



Master Thesis

AN EMPIRICAL INVESTIGATION OF FACTORS INFLUENCING MANAGEMENT
ACCOUNTING OUTSOURCING PRACTICES AMONG SMEs IN PAKISTAN AND
THE EFFECT OF OUTSOURCING ON FIRM'S PERFORMANCE.

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*This Master's Thesis is carried out as a part of the education at the
University of Agder and is therefore approved as a part of this
education. However, this does not imply that the University answers
for the methods that are used or the conclusions that are drawn.*

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List of Abbreviations

CFOs.....	Chief Financial Officers
GDP.....	Gross Domestic Product
ICAP.....	Institute of Chartered Accountants of Pakistan
RBV.....	Resource Base View
RBT.....	Resource Base Theory
RCT.....	Relational Contracting Theory
RM.....	Relationship Marketing
RT.....	Relationship Theory
SMEs.....	Small and Medium Enterprises
SMEDA.....	Small and Medium Enterprises Development Authority
SPSS.....	Statistical Package for Social Sciences
TCA.....	Transaction Cost Theory

1. INTRODUCTION: SUMMARY OF THE RESEARCH PROJECT

1.1 Title of the Research Project

An empirical investigation of factors influencing management accounting outsourcing practices among SMEs in Pakistan and the effect of outsourcing on firm performance

1.2. Abstract

The purpose of this study is to identify factors that affect the Pakistani Small and Medium Enterprises (SMEs) decisions to outsource management accounting practices in terms of transaction cost economics (TCA), the relationship theory (RT), the resource-based view (RBV) and the impact of outsourcing on firm performance. The aim is to investigate the current state of management accounting policies and practices employed in SMEs in Pakistan. Based on the literature review a conceptual model was proposed and fourteen hypotheses were developed. The model examines the effect of several independent variables on management accounting outsourcing and firm performance.

A survey of 302 SMEs was carried out using convenience sampling, a personal interview owners/managers/CFOs located in 9 major cities of Pakistan. Several techniques have been used with the help of Statistical Package for Social Sciences (SPSS) to analyze data, such as factor analysis, Pearson correlation, descriptive statistics and multiple regressions.

The hypothesis was tested for SMEs in the manufacturing sector and the present findings revealed that several factors, including frequency of routine tasks, frequency of non-routine tasks, asset specificity, environmental uncertainty, behavioral uncertainty, opportunism, trust in the accountant, commitment, competition and outsourcing strategy have a significant impact on the management accounting outsourcing. Furthermore, accounting outsourcing has significantly positively associated with firm performance. In addition, the outsourcing mediates the relationship between frequency of routine tasks, frequency of non-routine tasks, opportunism, trust in accountant, commitment, competition and outsourcing strategy with firm performance.

Finally, among the control variables; gender, education and firm size had an insignificant effect on accounting outsourcing whereas experience and firm age were found to have a less significant positive effect on management accounting outsourcing

The result shows that this research might be useful for external accountant or accounting firms to explore the avenues in order to improve service performance. Secondly, it will also help SMEs to identify the resource gap, when and why SMEs refers to the external accountant for outsourcing in order to fill up the resource gap to enhance efficiency and performance. Thirdly, the results of this study will provide information about accounting outsourcing that have a positive association with firm performance for recommendation and benefit to unsuccessful SMEs. Finally, this research contributes to the body of knowledge in the emerging economics context.

Key words: Small and Medium Enterprises, Transaction Cost Economics, Relationship Theory, Resource Base View, Frequency, Assets Specificity, Environmental Uncertainty, Behavioral Uncertainty, opportunism, Trust, Commitment, Cooperative Behavior, Accounting Competence, Competition, Outsourcing Strategy, Linear Regression, Factor Analysis.

1.3 Motivation for Research and Research Objectives

The Small and Medium size Enterprises (SMEs) sector has seen substantial changes throughout the world. SMEs had always had the largest share in the GDP of any country. Developed countries have now more or less achieved economies of scale, when it comes to this particular sector, and seem highly saturated. However, this also presents many opportunities in the developing world. Pakistan is a young and fairly underdeveloped country representing great opportunities for economic progress and expansion. Consequently, this sector also represents a competitive business sector with a continually changing landscape. The SMEs sector has gone through dynamic changes over the past few years. The entry of foreign products in the Pakistani market has created massive competition among all the large and small players and make them active in the market.

