

**THE IMPACT OF CASH MANAGEMENT ON SUSTAINABILITY
OF SMALL MANUFACTURING BUSINESS IN DHULIKHEL
MUNICIPALITY**

**A Thesis
Submitted
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CERTIFICATION OF AUTHORSHIP

I certify that the work in this thesis has not previously been submitted for a degree or has it been submitted as part of requirement for a degree except as fully acknowledge within the text.

I also certify that the thesis has been written by me. Any help that I have received in my research work and the preparation of the thesis itself has been acknowledged. In addition, I certify that all information sources and literature used are indicated in the reference section of the thesis.

Prashun Shrestha

November, 2020

RECOMMENDATION LETTER

It is certified that thesis entitled **THE IMPACT OF CASH MANAGEMENT ON SUSTAINABILITY OF SMALL MANUFACTURING BUSINESS IN DHULIKHEL MUNICIPALITY** submitted by Mr. **Prashun Shrestha** is an original piece of research work carried out by the candidate under my supervision. Literary presentation is satisfactory and the thesis is in a form suitable for publication. Work evinces the capacity of the candidate for critical examination and independent judgment. Candidate has put in at least 60 days after registering the proposal. The thesis is forwarded for examination.

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APPROVAL SHEET

We, the undersigned, have examined the thesis entitled **THE IMPACT OF CASH MANAGEMENT ON SUSTAINABILITY OF SMALL MANUFACTURING BUSINESS IN DHULIKHEL MUNICIPALITY** presented by Mr. **Prashun Shrestha**, a candidate for the degree of **Master of Business Studies (MBS)** and conducted the viva voce examination of the candidate. We here by certify that the thesis is worthy of acceptance.

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Prashun Shrestha
Researcher

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ABBREVIATIONS

CCC	:	Cash Conversion Cycle
CD	:	Certificate of Deposit
CSE	:	Common Stockholder's Equity
EAT	:	Earning After Tax
EOQ	:	Economic Order Quantity
GDP	:	Gross Domestic Product
HR	:	Human Resource
IRT	:	Intermodal Rail Freight Transport
KPI	:	Key Performance Indicators
LM	:	Liquidity Management
NPS	:	Net Promoter Score
ROE	:	Return on Equity
ROTA	:	Return on Total Assets
R^2	:	Coefficient of Determination
SD	:	Standard Deviation
SME	:	Small and Medium-sized Enterprises
SPSS	:	Statistical Package for the Social Science

ABSTRACT

Small businesses are vital for employment and job creation in Nepal. The implementation of sound cash management practices is essential to ensure to profitability and sustainability of any successful business. The commonly used expression, “Cash is king” cannot be contested as its validity was more prevalent in this research study. The aim of the study was to identify the current cash management practices of small and medium manufacturing businesses in the Dhulikhel Municipality and identify the impact of such practices on their profitability and sustainability.

The objectives of the study are to find the current position of cash management practices of small and medium manufacturing businesses. Some specific objectives of the study to find the effect of cash management on profitability of small and medium manufacturing businesses and the effect of cash management and sustainability of small manufacturing businesses in Dhulikhel Municipality.

There was an insignificant relationship between Cash management and sustainability. This descriptive study, using a quantitative research paradigm and a sampling method targeted a sample of more than 50% of registered businesses in the chosen area. The sample structure consisted of small manufacturing businesses in the Dhulikhel Municipality.

The findings of this study could be useful to potential, emerging and established owners of all types of businesses since effective and efficient cash management is an integral component of any successful business. There should be more emphasis placed on the impact of how proper cash management practices can affect profitability and sustainability of small and medium manufacturing businesses.

CHAPTER I

INTRODUCTION

1.1 Background of study

Cash management is essential to every business that desires to meet up with its short-term financial obligations. Akinsulire (2003) asserts that the success of any business venture is predicated on how the management has planned and controlled its cash flows. According to Olowe (2008), cash management is concerned with the efficient management of cash so as to achieve an optimum level of cash in the firm's working capital. Cash represents the basic input necessary to start and keep a business running. A company needs to maintain sufficient cash to keep its business running smoothly. Cash shortage will disrupts the firm's operation and can even lead to insolvency. Excessive cash will tie down unnecessarily long-term capital with a result that the return on capital employed will be low. A firm thus needs to maintain sound cash position.

The importance of the SME sector is well recognized worldwide due to its significant contribution to gratifying various socio-economic objectives, such as higher growth of employment, output, promotion of exports and fostering entrepreneurship. Recent empirical studies show that SME's contribute to over 55% of GDP and over 65% of total employment in high-income countries. SME's and informal enterprises, account for over 60% of GDP and over 70% of total employment in low-income countries, while they contribute over 95% of total employment and about 70% of GDP in middle-income countries. In the European Union countries, for example, there are some 25 million small businesses, constituting 99% of all businesses; they employ almost 95 million people, providing 55% of total jobs in the private sector. (OECD, 2004).

Most of the Nepalese SMEs are involved in processing and manufacturing of food items, consumer and household goods, and textiles and related products, both for exports as well as the domestic market. Rice, pulses, oil and flour mills, dairy, aerated soft drinks, fruit juices and processed products, noodles, biscuits and light snack products, chocolates and candy, mineral water, dried vegetables, and some other household utilitarian and consumption goods have dominated SMEs activities in Nepal. Other areas of SMEs' involvement include forest fiber based industries, wooden and metal handicrafts, handmade paper and products, apparels and garments, woolen

carpets, pashmina shawls and rugs and leather. SMEs' involvement is also high in metal and plastic household utensils, wooden, plastic and metal furniture, printing press, polythene pipes, utensils, jute products, poultry products, livestock products, wire drawing, nail and iron rod, sheet metal, gig and black pipes, rubber tires and tubes, plywood and boards, color paint products and zinc oxide. Agro-based industries like tea, vegetables and horticulture products, dairy and milk products, animal husbandry and floriculture are other areas where SMEs have started to invest. Due to the opening up of investment for infrastructure development to the private sector, investment in micro hydropower and tourism resorts and complexes have also been witnessed in some regions. At the micro, cottage and family level, a sizeable number of unregistered enterprises operate on a seasonal basis.

However, too often, businesses fail before they have a chance to succeed because they run out of cash. Research statistical analysis indicates that the most crucial cause of business failure is due to the lack of planning. Thus sound cash management practices is essential to ensure profitability and sustainability to make business a success. A large number of businesses fail due to the absence of cash rather than the absence of profits. Patel (2010) indicates that cash flow management is vitally important for the business profitability, future planning and sustainability. The practice of basic concepts of cash flow management will assist businesses to plan for the unforeseen eventualities. One possible reason for this prevalence could be that small business owners are not equipped to identify the problem areas within their businesses, due to the lack of necessary skills and tools. Likewise, many small business owners do not perform many cash management practices because they feel that they are unnecessary and time consuming.

This study will investigate the impact of cash management practices on the profitability and sustainability of small businesses.

1.2 Statement of the problem

These small businesses cannot be the platform for growth and development if they are not profitable and sustainable. One possible reason for this prevalence is that small business owners are not equipped to identify the problem areas within their businesses, due to the lack of necessary skills and tools to increase profitability and sustainability.

Cash necessitates proper monitoring, protection, control and better employment Marie (2001). Efficient cash management practices are much more than prevention of bankruptcy and entail reduction of the risk a company is exposed to Maness (2002). Good cash management practices are greatly argued to an urgent need of Bottled water purifying companies. Puntland Bottled Purified water companies are owned by local business people and they rely on their employees to deliver the products to their customers such as tea shops, restaurants, Grocery shops, food stores, Hotels, government and non-governmental offices. Previous Bottle Purified Companies got bankrupt like Shifo and Xareeda water companies and the current companies are in risk of the same because timing is important even if their business was profitable at that time, they ran into problems because the payments from customers come in too slowly, and they had too many outflows while they were waiting their customers to pay.

In the similar way the small businesses that are being operated in Dhulikhel Municipality might also be facing similar problems of cash management that it not yet known to us. It is not known if the owners of small business are following any cash management tools to better manage their cash and business operations. Also it is also not known how well they are managing their businesses in terms of cash management. This problem would be addressed with this study.

This problem would be addressed by looking for answers for the following research questions.

- i. What are the prevailing cash management practices of small manufacturing businesses within the domain of Dhulikhel Municipality?
- ii. What are the relationship between cash management and profitability?
- iii. What are the impacts of cash management on sustainability of small manufacturing businesses?

1.3. Purpose of the study

The general purpose of the study is to identify the current cash management practices used by small and medium businesses in the Dhulikhel Municipality and identify the impact of such practices on their profitability and sustainability. The specific purposes of the research are as follows:

- i. To assess the status of cash management practices of small and medium manufacturing businesses.

- ii. To examine the effect of cash management on profitability of small manufacturing businesses.
- iii. To evaluate the effect of cash management on sustainability of small manufacturing businesses.

1.4. Significance of the study

This study will contribute to existing literature on cash management on profitability and sustainability in small business in Dhulikhel Municipality. The purpose of the study is to investigate the impact of cash management practices on profitability and sustainability of small retail businesses in the Dhulikhel Municipality. Part of the study will also ascertain whether certain cash management practices are being performed in small businesses and, what are the challenges faced? Many small businesses face liquidity problems and eventually fail due to the lack of cash management knowledge and implementation. It is vital to have viable small businesses in developing communities as these businesses provide the basic necessities of the community. Therefore, this study will directly benefit these communities. This study will equip business owners with sound management practices which will ensure the profitability and sustainability of their businesses.

1.5. Limitations of the study

This study tries to examine the impact of cash management on sustainability of small manufacturing business in Dhulikhel Municipality, still it has its own restrictions which are as below.

- i. This study addresses cash management practices used to tackle profitability problems.
- ii. This study is based on surveys of the owners or suitable representatives of each business in the sample.
- iii. This study is restricted to determining whether or not small business owners are adequately managing their cash practices and if they have the necessary skills and knowledge to perform cash management practices.
- iv. This study will not investigate economic development and other business-related aspects. Therefore, the findings of this study cannot be generalized to all types of small businesses in Dhulikhel Municipality.

1.6. Chapter plan

The study is divided into five chapters.

Chapter I: Introduction

This chapter explains background of the study, statement of the problem, objectives of the study, significance of the study, research hypothesis and limitation of the study.

Chapter II: Review of literature

This chapter include review of literature which incorporates the theoretical review, the review of previous studies, conceptual framework and research gap.

Chapter III: Research methodology

This chapter includes research design, justifications for the selection of the unit, population and sample size, nature and source of data, data collection procedures, data processing and analysis tools.

