

The second chapter focuses on review of literature. It contains the conceptual framework & research literature on working capital management of various books & research works.

The third chapter deals with the research methodology to be adopted for study consisting research design, source of data, data processing procedure tools & technique of analysis & period covered. The fourth chapter deals with presentation analysis & interpretation of data. The last chapter covers summary conclusions & recommendation.

### **1.7 Key terms used in this study :-**

**Current assets:-** Current assets include cash & those assets, which can be converted into cash within a year, such as marketable securities, debtors & stock, prepaid expenses should also be included in current assets.

**Current liabilities:-** Liabilities, which are to be repaid within one year of the date of balance sheet are known as current liabilities. It represents the obligation of the business & arises in the ordinary course of operating business. Sundry creditors, bills payable, bank overdraft, accrued expenses, received in advance, cash credit etc are example of current liabilities.

**Net working capital:-** Net working capital refers to the company's surplus balance of current assets over current liabilities.

**Working capital:-** The term working capital here refers to the gross

working capital. It includes the total volume of current assets.

**Fixed assets:-** they are infrastructure assets & are not intended for resale in the normal course of business. These assets provide benefit over a long period of time to the organization. Fixed assets are those physical assets that they will be used, rather than sold. Examples of fixed assets are land & plant, building & equipment, furniture & fixtures, loose tools, vehicles etc.

**Total assets:-** It is the total sum of current & fixed assets.

**Inventory:-** It includes the inventory of raw materials, chemicals & finished goods inventory.

**Receivables:-** It includes the sales debtors & other debtors only.

**Cash & Bank balance:-** It includes cash in hand & cash at bank.

**Quick assets:-** It is a part of current assets, which are considered as highly liquid. We have to reduce the prepaid expenses & inventories from total current assets to find out quick assets.

**Flt:-** It is the period of 12 months from 1<sup>st</sup> Shrawan to 31<sup>st</sup> Ashad.

**Total fund:-** It implies the total of long-term debt as well as short-term debt.

## **CHAPTER II**

### **REVIEW OF LITERATURE**

**INTRODUCTION:-** This chapter highlights upon the literature that is available in this particular topic. This chapter is divided into two parts :first part deals with the conceptual framework & second part deals with relating of some available literature including review of books, articles & Thesis.

#### **2.1 CONCEPTUAL FRAMEWORK:-**

##### **2.1.1 Meaning of factory :-**

It is difficult to give accurate & concise definition of industry. It is so because a modern industry renders various functions. It is difficult to include all these functions in a single & concise definition. Even though, factory refers to the people & activities involved in producing a particular thing or in producing a particular service in a small or large scale by the use of skill.

An factory is a group of business that makes or sells similar products or performs similar services. Forms are part of agricultural industries, factories are part of manufacturing industry, & schools are part of educational service factory. Factories are important to every countries economy.

##### **2.1.2 Concept of working capital:-**

The term working capital management is closely related with short-term finance & it is concerned with collection & allocation of the resources. “Working capital management is related to the problem that arise in attempting to manage the current assets. The current liabilities & the interrelationships that exit between them . (*Smith:1974:5* )

Mostly there are two schools of thoughts or concepts regarding the meaning of working capital. According to one school of thought, working

capital is meant for the current assets only. It is concerned nothing with the liabilities side. According to other school of thoughts working capital is the excess of current assets over current liabilities. The former concept which can be termed as gross concept, is important to newly established companies where liabilities have not been acquired immediately, but the later one which can be termed as net concept, is important for both newly established & operating concerns where some amount of current liabilities has been maintained for payment of different creditors, income taxes, bill payable, secured & unsecured loans etc. The term current assets refers to those assets, which is the ordinary course of business can be or will be turned into cash within one year without undergoing a diminishing in value & without disrupting the operations of the firm such as cash, marketable securities, account receivables & inventory etc. Current liabilities are those liabilities, which are intended at their inception to be paid in the ordinary course of business such as accounts payable, bank overdraft & outstanding expenses etc. (*Khan & Jain:1992:2*)

#### **2.1.2.1 Gross concept:-**

Working capital in gross concept means the total sum of current assets only. Distinguished authorities like mean, baker, Millod, Filed & Adam smith, supported the view. Adam smith called 'circulating capital' for 'Current assets'. Use if these terms emphasizes on the short-term cash cycle of the firm. The short-term cash cycle refer t the recurring transactions from cash to inventory, inventory to receivables to cash again.

The use of term circulating capital instead of working capital indicates that its flow is circular in nature. At the beginning of the business venture, cash is provided by owners & lenders. A part of this cash is invested in tools, machinery, furniture, equipment, building & other forms of fined assets

which are not be sold throughout the year during the normal course of business. The remaining cash is used as working capital to meet the current requirement of a business enterprise, such as purchase of services, raw material or merchandise. When a firm's products or finished goods are sold. It has what is known as cash or receivable for the planning of services & the purchase of raw materials or merchandise. This, flow of cash into production, credit sales. Collection & then back into inventories production & so on illustrate the circular flow working capital.

In the word of Adam Smith, "The goods of the merchant yield him to revenue in profit till the sells them from money & a money yields him a little till it is again exchanged for goods. His capital is continuously going from him in another & it 's only by means of such circulations or successive exchange that can yield very him any profit; such capital therefore, may properly be called circulating capital. It may represent both owned capital as well as loan capital assets used for financing the current assets. B.S. Pradhan & K.D. Koirala express their view about gross concept of working capital as "if all the expenses needed to run the day to day operation of business such as amount to be invested in the form of cash, finished goods , receivables etc are put together, it is called working capital. This working capital & total current assets are synonymous. (*Smith:1937:262-28*) (*Pradhan & Koirala:1986:32*)

#### **2.1.2.2 Net concept :-**

Gross concept of working capital, in one, is a narrow concept of working capital as it includes the temporary assets side only. But a business concept needs not only current assets. Sufficient procurement of funds in business cannot be made without having current liabilities. Current assets & current liabilities both play a vital role in operation of cycle of business. So,

all the current liabilities must be considered rather than current assets alone. Since, working capital is current assets; it includes those entire assets which in the normal course of business return to the firm, as cash within short period of time. Ordinary investments, which may be readily converted into cash upon need, are also current assets. The short-term or the current liabilities on the left hand side of balance sheet are closely related & included those debts that mature within a year. If public enterprise fails to consider current liabilities, the management of working capital gives misleading results. Again the true financial position of public enterprise is not revealed if they rely on this concept.

The separation between current assets & fixed assets is not always easy to demarcate because fixed may be current & vice-versa. (*Shrestha:1982:1-4*)

The term working capital in net concept is excess current assets over current liabilities. In other words, it means the difference between the current assets & current liabilities. The view of net working capital is supported by distinguished authorities like Lincoln, Davis, Steowen & Saliers. I. G. Gitman has defined net working capital as that portion of firm's current assets which is financed with long-term fund.

The concept of net working capital considers both current assets & current liabilities. As against the current assets the company in turn has current liabilities like credit facilities through its accounts payable or sundry creditors. In addition, it makes use of deposits received from customer's against supplies to be made & also makes provision for payment of dividends, interest & taxes. If from the current assets. The current liabilities are deducted, the resultant is the net working capital deployed by the company. The excess of the current assets over the current liabilities means

employment of owner's interest, which is called capital on it . The concept of net working capital helps the management to look forward to the concept of net working capital helps the management to look forward to the payment sources for its financing. Since working capital under this approach does not increase in short-term borrowings. The increase in short-term borrowings leads to the increase in short-term assets of the same value by short-term investments, or decrease the amount of excess current assets over current liabilities & if there remains any amount that might be the part of owner's interest.

It is commonly used by accountants to designate the excess of the current assets over the current liabilities theoretically that amount of all the liabilities, which are paid as expressed by American institute of certified public accountants U.S.A. working capital sometimes called net working capital is represented by the excess of current assets over current liabilities & identifies the relatively liquid position of total enterprise capital, which constitutes a margin buffers for maturing obligations within the ordinary operation cycle of business. Net position of the business & shows the ability to pay its creditors.

When the term is used as a synonym of current assets, it becomes necessary to find out another term to describe the excess of current assets over current liabilities. Those who used the term in this matter called this excess the net working capital.

According to I. M. Pandey, net concept of working capital may be positive or negative,. A positive net working capital will be raised when current assets are in excess of current liabilities.

Thus, there are two concepts of working capitals: gross & net concept. However, the concept of working capital is related not only with gross & net



concepts of working capital but also with organizations borrowings. The management of any organization has to pay attention towards the total amount of both current assets as well as borrowings and along with this, the management has to check whether profit-earning capacity of the organization is favorable or not because not because it is higher than the cost of borrowing. In cooperation or in any types of firms the financial manager should pay attention to the aspects of profitability. He should also aim to ensure the liquidity of the firm. Any established business is a constant debtor. It borrows form financial institutions. It purchases merchandise on credit and it has tan obligations to the government or the concerned authorities. Thus, in every step of business or cooperation activities, there is an obligation of creditors. So, to satisfy these creditors, the firm must have that much of liquid cash for making payment of all these obligations in time.

Determining the appropriate liquidity structure of assets & liabilities involves fundamental decisions with respect to the firm's liquidity & maturity, composition of its debt. In turn a trade off between profitability & risk influences these decisions. (*J.C. Financial Management & Policy:1974:10* )

Net profit made by the company would be a source of the increase in the working capital of the company. If not used, for operating losses of the previous year, payment of cash, dividends & repayments of long-term debt. Or purchase of fixed assets. Again, the net profit may be used in creating funds or in making additions to the created funds. But reserve funds invested in outside securities, which cannot be marketed in the time of needs, would not increase the working capital of the company. It should be noted that the accretions made to funds and reserve funds not invested in outside securities, increase the working capital of the company.

Thus, both concepts of net & gross working capital are necessary for the business finance. Both current assets & current liabilities are two main parts of management of working capital. (*Agrawa:1972:805*)

Further the management of working capital can not be expected without considering the liquidity & profitability position of the firm. It is clear that working capital of any cooperation & firm must be equally considered along with the current assets, current liabilities as well as profitability risk & earnings of the firm to regulate day to day transaction of the firm. Lastly, we can say that, in working capital management we manage the financial resources needed by a firm & use it in a most profitable field without keeping any idle fund as far as possible.

### **2.1.3 Need of working capital:-**

Efficient management of working capital is an integral part of overall financial management & has a bearing on the objective of the maximization of the owner's wealth. Sufficient profit is needed to achieve this objective. Profit position of the firm depends upon the amount of sales. In other words a good sales program is needed to gain sufficient profit. But the amount of sales shown in the book cannot reflect the real income. Some time lag between sales and cash realization is needed. As the operation cycle in this period cannot be stopped, some amount of liquid assets is called working capital. Indeed the concept of working capital ( gross and net ) are exclusive, rather they are equally significant from the management point of view. However the firms need capital for following purpose.

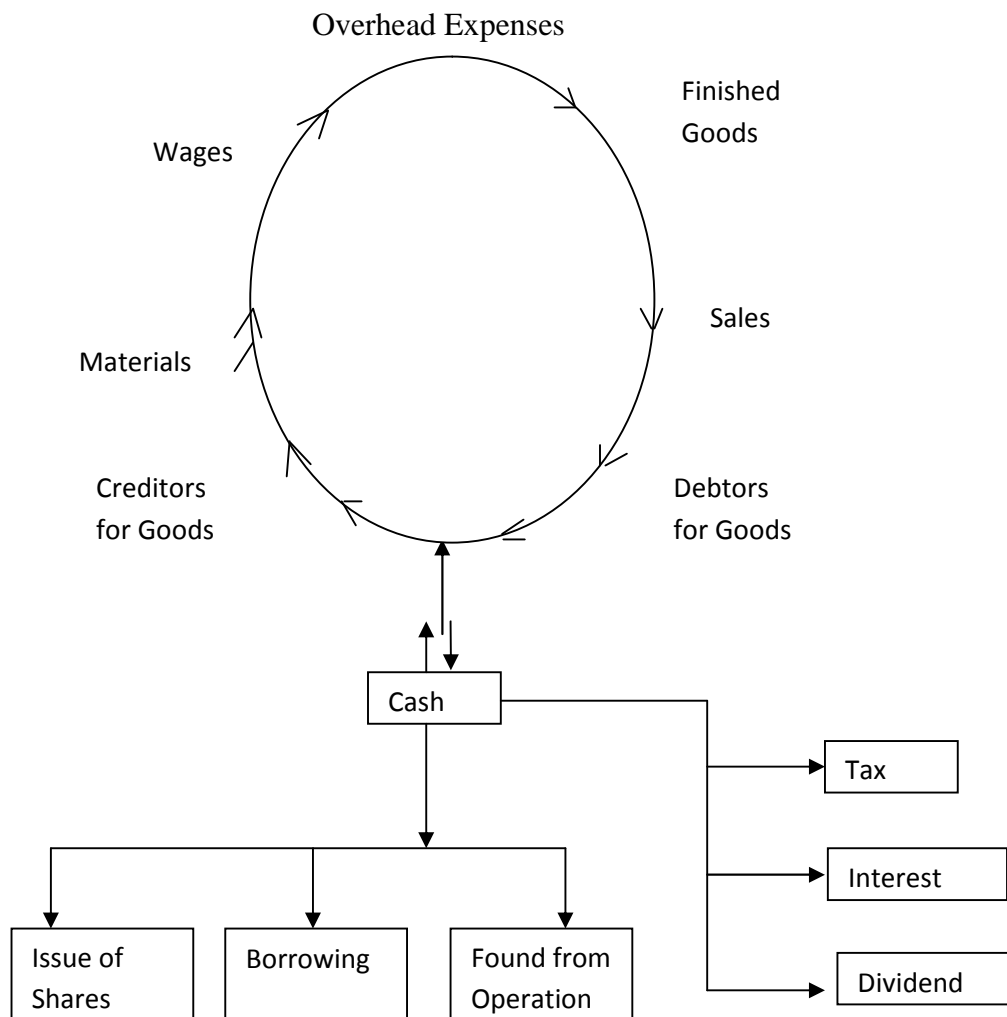
#### **2.1.3.1 Operating cycle of cash :-**

According to O.M. Jeyaraj, the continuing flow of cash to suppliers to inventory, to receivable and back into cash is what is called the operating cycle. The current assets and current liabilities are following round in a

business like an electric current. The working capital plays the same role, in the business as the role of heart in human body. Just as the heart gets blood and circulates the same in the body, the working capital generates funds and those funds are circulating capital and it is circulating in the business just like blood in the human beings. The funds generated from issue of shares, borrowings and from operations are used to pay creditors for materials etc. The materials are processed, wages and overhead expenses are paid. This makes available stock of finished goods. By selling these goods either debtors are created or profit is made and utilized for payment of tax, interest and dividend. This cycle can be diagrammatically presented as follows.