For better understanding the context, it is worth having on an overview of the current SMEs sector in Pakistan. SMEs can play a crucial role in the economic development in term of

generating employment, productivity and growth in some of the developed and emerging economies like Pakistan. SMEs sector of Pakistan is the backbone of the economy; *we can say our economy is an economy of SMEs* (SMEDA). Small Business Management meets with many challenges in terms of productivity and performance. The Government of Pakistan constantly engaged in the formulation and implementation of policies to help small businesses in the economic development of the country. During the last decade, the Government of Pakistan has established various institutions like SMEDA to overcome challenges of SMEs and to assist new business ideas. Currently, it seems that government efforts are not enough to make this sector successful. Institutions and other stakeholders for small businesses are also required to contribute their efforts such as research and development (R&D) activities (which is rarely seen in this sector).

The Small and Medium Enterprises (SMEs) sector is contributing a large share in Pakistan's GDP in the shape of exports of different manufacturing goods such as sports, leather, cotton and surgical. SMEs in Pakistan is diversifying the economy as in several developed and emerging economies around the globe performing in country development. However, many researchers argued that the majority of SMEs in emerging economies have the internal resource gap therefore; SMEs are struggling to enhance productivity and to sustain competitive advantages. It is not easy for SMEs to achieve a satisfactory return on investment, where traditional practices of doing business are still in practice. Furthermore, it is obvious from management research that financial management is the key to achieve competitive advantages. Therefore, it is a tough task to manage it properly. Management accounting outsourcing is a recent phenomenon in SMEs worldwide in order to increase productivity and reducing the cost of doing business. However, the questions about Pakistan's SMEs level of accounting outsourcing practices remain unanswered. There is not even a single study has been conducted to investigate SMEs management accounting outsourcing in Pakistan. This proposed study will investigate accounting outsourcing practices in Pakistani SMEs and its relationship with SMEs performance, is an interesting and challenging task, especially, when investigating this for SMEs of an under-researched developing country. Furthermore, recommendation of this study will be very helpful for unsuccessful SMEs. This study will also contribute to the body of scientific knowledge on management accounting and SMEs performance by providing empirical findings for accounting outsourcing and firm performance. The majority of the recent studied highlighted this issue as a

critic for future investigation of SMEs operations in emerging economies. (Kamyabi & Devi, 2011). Pakistan's economy is considered one of the top growing economies in South-Asia in the last decade. Therefore, surgical, textile, sports goods, leather and pharmaceutical are considered to be the major industry in the country. The majority of SMEs is operating in Punjab province and Lahore (the metropolitan city of Pakistan) is considered as hubs of SMEs in Pakistan. Therefore, finding of this study will help SMEs stakeholders to acquire best businesses and managerial practices regarding accounting outsourcing to take better business decisions.

1.4 Problem Statement

Research on management accounting outsourcing practices in the SMEs sector has been capturing high attention in recent years (Kamyabi & Devi, 2011; Everaert et al., 2010; Jayabalan et al., 2009; Carey et al., 2006; Gooderham et al., 2004). Moreover, most of the research has been conducted in developed countries. Therefore, current and past research suggested that there is a need for further validation of accounting outsourcing practices in small firms particularly for emerging economics like Pakistan. A number of researchers have also identified that accounting outsourcing practices in SMEs have not received considerable attention in management accounting research with respect to transaction cost economies, resource based view and relationship theory. Moreover, they further focus the need for future studies on SMEs sector particularly on management accounting. The proposed study will explore SMEs management challenges and issues such as management accounting practices, transaction cost, resource base view and relationship theory practices in SME management in the country. In the next section, the main research question is inscribed.

Main Research Questions

This study is going to answer this main research question using below mentioned sub-questions and proposed conceptual model (see figure 2).

“What factors influence the SMEs outsourcing choice of management accounting practices and the effect of outsourcing on the performance of SMEs in Pakistan?”

Sub-questions:

1. Do SMEs outsource their accounting functions in Pakistan?
2. What are the accounting functions being outsourced?
3. What is their performance level after outsourcing these functions?

Main Research Objectives

4. What are the most important factors that impact the choice of management accounting outsourcing practices?
5. To examine the accounting functions which are most outsourced?
6. To determine the range of outsourcing practices in terms of firm owner/manager education, experience, firm size and firm age.
7. To determine the outsourcing orientation and its impact on the firm overall performance.