Chapter IV: Results

This chapter consists of data presentation and analysis. This chapter includes data presentation, data analysis and major finding of the study.

Chapter V: Conclusion

This chapter includes the summary, conclusion and implication of the study.

CHAPTER II

REVIEW OF LITERATURE

2.1 Conceptual review

This chapter is basically concerned with review of literature relevant to the cash management on profitability and sustainability on small manufacturing businesses. It is the way to discover what other research has uncovered in the area of our problem. Every research is based on previous knowledge. The past knowledge or the previous studies provide necessary information to the present study so that it cannot be ignored. The purpose of the literature review is to find out what other studies have been conducted in one's chosen field of study. It provides the foundation for developing a comprehensive theoretical framework from which hypothesis can be developed for testing. Therefore, this chapter has its own importance. This chapter is divided into following parts.

2.1.1 Cash management concept

Cash management is a broad term that refers to the collection, concentration, and disbursement of cash. The goal is to manage the cash balances of an enterprise in such a way as to maximize the availability of cash not invested in fixed assets or inventories and to do so in such a way as to avoid the risk of insolvency. Factors monitored as a part of cash management include a company's level of liquidity, its management of cash balances, and its short-term investment strategies (Springer, 2005).

Cash management refers to the management of an entity's cash to ensure sufficient cash to sustain the entity's daily operations, finance continued growth and provide for unexpected payments while not unduly forfeiting profit owing to excess cash holdings (Bartlett et al. 2014).

According to Pandey (2004), as cited by Akinyomi (2014), cash management is defined as a practice of the ability of controlling the cash inflows and outflows in a business. It also entails the ability to establish the cash balances that are held in a business at all times. Uwuigbe, Uwalomwa and Egbide (2011) indicated that cash management entails taking the needed precautionary measures to ensure that adequate cash levels are maintained in the business so that the operational requirements could be met. According to Aliet (2012), cash management is the management of cash to maximize the cash held

in the business that is not invested in buying inventory or fixed assets. It essentially is the management of cash to avoid the risk of the business becoming insolvent. The author added that cash management is a rather broad term that refers to the collection, management of cash as well as the payment of cash from the business.

Waltson and Head (2007) explained Cash management as the concept which is concerned with optimizing the amount of cash available, maximizing the interest earned by spare funds not required immediately and reducing losses caused by delays in the transmission of funds.

According to Zimmerer et al (2008) cash management is the process of forecasting, collecting, disbursing, investing, and planning for cash a company needs to operate smoothly. They further added that cash management is a vital task because it is the most important yet least productive asset that a small business owns. A business must have enough cash to meet its obligations or it will be declared bankrupt. Creditors, employees and lenders expect to be paid on time and cash is the required medium of exchange.

However, some firm retain an excessive amount of cash to meet any unexpected circumstances that might arise. These dormant cash have an income-earning potential that owners are ignoring and this restricts a firm's growth and lowers its profitability. Investing cash, even for a short time, can add to company's earning. Proper cash management permits the owner to adequately meet cash demands of the business avoid retaining unnecessarily large cash balances and stretch the profit generating power of each dollar the business owns (Zimmerer et al, 2008).

2.1.1.1 Key indicators in cash management

Without adequate cash flow, a firm can become technically insolvent even though assets far out way the liabilities. To reduce the chances for a firm becoming technically insolvent, the following parameters have been recommended to be employed in evaluating the effectiveness of a cash management system. This includes:

Cash conversion cycle

Operation cash flows

Working capital

Inventory management

2.1.1.2 Cash conversion cycle

This is the time interval between actual cash payment/expenditure for the purchase of productive/operational resources and the ultimate collection of cash from the sales of products/services. The cash conversion cycle provides a valid alternative for measuring company liquidity. The longer the time taken to get back the money paid out, the more the likelihood the organization is to face technical insolvency and vice versa.

2.1.1.3 Operational cash flows

Cash flows from operations are the amount of cash a firm generates in a measured time from its operation. Various methods are used to determine the amount of operating cash flow. The prevalent methods use the income statement and the balance sheet to prepare the cash flow statement (also called statement of sources and application of funds). (Kasilo, 1997).

Positive cash flows indicate how much cash the organization has generated from operations during the financial year. Negative cash flows indicate how much additional cash has been used to support the operations during the same period. Usually, a firm with negative cash flow from operations is unable to finance its operations. De facto, it is consuming cash flows rather than generating them. It becomes prone to technical insolvency problems and it may go bankrupt. (Kasilo op cit: 30, Vause and Woodward op sit: 99).

Cash flow accounting involves the reporting of classified list of last year's cash flows, and a set of forecast cash flows, with supporting analysis of the variances between last year's actual and forecast cash flows. It therefore emphasizes the most fundamental events in business activities, cash flows into and out of the firm, and the segregation of past (cash) facts from future estimates, accounting time period allocation, based on estimates of consumption are avoided (Vause and Woodward, 2001).

The result is a set of statements that is objective, understandable and simple, and which meets the needs of a variety of users concerned with stewardship, liquidity, performance appraisal and investment. In particular, cash flow accounting meets one of the fundamental accounting objectives, "to provide information useful to investors and creditors for predicting, comparing and evaluating potential cash flows to them in terms of amount, timing and related uncertainty."

Cash flows provide data, which, because it is properly dated, can be discounted at a rate, selected by the user, and which does not require level adjustments, although comparisons over time require, and the data permit general price level adjustment to a base period.

Finally, the use of a cash flow statement integrates trading activities and investments, dividends and financing policies, unlike information presented in profit and loss account and balance sheet format.

However, critics of the cash flow system argue that cash flow reports can be distorted, for example, by delaying payments to creditors, and as they ignore non-cash changes in assets and liabilities, including holding gains and losses, so that no estimate is provided of the extent to which these flows were obtained by consumption of assets. Operating cash flows have also been found to be poor predictors of failure. (Arnold and Weir 1988).

2.1.1.4 Working capital

Cash that is immediately available is “working capital”. Working capital can be calculated by subtracting business’s existing liabilities from its existing assets. Cash on hand, accounts receivable, short-term investments are included, as well as accounts payable, accrued expenses, and loans are all part of this key performance indicator (KPI) equation.

This especially meaningful KPI informs the condition of the business in terms of its available operating funds, by showing the extent to which available assets can cover short-term financial liabilities.

2.1.1.5 Inventory management

Kincaid (2008) emphasized that proper inventory control procedures could enhance a bigger profit in the business. In the slower moving economy, streamlining business operations and focusing on what the majority of the business cash is tied up in could mean the difference between much needed profits or unwanted losses.

Barrera (2013) stated that it’s easy to turn cash into inventory but it’s not easy to turn inventory into cash. Barrera found that when inventory is sold and floor space is freed

up, the business profitability really changes. The slow moving inventory should not increase to more than 5% of all inventory stocked in the business.

2.1.2 Profitability

Aliet (2012) indicated that profitability is defined as an income generated in the business which is calculated by subtracting the expenses from the revenue. The author went on by indicating that the word profitability derives from the word “profit” denoted by the Greek letter “π”. This is defined as the difference between the total revenue of a business and the total cost of a business.

Kew and Watson (2012) provided definitions from four different sources. The authors first gave the English dictionary definition: “advantage, benefit/financial gain; excess of returns over outlays”. The second definition was from a Business dictionary: “the excess of the selling price of the article or service being sold over the cost of providing it”. Kew and Watson (2012) also provided a definition from a director of a professional services company: “income less expenditure, not cash”, and, lastly, a textbook on finance: “income less expenditure for a given period”.

Karuru (2005) has indicated that profitability is the difference between the sales generated by a business and the expenses incurred during the business operations. The author also emphasized that it is important to maximize the sales amount of a business by significantly reducing the expenses incurred in the business.

Brinker (2002) agreed with Karuru (2005) by stating that the definition of profitability is the difference between the revenue and the operational expenses incurred in the business. The author also added that all businesses should aim at significantly reducing their operational expenses and aim at increasing their incomes to maintain a positive net income. This positive net income is referred to as a profit.

The above definitions indicate that profitability is a positive balance after calculating the difference between the businesses sales and the operational expenses i.e., Profit = Sales – Expenses.

2.1.2.1 Return on total assets (ROTA)

Return on assets indicates the profitability on the assets of the firm after all expenses and taxes (Van Horne 2005). It is a common measure of managerial profit (Ross,

Wester field, & Jaffe 2005). It measures how much the firm is earning after tax for each dollar invested in the assets of the firm. That is, it measures net earnings per unit of a given asset, moreover, how corporate firms can convert its assets into earnings (Samad & Hassan 2000). Generally, a higher ratio means better managerial profit and efficient utilization of the assets of the firm and lower ratio is the indicator of inefficient use of assets. ROA can be increased by firms either by increasing profit margins or asset turnover but they can't do it simultaneously because of competition and trade-off between turnover and margin. ROA is calculated as under:

$$ROA = \frac{\text{Net Asset after Tax}}{\text{Total asset}}$$

According to Gillingham (2001) indicated that the return on assets of these corporate firms can be measured to identify whether the total assets are idle or not and he derived the method which can be used to measure the return of total assets which is;

$$\text{Return on Investment} = \frac{\text{Earning after tax (EAT)}}{\text{Total Assets}}$$

Where assets total is a function of current assets plus fixed assets and also in his conclusion, he stated that the higher ration in relation to the industry average ration shows that the total assets are having much return to the investors and the lower ratio compared to the industry average shows that assets are idle.

2.1.2.2 Return on equity (ROE)

Return on equity indicates the profitability to shareholders of the firm after all expenses and taxes (Van Horne 2005). It measures how much the firm is earning after tax for each dollar invested in the firm. In other words, ROE is net earnings per dollar equity capital. Also an indicator of measuring managerial efficiency [(Ross1994). By and large, higher ROE means better managerial profit; however, a higher return on equity may be due to debt (financial leverage) or higher return on assets. Financial leverage creates an important difference between ROA and ROE in that financial leverage always magnifies ROE. This will always be the case as long as the ROA (gross) is greater the interest rate on debt (Ross, Westerfiled, &Jaffe 2005). Usually, there is higher ROE for high growth companies. ROE is calculated as under:

$$ROE = \frac{\text{Net Profit after Tax}}{\text{Shareholder's equity}}$$

2.1.2.3 Net profit margin

Net Profit Margin (also known as “Profit Margin” or “Net Profit Margin Ratio”) is a financial ratio used to calculate the percentage of profit a company produces from its total revenue. It measures the amount of net profit a company obtains per dollar of revenue gained. The profit margin is equal to net profit (also known as net income) divided by total revenue, expressed as a percentage.

$$\text{Net Profit Margin} = \frac{\text{Net Profit}}{\text{Revenue}}$$

Where net profit = revenue - cost of goods sold. A high net profit margin ration indicates high sales, efficient management and profitability which higher selling prices, low-costs of goods sold, whereas a low gross profit margin ratio indicates low profitable firm. But in order to come up with that analysis, the ratio obtained should be compared to the industry average ratio.