(Agrawal:1981:70 )

### *Circulating System of working capital*



Cash, which is left over after paying tax, interest & dividend is a part of working capital, which is required to finance, current needs of company. If there is no residual cash, the company has to depend on the debtors & cannot fulfill the needs of cash until realization of debts. The prosperity & survival of a concern depend mainly on the working capital. In the words of N. K. Kurshekher, in the technical process of estimating the worth of working capital, the planner must study the different operational needs of the project. He should come parallel to the spin of time consumed by circulating process of working capital cycle. The cycle begins from conservation into finished goods & moving towards sales & feeding back to the fund. But the non-manufacturing firm will not have such operating cycle.

The operating cycle, which is a continuous process, is as shown in figure.

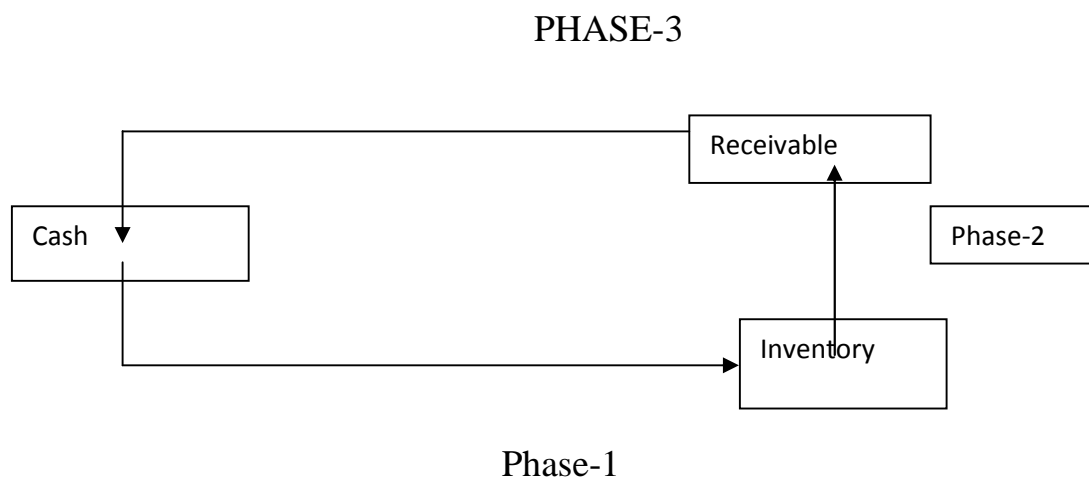


Fig. 2 Operating Cycle

The operating cycle consists of the three phases:- In phase 1, cash converted into inventory. This would include purchase of raw materials, conservation of raw materials into work in progress, finished goods & terminate in the transfer of goods to stock out the end of the manufacturing process. In phase-2 of the cycle, the inventory is converted into receivables

as credit sales are made to customers. Firms, which do not sell on credit will obviously not have phase 2 of the operating cycle. In phase 3, the receivables are collected. This phase completes operating cycle. Thus, the firm moved from cash to inventory to receivable & to cash again.

This cycle, will of course, is totally absent in the case of service-oriented organization. They may not have any type of inventory at all.

R.S. Shrestha & K.D. Koirala also viewed operating cycle as business starts with cash, which is converted into inventory after some time. Inventory may be inventory of raw material, semi-finished goods & finished goods, The inventory is then converted into receivables & receivables into cash again. Thus, the cycle becomes complete. This kind of cycle keeps on operating in the business. The length of the cycle differs depending upon nature of the business. (*Shrestha, Koirala:1975:10*)

Since cash inflows & cash outflows do not match, firms have to necessarily keep cash or invest in short-term or liquid securities, so that they will be in a position to meet obligation when they become due. Similarly, firms must have adequate inventory to guard against the possibility of not being able to meet a demand for their product. Adequate inventory, therefore, provides a caution against being out of stock. If firms have to be completed, they must sell goods to their customers in receivable base. It is in these ways that an adequate level of working capital is absolutely necessary for smooth sales activity which in turn enhance the owner's wealth. (*Khan & Jain:1992:2*)

### **2.1.3.2 Permanent & Temporary working capital:-**

However the operating cycle is the continuous process over the business life. The need of working capital is also continuous. So the minimum level of working capital is needed to continue the business

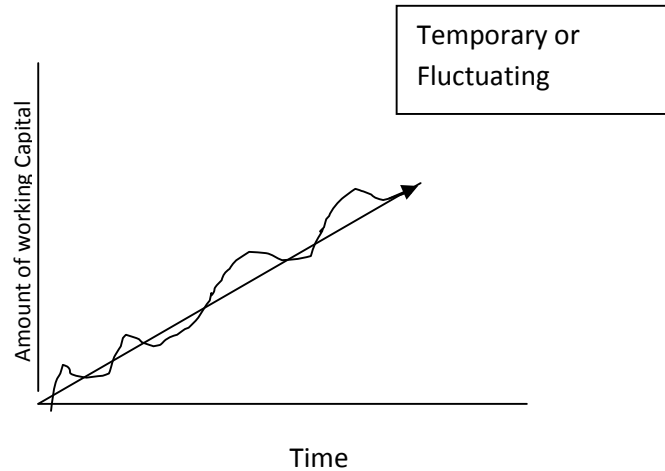
operation without interruption. This minimum level of working capital plays a role as other type of fixed assets in the business & is regarded as a permanent working capital.

As expressed by Stephen H.D. Chorle, “It is difficult to business & what amount not often a normal minimum level of operations is identifiable for a firm & the difference between minimum normal current assets & minimum normal current liabilities is known as permanent sources of capital.

Depending upon the changes in production & sale volume, the need for working capital over & above the permanent working capital is temporary, fluctuating or variable. Working capital for example, extra inventory of finished goods will have to be maintained to support the peak period of sales & investments in receivable may also increase during such period on the other hand, investments in raw materials, working process & finished goods will fall if the market is stock. The extra working capital needed is called the fluctuating or variable or temporary working capital.

To run the business operation smoothly both types of working capital are needed. Permanent working capitals are needed. Permanent working capital facilitates regular production & sales & temporary working capital fulfill the temporary requirement of funds for liquidity, which will increase or decrease depending upon the volume of business operation.

The working capital in any type of business will never fall into zero. Again, it does not require the same amount for every reason. The need of working capital in the business can be shown in the following figure



### **Temporary & Permanent working capital**

The need of the same amount of permanent working capital in business may not occur. In other words, the level of permanent working capital in starting of business will differ in succeeding years along with the rising level of business activities. So the level of permanent working capital will be constant only for a period. After that period, it will increase & will be constant for some another period & so on. Further, as shown in the figure temporary working capital is fluctuating, i.e. some times it is increasing & sometimes it is decreasing in accordance with seasonal demand. A change in the amount of working capital is possible when there is a change in the level of sales or operating expenses business policy & technology.

The additional working capital may also be required on account of certain abnormal conditions. For example, the anticipated rise in the price level may induce the industrialists to increase their stock position of raw material as well as finished goods remains in stock in account of crash in the prices. Additional doses of working capital may be administered to face cut throat competition. The organization of special campaigns for increasing sales through advertisement or other sales promoting activities, for

conducting research & experiment & for execution of special cutting research and government may have to be fence by additional working capital.

So every company has variable and fixed working capital. On the one hand permanent working capital is needed for day- to -day or normal operation of business and on the other hand temporary working capital is needed for meeting the seasonal demand or abnormal condition of business operation.

Except the above-mentioned reasons for holding working capital, we can show its other importance also. Working capital plays vital role in maintaining reputation of business, etc the importance of working capital is grater in small business where investment in fixed assets is minimum. They must rely heavily on trade credit & short-term bank loans, both of which affect net working capital by increasing current liabilities.

But a company reeds only adequate working capital to maintain sound financial position. It mans that working capital all organization should be neither less nor more men what is required. P. V. Kulkarni has expressed the need of adequate working capital for the following reasons:-

- 1) It protects a business form the adverse effect of shrinkage the value of current assets. When the value if assets decreases, the possibility of the firm's insolvent increases.
- 2) It is possible to pay off all the current obligations promptly & to take advantage of can discounts.
- 3) It ensures, to a grater extent, the maintenance of a company's credit standing & proudest for such emergencies as strike, floods, fires etc.
- 4) It permits the carrying of inventories at a level that would enable a business to serve the needs of its customers satisfactorily.



- 5) It enables a company to extend favorable credit terms to customers.
- 6) It enables a company to operate its business more efficiently because there is no delay in obtaining material etc on credit.
- 7) It enables a business to withstand the period of depression smoothly.
- 8) There may be overrating losses or decreased retained earnings.
- 9) There may be excessive non-operating or extra ordinary losses.
- 10) The management may fail to obtain funds form other sources for the purpose of expansion.
- 11) There may be a unwise dividend policy.
- 12) Current fund may be invested in non-current assets.
- 13) The management may fail to accumulate funds necessary for repaying debentures on maturity.
- 14) There may be increase in the price of material necessitating bigger investment on inventories & fixed assets.

There is a great possibility of the above situation occurring in any type of business only an adequate working capital can help to solve these problems easily. Both excessive capital as well as inadequate working capital is unfavorable for efficient financial management. Excessive working capital means idle funds, which, earn no profit but insure losses. IN such a case, the liquidity of a firm will be higher, but the percentage of profit will be higher, but the percentage of profit will be lower. In the same way excess of working capital not only reduces the profit but also leads to the failure of business. We can indicate the dangers of excessive working capital as follows:-

- 1) A company may keep very big inventories & i.e. up its funds unnecessarily. Thus, it may have more chances of inventory mishandling, waste, theft & losses.

- 2) Tendencies of accumulating inventories to make speculative profit grow. This tends to make dividend policy liberal. But in future when the firm is unable to make speculative profit, it may not be possibility to pursue the liberal dividend policy as before.
- 3) There may be imbalance between liquidity & profitability & at the same time may suffer from low profitability.
- 4) It is an indication of defective credit policy & stock collection period consequently, higher incidence of bad debts may be the result, which adversely affects profits.
- 5) Excessive working capital may be as unfavorable as inadequately of working capital because of the large volume of funds not being used productively.

Above are the main possible problems created by more working capital than needed. Ralph Kennedy & McMullor have observed that the availability of excessive. Working capital may lead to carelessness about the cost & therefore, leads to efficiency of operation. In the same way, there are some possible problems, the inadequate working capital can rise,

- 1) A company may not be able to take advantage of profitable business opportunity. Further operating inefficiencies creep in when it becomes difficult ever to meet day-to-day commitment. It becomes difficult to implement operating plans & achieve the firm's target.
- 2) When a firm is not in position of honor its short-term obligation, it loses its reputation & it unable to avail itself of attractive credit opportunities, cash discount etc.
- 3) Inadequacy of working capital means low liquidity, which may lead to low profitability. In the same way low profitability leads in

the low liquidity. Low liquidity positively threatens the solvency of the business.

- 4) Fixed assets are not efficiently utilized for the lack of working capital funds. Thus, the rate of return on investment slumps.

Thus an efficient management of working capital is necessary for sound financial position of a company. Adequate working capital is first requirement for preserving good trade & bank credit, for meeting all expenses & liabilities promptly & for taking care of emergency & especial needs. On the other hand redundant current funds reduce the return on investment & encourage waste & manipulation. Each dollar should do as much work as possible, but idle & unnecessary dollar's might better be distributed to the owners of the corporation, or be used to reduce debts & save on interest charges. 19

Determination of the adequacy of working capital poses a problem both to the corporate body & to banking sectors. The complicated nature of the problem seems to have been well appreciated by both, & the banking sector provides the working capital needed by the corporation every out of the limited resources at its disposal.20

## **2.2 Review of literature:-**

Related to available literatures are reviewed in this sub chapter various resources works have done in different aspects of working capital of different organization are also reviewed for the purpose of justifying the study.

### **2.2.1 Review of books:-**

For the working capital management, I.M. Pandey has described various aspect of working capital management. He has divided working capital management into five chapters. The first chapter deals with the

concept of the working capital, need for working capital determinants of working capital, dimensions of working capital management, optimum level of current assets & working capital trends in India. In the second chapter he has described the management of cash & marketable securities where he has deals with facts of cash management, motives for holding cash, cash planning, managing the cash flow, determining the optimum cash balance, investment in marketable securities. In the third chapter, he has described the management of receivable, in which he has deals with goals of credit management of optimum credit policy, aspect of credit policy. Credit producers for individual accounts. In the fourth chapter of the inventory management he has described the need to hold inventories, objectives of inventory management, inventory management techniques, selective inventory control technique & financial manager's role in inventory management.

The management needs to determine, the size of working capital as accurately as possible. It should be other neither over neither inverted nor under inverted. There is no precise way to determine the exact amount of current assets for any firm. For that, the data & the problems of each company should be analyzed. There is no specific rule to finance the current assets keeping in the view the constraints of the individual company; a proper mix of long-term & short-term source of the finance should be inverted in current assets.

For an organization, therefore, is necessary to pay proper intention to the relevant factors, which generally influences he working capital requirement of the firm. Such determinants of working capital differ form one enterprise to another some of the most Common & important determinants are;

- 1 Nature & size of the business.
- 2 Sales & demand condition
- 3 Technology & manufacturing policy
- 4 Credit policy
- 5 Availability of credit
- 6 Operating efficiency &
- 7 Price level change

A firm, then taking those demands under consideration, should determine optimum size of incensement in each type of current, e.g. Cash receivable & investor. Those factors affect different enterprises differently & also vary form time to time. All factors of separate importance of the factors changes for the firm over time.

A firm can have different levels of current assets to support the same level of output. Its proportion upon the fined assets of the firm indicates the working capital policy of the firm namely conservative & aggressive in two extreme ends. Dividing current assets by fixed assets gives current assets to fixed assets ( CA/FA) ratio. Assuming a constant level of fixed assets, a higher CA/FA ratio means an aggressive current assets policy assuming other factors to be constant. Higher levels of current assets imply greater liquidity & solvency of the firm. There is less risk of technical insolvency, but a considerable amount of funds will be tied up in current assets, which cause to lower profitability , a firm can take an aggressive current assets policy maintaining lower level of current assets, which will lower the solvency of the firm & the level of the risk in the same manner. Thus, the reasonable approach is to balance the cost of maintaining current assets & risk associated in such a way that the trade of between risk & return is minimized.