1.5 Significance of the Study

This research will give a broad framework for management accounting outsourcing functions towards making good and well informed accounting outsourcing strategies through the analysis of SMEs profiles with respect to transaction cost economics, resource base view and relationship theory. Furthermore, the results of this study can also be used as relevant guidelines for developing future business plans and making changes or improvements in the current activities of players in the Pakistani SMEs sector. It gives an idea of the areas which need to be emphasized more for better development and future growth.

1.6 Organization of the Thesis

The rest of the research is structured as follows:

Chapter 2:

This chapter contains information related to research background; for example, an overview Pakistani's economy, professional accountant and financial reporting in Pakistan, outsourcing of accounting functions in SMEs and SME with some used definitions.

Chapter 3:

This chapter presents a literature review and theoretical framework are presented by explaining the selected theories for this research that will help us to formulate our research problem and hypotheses.

Chapter 4:

This chapter presents the overall conceptual framework and hypotheses, with a short introduction of conceptual framework. The relations or impact of direction of the independent, control and dependent variables can be viewed.

Chapter 5:

This chapter discusses about research methodology. It includes a detailed discussion on research process including, research design, procedure, and the method which we choose for this research and explanation of why we choose such procedure and methods.

Chapter 6:

This chapter consists the analysis of the results of the collected data and will also present the findings of the research with the help of descriptive statistics and multiple linear regression model.

Chapter 7:

In this chapter we will compare our findings with the previous studies and will try to find the cause and explanation for same or different results and findings.

Chapter 8:

This chapter concludes the thesis by summarizing the main findings of the analysis and will try to link these findings to theorize that we used in chapter 3. We will also try to check that our research objectives are met with our findings that we express in chapter 1 and giving final words and future recommendation for similar studies.

2. RESEARCH BACKGROUND

2.1 Introduction

This part of the study provides general information related to the research context, for example, information about the location of the research (e.g. Pakistan), its economic conditions, accounting services, reason to outsource, reason not to outsource, professional accountants and financial reporting in Pakistan. This chapter will increase the reader's interest in the subject and provides valuable information are also important for our study.

2.2 Pakistan as Research Location

The geographic location of Pakistan extends along with the historic Indus River, from the spectacular mountains and gashing valleys of the Himalaya down to the Arabian Sea. Bordering along with India on the east, China on the north, Afghanistan on the west and Iran on the southwest, the country enjoys a strategic importance with the ancient trade routes between Asia and Europe. With the territory of 796.095 square km, Pakistan has a variety of landscapes, e.g. From deserts to green valleys and high mountain peaks (Geographia, 2005). The total estimated population of Pakistan is 187 million people and is one of the fastest growing populations in Asia. Urdu is the national language of Pakistan, while English is officially used in government institutions and many business organizations (Geographia, 2005). It is evident that researchers have ignored SMEs management research particularly in management accounting in Pakistan. In this situation, a study on SMEs will have high value to an economy.

2.3 Pakistan's Economy and SMEs

Pakistan has a population of 176 million and majorities are young people (World Bank, 2011). Pakistan's economy is largely depending on the commodity sector comprises of agriculture and industry. The commodity producing sector accounted for 46.5 in GDP in 2011-2012 (Economic Survey of Pakistan). In fact, the dependence of the economy is largely driven on the performance agriculture sector and industry sector. The Agriculture sector is the major source of raw material to industrial unit accounts for 21 percent of GDP, generates 65 percent of employment and contributes 60 percent in exports. However, the agriculture and industry move by hand in hand in Pakistan's economy. Furthermore, the country faces several challenges such as corruption,

unemployment, energy crises and terrorism, the real growth rate in 2011-12 is 3.7 percent as compared to 9.0 percent was in 2004-05, the inflation rate above 10.8 percent, population living below the poverty line 22.3 percent, and unemployment rate 6 percent. Hence, the most challenging situations for Pakistan's economy is to assist and create jobs for people who are ready to work. These economic indicators can be achieved by recognizing the significance of SMEs that generates employment and development of the nation. Pakistan's economy comprises mainly on small and medium size enterprises. Small and Medium Enterprises Development Authority (SMEDA) is the official government body deal with the formulation and implementation of policies to boost up this sector in the country.