2.1.3 Relationship between cash management and profitability

The study by Pandey (2001) in support of above added cash management is very important to these firms this is because a firm needs cash to invest in inventory receivable and fixed assets and to make payments to operating expenses in order to maintain growth in sales and earnings, he further explained that the firm may make adequate profits, but may suffer from shortage of cash because its growing needs may be consuming cash very first so that management should look to ways of increasing cash inflows to the firm and minimizing cash outflows like delaying of operating expenses like rent then the surplus cash may be managed into an investment portfolio thus increasing the profitability of these firms.

This study concurred with the study Saleemi (2002). If effective cash management is not monitored in these firms there were no firms that attain the desired levels of profits and these firms fortunately will end up closing because of failing to achieve the said main objective. He further elaborated that if cash management is purely monitored, it becomes easy to implement and plan for the profits to be generated by these firms and therefore it is only through effective implementation of cash management that firms get desired profit set levels.

In another study, this was conducted by Kakuru (2005), indicates that these firms in any period was both cash receipts and cash disbursement with the net balance either

a surplus or a deficit and to ensure that if cash receipts and disbursement are synchronized the management should aim at a zero balance that is to say in investing the surplus cash for profitability.

He further explained that if in case of a deficit the firm should aim at increasing the cash inflows to the firm that is by motivation customers to settle their debts in time, reducing the period it takes for payment from its clients which increased the availability of cash and these surplus cash finally invested for profit maximization in these firms.

2.1.4 Sustainability

Findings from a survey done by Berns (2009) at the Massachusetts Institution of Technology indicated that there is no single established definition for sustainability in the business context. Different businesses define the term sustainability in numerous ways. Some businesses define the term purely on the environmental impact while other focus on the social and personal impact. Some businesses look at sustainability in the financial viability of the business for the future period. The author went on by indicating that 40% of businesses defined business sustainability by indicating that it is regarded as maintaining business viability. 60% of businesses defined sustainability in one of the two widely accepted definitions: the Brundtland Commission definition and triple bottom line definition.

2.1.4.1 Productivity

Productivity is a fundamental concept in economic analysis. The evolution of mid-to-long-run economic growth — which is a crucial assumption of analyses, on fiscal sustainability, for instance — relies substantially on perspectives on productivity growth. Productivity is also important in the light of short-run economic dynamics. For example, when an economy grows, the desirable policy accompanied by a rise in productivity will be totally different from that without the rise. Considering monetary policy, immediate monetary policy tightening is not necessary if an economy grows with a rise in productivity and labor market conditions are not tight. By contrast, central banks should be cautious about economic growth without rising productivity, because economic bubbles and accelerated inflation are fairly likely to happen through economic overheating. While it is widely recognized that productivity is conceptually important, measuring productivity is quite difficult. One challenge in measuring

productivity is that productivity measured in real time will be revised due to revisions to its source data. (Naoko Hara, HibikiIchiue, 2011).

2.1.4.2 Investment cost

Investment decreases with idiosyncratic risk, and is positively correlated with past profits, past investment, and managerial compensation even with time-invariant investment opportunities. Optimal contracting involves deferred compensation, possible termination, and compensation that depends on exogenous observable persistent profitability shocks, effectively paying managers for luck. Behdani and Wiemans (2017), shows that handling costs only play a marginal role in the scientific research in intermodal rail freight terminals (IRT). This is remarkable given the large role costs occupy in decision-making in freight transport. Furthermore, the used cost levels show a wide range of proposed amounts and terminal sizes or handling technologies are seldom addressed. Finally, many of the scientific papers do not make it clear whether the average transshipment cost or market price is referred to. Next, the analysis of the investment in, and cost structure of, IRTs shows that IRT investments are very capital-intensive leading to relatively high average costs per handling. However, given the cost characteristics of IRTs, the average cost per handling represents the underlying cost structure and are – in this sense – representative. The cost analysis demonstrates that extra-large IRTs actually have the lowest average handling costs, followed by small IRTs.

2.1.5 Relationship between cash management and sustainability

The study by Unvi (2014) also investigated the major causes for their failure. 46% indicated that the major cause was business owner incompetence. The specific pitfalls were poor collection and control of debtors' payments, no knowledge of pricing, lack of planning and budgeting, no knowledge of financing and no experience in record keeping.

30% of the failed businesses indicated that their major cause was unbalanced experience or lack of managerial experience. The specific pitfalls were poor credit granting practices and inadequate borrowing practices.

According to Bornstien and Scarborough (2007) revealed that small business owners do not know how to run a business or manage cash flow. Obtaining credit for financing

the business does not guarantee its success or viability. The authors indicated that the businesses which employed less than 5 people only had a 37% chance of being sustainable for more than four years and the chance of it surviving for more than 10 years was just 9%. Common reasons for business failures were: the lack of management expertise, and the lack of record keeping knowledge from the owners' part or how to manage inventory. Bornstien and Scarborough (2007) also indicated that small business owners fail because they use five hats. They take on too many responsibilities in the business and find it challenging to manage, control, and successfully run a business.

Ibarra (1995) and Van Auken and Howard (1993), as cited by Salazar (2012), indicated that crucial factors for business failure are the restricted access to funds and capital, poor financial planning, unexpected growth and inability to cope with increased sales as well as poor forecasting. Many of these causes of failures could be avoided with implementing planning and forecasting strategies in the business.

According to the American Express OPEN Small Business Monitor, a survey was done targeting business owners. The results indicated that more than 60% of business owners showed concern about not having cash available to pay obligations for the future months ahead (Flynn 2009).

2.2 Review of pervious works

2.2.1 Review of general articles

2.2.1.1 Baumol model theory

Baumol model developed by using William Baumol it's far a derivative of the economic order quantity (EOQ) version. The model assists in deciding optimal cash balances to be held in organizations. It treats cash as an inventory item and buying and selling investment transactions to be the ordering fees. This aims at minimizing the fixed fee of purchasing and selling investment transactions and significantly reduces the possibility fee of holding too much unnecessary cash. Just like in EOQ Baumol is a - step components. Step one is to determine the most excellent transaction size. Step two is to determine the top of the line range of transactions in duration. Average cash holdings might be one half of the ultimate transaction size.

In the Baumol version of cash management there is a tradeoff between possibility cost or wearing fee or conserving cost & the value of the transaction. Baumol version of

cash control facilitates in figuring out a firm's most desirable cash stability beneath reality. It is drastically employed because it is beneficial for the purpose of cash management. As according to the model, cash and inventory control issues are synonymous. William J. Baumol evolved a version (The transactions demand for cash: An inventory Theoretic approach that is popularly in inventory management & cash control).

2.2.1.2 Miller and Orr's cash management model

Miller and Orr (1966) model of cash management elucidates that companies allow their cash balances to move within two limits, that is, upper and lower limit. Companies therefore buy and sell their marketable securities in the event that cash balance is on the lower or the upper limit. The model provides a framework for determining the optimum cash balance and the point at which to sell securities in order to raise cash. Further, it provides for when to invest excess cash by buying securities and lowering their cash holdings.

2.2.1.3 Operating cycle theory

The theory postulates that incorporating working capital measures such as accounts receivable and inventory turnover into an operating cycle concept provides an appropriate view of liquidity management than does the use of traditional measures such as current and acid- test ratios. Weston (1979) noted that the additional liquidity measures recognize that life expectancies of some working capital components depend on the extent to which production; sales and collection are non- instantaneous and unsynchronized. Accounts receivable turnover indicates then speed with which firms receivables are converted to cash. A change in credit and collection policy of a firm would influence the outstanding accounts receivable balance maintained relative to the firm's annual sales. Where firms grant more liberal terms to their customers, larger and potentially less liquid current investment in receivables arise. If the sales do not increase relative to the increase in receivables then liquidity would be affected as lower receivables turnover and extended collection periods would be observed.

Inventory turnover indicates the frequency with which firms convert their stock of raw materials, work in progress and finished goods into product sales. Purchasing, production scheduling and distribution strategies adopted by firms require more inventory commitments in relation to anticipated sales. This produces a lower turnover

ratio which in turn reflects a longer and potentially less liquid inventory holding period. In the event that firms do not alter the payment practices with trade creditors and their access to short-term financing, decisions creating longer or less liquid holding periods will arise and lead to higher current ratio. Higher current ratio implies that firms have accumulated current assets such as inventory that lie idle and therefore do not generate profits (Weston 1979). It is further argued that the length of the firm's operating cycle is based on the cumulative days per turnover for receivables and inventory investments. Incorporating the two measures of working capital measures provides an arguably realistic approach to firm's liquidity position. However, the operating cycle concept fails as a cash flow measure since it doesn't consider the liquidity requirements imposed on a firm by the dimension of its current liability commitments.

2.3 Review of previous studies

Muya and Gathogo (2016), study revealed that average payment period and cash conversion cycle were significantly related to profitability of manufacturing firms. More so, it was established that cash conversion cycle had a negative effect on firm's profitability. However, average payment period positively influenced profitability. In general, it was revealed that cash management significantly and positively influenced firm's profitability. It is recommended that manufacturing firms should shorten their cash conversion cycle and extend payment period.

An article made by Mungal and Garbharran (2014), had study about a significant relationship between cash management knowledge and managing cash flow. This study revealed a correlation between profitability in the business and implementation of cash management practices as well as a correlation between the challenges of cash management practices and their ability to ensure profitability in their business. This paper recommended that businesses should implement cash management procedures to eliminate cash management difficulties. The purpose of this paper was to identify the cash management challenges faced by small businesses in a developing community.

Akinyomi (2014), study found that only limited studies have investigated the relationship between cash management and profitability in Nigeria. Therefore, this study examined the relationship between cash management and profitability in the Nigerian manufacturing firms. Correlation and regression analysis were carried out. The results reveal a positive and significant relationship between CCC and ROE on one

hand and a non-significant negative relationship between CCC and ROA. From the results of the study, it is recommended that future researchers should expand the scope of their studies to include multiple sectors of the economy. Cash management assumes more significance than other current assets because cash is the most important asset that a firm holds.