The well-known professor western & Brigham have given some theoretical insights into working capital management after their various research studies on it. The bond conceptual findings of their study provide should knowledge & guidance for the further study on the field of management of working capital in any enterprise & naturally to this study as well. They explain, in the beginning, the importance of working capital, concept of working capital, financing of working capital, the use of short term versus long-term debts, relationship of current assets to fixed assets. In the next chapter they have dealt with the various components of the working capital & their effective management techniques. The components of working capital they have deal with the cash, marketable, securities, receivables & inventory for the efficient management of the cash, they have explained the different cash management models. They have also explained the major sources & forms of short-term financing such as trade credit, loans form commercial banks & commercial paper. (*Weston & Brigham:1984*)

Van Horne has categorized the various components of working capital i.e. liquidity, receivable inventory current liabilities grouping them according to the way they affect valuation. He has also described the different methods for efficient management of cash the marketable securities. For the management of the receivables, different credit the collection policies have been described & various principles of inventory have been examined for inventory management control.

In the view of N. K. Agrawal working capital management is the effective lifeblood of my business. Hence the management of working capital plays a vital role for

Existing of any public enterprises successful while study it. It is the centers on the routine day-to-day administration of current assets current

liabilities. Therefore, working capital in public enterprises is very important mainly for four reasons. Firstly investment in current assets other wise it could seriously erode their liquidity base. Secondly they must select the type of current assets, suitable for investment so far as to raise their operational efficiency. Thirdly, they are required to ascertain the turnover of current asserts, which determine the profitability of the concerns. Lastly, they must find out the appropriate source of funds of finance the current asserts. Proper management of working capital must ensure, adequate amount of working capital as per need of business firms. It should be in good health & efficiency circulated. To have adequate, healthy & efficient circulation of working capital it is necessary that working capital be properly determined & allocated to its various segments, effectively controlled & regularly reviewed.

Suniti shrestha study on portfolio behavior of commercial banks in Nepal & selected two local commercial banks, three joint venture banks & one development bank as a sample for the study. Some Major findings of her study are as follows:

- 1 Total deposits have been the major sources of fund for all the banks.
- 2 Capital & Reserve funds do not seem to have changed much over the year.
- 3 The user of the fund analysis should that the resource if the commercial banks is allocated in the liquid funds, investment on securities, loans & advances, Bills purchase & discounted.
- 4 Among the portfolio, for Nepalese banks loan & advances share highest volume of the resources & the bills purchased & discounted the least over the year.

- 5 The excess reserves of the commercial banks show unused resource. The cash reserve exceeds much more than the required cash reserve. (*Shrestha:1995*)

Surendra pradhan, in his books basic if Financial management, has shed light on financing of working capital as: There are two ways of financing working capital requirements i.e. internal & external sources. Internal sources include use of retained earnings, depreciation funds & share capital. External sources include trade credit, advance form customers, short-term deposit cash credit, short-term government loan etc. “generally a source or a combination of various sources of financing to be used depends on the type of current assets ( permanent & variable) to be maintained. The long-term sources type of current assets only if the spontaneous type of permanent assets. Types of financing may be distinguished into three groups. (*Pradhan:2000:144*)

- 1) Long-term financing: the sources of long-term financing include long-term debt ( i.e. term loans & bonds)
- 2) Short-term financing: It includes short term bank loan notes payable, line of credit, overdraft, pledging, blanket line etc. Those are obtained for the period less than one year.
- 3) Spontaneous financing: It includes operating sources like trade credits account payable accruals etc.

A company can follow three approaches to the mix of short term & long term source of financing, namely conservative, aggressive & matching approach. If more short-term funds are used in financing fixed & current assets it can be considered as aggressive approach. Conservative approach refers to more use of long-term financing, which is less risky than aggressive approach. Matching approach is to finance variable current assets by short-



term sources & permanent current assets by long-term source. In working capital management an important aspect is matching the type of financing with the type of assets. However, the degree of managerial aggressiveness often guides in choosing a certain combination of short-term & long-term financial for working capital.

### **2.2.2 Review of thesis :**

Gin in this study has attempted to evaluate “ working capital management of Balaju Textile industry Limited”. The major findings of his study are not so significant improvement in working capital during study period. Increased working capital was financed by sales of fixed assets or sources of share capital, long-term financing financed CAs & high level of sluggish inventory’s amount to unnecessary tied-up of funds impairment of profit & increased costs .

He has suggested for efficient working capital management of BTIL. It is better to fix a minimum target rate of return, make regular check to identify both excess and deficit current assets from the appropriate combination of long-term and short-term sources to preserve liquidity and maintain stability, take necessary action for disposing a huge inventory with tied up working capital, involved huge carrying cost risk of losses sick position and work efficiency of corporation should improve .

He has set only three questions to analyze working capital management of BTIL. Which is insufficient. He has used ratio analysis as a research tool. But he has not done analysis to evaluate the relationship of current assets components with total current assets. Similarly, he has set null hypothesis but has not tested it through appropriate tool to find out whether null hypothesis is accepted or rejected. So we can say it is not fully analytical type of research.

Joshi in his study seeks to have true insight into the working capital management in Bhilainagar Jute Mill. The study is concerned with the management of current assets and covers five years period ( 2039/37 to 2040/41). The study has embodied various financial ratios for measuring Biritanagar jute Mill's financial viability. The study is based on secondary data with opinion survey method and limited to gross concept of working capital. The study has indicated the mismanagement of inventory, no proper policy of cash holding and heavy dependence on short-term bank credit. He has recommended for effective working capital management of the mill by planning realistic turnover target specimen, designing effective inventory management program, following productive investments approach preparing effective sales plan and exhaustive market research program, using short-term bank credit up to certain reasonable limit, maintaining optimum cash balance and marketing proper utilization of accumulated collection debts. 32

An analytical study of working capital management in public sector brick factory conducted by Shrestha tried to make a comparative easements of working capital management of public sector brick factories in Nepal. He has analyzed various components of working capital like cash, inventory, receivables & current liabilities. The study is based in two government brick factories, Haridgiddhi & Bhaktapur brick factory. He found that there is no proper relation between liquidity turnover & profitability of two brick factories. There is no combination between fixed capital & working capital . The analysis indicates that the working capital portion is totally neglected. He has suggested using financial tools to forecast the working capital. The factories have to keep the record up to date according to standard format. The management must have to be serious regarding working capital

management.

He study is basically comparative type. He has analyzed various working capital components through ratio analysis to compare between two brick factories. He has not used the hypotheses test to verify the significance of working capital components between two factories.<sup>33</sup>

Keshav Raj Joshi in his thesis entitled a study in the financial performance of the banks. Concludes that the liquidity position of the commercial banks higher than JVBS. Conservative credit policy is followed by commercial banks for assets utilization that's why more investment is done on loans & advances. Assets utilization for the purpose of earning is two third of the total assets. The main source of income for these banks is interest form loans & advances & overall profitability position of NABIL is better than others. (*Joshi:1986* )

Amir Raj Bhandari in his thesis entitled “ working capital Management ( A case study of Nepal Bank Limited), has done research work for ten years period, 2034 to 2043 B.S. He has drawn some major findings from his study were as follows. The bank has heavy liquid assets that reflect the improper utilization of bank fund due to heavy growth in deposit & other borrowed capital, the volume of share capital became insufficient, Rate of return on shareholders investment is considered insufficient, the bank could not utilize its funds & not paid attention to the portfolio management in investment. (*Bhandari:2047*)

The thesis entitled “ An appraisal of financial position of Nepal Bank Limited” by Narendra Bahadur Amatya analyzed, interpret the financial position of the bank from 1980/81 to 1989/90. Main findings of the study are as follow :

- 1 Regarding the liquidity management, the bank is in a better

position but the bank has been following a uniform policy to finance current assets & current liabilities .

- 2 The bank is successful in deposit collection but it has always adopted conservative & traditional credit policy.
- 3 The trade & commerce advances are playing major role in the credit composition of the bank. Although the reserve of the bank is increasing gradually, the reserve plays a nominal role in credit expansion control.
- 4 The major control of the investment of the bank is in HMG's securities and the volume of transaction is high in all respect but the bank does not show higher ratio of profit or it shows a decreasing trend of profit. (*Amatya:1993:24*)

Prem Kumar shrestha in his study a “ Working capital management in Bhrikuti paper Mills Ltd.” Considered the financial statement of this organization for the five fiscal years forms 2044/045 to 2048/049 B.S. He has drawn some conclusions from the study. The major components of the current assets are cash & bank balances, investments of the current assets are cash & bank balances, inventories & receivables. Among them cash & bank balance hold the large portion & has fluctuating trend. Due to the lack of definite credit & collection policy the receivables ate increasing year after year. Various turnovers are decreasing which indicate that current assets are not properly utilized in the mill. The liquidity position of the mill is not bad, it is due to decrease trend of current liabilities. Although, mill is earning profits, its profitability is not encouraging one because its return on total assets is nit high enough. (*Shrestha:1994:58* )

Ramji poudel in his thesis entitled “ A comparative analysis of financial performance between NBL & is NGBL” has drawn some major

findings. Although the liquidity position of NBL is better than NGBL but on the whole the current assets of these banks are and equated to meet the current liabilities. NGBL has better credit position than NBL, in terms of short-term investment. It also found that NBL has better turnover & highly levered than NGBL. Joint-venture banks such as NGBL is fast growing, the overall profitability are higher but government owned commercial banks such as NBL has higher expenditure & the profit making capacity is lower & gradually decreasing. (Poudel:1997:125)

The thesis entitled “ comparative study of working capital management of NBL & NABIL .” by Niraj K.c. aims to examination the management of working capital in NBL & NABIL. The specective objective taken in his studies are:-

- 1 To study the current assets & current liability & their impact & relationship to each other of NBL & NABIL.. To analyze the comparative study of working capital management of NBL & NABIL..
- 2 Recommendation & suggestion for the improvement of working capital management NBL & NABIL in future.

**Study has mentioned the following findings:**

- 1 Interest income of NBL is better than NABIL
- 2 Liquidity management policy of these two banks is significantly different.
- 3 NABIL has the better utilization of deposits in income generating activity than NBL . It also shows that NABIL has better investment efficiency in loan & advances
- 4 Due to more conservative working capital policy risk of insolvency is lesser but cost of fund is higher on NBL then NABIL

- 5 Profitability position of NABIL is far better although NBL earned higher interest than NABIL (*K.C.:2000* )

Dr. Khangendra Acharya had studied the working capital management of manufacturing Public enterprise. Some major outcomes of this this study are mentioned here. (*Acharya:1986*)

1. Inventory constitutes the most important & larger element of working capital in NTDC. The overall adequacy of inventory in NTDC discloses that the growth of working capital & inventory in the corporation are negatively correlated .
2. Receivable are growing rapidly than the corresponding growth on sales volume.
3. The break-even analysis of NTDC reveals that due to insignificant working capital the corporation has been selling its products at a far below rate than its break-even.
4. Monitoring the proper functioning of working capital management has never been in the managerial job in all selected PES, with no exception to NTDC during the study period.
5. NTDC is expected to improve its prevalent system of inventory management regarding the planning & purchasing of spares parts manures, insecticides, fuels etc.
6. There should be a close liaison between the production units of different estates & estates & the central materials management department.
7. The corporation, while collecting the over-due accounts, has not followed the credit policy, which is not clear in it.

Likewise, Mr. Rajib has completed his report on the “ working capital

Management” with special information of bottlers Nepal Limited & concludes that:-

- 1 Due to increment of net working capital the company has no risk than previous year or the company has more liquidity position less likely to technically insolvent.
- 2 Since the conversion cycle comes in negative indicates that payable deferral period is higher than the delaying in receives cash. It means the company doesn't invert working capital it has sufficient cash in hand to operate the company daily needs.
- 3 Due to the increase in total assets & net profit the return on assets is some how smaller that of previous year. So earning capacity of assets is not satisfactory than previous year.
- 4 Current assets turnover ratio represents better efficiency.
- 5 Company quick ratio shows that company is in its standard. It shows company's quick liquidation portions is satisfactory. (*Ghimire:2002* )

### **2.2.3 Review of different studies:-**

Shrestha in his study “ working capital management in public enterprise” states that manager often lacks the basic knowledge of working capital & its overall impact on the operative efficiency & financial viability of public enterprise. The study has been based on sample of ten enterprise i.e. Birgunj sugar Factory, Raghupati Jute mills. Dairy Development Corporation, National trading Ltd, Royal drugs Ltd, National construction company of Nepal, Harisiddhi Brick & Tile Factory, Nepal Cheuri Ghee Industry Ltd & chandesowri textile factory Ltd. The study has pointed at certain policy flows such as deficient financial planning, neglect of working capital management, deviation between liquidity & turnover etc. He has suggested some measures for their effective operation & efficient result. The

problem can be sorted out through identification of needed funds, development of proper management information system, determination of sound combination of short-term sources to finance working capital requirements. (*shrestha:1983:1-4*)

The study is based on ratio analysis. He has selected different types & nature of PEs . That is why with lower turnover has higher liquidity position. The aurora should have selected similar nature of PEs or analysis should have made separately. He has taken only one-year data of the study . But to find the real situation of PEs it should more than five years.

Dr. Radhe Syam Pradhan has published a book on management of working capital in Nepalese PEs . This enterprise of Nepal for the duration of ten years forms 1973 to 1982 A.D. He has aimed to provide useful insight into the existing & forthcoming corporations on working capital behavior. In this study, he has dealt with various issues Viz, type of working capital policy followed by that PEs, liquidity position, structure of working capital & its various components with changes of volume of sales in that PEs. In the study he reveals that most of the selected enterprises achieved a trade off between risks & much of the growth in net working capital at deflated prices has been much lower. The liquidity measure shows a poor liquidity position in majority of MPEs. It has been noticed that the enterprises had excessive net current debts, which could not be paid within a year. (*Pradhan:1986*)

Of the current assets, this is on an average, half of the total assets in PEs. The share inventories is the largest followed by receivables & cash. There had been improvement in utilization of current assets in the majority of PEs. He also noticed that the adjustment speed of actual to desire balance had been observed as highest for cash followed by inventories. However the speed of adjustment was much slower in all these cases. The results were,



therefore, surprising, as the adjustment of even cash holding was not immediate. Further more, the inclusion capacity utilization in the models did not seem to have contributed much to the demand function of working capital & its various components. Thus, capacity utilization as significant variable affecting these demand function was doubtful. This book, thus, provides an extensive & comprehensive survey and the overall liquidity position, working capital policy, working capital utilization & demand functions of current assets.