For industrial development of Pakistan the importance of SMEs is unquestionable. SMEDA is an institution in Pakistan working under the ministry of industries was established in 1998 to facilitate and regulate SMEs in enhancing their capabilities and competitiveness. According to the SMEDA definition of SMEs are divided into three classes, for example, (a) *employment size up to 250*, (b) *paid up capital up to Rs. 25 million* and (c) *annual sales up to Rs. 250 million*. Moreover, Pakistan's SMEs constitute 90 percent of all the enterprises; 80 percent of the non-agriculture manpower employed by SMEs and share in the annual GDP 40 percent approximately (SMEDA, 2013).

2.4 Professional Accountants and Financial Reporting in Pakistan

The Institute of Chartered Accountants of Pakistan (ICAP) was established in 1961, under the Accountant Ordinance in 1961, as an independent professional body with the objective to regulate the accounting and auditing functions in Pakistan (ICAP, 2013). Therefore, all listed companies, public joint stock companies and other legal entities are required auditing and present their financial reports. In fact, ICAP plays an important role in the Pakistani SMEs environment through professional accountants.

2.5 Accounting Services

For the purposes of this research, we will examine the task of basic accounting (accounting cycle) required to manage a business properly. These accounting tasks can be classified as 1) routine and 2) non-routine. Routine tasks are more regular and simple accounting activities with less judgment in either internal or external accountant activities (Abbott et al., 2007). On the other hand, non-routine accounting tasks decisions are less standardized and simple, requiring an

additional valuable opinion either from internal or external accountant. Similarly, routine tasks include: 1) the entry of sales and purchase or other financial transactions and 2) interim reporting. While non-routine tasks include 3) accounting adjustment at the end of the year such as depreciation, accrued interest, bad debts etc. and 4) preparation financial statements and 5) Pakistani companies tax on profit or gain adjustment etc. (Everaert et al., 2010). In addition, these five tasks are interconnected and needed to take into consideration while making the outsourcing decision. In addition, outsourcing of non-routine business decision depends on the outsourcing of the routine accounting task in a sense, if the company fully outsource routine tasks, will also rely on outsourcing non-routine tasks, because the company no longer has the internal information available (Everaert et al., 2010). Therefore, it is important to distinguish routine tasks and non-routine tasks to complete outsourcing of management accounting functions properly.

2.6 Service Provider

In accounting outsourcing we call either one person or an accounting firm providing accounting, tax and other services. For the purposes of this study, we distinguish the external accountant with an employee working in the premises of SMEs, to refer to a situation insourcing (Everaert et al., 2007).

2.7 Reason to Outsource

Cost Reduction

Studies have highlighted the cost reduction can play an important role in outsourcing (Quelin & Duhamel, 2003; Everaert et al., 2007). There are many SMEs consider outsourcing accounting tasks due to scarce resources. Different research has present various arguments against and for of outsourcing practices. The in-house demand for the service is often too low to provide cost efficient service or level of profitable performance, while the service supplier has the scale to buy resources (accounting related) or assign training expenses for more employees (Everaert et al., 2007).

Focus on Core Business

Literature suggests that the focus on core activities is another factor that plays an important role in attracting outsourcing (Gilley & Rasheed, 2000. Everaert et al., 2007). Studies indicate that this factor is the most influential for the least benefit of SMEs in the preparation of financial statements. They simply use external service providers to meet governmentally required tasks, because in most cases, they do not have the time, inclination and the capacity to perform (Marriott & Marriott, 2000).

Access to Expertise

Studies show that access to expertise is another key factor that attracts companies to outsource. The reason is that accounting functions require not only the knowledge of Generally Accepted Accounting Principles (GAAP), but also require the owners/managers should know how to apply these rules given in a competitive business environment (Marriott & Marriott, 2000). Some other reasons for SMEs outsource accounting functions is the lack of knowledge, skills, abilities, competence, while external service providers often considered highly specialized in this field. Thus, through service providers the SMEs obtains expertise in making important management decisions.

2.8 Reason to Not Outsource

Dubious Cost Savings

It is not certain that outsourcing could lead to cost savings for SMEs. For example, a company by reducing the cost of wages after outsourcing does not always lead to lower firm overall costs. Therefore, it is important to know that there are other costs associated with the transaction (subcontracting). This cost would be the cost of the contract, the cost of monitoring and performance. At the end of the day when we combine and compare all these costs of outsourcing with insourcing, the outsourcing could lead to be more expensive.