An article made by Ahmad (2016), study explored the extent of cash management practices applied in the micro and small businesses in four main states in Peninsular Malaysia. Overall findings of this study showed that cash management practices in these states are high. However, the results show that the internal control on cash management has very low implementation level. Thus, the capital providers need to re-educate the entrepreneurs on the importance of having good internal control on cash management in order to avoid any manipulation, cash shortage and other financial issues. Besides that, the result of this study is important to ensure the effectiveness of cash management in order to be able to support the financial sustainability of the business.

Enow and Kamala (2016) in this research, study found that most of the sampled SMMEs manage their cash effectively. However, only a minority of these entities hold cash for speculative purposes or even invest their surplus cash gainfully, thus, they fail to optimize on their scarce cash resources. Likewise, only a minority of the SMMEs employs computers for managing their cash, which is rather surprising given the proliferation of computers at a low cost in South Africa. The main objective was to investigate the cash management practices of small, medium and micro enterprises (SMMEs) in the Cape Metropolis, in South Africa. Data are collected from a sample of 200 SMMEs by means of a closed-ended questionnaire survey.

The study revealed that the majority (77.78%) of respondents have no knowledge about cash control procedures. The absence of appropriate cash management procedures has contributed significantly to the exposure of these enterprises to financial impropriety and misapplication of cash as a resource, leading to slow growth of most of the businesses. The study recommended, among other things, the need to initiate capacity building, training and sensitization of micro and small-scale business operators on cash management practices. Therefore, this study explores the extent of cash management practices applied in the micro and small businesses (Attom, 2012).

The main objective of the research presented here is to provide empirical evidence about the effects of working capital management on the profitability of a sample of small and medium-sized Spanish firms. With this in mind, we collected a panel of 8,872 SMEs covering the period 1996-2002. The results, which are robust to the presence of endogeneity, demonstrate that managers can create value by reducing their firm's number of day's accounts receivable and inventories. Equally, shortening the cash conversion cycle also improves the firm's profitability.

This study proposes a new concept for sustainable manufacturing assessment framework through remanufacturing strategies in Indonesian SMEs. In this sustainable manufacturing assessment framework, the existing remanufactured products are assessed using sustainable manufacturing criterion (e.g. reliability, life cycle cost, and employment opportunity and greenhouse gases). This framework identifies improvement opportunities, including eco-efficiency, cleaner production and green technology to make existing remanufactured products technically, economically, environmentally and socially sustainable. The sustainability of remanufactured alternators produced by Indonesian SMEs has been assessed to validate the aforementioned sustainable manufacturing assessment framework (Fatimah and Biswas, 2013).

Oluoch (2016) in this research, study was carried out in Eldoret Central Business District, UasinGishu County, Kenya, and sampled 171 respondents. Questionnaires and document analysis were used for data collection. The researcher used both descriptive statistics and inferential statistics to analyze the data. This study demonstrates that cash management practices have positive and significant effect on SME performance. Consequently, the paper recommends that SMEs should put emphasis on proper cash management practices. Anchoring its discussions on findings from an empirical study, this paper premises itself on theories of liquidity and posits that cash management practices such as using proper and petty cash book have a positive impact on SME performance.

An articles made by Samantar (2017), study will use Slovene's formula to establish the sample size of 46. Questionnaires will be used to collect data; document analysis and interviews, then correlational and regression analysis will be used. Significance will be tested at 95% confidence level and 5% significant levels. Puntland Bottled Purified

water companies are owned by local business people and deliver the products to their customers. Money flows into and out of these companies on a daily basis. This paper seeks to discuss the effect of cash control and financial performance of Bottled Purified Companies Garowe and Bosaso-Puntland Somalia. Cash flow is the life blood of all organizations and is the primary indicator of enterprise health. Cash control effect on enterprise overall performance is primarily based on extraordinary models similar to that of Baumol which identified the similarities between cash and stock management.

Smirat (2016) in this research, study revealed that only (32) percent from SMEs kept track of Cash Receipts and payment. And the majority (67%) of respondents have no knowledge about cash control procedures. The study concluded that cash management practices have influence on the financial performance of SMEs. The researchers recommend to the need to for SME managers to embrace efficient cash management practices as a strategy to improve their financial performance. The researcher sampled firms operating in various sectors of economic activity. A structured questionnaire was used to collect primary data from the respondents which were analyzed to generate frequencies and percentages.

The study expected that an efficient management of working capital might have a more profound impact on profitability of small enterprises than on the performance of larger companies since a substantial proportion of the total assets of small and medium firms is constituted of the Current Assets and a sizeable fraction of their total liabilities is consisted of the Current Liabilities. This study, aims to determine the potential effect of working capital management on the profit performance of Small and Medium sized firms in Pakistan. To investigate, effect of working capital management was determined on profitability of a sample of 40 Pakistani small and medium enterprises (SME's) listed in Karachi Stock Exchange for a period of six years from 2003 to 2008 which led to a total of 240 firm-year observations. Findings from the analyses suggested that indicators of working capital management had a perceptible impact on profitability of firms under study (Afeef, 2011).

This study sought to analyze effect of cash management practices (cash holding practices, use of technology and cash pooling practices) as well as analyze the combined effect of the cash management practices on financial performance of SMEs in Nyeri town, Kenya. The study employed a descriptive research design with target

population being the registered SMEs in Nyeri town. Data was collected using a self-administered semi structured questionnaire from a sample population of 62 SMEs operating in Nyeri town and registered by the business registrar's office in Nyeri County. Data was analyzed using statistical package for social sciences (SPSS) to generate descriptive and inferential statistics. Results obtained indicated that cash holding practices and use of technology in cash management had a relevant effect on financial performance of SMEs in Nyeri. The study recommended that all stakeholders in business operations ranging from suppliers, customers, and financiers should embrace use of technology to facilitate electronic data interchange. Future research could focus on comparative study of large organizations to establish whether the same factors affecting SMEs financial performance also affect large businesses (Kinyanjui and Kiragu, 2017).

The purpose of the study was to examine the relationship between cash management policies adopted by selected SMEs and survival of SMEs in Uganda, with a case study of Kampala district. The study was descriptive in nature and both primary and secondary data was later used to revolve the objectives of the study that is: To examine cash management the effectiveness of policies adopted by the selected SMEs; to establish survival of SMEs, and to establish the relationship between cash management and survival of SMEs. Further data was collected using questionnaires and the information obtained from the field was arranged according to themes (objectives of the study), after which it was analyzed do establish the significance of the results. The major findings of the study were cash management policies used by some of the selected SMEs were effective because; 61% and 17% use flexible and non-flexible cash management policies respectively. However, in some no any cash management policy is used, this is represented by 17%. There is a strong correlation coefficient of -0.98 which shows that there is a strong relationship between the variable. However, the relationship is collapsing. The findings also revealed that the failure rate is of SMEs is high. This is because; 80% of the selected businesses have been in operation for less than eight years and only 2% have survive for more than 16 years(Arinaitwe,2011).

Usman and Aleem (2017), this study has used panel regression models for panel data. To choose most appropriate model among these models, the current study has used Chow, Brush-pagan and Hausman tests. These test suggested that the Random Effect

Model is appropriate while Fixed Effect Model and Pooled OLS cannot be used. Residual Autocorrelation test was tested using the Breusch-Pagan LM, Pesaran scaled LM and Pesaran CD and it showed that there is no issue of Autocorrelation in the Model. Correlation test shows that all the variables are unique and have no relationship with each other. Wald test shows that error terms are homoscedastic. In the results of Random Effect Model, it is found that R-Square has a value of 62.52 % which shows that 62.52 % changes in the Dependent variables are caused by the independent variables. Probability value of F-Statistic is 0.0000 which is less than 0.05 and shows that the overall model is highly significant.

The study revealed that cash management positively affected organizational profitability with a Pearson correlation coefficient of 0.411. The adjusted R² was 0.164 implying that 16.4% of changes in GCCE profitability are accounted for by cash management. It was recommended that the whole management team and the finance manager in particular need to enforce adherence to the cash policy put into place to guide and control cash management. The study tested the hypothesis: Cash Management has a significant positive effect on organizational profitability. The study adopted both probability and non-probability sampling techniques and data was collected from a sample of 181 employees of the company (Kakeeto and Micheal, 2015).

The findings revealed that SMEs planned for their cash as a tool against misuse, embezzlement of the business funds, SMEs also employ other tools like cash banking; Staff productivity and profitability, move in the same direction; Cash inflows, outflows, and planning were all found out to influence the profits of SMES in Nigeria. Recommendations suggested include the following, organization has to put into place controls to ensure that cash is safe, customers to even pay in advanced as a way of boosting the business collections which in turn will enable allocations to be made in time, as the organizational surpluses and deficits are concerned in projects beneficial to the business, should also use more of the accrual basis of cash outflow than the cash basis in order to maintain the business liquidity at an optimal level. A descriptive study design was adopted during the study; information was obtained from primary sources using questionnaires and interviews and purposive sampling was used, and 300 questionnaires were administered and 60 respondents were interviewed and these included owners of business, manager and workers (Paul, 2015).

Uwonda and Okello (2015), study revealed limited application of cash flow management by SMEs in Northern Uganda, especially cash flow projection; tax planning; budgetary control and interpreting financial statements. As a result the study noted that most SMEs had declining levels of long-term solvency and growth. Finally the study established that cash flow control and monitoring had significant influence on the sustainability of SMEs. This study sought to examine how cash flow management influences sustainability SMEs in Northern Uganda. The research adapted a cross sectional study. A sample of 120- SMEs was selected using stratified sampling. Self-administered questionnaires, designed for this study, were filled in by SME managers and the data analyzed using frequency tables, custom tables, Correlation Analysis and Multiple Logistic Regression.

The study was revealed that investment cash flow risk management practices have no correlation between sustainable financial performances. This will give detailed idea of cash flow risk management practices involvements and the importance to the listed companies in Sri Lanka.

This research aims to explore the impact of risk management practices and how they have applied to accomplish sustainable financial performance in Sri Lanka and offer guidance to all the businesses as to how they can mitigate the risk faced by them. The research has expanded to extensive coverage of business sectors by 65 listed companies and secondary data were obtained from the annual reports publication in CSE. The statistical analysis of the multiple regression technique performed to calculate the results using e view-9 software (Wickramasinghe, 2017).

Raymond and Adigwe (2015), study found that credit policy can affect profitability management in manufacturing companies in Nigeria and there is a significant correlation between liquidity position and debtors' turnover of the company in Nigeria. Finding also shows that there is a relationship between liquidity management and corporate profitability. Based on the findings, the researcher recommends among others that there is need for companies to maintain adequate liquid assets and eliminate bad debt losses and other associated costs of credit and that company should intensify efforts to engage the services of factoring agents. This will reduce the incidence of bad debts losses and other associated costs of credit.