Pradhan in his study aims at examining the various aspects of management of working capital in selected manufacturing public enterprises of Nepal. The specific objectives undertaken in his study are:-

- 1 To conduct risk return analysis of liquidity of working capital position.
- 2 To assess the short-term financial liquidity position of the enterprises.
- 3 To assess the structure & utilization of working capital and
- 4 To estimate the transaction demand functions of working capital & its various components.
- 5 It has been found that the most of the selected enterprises have been activating a trade off between risk and return thereby following neither aggressive nor a conservative approach.
6. It has showed a poor liquidity position of most of the enterprises. This poor liquidity position has been noticed as the enterprises have either negative cash flour or negative earnings before tax or they have excess net current debts, which cannot be paid with in a year .
- 7 . The Nepalese manufacturing public enterprises have an average, half of the total assets in the form of current assets. Of all the different components of current assets, the share of inventories in total assets

on average, it largest followed by receivables, and cash in most of the selected enterprises.

8. The economic of scale have been highest for inventories followed by cash and gross working capital receivables and net working capital.
9. The regression results also show that the level of working capital and its components and enterprises desires to hold depend not only sales but on holding carts also.

The above review of literatures from various books, journals and articles and thesis related to the working capital management shows that one of the Major problems in Nepalese corporations behind unhealthy and unsound situation is improper management of working capital. Since the success and failure of nay enterprise is heavily depended upon, the efficient management o working capital and being a manufacturing company established in Nepal, the efficiency in the management of working capital should be analyzed. So, this study attempts to analyze the working management in UCEL by taking five years data for observation with the help of methodology as describe in the following chapter.

# CHAPTER III

## Research Methodology

### 3.1 Introduction

A system research study needs to follow a proper methodology to achieve the pre mentioned objectives . research methodology is a sequential procedure & methods to be adopted in a systematic study. (*Kothari:19*)

This chapter describes the methodology employed in this study . The research methodology is the process of arriving to the solution of the problem through planned & systematic dealing with the collection, analysis & interpretation of fact & figure . it consists of research design, population & sample study; source of data; data processing procedure & techniques of analysis of data.

This study is more analytical & empirical . It covers quantitative methodology using financial & statistical tools. The study is mainly based on the data general from the balance sheet & other publications made by the industry.

### 3.2 Research Design :-

Research design is a plan structure & strategy of investigation convinced so as to obtain answer to research question & to control variances. 46 It is highlighted for ascertaining the basic objectives of this study. As already mentioned the main objectives of this study is to evaluate the working capital management of UCF, under which this study attempts to make comparison & to establish relationship between two or more variables so, the research design of this study is based on descriptive & analytical study. (*Kothari:43*)

For the study of working capital management of UCF, financial tools

as well as statistical tools are employed to provide analytical insight & to achieve prescribed result.

### **3.3 Population & sample of the study :-**

The financial statement i.e., Balance sheet & P/ L account of UCF published form establishment to this data are assume as population of the study where as balance sheet & loss account of the study where as balance sheet & profit & loss account of five years from.2061/o62 to 2065/066 is selected as sample of the study. It is quite difficult to adopt the whole population in this study . Thus, five years financial statement is taken from the population for this study as sample . In other words, the sample of the study comprises financial statement from the F/Y 2061/062 to 2065/066 that covers five years of the population.

### **3.4 Nature & source of data :-**

The data used in this study are mainly collected from secondary source although the idea & information's are also collected through personal interview & discussion with the employees with reference to the research designed. The secondary data has been collected from financial statement, reports &officials records of UCF.

### **3.5 Data processing procedure:-**

Methods of analysis are applies as simple as possible the obtained data are presented in various tables, diagrams, and charts with supporting interpretation. Those details calculation that cannot show in the body part of the report are presented in appendices at the end.

### **3.6 Use of analytical tools:-**

On the basis of historical data both finical and statistical tools are used to analyze different variable. A short description of these techniques is

expressed in the following paragraph.

### **3.6.1 Financial tools and techniques used:-**

#### **3.6.1.1 Ratio Analysis:-**

A ratio is a quotient of two mathematical expressions. Establishment of quantitative relation of data furnished by the financial statement is called ratio analysis. In other words a financial ratio is the mathematical expression of the relationship of two accounting figures. It is widely used tools of financial analysis.

Financial ratios are classified into four groups on the basis of utility.

- 1 Liquidity ratio
- 2 Leverage/solvency/capital structure ratio
- 3 Profitability ratio
- 4 Activity or turnover ratio.

All of these ratios, consist of various ratios, which are applicable & suitable in decision-making. The description of these is in next chapter.

### **3.6.2 Statistical tools:-**

In this research study, some statistical tools are used for the analysis. The tools are as follows;

#### **3.6.2.1 Trend analysis:-**

The tools that are used to show the grandly increase or decrease of variables over a period of time is known as trend analysis with the help of trend analysis the tendency of variables over the period of time can be seen clearly. In this research work trend value is calculated treating F.Y 2059/060 as the base year.

#### **3.6.2.2 Arithmetic Mean or Mean ( Average) :-**

Arithmetic mean is the most popular & commonly used statistical average, which represents entire data by single value. Arithmetic mean or

simply mean of a set of observation is the sum of all the observations divided by the number of observations: Its value is obtained by adding together all the items & dividing this total by the number of items. This is calculated as:

The number of observations. Its value is obtained by adding together by adding together all the items & by dividing this total by the number of items. (*Bajaracharya:2053: 101*)

This is calculated as:

$$\bar{x} = \frac{\sum x}{N}$$

Where,

$\bar{x}$  = Mean value of arithmetic mean.

N = Number of observation

$\sum x^2$  = Sum of Observations

### **3.6.2.3 Correlation Analysis:-**

Correlation is statistical tools that we can use to described the degree the which one variable is linearly related to another. "Correlation co-efficient summarizes in one figure, the degree & direction of movement. It only helps in determination the extent to which the two variables are correlated but it does not tell about cause & effect." (*Bajaracharya:2053: 180*)

Among the various methods of finding out coefficient of correlation, Karl person's correlation co-efficient method has been used in this study.

Symbolically, it is calculated as:

$$r = \frac{S_{dx}S_{dy} - \frac{S_{dx}S_{dy}}{N}}{\sqrt{S_{dx}^2 - \frac{(S_{dx})^2}{N}} \sqrt{S_{dy}^2 - \frac{(S_{dy})^2}{N}}}$$

Where,

- X = the first variable
- Y = the second variable
- N = Number of year (observation)
- dx = deviation taken from assumed mean of first variable.
- dy = deviation taken from assumed mean of second variable.

The value of 'r' lies in between -1 & +1. Where r=1, it implies that there is perfect positive correlation between the variables, when r=-1, it signifies that there is perfect negative correlation between the variables and r=0, denotes that there is no correlation at all.

**Probable Error (PE):**

$$PE = 0.6745 \frac{(1-r^2)}{\sqrt{N}}$$

If 'r' is less than its PE then it's PE, it is not at all significant, if 'r' is more than PE, there is correlation. If 'r' is more than 6 times its PE greater than  $\pm 0.5$ , then it is considered significant.

# **CHAPTER IV**

## **PRESENTATION AND ANALYSIS OF DATA**

### **4.1 Introduction:-**

For the achievement of the pre-mentioned objective about the working capital management of Udayapur Cement Udhyog Ltd, this section is standing in this chapter relevant data and information of working capital as well as balance sheet of Udayapur Cement Udhyog Ltd are presented & analyzed accordingly. It covers to analyze the ratio as well as trend & composition of current assets & liabilities, investment in current assets; current assets relationship with fiend assets, liquidity position; relationship between short term & long term financing etc. of the Udhyog. The financial variables are also compared with the help of available statistical tools.

### **4.2 Position of Current Assets:-**

As current assets are the main parts, which are required to run day-to-day business activities & the total of which is known as working capital as per the gross concept, its position has become needful to stay. Most of the business organization required same amount of working capital & its requirement differs according to the size of the organization.

A firm needs cash to purchase raw materials, pay expenses this is because of not prefect matching between cash inflow & outflow. Cash may also be held to meet the future expenses. The storks of raw materials to meet this obligation also cash is needed.

Any business organization aims to maximize return of investment. In order to accomplish this objective, the business organization should earn sufficient return for its operation. Earning a steady amount of profit requires successful sales. So, the firm has to invest enough funds in current assets for



the success of sales. It's the sales do not convert into cash instantly the extra amount of working capital is needed.

The efficient management of current assets is an integral part of overall financial management & has the greater impact on maximization of owner's capital. In this context, it is necessary to have proper analysis for current assets management. The proper analysis of current assets of industrial concern reflects the nature of performance & operation of its management. So, the overall current assets are firstly analyzed.

The following table shows the current assets components of Udayapur Cement Udhyog of the study period.

**Table No-1**  
**Composition of Current Assets**

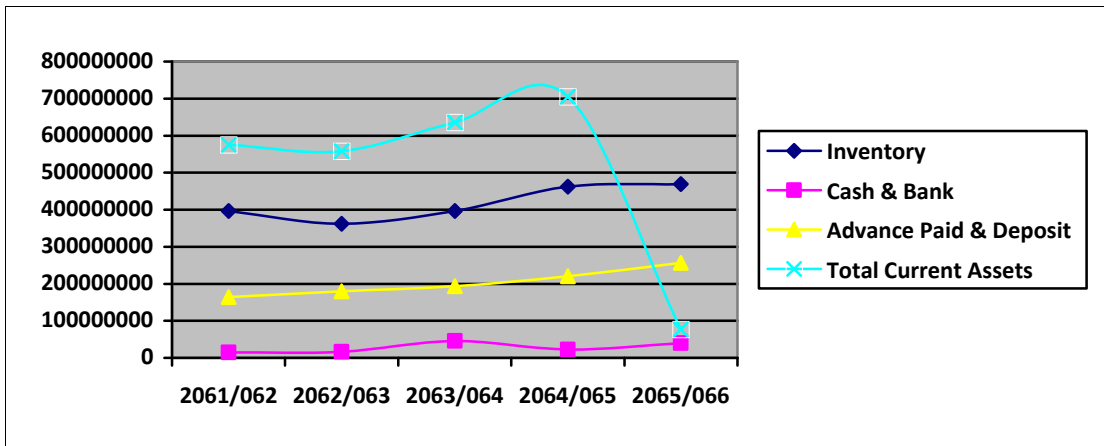
Fiscal Year	2061/062	062/063	063/064	064/065	065/066
Particular					
Inventory	396295521.8	361829425.0	396523328.9	462152291.0	469265206.9
	0	2	4	9	7
	68.90%	64.88%	62.34%	65.59%	61.31%
Cash & Bank	15054909.59	16312202.40	45853821.13	22039692.85	39539197.12
	2.62%	2.92%	7.21%	3.13%	5.17%
Advance paid, Advance Deposit	163844967.1	179583784.0	193692085.9	220395858.1	256605876.4
	8	8	6	2	1
	28.49%	32.20%	30.45%	31.28%	33.53%
Total Current Assets	575195398.5	557725411.5	636069236.9	704587841.9	76541028.50
	7	0		7	
	100%	100%	100%	100%	100%

*Source: Appendix-I*

The above table shows the part of current assets of Udayapur Cement Udhyog Ltd. The current assets contain inventories; cash & bank balance, advance paid, advance & deposit are related to the firm's total current assets.

The composition of current assets if presented graphically by the line chart below:

**Graph No-1**



#### 4.3 Percentage of Current Assets on Total Assets:-

Current assets are normally required to meet working capital, which is used to fulfill the need of daily business requirement. The size of volume of current assets differs as the base of the size as well as the nature of the business. The participation of current assets of total assets its shown in the table given below:

**Table No: 2**  
**Percentage of Current Assets on Total Assets:**

F/Y	Current Assets (CAS)	Total Assets (TAS)	% of CAS on TAS	% Change
2061/062	575195398.57	5207437136	11.05%	0
2062/063	557725411.50	5096526052	10.94%	0.11
2063/064	636069236.03	50869795112	12.51%	1.57
2064/065	704587841.97	5048371611	13.96%	1.45
2065/066	765410280.50	4908189102	15.60%	1.64
Total	3238988168	25347503413	12.78%	0
Average	647797633.7	5069500682.6	12.78%	0

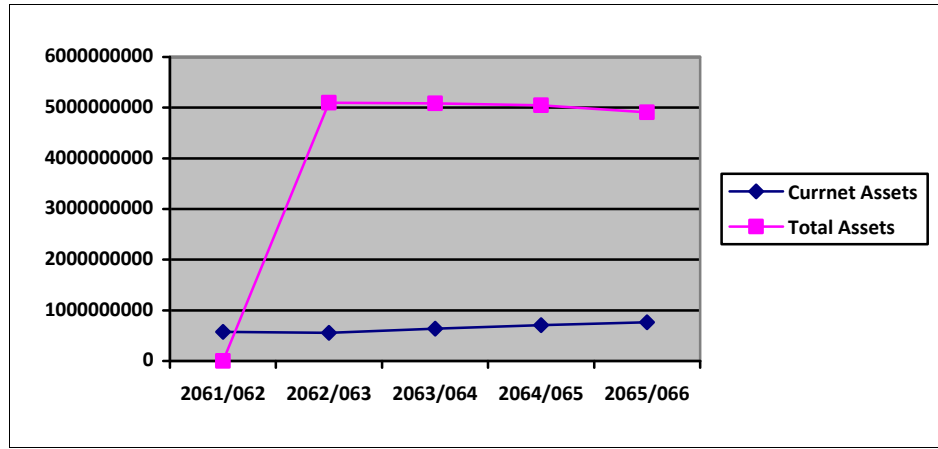
*Source: Appendix-I*

This ratio represents the proportion of current assets investment to total assets investment of Udayapur Cement Udhyog Ltd. for the selected. Five year's period the above table shows that the proportion of current assets of total assets is fluctuating. In F/Y 2061/062 current assets volume is Rs. 575195398.57. This is 11.05% of total assets. In the year 2062/063 it decreases to 10.94%, which is 0.11% less than F/Y 2061/062. The percentage of current assets on total assets in the F/Y 2063/064 is 12.51%, which is 1.57% more than the percentage in the F/Y 2065/066 similarly; it increased by 1.45% & 1.654% in the F/Y 2064/065 & 2065/066 respectively. The percentage of current assets on total assets is highest in F/Y 2065/066 the other. It is due to holding highest amount of inventories, advance & cash.

In an average there are 12.78% of current assets on total assets. Low level of current assets indicates the weak liquidity position of the firm but it lifts up the profitability of the company because there is not my possibility

of the find being idle & earns noting. The graph no. 2 shows the relationship of current assets & portal assets as follow.