Loss of Expertise

Literature suggests that the loss of skills is another factor to outsource accounting functions. Studies have indicated that outsourcing lead to the loss of internal skills and competencies (Gilley & Rasheed, 2000; Quelin & Duhamel, 2003). Furthermore, outsourcing creates a risky situation where a single actor (service requester) becomes too dependent a particular service provider. This can create problems for SMEs in the future through higher prices or reduce the quality of service. Then it became difficult for SMEs to move to internalize any of the service providers, since most accounting services required specific skills and expertise's that are difficult to obtain in a short time.

Loss of Information

Many studies have reported that the major reasons for not outsourcing management accounting functions, as some information may not be immediately accessible for their business, and direct monitoring of financial records become much more complex in the case of outsourcing (Everaert et al., 2007).

2.9 Management Accounting and the Role of Professional Accountants in SMEs:

The term accounting refers to summarize and report financial information in the form of reports or reporting for internal and external parties to make appropriate business decisions. Accounting in general can be divided into two categories such as financial accounting and management accounting. The information is obtained from financial accounting reports uses for both internal and external decision making whilst management accounting focuses on internal managerial decision making purpose; such as planning, processing and coordinating production activities (Nandan, 2010). In today's competitive business environment, SMEs must have the knowledge resources through effective management accounting information for making a reliable business decision. In addition, it is a great challenge for SMEs to obtain accurate, reliable, timely management accounting information via in house accountant. Therefore, the role of external (professional) accountant came into existence to manage the resources of SMEs to achieve competitiveness (Maelah, 2010). Hence, the SMEs outsourcing of management accounting functions provides small businesses an opportunity for capacity building in order to achieve sustainable competitive advantages (Lamminmäki, 2008).

3. LITERATURE REVIEW AND THEORETICAL FRAMEWORK

3.1 Introduction

The purpose of this section is to provide literature and theoretical discussion regarding outsourcing, transaction cost economics, resource base view and relationship theory used in this study. In the end combine perspective of these theories is summarized.

The nature of this research study is focused on the ‘outsourcing’ that exist nowadays in SMEs. However, it is seen in the recent times that as part of the worldwide development trend the SMEs have greatly shifted towards outsourcing their business operations. For understanding SMEs outsourcing choice the researcher searched university library databases such as Scopus, Ebcco and Business Source Premium for related studies. More specifically, the research was limited to publications made on the SMEs choice of outsourcing of management accounting functions in the manufacturing sector. Accordingly, the researcher identified the 20 most relevant studies focusing on outsourcing as a theoretical background for this study’s research problem. The studies are summarized later in this chapter.

3.2 Outsourcing

The concept of outsourcing was first introduced in the mid of 1980 (Hussey & Jenster, 2003). Outsourcing refers as an external service provider to a firm. However, in accounting outsourcing is a process involves external professional accountant or accounting firm. For example, in Pakistan, firms can get services from an external accountant both from an individual professional accountant and accounting firm with valid ICAP certificates. In Pakistan external accountant are providing accounting services (costing, financial statement etc.), auditing services (e.g tax audit and financial audit etc.) and advisory services (ICAP, 2013). Thus, many empirical studies show that SMEs outsource their accounting functions to an external professional accountant. In Belgium over two-third firms outsource accounting functions (Everaert et al., 2010), in Australia and UK majority of firms outsource accounting tasks (Carey et al., 2006) in Norway many firms are involved in outsourcing accounting support services (Gooderham et al., 2004). However, in the literature most of the studies on accounting outsourcing were done in developed countries except from Malaysia by Jayabalan et al., (2009) and latest in Iran by Kamyabi & Devi, (2011).

Therefore, there is a need to explore more SMEs accounting outsourcing functions in emerging economics such as Pakistan. Hence, According to Krell, (2006); Everaert et al. (2010) and Kamyabi & Devi, (2011) accounting and finance functions are suitable to outsource are as follows:

- General accounting
- Period-end accounting
- Accounts payable
- Accounts receivable
- Banking
- Financial services
- Credit services
- Insurance processing
- Tax services
- Billing system
- Collection and credit
- Compliance
- IT consultancy
- Management reporting
- Bookkeeping
- Interim reporting
- Preparation of financial statements
- Product/services costing
- Customer profitability analysis
- Budgeting/forecasting
- Internal audit
- Financial planning
- Tax consultancy
- Management accounting
- Business advice
- Management consultancy
- Financial advice
- Audit

3.3 Transaction Cost Economics

The concept transaction cost theory was initiated by the Coase, (1937) question, which simply was: Why do firms exist? In other word, why do not all transactions take place in markets, since markets are supposed to be the most efficient way to carry out transactions?