This study employs multiple regression analysis to measure relationship among variables, individual and overall impact on profitability and to test the operational hypotheses (Sivathaasan and Tharanika, 2013). The results revealed that whereas all independent variables explain 76.6% and 84.7% of the variance on ROA and ROE respectively where significant is at 5% levels, the overall model has a significant impact on profitability at the rate of 80.5 % (Adjusted R² = 80.5%, P < 0.05), the remaining working capital (+), growth rate (-) and firm size (+) have no significant effect on the profitability (P > 0.05).

The results showed that the general attitude towards sustainability was very positive for all businesses. No relation was found between the general attitude and the actions taken. It can be summarized that higher classified, medium size, hotels, and businesses that were part of a corporate chain took significantly more actions compared to low classified, micro size, guesthouses, and businesses that were owner managed. A high implementation of sustainable business practices correlated with a high level of benefits perceived, more strategic planning and a less intense perception of barriers. It intends to examine relationships between attitudes and actions as well as differences in attitudes and actions related to the business' characteristics (Raderbauer, 2011).

Stoica and Olsson were (2017), were utilized for a better integration of sustainability. Incorporating sustainability in the firm's values was the most effective way. This was achieved through integrating sustainability in the different HR practices; by communicating its value to employees, emphasizing it during the recruitment to assure value alignment, as well as explaining it during training activities. To examine the integration of sustainability through HR practices in SMEs, in the Jonkoping region. : An exploratory and an additive approach were used to fulfill the purpose of the thesis. The explanation building strategy was used to analyze the data. Theories from the literature were compared with the empirical findings to identify patterns, based on the categories within the HR practices. The empirical data followed a qualitative method and was based on a multiple-case study, consisting of ten interviews with SMEs.

2.4 Conceptual framework

The conceptual framework is an analytical tool used to make conceptual distinction or organize ideas. Conceptual framework of the study explains the impact of cash

management on profitability and sustainability in small and medium manufacturing businesses in Dhulikhel Municipality.

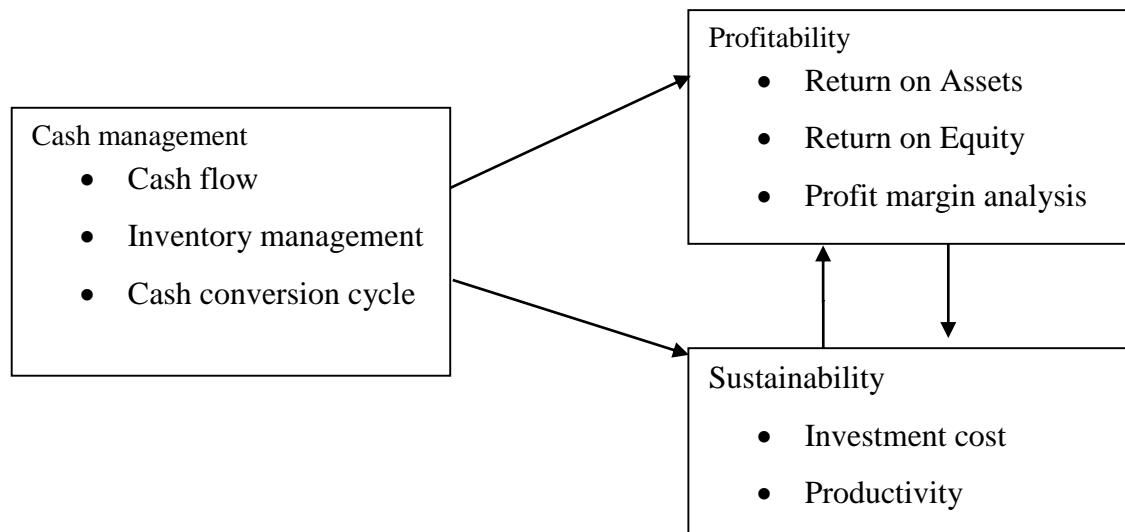


Figure 2.1: Conceptual Framework

Cash management: Cash management is an independent variable where profitability and sustainability are dependent variables. There is an inverse relationship between cash management and profitability and sustainability. Proper cash management increases liquidity and profitability position of business and drive towards long term existence.

Profitability: Profitability is dependent variable but it is also taken as an independent variable when sustainability is dependent. The long-term existence of business depends upon the profitability of that business. Business profitability is the justification of its good performance.

Sustainability: Sustainability is an independent variable when profitability is dependent. Sustainable business is more profitable. Buyers will prefer the sustainable grower. Sustainability increases revenues and reduces cost.

2.5 Research gap

Most of the previous studies showed the relationship between cash flow and profitability. But cash conversion cycle seems negative with profitability and productivity inventory management and profitability seem to be positive. But some of

the studies showed lean relationship between cash management items individually with profitability and sustainability items individually. So, the results is not conclusive. Thus, this study tried to fill the gap and draws the conclusive results.

For small and growing businesses, an efficient working cash management is a vital component of success and survival. So, this study is the source that can provide significant assistance. This study provides details about the nature of sample businesses along with their operational cash flow, cash conversion cycle, working capital, customer satisfaction and inventory management. This area is virgin area for research. This study tried to develop new literature in the field of cash management.

CHAPTER III

METHODOLOGY OF STUDY

This chapter explained the approaches the researcher used to get information on the research problem and included the research design, study population, sampling technique, data collection methods and instruments, data collection, data analysis. It also indicated the problems encountered in the study.

The research is limited to the medium and small manufacturing business in Dhulikhel Municipality. Small retail business can be defined as a form of business that purchases goods from suppliers with the aim of resale without any transformation to a certain customer. This study addresses cash management techniques used to tackle profitability problems. Therefore, the accuracy of information given in the questionnaire is limited to their knowledge of the cash management practices used in their business. This study is restricted to determining whether or not small business managers / representatives adequately have their cash techniques and if they have the necessary skills and knowledge to perform them. The literature is also restricted to cash management practices in small businesses as well as profitability. This reference period helps in establishing the effect of cash management on the profitability of small and medium manufacturing business.

3.1: Research design

This research used descriptive research design in order to examine impact of cash management on sustainability of small manufacturing business. The methods of research utilize in descriptive research are survey method of all kinds, including comparative and co-relation methods. This study emphasized detailed contextual analysis of a limited number of events or conditions and their relationships.

3.1.1: Area of study

The study is carried out in Dhulikhel Municipality main market with high number of business units. The study focused on commercial activities like retail trade business, manufacturing business and so on. Two major highway B.P. Highway and Arniko Highway passes through Dhulikhel. Dhulikhel is located at the Eastern rim of Kathmandu Valley. Its main market is at the center of this town and has more many retail businesses inside this market.

3.2: Sample size and sampling techniques

Population: The population identified for this study consisted of all small and medium manufacturing businesses situated within the Dhulikhel Municipality of Kavrepalanchok. As per the record of Dhulikhel Municipality, there are a total of one hundred fifty (150) registered small and medium manufacturing businesses. The researcher chooses to limit the study to just manufacturing businesses.

Sample: On this research more than 50% firms were taken for this study from the available population of the Small and Medium Manufacturing Businesses in Dhulikhel Municipality. Since, Small and Medium manufacturing businesses both contains similar characters. So, I choose 70 (small and medium) manufacturing businesses as a sample. The researcher approached all the small and medium manufacturing businesses in the Dhulikhel area, which form part of the population. However, the elements from the sample were selected for the convenience of the researcher. The researcher chose the businesses from the population that were readily available or those that were willing to participate in the research study.

3.3: Data collection and processing procedure

To carry out the research, primary data have been used on this study. This is raw data collected by the researcher from the field. Primary data was gathered from respondents at Dhulikhel main market through questionnaire and interview method.

3.4: Data collection instruments and methods

The researcher used a self-administered and structured questionnaire for the collection of data of the study. The questionnaire was specifically designed to accomplish the objectives of the study. After completing the questionnaire design, the process was conducted by the researcher who personally approached the business owners and explained the researcher's intentions related regards to conducting the study. The researcher also explained that the respondent's identity will not be exposed in this study. Also, the researcher personally asked questions from the questionnaire to the business owners and staff members for better understanding and reliability. The questionnaire was answered by the small and medium business owners or suitable representatives of the business owners. After receiving the response, data was decoded into excel file for further process.

3.5: Data analysis

Analysis is the systematic and careful examination of available facts so that certain conclusions can be drawn and an inference is made. This study uses the summary of descriptive statistics associated with the primary data analysis which is carried out on the basis of responses derived from questionnaire survey. Various related tools and techniques have been used for this purpose. Correlation analysis, regression analysis; Average mean and Standard deviation have been used for the analysis. For the analysis purpose, the collected data is used. The collected data are processed, analyzed and interpreted by using tools like SPSS, Ms-excel, and Ms-word etc.

3.5.1 Statistical tools

Some important statistical tools have been used to present and analyze the data for achieving the objectives such as coefficient of correlation between different variables, trend analysis which are presented below.

- a. Arithmetic Mean
- b. Standard Deviation (S.D)
- c. Correlation Analysis
- d. Regression Analysis
- e. Standard Error

A. Arithmetic mean

Arithmetic Mean is the ratio of the sum of all the observations to the number of the observations. An average gives us a point which is most representative of the data.

We have,

$$\text{Mean } (\bar{X}) = \frac{\sum X}{N}$$

Where,

$\sum X$ = Sum of all values of the observations

n = Number of observations, X = Values of variables

B. Standard deviation (S.D)

The standard deviation measures the absolute dispersion. The greater the amount of dispersion greater will be the standard deviation. In this study standard deviation can be computed in following way:

$$\text{S.D } (\sigma) = \sqrt{\frac{1}{N} \sum (X - \bar{X})^2}$$

Where,

N = Number of observations

X = Expected return of the historical data

C. Correlation analysis

Correlation Analysis is necessary in order to find out whether the selected variables in time series have any relation or not. If there is no correlation there would be no causality so this test is necessary. Correlation is a measure of the relation between two or more variables. The measurement scales range from -1.00 to +1.00. The value of -1.00 represents a perfect negative correlation, while a value of +1.00 represents a perfect positive correlation. A value of 0.00 or close to zero represents a lack of correlation.

$$\text{Correlation}(r) = \frac{\sum (X - \bar{X})(Y - \bar{Y})}{\sqrt{\sum (X - \bar{X})^2 \sum (Y - \bar{Y})^2}}$$

The value of r lies between + 1, when r =+ 1, it means there is perfect positive correlation between the variables where r = -1 it means there is perfect negative correlation between variables. However, in practice such value of r, as + 1, -1 and 0 are rare.