**Graph No-2**



In order to test the significance of the relationship between aforesaid two variables during the period of study Karl person's correlation co-efficient (r) is calculated as follow:

**Table No: 3**

**Calculation of Karl Pearson's correlation co-efficient ( r ) :**

F/Y	Current Assets (x)	Total Assets (y)	Deviation taken from assumed mean x-63-61=dx	dx <sup>2</sup>	Deviation taken from assumed mean y-50.48=dy	dy <sup>2</sup>	dx dy
2061/062	57.52	52.10	-6.09	37.09	1.62	2.62	-9.87
2062/063	55.77	50.97	-7.84	61.47	0.49	0.24	-3.48
2063/064	63.61	50.87	0	0	0.39	0.15	0
2064/065	70.46	50.48	6.85	46.92	0	0	0
2065/066	76.54	49.08	12.93	167.18	-1.14	1.96	-18.10
Summation	323.9	253.5	5.85	312.66	1.1	4.97	-31.81

Let, Current assets & total assets denoted by x & y respectively.

N = No. of observation

$$r = \frac{S_{dx}S_{dy} - \frac{S_{dx}S_{dy}}{N}}{\sqrt{S_{dx}^2 - \frac{(S_{dx})^2}{N}} \sqrt{S_{dy}^2 - \frac{(S_{dy})^2}{N}}}$$

$$r = \frac{-31.81 - \frac{5.85 \times 1.1}{5}}{\sqrt{312.66 - \frac{(5.85)^2}{5}} \sqrt{4.97 - \frac{(-1.1)^2}{5}}}$$

$$r = \frac{-33.1}{\sqrt{305.82} \sqrt{4.73}}$$

$$r = \frac{-33.1}{\sqrt{1446.53}} \quad r = \frac{-33.1}{38.03} = -0.87$$

$$r^2 = (-0.87)^2 = 0.78$$

$$PE = 0.6745 - \frac{1-r^2}{\sqrt{N}} = 0.6745 - \frac{1-0.78}{\sqrt{5}} = 0.6745 - \frac{0.22}{5} = 5761$$

From the above calculation total assets & current assets are negatively co-related. The correlation coefficient between current assets & total assets is found to be -0.87. The coefficient of determination is the square of the correlation, coefficient i.e.  $r^2$  which is  $r^2=0.78$  thus we can concluded that the variation in the independent variable current assets explain only 78% of the variation in the total assets. Similarly, the calculated value of r is less than its P.E. so, the relationship between them is considered not significant. Thus, if the company changes the investment on current assets, it not affects the total assets. Which means the total assets not depends on total current assets.

#### 4.4 Proportion of Inventory to Current Assets & Total Assets:-

One of the important parts of the current assets is inventory. For the manufacturing company like Udayapur Cement Udhyog Ltd, inventory of raw materials as well as spare parts are very important. The shortage of required inventor results in irregular production etc. In the other hand, excess inventory cost in inventory management so, level of inventory must be in optimum position so that heather it arises the excess inventory neither problem nor short inventory problem.

**Table No-4**

#### **Proportion of Inventory to Current Assets & Total Assets**

F/Y	Inventory (Inv)	Current Assets (CAs)	Total Assets (TAs)	% of Invento ry on CAs	% of Invento ry y on TAs	% of Chan ge on CAs	% of Chan ge on TAs
2061/0 62	396295521. 80	575195398. 57	520743713 6	68.90	7.61		
2062/0 63	361829425. 02	557725411. 50	509652605 2	64.88	7.10	(4.02)	(0.51)
2063/0 64	396523328. 94	636069236. 03	508697951 2	62.34	7.79	(2.54)	0.69
2064/0 65	462152291. 00	704587841. 97	504837161 1	65.59	9.15	3.25	1.36
2065/0 66	<u>469265206.</u> <u>97</u>	<u>765410280.</u> <u>50</u>	<u>490818910</u> <u>2</u>	<u>61.31</u>	<u>9.56</u>	<u>(4.28)</u>	<u>0.14</u>
Total	208606577 4	323898816 8	253475034 13	64.4	8.23		
Average	417213155	647797633. 7	506950068 2.6	64.4	8.23		

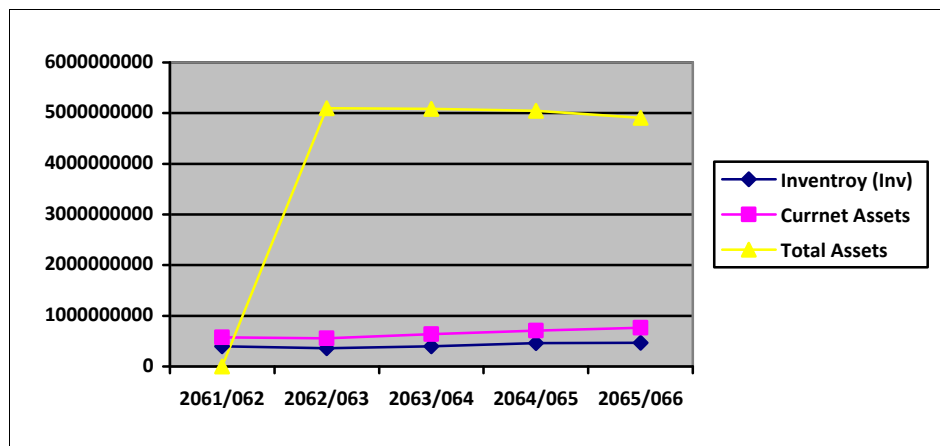
*Source: Appendix-I*

From the above table, it is clear that the investment is in most erratic trend of inventory level to current assets investment during the selected study period.

In the F/Y 2061/062 inventories are 68.90% and 7.61% of current assets & total assets amounting to Rs. 5207437136. It is decreased by 4.02% and total assets. In the F/Y 2063/064 the inventories is decrease in current assets by 2.54% and increase in total assets by 0.69% and again in the following F/Y 1.36% respectively and reached to 65.59% of current assets and 9.15% of total assets. Then in the F/Y 2065/066 inventories increased on current assets by 4.28% and increased on total assets by 0.14%.

The relationship between inventing, current assets & total assets can be clarified by the graphic representation, which is presented below.

Graph No-3  
Relation of inventory to CAS & TAs



The diagram clarifies that the inventory hold by the company is not proportionate to current assets as well as total assets. In the F/Y 2061/062 and Rs. 5207437136 to Rs. 557725411 and Rs. 5096526052 likewise, in F/Y 2062/063 and 2063/064 the investment is crease in current assets as well as

in inventories. But the investment in total assets is decrease in F/Y 2064/065 & 2065/066 to Rs. 508678512, Rs. 5048371611 and Rs. 4908189102 respectively.

Thus, increase or decrease inventory has affected the position of current assets as well as total assets. That means the current assets or total assets depend on the share of inventory on it.

#### **4.5 Proportion of Cash to Current Assets & Total Assets:-**

Cash is one of the raw materials that is essential to operate business. It makes liquidity position of a firm strong. Therefore, cash is the major resource of working capital. It is the most liquid assets. It is needed to pay bills, to purchase raw materials & to pay debts. It plays a vital role to achieve efficient management of working capital in all kinds of organizations whether they are manufacturing or non-manufacturing. Due to this, it must not be underestimated, rather it should be managed properly.

The proportion of cash & bank balance with reference to current assets & total assets are tabulated and calculated below.



Table No-5

## Proportion of Cash to Current Assets &amp; Total Assets

F/Y	Cash	Current Assets (CAs)	Total Assets (TAs)	% of Inventory on CAs	% of Inventory on TAs	% of Change on CAs	% of Change on TAs
2061/062	15054909.59	575195398.57	5207437136	2.62	0.29		
2062/063	16312202.40	557725411.50	5096526052	2.92	0.32	0.33	0.03
2063/064	45853821.13	636069236.03	8086979512	7.21	0.57	4.29	0.25
2064/065	22039692.85	704587841.97	5048371611	3.13	0.44	(4.08)	(0.13)
2065/066	<u>39539197.12</u>	<u>765410280.50</u>	<u>4908189102</u>	<u>5.17</u>	<u>0.81</u>	<u>2.04</u>	<u>0.37</u>
Total	138799823.1	3238988168	25347503413	4.29	0.55	2.55	0.52
Average	27759964.62	647797633.7	5069500682.6	4.29	0.55		

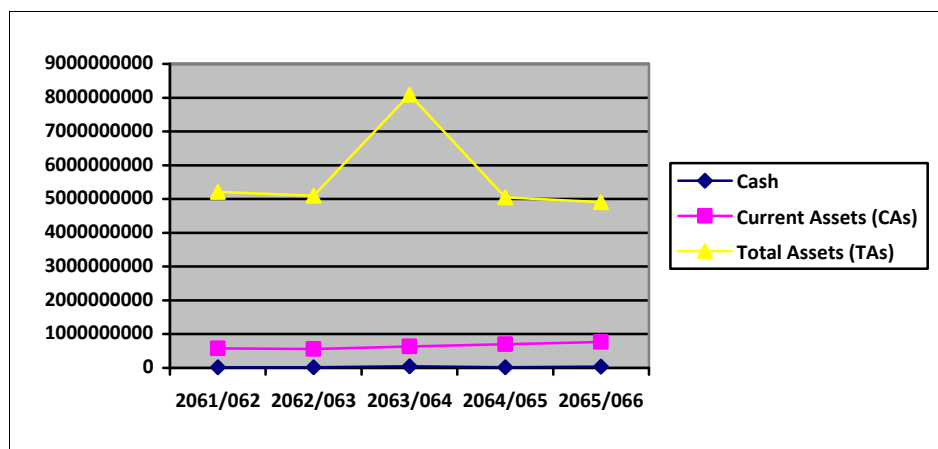
*Source: Appendix-I*

Above table implies the most erratic most erratic trend of cash and bank balance level to current assets and total assets investment during the selected period of study in F/Y 2061/062 the total amount of cash is Rs. 15054909.59 only and the proportion of current assets and total assets are lowest of 2.62% and 0.29% respectively. In the following year 0.33% & increase 0.03% to 2.92% and 2.92% and 0.32 but in F/Y 2063/064 the proportion of cash & bank balance in current assets & total assets goes up by 4.29% and 0.25% than its former level. The proportion of cash and bank balance to current and the total assets are lowest in the F/Y 2064/065, where

the proportion is 4.08% & 0.13% respectively but the proportion of cash & balance is increase to 5.175 and 0.81% of current assets and total assets increase by 2.04% and 0.37 respectively.

The relationship between cash and bank balance, current assets and total assets can be clarified by the graphic representation, which is presented below:-

Graph-4  
**Relation of Cash & Bank to CAS & TAS**



The Graph No. 4 clarifies that the cash & bank balance hold by the company is not proportionate to current assets as well as to total assets increasing or decreasing in cash and bank balance do not affect the position of current assets as well as total as total assets.

#### **4.6 Proportion of Inventory to Sales:-**

Inventory is one of the components of current assets, which should be maintained effectively and effectively. It has already been stated that the working capital, production and sales are correlated in general case. The production should be increasing to meet higher level of sales target. To produce more raw materials will be required. The stork level of raw material requirement should be properly maintained to meet the raw material

requirement for higher level of production. Hence, to fulfill this requirement the company has to increase its working capital.

Inventory turnover ratio indicates the number of times inventory is replaced during the years. It measures the relationship between sales and the inventory level. The inventory turnover ratio tests the efficiency on inventory management. It is a valuable measure of selling efficiency and inventory quality. A low inventory turnover may be due to a variety of reasons like poor merchandise, over valuation of closing stock, a large stock of unsalable goods over-buying and anticipated future increase in sales etc. in the last case, low inventory turnover may be desirable in terms of its effect on sales and profits.

On the other hand, substantially higher rate of inventory turnover may disclose conservation pricing of closing inventory, inventory valuation at a point when it is unusually low, a real shortage of inventory for required sales, a contemplated on sales, etc, it is thus, worth nothing that a high inventory may not by itself be desirable.

The proportion of inventory to sales has been presented below:-

**Table No-6**  
**Proportion of Inventory to Sales**

F/Y	Inventory	Sales	% of Inventory on Sales	% Change	Inventory Turnover (time)	change in Turnover
2061/062	396295521.80	719292020	55.10		1.82	
2062/063	361829425.02	515310520	70.22	15.12	1.42	(0.4)
2063/064	396523328.94	473388070	83.76	13.54	1.19	(0.23)
2064/065	462152291.00	546465285	84.57	0.81	1.18	(0.01)
2065/066	<u>469265206.97</u>	<u>532826050</u>	<u>88.07</u>	<u>3.5</u>	<u>1.14</u>	<u>(0.04)</u>
Total	20866065774	2787281945	74.84	32.97	6.75	(0.68)
Average	417213154.7	557456389	74.84	6.59	1.35	

*Source: Appendix-II*

The above table shows that the proportion of inventory to sales is maximum in the F/Y 2065/066. The proportion of inventory to sales in this year is 88.07% where the sales amount is Rs. 532826050 and the inventory amount to Rs. 469265206.97. The proportion of inventory to sales is minimum in the F/Y 2061/062, which is 55.10%, where the sales amount to Rs. 719292020 and inventory amount to Rs. 396295521.80.

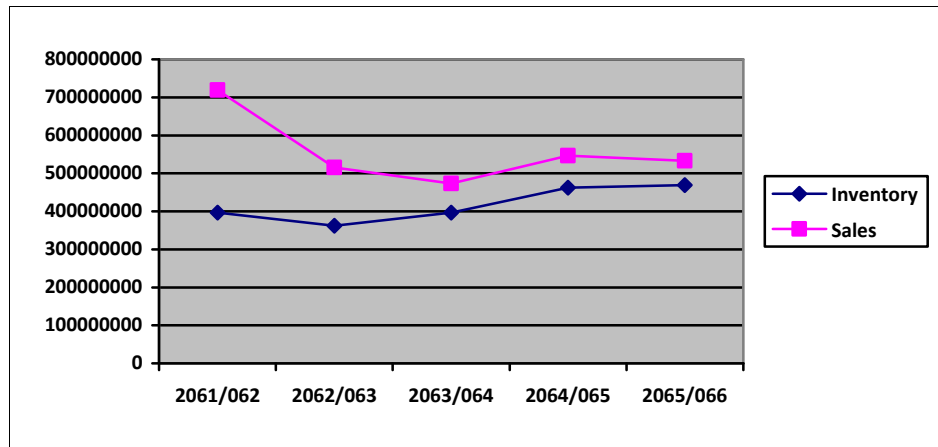
The five years trend presented in the above table shows that the proportion of inventory to sales is in increasing trend. In the F/Y 2061/062 the proportion is 55.10% and the proportion is increasing by 15.12%, 13.54%, 0.81% and 3.5 respectively in the subsequent years. The average proportion of inventory to sales is 74.8%, which indicates efficiency in sales the inventory management.

It can also be studied from the point of view of inventory turnover. The table shows that inventory turnover are 1.82 times, 1.42 times, 1.19 times, 1.18 times and 1.14 times, to sales in F/Y 2061/062, 2062/063, 2063/064, 2064/065, 2065/066 respectively. In the F/Y 2061/062 the highest turnover is 1.82 times and the average inventory turnover in the period of observation is 1.35 times. A low level of inventory due to the cause of over investment in inventory, dull business and poor quantity of stock accumulations slow moving stock.