D. Regression analysis

In a simple regression analysis, one dependent variable is examined in relation to only one independent variable. The analysis is designed to derive an equation for the line that best models the relationship between the dependent and independent variables.

This equation has the mathematical form:

Regression Equation (y) = a+ bx

Slope (b) = (NΣXY - (ΣX) (ΣY)) / (NΣX² - (ΣX)²)

Intercept (a) = (ΣY - b (ΣX)) / N

3.6: Model specification

It is the process of determining independent variables (profitability and sustainability) to include and exclude from a regression equation.

Model I: (Profitability)

$$(P_1) = \beta_0 + B_1X_1 + B_2X_2$$

Where,

P_1 = profitability,

X_1 = sustainability,

X_2 = cash management

It is expected that, there are positive relationship between sustainability and profitability and cash management to the profitability. Profitability increase due to proper cash management and increase in sustainability.

Model II: (Sustainability)

$$(S_1) = \beta_0 + B_1X_1 + B_2X_2$$

Where,

S_1 = sustainability,

$P_1 = X_1$ = profitability,

X_2 = cash management

It is expected that, there are positive relationship between profitability and sustainability and cash management to the sustainability. Sustainability increase due to proper cash management and increase in profitability.

3.7: Variable description

There are two variables, independent variable (cash management) and dependent variable (profitability and sustainability).

- **Cash management:** Cash management is defined as a practice of the ability of controlling the cash inflows and outflows in a business. It is taken as independent variable for this study. There is a significant and positive relationship between cash management and profitability and sustainability to cash management.
- **Profitability:** Profitability is the difference between the sales generated by a business and the expenses incurred during the business operations. It is taken as dependent variable for this study. There is a significant and positive relationship between profitability and cash management and sustainability to profitability.

- **Sustainability:** Sustainability focuses on meeting the needs of the present without compromising the ability of future generations to meet their needs. The concept of sustainability is composed of three pillars: economic, environmental, and social-also known informally as profits, planet, and people. It is taken as dependent variable for this study. There is a significant and positive relationship between sustainability and cash management and profitability to sustainability.

CHAPTER IV

RESULTS

4.1 Data presentation and analysis

This chapter deals with the presentation, analysis and interpretation of information obtained from data collection related to impact of cash management practices on profitability and sustainability of small and medium scale manufacturing businesses in the Dhulikhel Municipality. To accomplish these objectives, the various related data are presented in a systematic way in tabular forms. To obtain best result, the data and information have been analyzed according to the research methodology as mentioned in Chapter Three. To find the answer of research problem, the collected data are necessary to present and analyze by processing. This chapter will present the data on table & figure. The main objective of the study is to present data and analyze them with the help of various accounting, financial and statistical tools. Data analysis was carried out using Statistical Package for the Social Sciences (SPSS). This chapter consists of analysis and presentation of empirical data.

4.2 Respondents profile analysis

It includes the analysis of respondent's profile of responding their gender, education level, age, and engaged in the business which is one of the most important characteristics in understanding their views on their dignity towards their business. It indicates the level of maturity of individuals towards their goals which becomes more important to examine the response. It also indicates about the knowledge of cash management and the various techniques used in the business.

4.2.1 Gender profile

Under the gender analysis, the respondents are male and female. The status of male and female respondents on gender analysis is shown in table 4.1.

Table: 4.1: Gender profile analysis of respondents

Gender	Frequency	Percentage
Female	26	37.1
Male	44	62.9
Total	70	100

From Table 4.1, shows that out of total 70 respondents, 26 were female with 37.1% and the number of male respondents is 44 which is the highest percentage (62.9%) than female. It shows those males are more engaged in manufacturing business than female.

4.2.2 Education profile

Under the education analysis, the respondent's education is categorized on intermediate, bachelor and master's level. The education level of respondents is shown in table 4.2.

Table: 4.2: Education profile analysis of respondents

Qualification	Frequency	Percentage
Intermediate	22	31.4
Bachelor	36	51.4
Master and above	12	17.1
Total	70	100

From Table 4.2, we can identify the education profile of various respondents. Out of 70 respondents, 22 number of respondents have studied intermediate level with 31.4%, 36 number of people have studied the bachelor with the highest percentage among other level (i.e. 51.4%) and 12 were studied masters and above with having 17.1%.

4.2.3 Age profile

Under the age profile, the respondent's age is categorized on 15-25, 26-35, 36-45, 46-55 and above 56 years. The age level of respondents is shown in table 4.3.

Table: 4.3: Age profile of respondents

Age Group	Frequency	Percentage
15-25	6	8.6
26-35	36	51.4
36-45	18	25.7
46-55	9	12.9
56 and Above	1	1.4
Total	70	100

From Table 4.3, shows the age profiles of 70 respondents. The number of 6 respondents were falls under the 15-25 age, 36 respondents under the 26-35 age, 18 respondents under 36-45 age, 9 respondents under the 46-55 ages and only 1 respondent under 56 and above age. From which we can conclude that, the age group of 26-35 have the highest percentage with 51.4% among others involving in manufacturing business.

4.2.4 Working experience

Under the engaged business, the respondent's working experience are categorized on 1, 3, 5 and above 5 years. The working experience of respondents is shown in table 4.4.

Table: 4.4: Working experience of respondents

Experience	Frequency	Percentage
1 year	5	7.1
3 year	25	35.7
5 year	21	30
Above 5 year	19	27.1
Total	70	100

From table 4.4, shows the activity of a person who devotes time, attention and labor to engaging in their activity. The research shows that, mostly the respondents are running their business on three years with the highest percentage of 35.7%. And only the few entrepreneurs are starting their business on their first year with the least of 7.1%.

4.2.5 Business plan

It indicates that, whether the respondents have business plan or not before starting the business. It is categories on "yes" and "no" which is shown in table 4.5.

Table: 4.5: Business plan of respondents

Opinion	Frequency	Percentage
Yes	35	50
No	35	50
Total	70	100

Table 4.5, shows the frequency distribution about business plan. It can be seen that out of 70 respondent's survey 50 % have the business plan and remaining 50 % did not have the business plan before starting the business.

4.2.6 Attend on training

It indicates that, whether the respondents are attending on workshop/ seminar/ training related to their business or not before starting the business. It is categories on "yes" and "no" which is shown in table 4.6.

Table: 4.6: Attend on training of respondents

Opinion	Frequency	Percentage
Yes	35	50
No	35	50
Total	70	100

Table 4.6, shows the frequency distribution about attending on business. It can be seen that out of 70 respondent's survey, 50 % have attend and remaining 50 % did not attend on training before starting the business.

4.2.7 Cash sales

It indicates the portion of sales in cash on their business. It is categories on 25%, 50%, 75% and 100%. The sales in cash of respondents are shown in table 4.7.

Table: 4.7: Sales portion of respondents

Sales Portion	Frequency	Percentage
Below 25%	21	30
26% -50%	24	34.3
51% -75%	15	21.43
Above 75%	10	14.3
Total	70	100

From table 4.7, shows the portion of cash sales of respondents on their business. The research shows that, mostly the respondents are selling 26% - 50% with the high percentage of 34.3.

4.3 Cash management techniques

It indicates that, whether the respondents are using cash management technique or not in there manufacturing business. It is categorized on 'yes' and 'no' which is shown in table 4.8.

Table: 4.8: Analysis of cash management techniques

Opinion	Frequency	Percentage
Yes	29	41.4
No	41	58.6
Total	70	100

The above table shows frequency distribution for cash management techniques used in business. It can be seen that out of the 70 respondent's survey, 29 (41.4%) are using cash management techniques and remaining 41 (58.6%) are not using cash management techniques in there manufacturing business.

4.4 Cash management knowledge

It indicates that, whether the respondents have the knowledge of cash management knowledge or not in there manufacturing business. It is categorized on 'yes' and 'no' which is shown in table 4.9.

Table: 4.9: Analysis of cash management knowledge

Opinion	Frequency	Percentage
Yes	69	98.6
No	1	1.4
Total	70	100

The above table shows frequency distribution about cash management knowledge. It can be seen that out of the 70 respondent's survey 98.6% have the knowledge and remaining 1.4% did not have the knowledge of cash management.

4.5 Descriptive statistics

The table illustrates the descriptive statistics that quantitatively describes or summarizes features from a collection of information. It indicates mean and standard deviation on the Cash management, Profitability and Sustainability.

4.5.1 Descriptive statistics of cash management

It indicates the mean and standard deviation of the Cash flow analysis, Debtors management, Control of purchase of cash management which is shown in table 4.10.

Table: 4.10: Detail description of cash management

Statement	Mean	Std. Deviation
You manage your cash flow easily in the business.	3.73	1.034
You have been keep the record of cash management.	4.51	.717
You charge interest on the customer's overdue account.	1.00	.000
You know what impact bad debts have on cash flow.	3.96	.999
You get charged interest on the overdue amount.	1.00	.000
You provide a discount if they pay their accounts within a certain period.	3.76	.842

The mean of the cash flow analysis is 3.73 and 4.51 meaning that all the respondents are agree with the statement of managing cash flow and keeping record of cash management. The standard deviation is 1.034 and .717 respectively indicative of deviation from the mean. The opinion of respondent is scattered and they don't have similar thinking on cash flow analysis or forecasting management.

Debtor's management or sell on credit generated a mean of 1.00 meaning that all the respondents are disagree with the statement of charging interest on the customer's overdue account and 3.96 meaning that all the respondents are agree with the statement of impact of bad debt on cash flow. It has the deviation from the mean of .000 and .999. The opinion of respondent is scattered and they don't have similar thinking on Debtors management or sell on credit.

Control of purchase or buy on credit had a mean of 1.00 meaning that all the respondents are disagree with the statement of getting charged on the overdue amount

and 3.76 meaning that all the respondents are agree with the statement of providing a discount if they pay their accounts in certain period. The standard deviation are at .000 and 0.842 respectively indicative of a deviation from the mean.

4.5.2 Profitability analysis

It examines the mean and standard deviation of the Return on Assets, Return on Equity, Profit margin under profitability which is shown in table 4.11.