The decreasing trend of inventory, turnover ratio is unfavorable situation. The relationship between inventory and sales can be clarified the graphic presentation below:-

Graph No-5

Relationship between Inventory & Sales



#### 4.7 Cash Turnover:-

Cash is one of the main parts of current assets, which has greatest value to meet the current obligation occur in the business. It should be just adequate to run the business and excess cash has no meaning, as it earns nothing so the company always sees the risk return trade off to maintain the just adequate cash balance cash turnover measures the relationship between level of cash and volume of sales over a period of time the greater the sales volume the better the cash turnover would be provided so that cash balance is maintained at a desirable level the cash turnover is computed by dividing yearly sales by cash and bank balances.

The following table shows the cash turnover position of the Udayapur Cement Udhyog Limited during the study period.

**Table No-7**  
**Cash Turnover**

F/Y	Cash & Bank	Sales	Cash Turnover (Time)
2061/062	15054909.59	719292020	47.78
2062/063	16312202.40	515310520	31.59
2063/064	45853821.13	473388070	10.32
2064/065	22039692.85	546465285	24.79
2065/066	<u>39539197.12</u>	<u>5328260.50</u>	<u>13.48</u>
Total	1387799823.1	2787281945	20.08
Average	27759964.62	557456389	20.08

As per the table presented above the cash turnover is higher in the F/Y 2061/062 having the turnover of 47.78 times. In this particular year company holds Rs. 15054909.59 cash & bank balance where as sales amounting to Rs. 719292020. High cash & bank balance. The lowest ratio is 10.32 times in the F/Y 2063/064, when it holds more cash in relation to sales. The cash turnover ratio in other remaining F/Y 2062/063, 2063/064, 2064/065, 2065/066 is 31.59 times, 24.79 times & 13.48 times respectively. The average cash turnover in the period of observation is 20.08 times.

#### **4.8 Proportion of Working Capital (Gross) to Sales:-**

Sales are one of the most important activities of manufacturing industry like UCUL. The survival and growth of the industry depend on the sales policy as per the resource availability and market demand. The market demand, the sales policy greatly affect the production policy which affects the financial policy which affect the financial policy i.e. the total assets and the working capital required by the company to run it as per plan. Hence, the co-ordination between these three units of the company is very important each and every information should pass through all units. Increase in sales certainly because increase in production, which required more input to keep

the stock of raw materials, there should be adequate amount of working capital. The amount of working capital is also affected by sales policy. If the credit sales are increased, more working capital will be required to meet the daily requirements on the other hand; if tight credit policy is applied the amount working capital is also affected by sales policy. If the credit sales are increased, more working capital will be required to meet the daily requirements on the other hand, if tight credit policy is applied the amount of working capital to replace the amount held by credit sales will be decrease. It brings an effect of decrease in working capital need.

The proportion of working capital (gross) and sales mainly focuses to measure the efficiency of utilizing working capital (gross). This proportion shows the requirement of working capital for one rupee of sales. This proportion is computed by dividing sales by working capital (gross) which is shown using the information of Udayapur Cement Udhog Limited in the following table.

**Table No-8**  
**Proportion of Working Capital to Sales**

F/Y	Working Capital	Sales	% of Working Capital to Sales	% Change	Working Capital Turnover (time)	change
2061/062	575195398.57	719292090	79.97		1.25	
2062/063	557725411.50	515310520	108.23	28.26	0.92	(0.33)
2063/064	636069236.03	473388070	134.37	26.14	0.74	(0.18)
064/065	704587841.97	546465285	128.94	(5.43)	0.78	0.04
2065/066	<u>765410280.5</u>	<u>532826050</u>	<u>143.65</u>	<u>14.71</u>	<u>0.70</u>	<u>(0.08)</u>
Total	3238988168	2787281945	116.21	63.68	4.39	(0.55)
Average		557456389	116.21		0.86	

*Source: Appendix-I & II*

The table shows the relationship between sales & working capital (gross) of Udayapur Cement Udhyog Limited. The tabulated data shows the fluting relationship of between them. In F/Y 2061/062 the percentage of working capital to sales is 79.97 and in the following year 2062/063 the percentage is increasing by 28.26. In the fiscal year 2063/064, 2064/065 and 2065/066 the percentage of working capital turnover are 134.37%, 128.94 and 143.65% respectively.

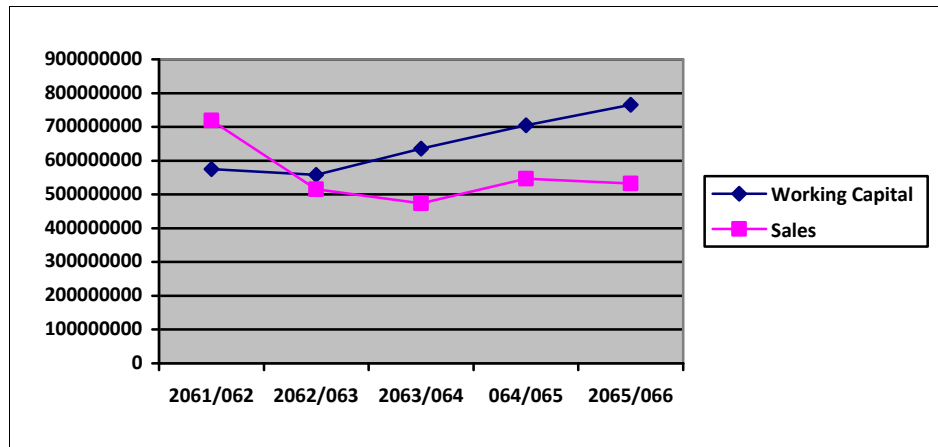
In F/Y 2061/062 the working capital turnover ratio is 1.25 times, which is decrease to 0.92 times in the F/Y 2062/063. It shows the ineffectiveness of utilizing, working capital in relation to sales in comparison with F/Y 2062/063. After then in F/Y 2063/064 the working capital turnover ratio goes down to 0.74 times. In this way in F/Y 2064/065 the ratio is slightly increase and goes up to 0.78 times and again in F/Y 2065/066 the ratio is decrease by 0.08 times and goes down to 0.70 times. Similarly, the average working capital turnover ratio is 0.86 times. Which means a rupee invested in total current assets generated sales of Rs. 0.86 only. So, overall working capital turnover ratio is not satisfactory because company has invested excess current assets in comparison to sales during the study period except F/Y 2061/062. Moreover, the ratios are generally decreasing trend. It indicates that current assets utilization has been destining in the following years as compared to the previous years of the study.

The relationship between working capital (gross) and sales can be clarified by the graphic presentation below:-



Graph No-6

Relationship between Working Capital & Sales:-



The graphic representation clarifies that the working capital is not proportion to sales. The sales are ineffective by the volume of working capital kept by the company. The curve of sales is independent of the curve of working capital (gross).

So as to get the touch with the probable relationship between working capital and sales volume of UCUL during the period the period of the study Karl Person's correlation co-efficient (r) is calculated as below.

**Table No- 9**

**Calculation of Karl Person's Correlation Co-efficient (r)**

F/Y	Working Capital (x)	Sales (y)	Deviation taken from assumed mean $x-76.54=dx$	$dx^2$	Deviation taken from assumed mean $y-53.28=dy$	$dy^2$	$dx dy$
2061/062	57.52	71.93	-19.02	361.76	18.65	347.82	-54.72
2062/063	55.77	51.53	-20.77	431.39	-1.75	3.06	36.35
2063/064	63.61	47.34	-12.93	167.18	-5.94	35.28	76.80
2064/065	70.46	54.65	-6.08	36.97	1.37	1.88	-8.33
2065/066	76.54	53.28	0	0	0	0	0
Summation( $\Sigma$ )	323.3	278.75	-58.8	997.3	12.33	388.04	-249.9

Sources: Appendix II

$$r = \frac{\sum dx dy - \frac{\sum dx \sum dy}{N}}{\sqrt{\sum dx^2 - \frac{(\sum dx)^2}{N}} \sqrt{\sum dy^2 - \frac{(\sum dy)^2}{N}}}$$

$$r = \frac{-249.9 - \frac{(-58.8) \times 12.33}{5}}{\sqrt{997.3 - \frac{(-58.8)^2}{5}} \sqrt{388.14 - \frac{(-12.23)^2}{5}}}$$

$$r = \frac{-249.9 + 154}{\sqrt{305.81} \sqrt{358.13}}$$

$$r = \frac{-104.9}{332.56}$$

$$r = -0.32$$

$$PE = 0.6745 - \frac{1-r^2}{\sqrt{N}}$$

$$= 0.6745 - \frac{1-(-0.32)^2}{\sqrt{5}}$$

$$= 0.6745 - \frac{0.8976}{\sqrt{5}}$$

$$= 0.27$$

$$r = -0.32$$

$$PE = 0.27$$

The above figure shows that correlation coefficient is between gross working capital & sales during. The study period is negative; i.e. there is negative correlation between gross working capital & sales. Thus, ordinary increase in sales cause decrease in working capital and vice-versa. Since, 'r' is not six time of PE, the relationship is not considered as significant.

#### **4.9 Relationship between Current Assets and Fixed Assets:-**

This ratio shows the relationship between current assets and fixed assets. An actual proportion of current assets and fixed assets can be determined through it. The lower ratio denotes slackness in trading activities and higher mechanization. On the other hand, an increasing in ratio may

reveal that inventories and debtors have been intensively used; increase in this ratio means increases in profit and expansion of business activities. In such situation relative size of working capital of Udayapur Cement Limited is analyzed in the following table.

**Table No-10**  
**Proportion of Current Assets to Fixed Assets:-**

F/Y	Current Assets (CAS)	Fixed Assets (FAS)	X of CA on FAS	% Change
2061/062	575195398.57	4632241737.38	12.42	
2062/063	557725411.5	4538800640.80	12.29	(0.13)
2063/064	636069236.03	4450910276.40	14.29	2
2064/065	704587841.97	4343783769.89	16.22	1.93
2065/066	<u>76540280.50</u>	<u>4142778821.78</u>	<u>18.48</u>	2.26
Total	3238988168	22108515246	14.65	
Average	647797633.7	4421703049	14.65	

*Source: Appendix-I*

If we look the percentage of current assets to fixed assets it is in increasing trend except F/Y 2062/063. It is maximum of 18.48% in F/Y 2065/066 while it is minimum of 12.29% in F/Y 2062/063. In an average it is 14.65%. The level of current assets can be measured by relating current assets to fixed assets. A higher current to fixed assets ratio indicates a conservative current assets policy and lower current assets to fixed assets ratio means an aggressive current assets policy. Other thing assuming constant a conservative policy (i.e. higher CA/FA ratio) implies greater liquidity and lower risk and poor liquidity but higher profitability. The current assets policies of the most firms may fall between these two extreme policies and moderate current assets policy maintains the ratio between CA/FA neither higher nor lower.

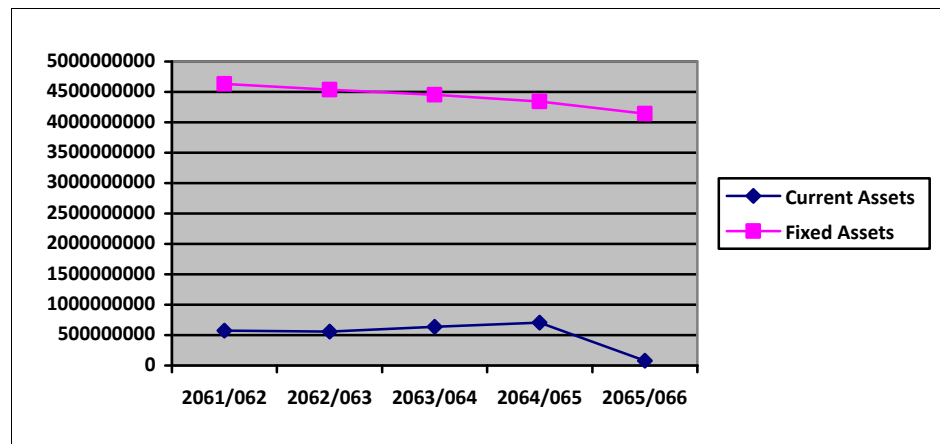
With reference to Udayapur Cement Udyog Limited the percentage of CA/FA is how which indicates the firm moves under aggressive policy. This implies higher risk and poor liquidity. Thus, Udayapur Cement Udyog Limited has high risk & high profitability.

The study shows that the fixed assets are in decreasing trend. In F/Y 2061/062 the percentage of current assets on fixed assets is 12.42% and it is slightly decrease in F/Y 2062/063 by 0.13% and became 12.29% & in the F/Y 2063/064, 2064/065 & 2065/066 the percentage are 14.29%, 16.22 & 18.48% respectively.

This can be further clarified by graphical presentation.

Graph No-7

Relationship between Current Assets & Fixed Assets:-



In order to examine the relationship between the afore said variable in content to Udayapur Cement Ughyog Limited five years trend analysis, Karl Person's correlation co-efficient (r) is calculated as follows:-

**Table No- 11**

**Calculation of Karl Person's Correlation Co-efficient (r)**

F/Y	Current Assets (x)	Fixed Assets (y)	Deviation taken from assumed mean $x-76.54=dx$	$dx^2$	Deviation taken from assumed mean $y-41.43=dy$	$dy^2$	$dx dy$
2061/062	57.52	71.93	-19.02	361.76	4.89	23.91	-93.01
2062/063	55.77	51.53	-20.77	431.39	3.96	15.68	-82.25
2063/064	63.61	47.34	-12.93	167.18	3.08	9.49	-39.82
2064/065	70.46	54.65	-6.08	36.97	2.01	4.04	-12.22
2065/066	76.54	53.28	0	0	0	0	0
Summation	323.3	278.75	-58.8	997.3	13.94	53.12	-227.3

$$r = \frac{\sum dx dy - \frac{\sum dx \sum dy}{N}}{\sqrt{\sum dx^2 - \frac{(\sum dx)^2}{N}} \sqrt{\sum dy^2 - \frac{(\sum dy)^2}{N}}}$$

$$r = \frac{-227.3 - \frac{(-58.8) \times 13.94}{5}}{\sqrt{997.3 - \frac{(-58.8)^2}{5}} \sqrt{53.12 - \frac{(-13.94)^2}{5}}}$$

$$r = \frac{-227.3 + 163.93}{\sqrt{305.81} \sqrt{14.26}}$$

$$r = \frac{-63.37}{66.04}$$

$$r = -0.96$$

$$\begin{aligned} PE &= 0.6745 - \frac{1-r^2}{\sqrt{N}} \\ &= 0.6745 - \frac{1-(-0.96)^2}{\sqrt{5}} \\ &= 0.6745 - 0.0351 \\ &= 0.6394 \approx 0.64 \end{aligned}$$

$$r = -0.96$$

$$PE = 0.64$$

The above figures shows that correlation co-efficient in between current assets and fixed assets during the period of study is negative ie. There is negative correlation between current assets and fixed assets. Since 'r' is not six times greater than PE the relationship is not considered to significant.

#### **4.10 Trend Analysis of Working Capital**

The trend analysis of net working capital is studied under this head. The F/Y 2061/062 has been taken as a base year. The following table shows the trend of net working capital for five year.

**Table No-12**  
**Comparative Working Capital Trend Analysis:-**

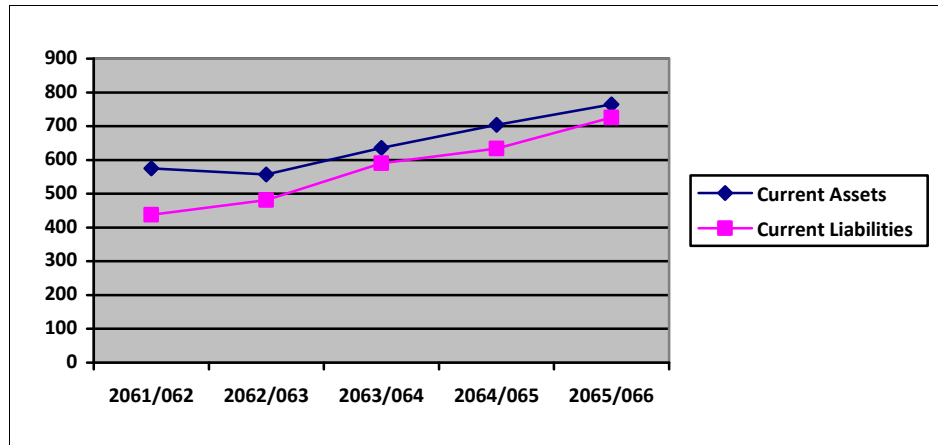
F/Y	Current Assets (x)	Trend %	Current Liabilities	Trend %	NWC	Trend %
2061/062	575	100	438	100	137	100
2062/063	557	97	481	110	76	55
2063/064	636	111	590	135	46	34
2064/065	704	122	634	145	70	51
2065/066	<u>765</u>	<u>133</u>	<u>726</u>	<u>165</u>	<u>39</u>	<u>28</u>
Total	3237	563	2869	656	299	268
Average	647	113	574	131	60	54

*Source: Appendix-I*

Above table shows comparative working capital trend Udayapur Cement Udhyog Limited from the F/Y 2061/062 to 2065/066 along with base figure for the F/Y 2063/064, 2064/065 & 2065/066. While it decreased in the F/Y 2062/063 and it has also increase in the study period. The average growth rate is 131%.

The trend percentage of net working capital shows the fluctuating trend. The average trend value of net working capital is 54% during the period. It is presented in the graph below:-

Graph No-8  
Comparative Working Capital Trend Analysis



#### 4.11 Analysis of Liquidity Ratio:-

Liquidity ratios are used to judge a firm's ability to meet short-term obligation. In order to ensure short-term solvency, the company must maintain adequate liquidity. Liquidity ratio should neither be inadequate nor highly liquid.

If the liquidity ratio of the firm is not enough it will result in bad credit ratings, loss of creditor's confidence which eventually may lead to the bankruptcy. If the firm has high degree of liquidity, fund will be unnecessarily tied up in current assets and can earn nothing. Thus, the firm should endeavor to maintain proper balance between inadequate liquidity and unnecessary liquidity for the survival and for avoiding the risk of insolvency.

##### 4.11.1 Current Ratio:-

Current ratio is frequently used to measure the liquidity position of the firm. This ratio shows that availability of current assets in rupee for every

one rupee of current liability. Generally, the current assets of the firms should be twice than current obligation to be technically solvent. Technical solvent means the ability of firm to meet current obligations duly as and when they become due. A relatively high value of current ratio is considered as an indication that the firm liquid and has the ability to pay its bill and vice-versa.

The current ratios of selected study years of the Udayapur Cement Udhyog Limited are computed in the table No. 13 by dividing the current assets by current liabilities. i.e.

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

**Table No-13**  
**Compilation of Current Ratio**

F/Y	Current Assets (CAS)	Current Liabilities	Current Ratio	Change in ratio
2061/062	575195398.57	4380.9653.29	1.31:1	
2062/063	557725411.5	481916140.34	1.16:1	(0.15)
2063/064	636069236.03	590274293.90	1.08:1	(0.08)
2064/065	704587841.97	634006959	1.11:1	0.03
2065/066	<u>765410280.50</u>	<u>726676035.27</u>	<u>1.05:1</u>	<u>(0.06)</u>
Total	3238988168	2870969966	5.71:1	(0.26)
Average	647797633.7	574193993	1.14:1	

*Source:- Appendix-I*

The figure presented above shows current ratios which cover five years period, they are 1.31:1, 1.16:1, 1.08:1, 1.11:1 & 1.05:1 respectively which are below the standard level of current ratio (i.e. 2:1). A low current ratio indicates inability to meet its short-term obligation that may lead to loss of goodwill & lower margin of safety.



Current ratio is test of quantity if the liquidity positions not a text of quality of liquidity position. In this regard, after analysis of ratio it may be concluded that the liquidity position in relation on current ratio of Udayapur Cement Udhyog Limited is adequate.

#### 4.11.2 Quick Ratio:-

Quick ratio is more refined measured of the firm's liquidity. This ratio established a relationship between quick assets and current liabilities. An asset is said to be quick which can be converted in to cash with in operating cycle without loss in value of assets. Thus, cash is the most liquid. The other assets, which are book debt and marketable securities. Inventories are excluded because it takes too time to sell finished goods & convert raw material & work in process into finished goods & there is also uncertainly whether it is sold or not. Prepaid expenses should also be excluded from quick assets because it cannot be converted into cash. The quick ratio is finding out by dividing quick asses by current liabilities.

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

**Table No-14**  
**Compilation of Quick Ratio**

F/Y	Quick Assets (CAS)	Current Liabilities	Quick Ratio	Change
2061/062	15054909.59	4380.9653.29	0.03:1	
2062/063	16312202.40	481916140.34	0.03:1	0
2063/064	45853821.13	590274293.90	0.08:1	0.05
2064/065	22039692.85	634006959	0.03:1	(0.05)
2065/066	<u>39539197.12</u>	<u>726676035.27</u>	<u>1.05:1</u>	0.02
Total	318799823	2870969966	0.22:1	0.02
Average	27759965	574193993	0.04:1	

*Source: Appendix I*

The quick ratio presented in table no. 14 covers a period from F/Y 2061/062 to 2065/066. Generally speaking an acid test ratio of 1:1 is considered, satisfactory as a firm can easily meet all current claims. The quick ratio in F/Y 2061/062, 2062/063, 2063/064, 2064/2065 and 2065/065 are 0.03:1, 0.03:1, 0.08:1, 0.03:1 & 1.05:1 respectively which indicate the firm has difficulty in meeting its current obligations. That's Udayapur cement Udhyog Limited it can be said that company has poor management in cash balance.

#### **4.12 Participation of Short term Financing (STF) and Long Term Financing (LTF) on Current Assets Composition:-**

To fulfill the requirement of working capital (gross) of a firm, the amount is financed by various ways i.e. short-term only, Long-term only, both short-term and long-term. The Investment of STF and LTF on working capital should be co-ordinate to keep an optimal level. Otherwise the company may have to bear the risk of uncertainly if the company may be failure to lunch operational activities when all working capital is financed by short-term resource. On the other hand of it is financed by only LTF the company may not be able to raise its shares as soon as it needs. So to operate the business in proper way both types of finance on working capital is needed.

Hence to fond out the condition of financing on working capital of Udayapur Cement Udhyog Limited a computation is made in table below:-

**Table No-15****Participation of (STF) & (LTF) on Current Assets Composition**

F/Y	Current Assets	Short Term Financing (STF)	% of STF	Long-term Financing (LTF)	% of LTF
2061/062	575195398.57	4380.9653.29	76.16	4918291580.47	855.06
2062/063	557725411.5	481916140.34	86.41	4726323148.31	847.43
2063/064	636069236.03	590274293.90	92.80	4571180709.45	718.67
2064/065	704587841.97	634006959	89.98	4451602398.15	631.80
2065/066	765410280.50	726676035.27	94.94	4181513067.01	546.31
Total	3238988168	2870969966	440.29	6384891089	3599.27
Average	647797633.7	574193993	88.06	1276978218	719.85

*Source:- Appendix-I*

Above table shows that the inflecting participation of short-term financing and long-term financing in investing total current assets level during the study period.

Short-term financing covered 76.16%, 86.41%, 92.80%, 89.98% & 94.94% of the current assets level in the F/Y 2061/062, 2062/063, 2063/064, 2064/065 & 2065/066 respectively. The highest proportion of short-term financing on total current assets is 94.94% in the F/Y 2065/066 where as the lowest proportion of short-term financing is only 76.16% in the F/Y 2061/062. The average participation of short-term financing sources in total current assets is 88.06% during the study period. The participation of long-term sources in investing the total current assets level in the same period is higher than that of the short-term financing. It covered 855.06% in the F/Y 2062/063 but decreased to 847.43% in the following year. Similarly, in the F/Y 2063/064 it decreases to 718.67% and also the percentage is decrease to 631.80% & 546.31% respectively in the fiscal year 2064/065 & 2065/066. In

this way the average participation of long-term financing sources in the total current assets is about 719.85% during the study period.

After analysis, it is found that the financing pattern over current assets of Udayapur Cement Udhyog limited is highly influenced by long-term financing source in comparison with short-term financing sources. Which is the symptom of conservative financing policy.

#### 4.13 Participation of STF and LTF:-

**Table No-16**

**Participation of STF and LTF on Total Funds**

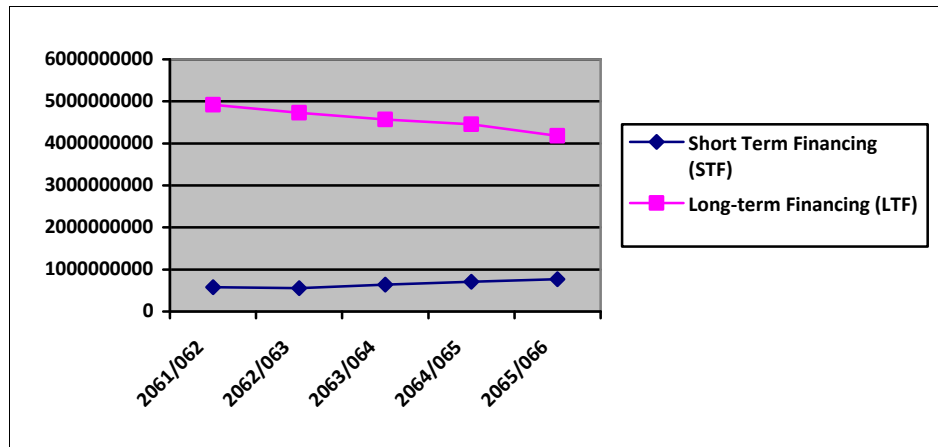
F/Y	Short Term Financing (STF)	Long-term Financing (LTF)	% of STF	% Change
2061/062	575195398.57	4918291580.47	8.91	
2062/063	557725411.5	4726323148.31	10.20	1.29
2063/064	636069236.03	4571180709.45	12.91	2.71
2064/065	704587841.97	4451602398.15	14.24	1.33
2065/066	765410280.50	4181513067.01	17.38	3.14
Total	3238988168	6384891089	63.64	8.47
Average	647797633.7	1276978218	12.73	1.69

Source:- Appendix-I

The figure shows the increasing trend of ratio between short-term financing and long-term financing for the period of study. It is 8.91% in the F/Y 2062/063, which is increase to 10.20% in the following year. Similarly, it increase to 12.91%, 14.24% & 17.38% respectively in F/Y 2063/064, 2064/065 & 2065/066 having 2.71% , 1.33% & 3.14% increase rate. In this way the ratio between STF and LTF lies in between 8.91% & 17.38%, which is increasing by 1.69% annually in an average.

It also Presented by Graph Below:-

**Graph No-9**  
**Relation of STF to LTF**



#### 4.14 Profitability of Working Capital:-

A company must earn profit for its survival and growth in the future. In fact, sufficient profit must be earned to sustain the operations of the business to be able to acquire funds from investors for expansion. Thus profitability ratio is used to measure the performance of efficiency or ability of the firms. Profitability in relation to some components of working capital is computed to convey to what extent the company is able to earn profit. These are some ratios that are considered to measure the efficiency of Udayapur Cement Udhyog Limited.

- Return on current assets.
- Return on working capital.

##### 4.14.1 Return on current assets:-

Assets that can be quickly being converted into cash within an accounting period without losing any value are termed as current assets. So, it includes cash and near cash items. It has direct relationship with day-to-day operation of a firm. This is the rate of return on assets or working capital employed by the firm. It measures the profit with respect of its total current assets. It gives the utilization of current assets effectiveness. So, it plays vital

role in profit earnings. The return on current assets of Udayapur Cement Udhyog Limited is calculated and presented in the table below.

**Table No-17**  
**Return on Current Assets**

F/Y	Current Assets	Net profit or Loss	% Change
2061/062	575195398.57	-27781813.44	-4.83
2062/063	557725411.5	-135793158.10	-24.35
2063/064	636069236.03	-12508206.67	-19.66
2064/065	704587841.97	-93686663.10	-13.30
2065/066	765410280.50	<u>-255052566.19</u>	<u>-33.32</u>
Total	3238988168	-2932896607	-95.46
Average	647797633.7	-586579321.4	-19.09

*Source:- Appendix-I & II*

Above the table shows the ration on current assets. The different ratios in percentages are (4.83%), (24.35%), (19.66%), (13.30%) & (33.32%) in F/Y 2061/062, 2062/063, 2063/064, 2064/065 & 2065/066 respectively. During the study period all the ratio is negative due to negative NPAT. The average return on current assets is (19.09%), which is not satisfactory.

#### **4.14.2 Return on Net Working Capital:-**

Return on net working capital is the excess of current assets over current liabilities. The ratio of NPAT on net working capital is obtained by dividing NPAT by net working capital to measure the profitability condition on the investment of net working capital. To operate business efficiently, profit-earnings ratio on working capital should also be satisfactory. In this regard, C.R. Kithari has said, "This ratio in standard business units is usually taken at 14.5%".

Here, the computation of this ratio of Udayapur Cement Udhyog Limited is made from F/Y 2061/062 to 2065/066 in the following table.