Table: 4.11: Profitability analysis

Statement	Mean	Std. Deviation
Does organizations have earned more profit every year?	3.47	.944
You utilized your assets properly.	4.76	.432
Your annual sale is increasing every year.	3.21	.931
Do proper planning of tax helps to reduce tax.	3.79	.946
Your administrative cost is decreasing every year.	2.83	.900
Does your sales revenue has been increasing every year?	3.44	1.058

The mean of the Return on Assets are 3.47 and 4.76 meaning that all the respondents are agree with the statement of earning profit every year and utilizing assets properly. The standard deviation are .944 and .432 respectively indicative of deviation from the mean. Likewise, the mean of the Return on Equity are 3.21 and 3.79 with the standard deviation of .931 and .946 respectively which means that all the respondents are agree with the statement of increasing annual sales every year and proper planning of tax helps to reduce tax. Similarly, the mean of profit margin is 2.83 meaning that all the respondents are disagree with the statement of decreasing administrative cost every year and 3.44 meaning that all the respondents are agree with the statement of increasing sales revenue every year with indicative of deviation from the mean are .900 and 1.058 lies. Thus the position of profit margin in concerned area is low than others.

4.5.3 Sustainability analysis

It indicates the mean and standard deviation of sustainability under Investment cost and Productivity which is shown in table 4.12.

Table: 4.12: Sustainability analysis

Statement	Mean	Std. deviation
Does your cost of capital is less?	3.11	1.123
The purchase of machinery and equipment is less.	3.26	1.003
The Initial cost of plant and machinery is low.	3.46	1.293
There is low wastage in production.	3.57	.894
Every year volume of production is being increased.	3.30	1.054
Your cost of production is decreasing every year.	2.14	.997

Table 4.12 shows the mean of investment cost are 3.11, 3.26 and 3.46 with standard deviation of 1.123, 1.003 and 1.293 meaning that all the respondents are agree with the statement of less cost of capital, less purchase of machinery and equipment and low initial cost respectively. Similarly, the mean of productivity is 3.57 meaning that all the respondents are agree with the statement of low wastage in production, 3.30 meaning that all the respondents are agree with the statement of increasing volume of production every year and 2.14 meaning that all the respondents are disagree with the statement of decreasing cost of production every year. The standard deviation are .894, 1.054 and .997 respectively based on investment cost and productivity. Higher value of mean have the lower standard deviation which lies on productivity.

4.5.4 Combined analysis of all variables (Cash management, profitability and sustainability)

It indicates the number of sample, sum and mean of the Cash management, Profitability, Sustainability and the standard deviation of each of the variable which is shown in table 4.13.

Table: 4.13: Combined views of respondent's analysis

Statement	Mean	Std. deviation
Cash management	2.9929	.45439
Profitability	3.5833	.60710
Sustainability	3.1405	.57148

The mean of cash management, profitability and sustainability are 2.9929, 3.5833 and 3.1405 respectively with standard deviation of .45439, .60710 and .57148. The mean

of profitability is greater than other two variables with greater standard deviation. Thus, the position of Return on Assets, Return on Equity and Profit margin in concerned area is high. It means small and medium scale manufacturing business manages the cash management properly which exhaust more profitability.

4.6 Correlation

It examines the correlation between the independent and dependent variables which is shown in table 4.14.

Table: 4.14: Correlations

Variables	Cash management	Profitability	Sustainability
Cash management	1		
Profitability	.398**		
Sustainability	.013	.277	1

Table 4.14, illustrates correlation between the dependent and independent variables. The correlation value between Cash management and Profitability is 0.398. This finding indicates that there is a low degree of positive correlation between cash management and profitability. This means as cash management increases, profitability is also expected to increase insignificantly.

4.7 Regression result

A regression analysis test was done to measure a relationship between cash management practices and the profitability as well as sustainability of the businesses.

4.7.1: Model I result (profitability on cash management and sustainability)

In model I, profitability is taken as independent variable and cash management and sustainability are taken as dependent variables. It is expected that, there are positive

relationship between profitability and sustainability and cash management to the profitability. A multiple regression model has been used and the results are represented in Table 4.15.

$$P_1 = \beta_0 + B_1 C_1 + B_2 S_1$$

Where,

P_1 Represents profitability

S_1 Represents sustainability

C_1 Represents cash management

Table 4.15: Regression results of profitability

$P_1 =$	1.102	+ 0.527** C_1	+ 0.288* S_1
	[0.558]	[0.143]	[0.114]
	{1.975}	{3.180}	{2.536}
			Adjusted $R^2 = 0.232$

Figures in parenthesis [] { } indicates standard error of the concerned variables and t-value

(‘) Significant at (0.01) 1% level

(“) Significant at (0.05) 5% level

The regression results of perceived issues show that the sign of all independent variables are as per priority and expectation. There is a presence of relationship, as adjusted $R^2 : 0.232$. The observed adjusted R^2 shows that the issues regarding profitability as independent variable is affected to the defined value of 23%. It shows that the variation in dependent variable is explained to 77% by the variables of independent variables included in the model.

It is hypothesized that cash management affects to the profitability of small manufacturing business. If the cash management is increased by 1%, the profitability increased by 0.53% meaning that at 5% significant level. There is significant effect of cash management to profitability.

It is hypothesized that sustainability affects to the profitability of small manufacturing business. If the sustainability is increased by 1%, the profitability increased by 0.29%

meaning that at 1% significant level. There is significant effect of sustainability to profitability.

4.7.2: Model II result (sustainability on cash management and profitability)

In model II, sustainability is taken as independent variable and cash management and profitability are taken as dependent variables. It is expected that, there is positive relationship between cash management to the profitability. A multiple regression model has been used and the results are represented in Table 4.16.

$$S_1 = \beta_0 + B_1 C_1 + B_2 P_1$$

Where,

P_1 Represents profitability

S_1 Represents sustainability

C_1 Represents cash management

Table 4.16: Regression results of sustainability

$S_1 =$	2.486	+ 0.304* C_1	- 0.145 S_1
	[0.504]	[0.120]	[0.160]
	{4.930}	{2.536}	{-0.904}
			Adjusted $R^2 = 0.296$

Figures in parenthesis [] { } indicates standard error of the concerned variables and t-value

(‘) Significant at (0.01) 1% level

(“) Significant at (0.05) 5% level

The regression results of perceived issues show that the sign of all independent variables are as per priority and expectation. There is a presence of relationship, as adjusted $R^2 : 0.296$. The observed adjusted R^2 shows that the issues regarding profitability as independent variable is affected to the defined value of 30%. It shows that the variation in dependent variable is explained to 70% by the variables of independent variables included in the model.

It is hypothesized that cash management affects to the sustainability of small manufacturing business. If the cash management is increased by 1%, the sustainability

increased by 0.30% meaning that at 1% significant level. There is significant effect of cash management to profitability.

It is hypothesized that profitability affects to the sustainability of small manufacturing business. If the sustainability is increased by 1%, the profitability increased by -0.15% meaning that there is negative impact. There is not significant effect of profitability to sustainability.

4.8 Major findings

This study has been concentrated on impact of cash management practices on profitability and sustainability of small and medium scale manufacturing businesses in the Dhulikhel Municipality. The major findings of the study are as follows:

- i. It is concluded that 37.1% are female and 62.9% are male respondents in this research.
- ii. It is concluded that there is a significant relationship between experience of the entrepreneur and their opinion about the cash management in manufacturing business. That is the respondents differ significantly in their opinion about the impact of cash management on sustainability in small manufacturing business when they are classified based on their experience in the study area.
- iii. This study was found that of 70 respondents on which 22 number of respondents have studied intermediate level with 31.4%, 36 number of people have studied the bachelor with the highest percentage among other level (i.e. 36%) and 12 were studied masters and above with having 12%.
- iv. It is concluded that the number of 6 respondents were falls under the 15-25 age, 36 respondents under the 26-35 age, 18 respondents under 36-45 age, 9 respondents under the 46-55 ages and only 1 respondent under 56 and above age. From which we can conclude that, the age group of 26-35 have the highest percentage with 51.4% among others involving in manufacturing business.
- v. It can be seen that out of the 70 respondent's survey 98.6% have the knowledge and remaining 1.4% did not have the knowledge of cash management.
- vi. The average mean and standard deviation of cash management on cash flow analysis, debtor's management and control of purchase are 4.12 and 0.8755, 2.48 and 0.4995 and 2.38 and 0.421 respectively.

- vii. The average mean and standard deviation of profitability on return on assets, return on equity and profit margin are 4.115 and 0.688, 3.5 and 0.9385 and 3.135 and 0.979 respectively.
- viii. The average mean and standard deviation of sustainability on investment cost and productivity are 3.2767 and 1.1397 and 3.003 and 0.9817 respectively.
- ix. The mean value of the Cash management is 2.9929 and standard deviation is 0.45439 which shows that the opinion of respondent is scattered and they don't have similar thinking on cash flow analysis or forecasting management. Cash management practices in small and medium scale business are good.
- x. The mean value of the Profitability is 3.5833 and standard deviation is 0.60710 which shows that the opinion of respondent is scattered and they don't have similar thinking on return on assets, return on equity and profit margin. Profitability practices in small and medium scale business are good.
- xi. The mean value of the Sustainability is 3.1405 and standard deviation is 0.57148 which shows that the opinion of respondent is scattered and they don't have similar thinking on investment cost and productivity. Sustainability exhaust in small and medium scale business are good.
- xii. The correlation value between Cash management and Profitability is 0.398. This finding indicates that there is a low degree of positive correlation between cash management and profitability. This means as cash management increases, profitability is also expected to increase insignificantly.
- xiii. It shows that cash management affects to the profitability of small manufacturing business. If the cash management is increased by 1%, the profitability increased by 0.53% meaning that at 5% significant level. There is significant effect of cash management to profitability.
- xiv. It shows that sustainability affects to the profitability of small manufacturing business. If the sustainability is increased by 1%, the profitability increased by 0.29% meaning that at 1% significant level. There is significant effect of sustainability to profitability.
- xv. It shows that cash management affects to the sustainability of small manufacturing business. If the cash management is increased by 1%, the sustainability increased by 0.30% meaning that at 1% significant level. There is significant effect of cash management to profitability.

- xvi. It shows that profitability affects to the sustainability of small manufacturing business. If the sustainability is increased by 1%, the profitability increased by -0.15% meaning that there is negative impact. There is not significant effect of profitability to sustainability.

Analysis of primary data shows that most of business owners have knowledge about cash management practices but haven't implemented it smoothly.

CHAPTER V

CONCLUSIONS

This chapter illustrates the brief summary of the entire study and highlights of major findings of the study. The lack of cash management knowledge was identified as a major reason why certain practices were not performed in these businesses. The study revealed the importance of proper cash management practices and the impact they have on the profitability and sustainability of small and medium manufacturing businesses. Finally, the chapter ends with the scope of the future research in same field.