**Table No-18**  
**Return on Net Working Capital**

F/Y	Short Term Financing (STF)	Long-term Financing (LTF)	% Change
2061/062	1370798861.28	-27781813.44	-20.26
2062/063	75809271.16	-135793158.1	-179.12
2063/064	4574942.13	-12508206.67	-273.12
2064/065	70580882.83	-93686663.10	-132.74
2065/066	<u>38734245.23</u>	<u>-255052566.14</u>	<u>-658.47</u>
Total	368018202.6	-2932896607	
Average	73603640.51	-586579321.4	

The above table shows the ratio of return on net working capital is negative. Thus, it is unable to maintain standard ratio (i.e. 14.5%) during the study period.

# CHAPTER V

## Summary, Conclusion & Recommendation

### 5.1 Summary

Nepal is an underdeveloped, landlocked and agricultural country; where about more than 80% of the total economically active populations are engaged on agriculture for their livelihood. Industrialization is the yardstick of economic development of any country. It is a major instrument of Progress, modernization and social change. Therefore, it is the major tools with the aid of which vicious circle of backwardness and poverty can be broken. Economic development of a country can be accelerated only with the growth of rapid industrialization. In a country like Nepal, Where the economy is basically agriculture based. The industrial development can play a vital role in replanting, employment and substitution of imports through increased domestic production. In this context, Udayapur Cement Udhyog Limited Company is acting as key elements to fulfill the demand of Cement.

Udayapur Cement Udhyog Limited situated at Gaighat has been successfully operated since 2044 B.S. The study focuses on the working capital management of Udayapur Cement Udhyog Limited. The objectives of the study are to analyze the participation of various components of current assets, utilization of assets, liquidity position etc. Hence, various internal and external variables have to be analyzed before presenting the solution of the problem.

Here, the study is designed to Judge the working capital management, which is based on published financial statement of Udayapur Cement Udhyog Limited for five years period. The period is form F/Y 2061/062 to



2065/066 working capitals is one of the components of financial administration. It is life-blood and never have a business enterprises. It is essential to an industry to meet its short-term obligation, to pay out current operating expenses and to make full utilization of long-term assets in which large investment is made. But both excessive and inadequate amount of working capital are dangerous to the firm. Thus, in fact, business concern should try to maintain sound proper and adequate amount of working capital so that total cost of the investment becomes minimum and the operational activities are performed regularly without nay disturbances.

There exist two conflicting concepts regarding working capital i.e. gross working capital and net working capital. Gross working capital denotes total investment in current assets where as net working capital is defined as the excess of current assets over current liabilities. Gross working capital is useful in determining the rate of return on investment while net working capital is useful for internal control of the firm. Financial analyst focuses on gross working capital where as accountant emphasis on net working capital concept. However, these two concepts are complementary and they have equal significance form management point of view.

Working capital is categorized according to different bases i.e. components and time. Components include cash, marketable securities, receivables, and debtors where as time base include permanent or fixed verses variable or temporary. Although they are no set rules to determine working capital requirements of the firm, a large number of factors such as nature and size of business, production cycle, rate of growth of business, demand conditions and other directly affect working capital needs of a business. So far as financing of working capital is concerned, there are mainly three basic

approaches Viz. hedging, conservative and aggressive. Risk-adverse investors generally follow conservative approach while risk-seeker investors follow aggressive approach. Hedging is the balance between these two extremes and therefore, following by risk-neutral investors.

Udayapur Cement Udhyog Limited is the unit of this study. All the financial statements from the date of its establishment up to now are taken as the population of the study. Since it is quite difficult to incorporate all the audited financial statements of population, only five years statements from F/Y 2061/062 to 2065/066 have been taken as a sample.

The data used for this research project was secondary in nature, Which is provided by the company. The relevant information is also collected through personal effort by approaching the staff in official hours.

The data obtained from the audited financial statements of Udayapur Cement Udhyog Limited are prepared and presented in tabular forms, graphic forms & they are analyzed by using various tools and techniques of financial and statistical analysis.

## **5.2) Conclusion: -**

The main conclusions of the study are presented below:

- 1) Major shares of Udayapur Cement Udhyog Limited current assets are occupied by the less liquid form of assets i.e. inventories and Advance paid and deposit.
- 2) The indices of total current assets of Udayapur Cement Udhyog Limited indicated in increasing trend. In four year and decrease in one year. Similarly, the current liability also shows the increasing trend.
- 3) The indices of net working capital show the fluctuating trend.

- 4) In regard of the assets structure of Udayapur Cement Udhyog Limited, the low level of current assets indicates the weak liquidity position of the firm & high percentage of current assets in total assets signify greater liquidity position.
- 5) Current assets shows increasing trend in third, fourth & fifth year while it is decreasing in second year.
- 6) Total assets are fluctuating due to fluctuating current assets and fixed assets. The current assets and the total assets are found moving in the opposite direction.
- 7) In terms of proportion of inventory, it seems that Udayapur Cement Udhyog Limited has hold high proportions of inventory on current assets than other component i.e. investment in cash.
- 8) Udayapur Cement Udhyog Limited failed to maintain proper and stable trend of inventory. Inventory turnover ratio is low. Low inventory turnover ratio is the sign of inefficient inventory management; it indicates that the sales are very slow moving in inventory. Moreover, company is unable to utilize more stock caused by poor co-ordination between inventory and sales.
- 9) Cash turnover ratio indicates the number of times cash has been turned over during the study period. There is no consistency in the cash turnover ratio due to lack of optional co-ordination between cash and sales. Even though the management of cash balance resources of Udayapur Cement Udhyog Limited is effective and efficient. After all, it is not a poor position but it is in satisfactory level.
- 10) Gross working capital turnover ratio shows that Udayapur Cement Udhyog Limited has invested excess in current assets in comparison to sales during the study period. However, the ratio are in decreasing trend.

- It indicates that current assets utilization of Udayapur Cement Udhyog Limited has been declining in the later years as compared to the previous years of the study period.
- 11) By summarizing the conclusion about current assets to fixed assets, there is negative correlation in between current assets and fixed assets. Hence, Udayapur Cement Udhyog Limited has to pay more attention to invest in current assets rather than fixed assets.
  - 12) The trend of working capital is fluctuated. Udayapur Cement Udhyog Limited has not invested balance in current assets and current liabilities and there is absence of proper management between current assets and current liabilities.
  - 13) By analyzing liquidity ratio of Udayapur Cement Udhyog Limited, the current ratio has shown below the standard level (i.e.2:1). It indicates inability to meet its short-term obligation.
  - 14) Similarly, the quick ratio shows that Udayapur Cement Udhyog Limited is also unable to meet the standard (i.e. 1:1) in the study period. That's why after analyzing and measuring of the quick ratio, it is found that company has poor management in cash balance and it has made excessive investment in inventory.
  - 15) The participation of long-term finance and short-term finance is not stable. The total finance is more influenced by the long-term finance. So Udayapur Cement Udhyog Limited seems to have conservative policy to finance company's fund.
  - 16) By analyzing the profitability of working capital, return on current assets ratio is found to be negative during the study period during negative NPAT.
  - 17) Return on net working capital is also negative due to negative return.

- 18) Under the topic of trend analysis various items related to working capital have been calculated and presented in tabular form in term of trend percentage.
- 19) The trend of current assets and current liabilities show the increasing trend as compare to base year.
- 20) On the other hand, net working capital show the fluctuating trend.

### **5.3) Recommendations:**

In the regards of analysis and conclusions of the study following recommendations have made.

- 1) The fluctuation size of various components of current assets may be negatively influenced in future. So, the company should be aware off excessive and inadequate investment in current assets, which can be inspected through various tools.
- 2) Udayapur Cement Udhyog should make its selling effort effective so that the stock would be minimum.
- 3) Management should give highest priority in inventory management and apply various systematic and stable inventory control policies to make sufficient inventory level.
- 4) Udayapur Cement Udhyog Limited should make proper balance of cash, in other words, it is necessary to determine the limit of holding cash as per the requirement of its operation.
- 5) While recommending from the viewpoint of the liquidity ratio, it is found to be lower than the standard. So Udayapur Cement Udhyog Limited should try to make optimum and efficient liquidity position.
- 6) In the sense of working capital financing, Udayapur Cement Udhyog Limited has adopted conservative policy. Sometimes company can loose suitable opportunities depending on such policy. That's why it can be referred that it should pay attention to apply average financing

policy of working capital.

- 7) Udayapur Cement Udhyog Limited should determine certain rate on its investment and sales target should be set to overcome the problem of negative profit.
- 8) Udayapur Cement Udhyog Limited should afford cost control program to reduce amount of cost.
- 9) The firm should make financial analysis of the prepared financial statements and other supporting schedules. This would leak out many facts about the firm's operation and efficiency.
- 10) Lastly, the firm should constitute research and development unit for conduction research and development activities, which can bring efficiency in production process and may be helpful in reducing cost, exploring new facts and tackling with business threats.

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Appendix – 1

Consolidated balance sheet of Udayapur Cement Udhyog Limited

As at 31<sup>th</sup> Ashad 2061/062 to 2065/2066

particular	2061/062	2062/063	2063/064	2064/065	2065/066
<b>Capital and liabilities:</b>					
Share capital	3648051000.00	3648051000.00	3648051000.00	3648051000.00	3648051000.00
Reserve fund and cumulative profit	-695934693.59	-831727851.69	-956870290.58	- 1051448601.85	- 1306537932.99
Long term loan	<u>1966175274.06</u>	<u>1910000000.00</u>	<u>1880000000.00</u>	<u>1855000000.00</u>	<u>1840000000.00</u>
Total capital and liabilities	<u>4918291580.47</u>	<u>4726323148.31</u>	<u>4571180709.42</u>	<u>4451602398.15</u>	<u>4181513067.01</u>
<b>Assets:</b>					
Fixed assets	2535573542.54	2538914506.74	2540808279.55	2542036605.23	2543899410.47
Depreciation	= <u>1030329207.29</u>	= <u>1139753018.51</u>	= <u>1226740058.28</u>	= <u>1313812841.64</u>	= <u>1516355704.40</u>
Net value	1505244335.25	- 1399161488.23	1314068221.27	1228223763.59	1027553706.07
Assets on work-in-	<u>3058744340.13</u>	<u>3058544152.57</u>	<u>3058247055.13</u>	<u>3059465006.30</u>	<u>3059130115.71</u>

progress					
Net fixed assets	4563988675.38	4457705640.80	4372315276.40	4287688769.89	4086683821.78
Fixed deposit	60000000.00	70000000.00	67500000.00	45000000.00	45000000.00
Short term loan	3400000.00	3400000.00	3400000.00	3400000.00	3400000.00
Share investment	4853062.00	7695000.00	7695000.00	7695000.00	7695000.00
Total fixed assets	4632241737.38	4538800640.80	4450910276.40	4343783769.89	4142778821.78
<b>Current assets:</b>					
Inventory	396295521.80	361829425.02	396523328.94	462152291.00	469265206.97
Cash and bank	15054909.59	16312202.40	45853821.11	22039692.89	39539197.12
Advance paid, Advance, deposit	<u>163844967.18</u>	<u>179583784.08</u>	<u>193692085.96</u>	<u>220395858.12</u>	<u>256605876.41</u>
Total current assets ( A)	<u>575195398.57</u>	<u>557725411.50</u>	<u>636069236.03</u>	<u>704587841.97</u>	<u>765410280.50</u>
<b>Less:- Current liabilities and provision:</b>					
Other payable	4022355267.25	436006594.60	53859205.16	5766899957.15	656129173.36
provision	<u>35861270.04</u>	<u>45909545.74</u>	<u>51682088.74</u>	<u>57317001.99</u>	<u>70546861.91</u>
Total current	<u>438096537.29</u>	<u>481916140.34</u>	<u>590274293.90</u>	<u>634006959.14</u>	<u>726676035.27</u>

liabilities ( B)					
Net current assets ( A-B)	137098861.28	75809271.16	45794942.13	70580882.83	38734245.23
Amortization expense	<u>148950981.81</u>	<u>111713236.35</u>	<u>74475490.89</u>	<u>37237745.43</u>	<u>0.00</u>
<b>total Assets:</b>	<u>4918291580.47</u>	<u>4726323148.31</u>	<u>4571180709.42</u>	<u>4451602398.15</u>	<u>4181513067.01</u>

source:- Annual audit report of UCUL from

## A.pendix – 2

### Comparative Income statement of Udayapur Cement Udhyog Limited

#### UDAYAPUR, NEPAL

For the 2061/062 to 2065/2066

particular	2061/062	2062/063	2063/064	2064/065	2065/066
Sales income	719292020.0 0	515310520.0 0	473388070.0 0	546465285.0 0	532826054.0 0
Less: sales cost	- 473084345.3 5	- 386174691.5 9	- 356558451.6 4	- 395466927.2 0	- 425480529.6 1
Total profit	246207674.6 5	129135828.4 1	116829618.3 6	150698357.8 0	107345520.3 9
Less: Adm. cost	- 3141779634	- 29684002.87	- 31881661.99	-34742625.41	-37724237.58
Less:	-1980964.08	-1369212.10	-985024.90	-1619069.00	2800614.15

Advert, and promotional Expenses					
Total administrative & advertisement expenses	- 33398760.42	- 31053214.97	- 32866686.89	-36361694.41	-40524851.71
Operating profit	212808914.23	98082613.44	83962931.47	114336663.39	66820668.66
Other income	9113410.53	9888534.84	9897755.57	10096230.66	10422721.17
Bad debt	-45420.00	0.00	0.00	0.00	0.00
Interest expenses	.- 101028208.15	- 97102749.70	- 94679167.00	-93809028.33	-92525344.74
Depreciation expenses	- 111392764.59	- 109423811.22	- 87026181.25	-87072783.36	- 202532862.77
Amortization expenses written off	- 37237745.46	- 37237445.44	- 37237745.46	-37237745.46	-37237445.43
profit/loss before income tax	- 27781813.44	- 135793158.10	- 125082406.67	-93686663.10	- 255052566.14
income tax	0.00	0.00	0.00	0.00	0.00

provision					
Net profit & loss	- 27781813.44	- 135793158.1 0	- 125082406.6 7	-93686663.10	- 255052566.1 4
Adjust ( Last year p/L )	-3510563.07	0.00	-600032.22	-891648.17	-36765.00
Balance last year	- 664642317.0 8	- 695934693.5 9	- 831727851.6 9	- 956870290.5 8	- 1051448601. 85
Transfer to balance sheet	- 695934693.5 9	- 831727851.6 9	- 957410290.5 8	- 1051448601. 85	- 1306537932. 99

Source: Annual report of Udayapur Cement Udhyog Limited from fly 2061/062 to 2065/066