5.1 Summary

The research set out to investigate the impact of cash management on profitability and sustainability on small and medium manufacturing businesses in Dhulikhel Municipality. The aim of the study was to identify the current cash management practices of small and medium manufacturing businesses and establish their problem areas regarding cash management practices of their businesses.

A study of Akinyomi (2014) found that only limited studies have investigated the relationship between cash management and profitability in Nigeria. Therefore, this study examined the relationship between cash management and profitability in the small and medium manufacturing firms. Correlation and regression analysis were carried out. The results revealed a positive and significant relationship between Cash Conversion Cycle and Return of Equity. In this research, the profitability and sustainability of small and medium businesses is found to be affected by Cash Conversion Cycle, Cash flow management, Inventory management. There is a positive but insignificant relationship between Cash Conversion Cycle and profitability on one hand and a negative insignificant relationship between Cash Conversion Cycle and sustainability. The finding is considered to be inconsistent with previous findings because proper cash conversion cycle time is maintained within the previous finding whereas that is rarely seen within this finding. A buyer delays the cash payment to be done within certain period of time which directly affects to the companies as well as to the workers as well. So, proper conversion cycle time should be implemented for every companies to gain profit and sustain thoroughly.

A linear regression model was used for data analysis to provide information on relationship between various components of regression model. Individual information on the variables was obtained through a descriptive study and Pearson correlation coefficient used to indicate the level of correlation between the independent variables and the dependent variables. The average mean and standard deviation of cash management on cash flow analysis, debtor's management and control of purchase are 4.12 and 0.8755, 2.48 and 0.4995 and 2.38 and 0.421 respectively. The average mean and standard deviation of profitability on return on assets, return on equity and profit margin are 4.115 and 0.688, 3.5 and 0.9385 and 3.135 and 0.979 respectively. The average mean and standard deviation of sustainability on investment cost and productivity are 3.2767 and 1.1397 and 3.003 and 0.9817 respectively. It shows that cash management affects to the profitability of small manufacturing business. If the cash management is increased by 1%, the profitability increased by 0.53% meaning that at 5% significant level. There is significant effect of cash management to profitability. It shows that sustainability affects to the profitability of small manufacturing business. If the sustainability is increased by 1%, the profitability increased by 0.29% meaning that at 1% significant level. There is significant effect of sustainability to profitability. It shows that cash management affects to the sustainability of small manufacturing business. If the cash management is increased by 1%, the sustainability increased by 0.30% meaning that at 1% significant level. There is significant effect of cash management to profitability. It shows that profitability affects to the sustainability of small manufacturing business. If the sustainability is increased by 1%, the profitability increased by -0.15% meaning that there is negative impact. There is not significant effect of profitability to sustainability.

The research found out that there was insignificant relationship between cash management, profitability and sustainability of small and medium manufacturing businesses in Dhulikhel Municipality. There was low degree of positive correlation between the dependent and independent variables. The result also indicated that the independent variables had an effect on the dependent variable. Therefore, for the purpose of this study, the variables used were considered to be insignificant but sufficient to influence for profitability and sustainability of the enterprises.

5.2 Conclusion

This research investigated the impact of cash management on profitability and sustainability on small and medium manufacturing business in Dhulikhel Municipality. The study arrived at the conclusion that cash management had an insignificant but positive co-relationship with profitability and sustainability of small and medium size business based on the data obtained. This shows that good cash management practices slightly impact to profitability and sustainability of firms.

The findings of this study revealed that there is insignificant but positive correlation between profitability in the business and implementation of cash management practices. So, Implementation of cash management practices helps the business owner to improve their profitability. The findings is inconsistent with the previous findings because the owners, managers, staffs working within the small and medium manufacturing business of Dhulikhel Municipality has low educational level and low financial status in comparison with the report analysis of previous findings. Besides that, the contextual factors are also legal within this finding. Because of which the findings is different in comparison to previous findings.

Therefore, it seems that poor cash management practices are a contributing factor towards the profitability and sustainability of these small businesses. This study established that this hypothesis was prevalent and that acquisition of knowledge of cash management practices was one of the important elements in the success of a small business.

5.3 Discussion

The literature review provided an overview of small and medium businesses' cash management components required for proper cash management. The review also looked at the cash management challenges facing small businesses. The literature also discovered what other research has uncovered in the area of our problem. There were many similarities in the outcomes of research done in other parts of the world compared to this research study. The study also explored the impact that a lack of cash management practices had on the profitability and sustainability of small retail businesses.

An articles made by Mungal and Garbharran (2014) found that a significant relationship between cash management knowledge and managing cash flow. This study revealed a correlation between profitability in the business and implementation of cash management practices as well as a correlation between the challenges of cash management practices and their ability to ensure profitability in their business.

Uwonda and Okello (2015), study revealed limited application of cash flow management by SMEs in Northern Uganda, especially cash flow projection; tax planning; budgetary control and interpreting financial statements. As a result the study noted that most SMEs had declining levels of long-term solvency and growth. Finally the study established that cash flow control and monitoring had significant influence on the sustainability of SMEs. This study sought to examine how cash flow management influences sustainability SMEs in Northern Uganda. In this research compare with them, there exist an insignificant influence between cash management practices and sustainability of small and medium manufacturing business. Here also, the finding is considered to be inconsistent with previous finding because the respondents from previous findings and this finding don't have similar thinking on cash management as most of them from this finding have achieved low education level. As a result, they seems to be lacking a knowledge about proper planning, control and interpreting financial report that leads the companies difficult to be sustainable. Hence, both researches findings aware the business managers and owners about the significance of cash management practices for sustainable business.

5.4 Recommendation

5.4.1 Managerial implication

1. This study report provides information about the position of cash management and profitability and sustainability that are related to cash management and business sustainable.
2. Manager should also make sure that the cash management process is in compliance with applicable laws, regulations, and professional and ethical standards.
3. This study report helps the owners and managers to take appropriate decisions while facing liquidity crisis.

5.4.2 Future research implication

1. This study focused on small and medium manufacturing businesses in Dhulikhel Municipality. Future research can be undertaken among the businesses in other parts of Kathmandu or Nepal as a whole.
2. Further researchers can make the comparison how this cash management is influencing the financial performance of developing or developed areas.
3. As is evident from this study, the independent variables studied do not fully determine the outcome of the dependent variable. It will be important to carry out other studies to identify other factors that relate to profitability and sustainability other than cash flow.
4. Further research is needed to be carried out on the effect of other factors like; product/services quality, motivation among others on survival of businesses.
5. Future research can also be carried out using different methodology, tools and technique.

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QUESTIONNAIRE

Dear Sir/ Madam,

I am undertaking this research study entitled “The impact of cash management on sustainability of small manufacturing business in Dhulikhel Municipality” for the award of **Master Degree**, Faculty of Management, Tribhuvan University. The study mainly attempts to examine cash management practices, profitability and sustainability of small manufacturing business in Dhulikhel Municipality.

Your opinion will be highly confidential and specifically used for academic purposes.

1) Education level;

Primary and below (1) Senior Secondary School (2) University (3)

Others specify (4)

2) Age:

15-25 (1) 26-35 (2) 36-45 (3) 46-55 (4) 56 and above (5)

3) Gender: Female (1) Male (2)

4) Name of business: Small scale (1) Medium scale (2)

5) Address:

6) How long have you been engaged in this business

1 years (1) 3 years (2) 5 years (3) above (4)

7) Does your business have a business plan?

Yes (1) No (2)

8) Have you attended any workshop/seminar/training relating to your business?

Yes (1) No (2)

SECTION A: CASH MANAGEMENT TECHNIQUES USED

1. Do you have basic cash management knowledge?

Yes () No ()

2. Are there cash management techniques used in your business?

Yes () No ()

3. How do you rate the effectiveness of cash management in your business?

Effective () Ineffective () I don't know ()

4. What portion of your sales is in cash?
 - a) 25% () b) 50% () c) 75% () d) 100% ()
5. How long do your customers take to pay you?
 - a) 0-3 days () b) 4-5 days () c) 6 days () d) unknown ()
6. What percentage of your debtors pays back their amounts owing?
 - a) 0% - 25% () b) 26% - 50% () c) 51% - 75% () d) 76% - 100% ()
7. What portion of your purchases is bought for cash?
 - a) 0% - 25% () b) 26% - 50% () c) 51% - 75% () d) 76% - 100% ()
8. How long do you take to pay your creditors?
 - a) 0-3 days () b) 4-5 days () c) 6 days and above () d) unknown ()

Below are the elements that are used in cash management. Please indicate how you manage cash inflow and outflow. You are requested to Tick (✓) on the appropriate alternative that comes closest to your opinion.

SA – Strongly Agree-5, A – Agree-4, SA – Slightly Agree-3, D – Disagree-2, SD – Strongly disagree-1

SECTION A: CASH MANAGEMENT

Cash flow analysis/forecasting:	SD	D	SA	A	SA
You manage your cash flow easily in the business.	1	2	3	4	5
You have been keeping the records of cash management.	1	2	3	4	5
Debtors management/ sell on credit	SD	D	SA	A	SA
You charge interest on the customer's overdue account.	1	2	3	4	5
You know what impact bad debts have on cash flow.	1	2	3	4	5
Control of purchase / buy on credit	SD	D	SA	A	SA
You get charged interest on the overdue amount.	1	2	3	4	5
You provide a discount if I they pay their accounts within a certain period.	1	2	3	4	5

SECTION B: PROFITABILITY

Return on Assets (ROA)	SD	D	SA	A	SA
Does organizations have earned more profit every year? You utilized your assets properly.	1 1	2 2	3 3	4 4	5 5
Return on Equity (ROE)	SD	D	SA	A	SA
Your annual sale is increasing every year. Do proper planning of tax helps to reduce tax.	1 1	2 2	3 3	4 4	5 5
Profit margin	SD	D	SA	A	SA
Your administrative cost is decreasing every year. Does your sales revenue have been increasing every year?	1 1	2 2	3 3	4 4	5 5

SECTION C: SUSTAINABILITY

Investment cost	SD	D	SA	A	SA
Does your cost of capital is less? The purchase of machinery and equipment is less. The Initial cost of plant and machinery is low.	1 1 1	2 2 2	3 3 3	4 4 4	5 5 5
Productivity	SD	D	SA	A	SA
There is low wastage in production. Every year volume of production is being increased. Your cost of production is decreasing every year.	1 1 1	2 2 2	3 3 3	4 4 4	5 5 5