The basic idea of the transaction cost theory (TCA) is to choose the form of organization or governance that leads to lower transaction costs, whether this should be the market, hierarchy or an intermediate form. The TCA may also be applied when it comes to selection of internal governance form (intra-organizational governance), and the idea behind TCA is also applied in a number of other, non-economical, problems concerning the form of governance and costs associated with the search for a supplier/service provider, the costs of price negotiations, contracting costs, and necessary investments and other costs in connection to the transaction.

Milgrom & Roberts, (1992) use another classification: Coordination costs refer costs in connection to determine prices & other sales conditions. Moreover, the motivation costs that which partly is connected to incomplete information, and the costs that arise when there is a problem of establishing a complete, enforceable contract. Transaction costs may arise for both ex ante (before) and ex post (after) transaction. Transaction costs are composed of direct costs in connection to a governance form and the opportunity costs by not having chosen the optimal form of governance.

Basic Assumptions

TCA is based on several assumptions. The most important are bounded rationality and opportunism. Bounded rationality can be found in most other theories in marketing and strategy.

Bounded rationality

Bounded rationality is the assumption that decision makers have constraints on their capabilities and limitations of their cognitive rationality. Although decision makers often intend to act rationally, this intention may be limited by their limited ability to acquire, process, interpret and communicate information. In addition, the assumption of bounded rationality is particularly important in cases of uncertainty surrounding the transaction, such as when the circumstances surrounding an exchange cannot be specified ex ante: environment uncertainty (external), and when there is a doubt/uncertainty about the performance of the exchange partner: behavioral uncertainty (internal). Numerous studies demonstrated that the behavioral and environmental uncertainty has a great impact on the choice of the form of governance. The most important effect of the internal uncertainty is to evaluate the performance of the service provider, for example, by verifying whether compliance with established agreements has occurred. As an example, the owners/managers of SMEs may have difficulties in verifying whether or not an accountant is performing agreed service efforts.

Opportunism

The term opportunism, we mean that an actor, if she/he has the opportunity – may act to serve their own interests at the expense of the exchange partner. “Opportunism describes a condition of ‘self-interest seeking with guile’ that includes propensities to disseminate, distort, fail to

disclose, and otherwise act in an untrustworthy and even fraudulent manner for purposes of the translator's own gain" (Wang, 2002: 161). The assumption of opportunism can also be found in the principal-agent theory and the bureaucratic theories. The assumption of opportunism has some connection with the assumption of bounded rationality, because the decision maker has imperfect information about exchange partner. In a business relationship each party has information about itself that the other party does not have access, what is called private information. In other words, there exists a form of information asymmetry, which means that one party's ability to detect opportunism from the other party's side is limited.

We distinguish between *ex ante* and *ex post* opportunism in TCA, depending on whether we analyze before or after the contract is entered. *Ex ante* implies that one of the parties (A) retains important information, or that the party claims to be another type than he/she really is – this is called misrepresentation. Under such circumstances, the other party (B) risks to choose a non-optimal exchange partner. This form for opportunism leads to adverse selection. A well-known example is the second hand car salesman, who has private information about the quality of the car. The buyer may thus be led to choosing a car of inferior quality. Whilst, *Ex post* opportunism may occur after the agreement has been established. This form for opportunism is called moral hazard. For example, A retailer may have agreed on promoting a product from a supplier, by recommending this product to the customers. If the retailer does not comply with this agreement, he/she demonstrates a moral hazard.

Transaction cost economies (TCA) have been the major framework employed for the study of firms manufacturing outsourcing decisions (Klein, 2005). The decision to outsource or internalize depends on the comparative transaction cost to avail that service such as the *ex-ante* negotiation cost and the *ex-post* performance and feedback (Everaert et al., 2010; Williamson, 1985). In the competitive market many potential suppliers exist and market pressure to reduce the efforts of firms to monitor the supplier opportunistic behavior that will encourage firms to outsource their operations. Conversely, if the market is failing to provide the availability of numbers of supplier, it is most likely that the supplier will behave opportunistically (Everaert et al., 2010). In such case, a firm can reduce their transaction cost by switching from external suppliers (outsourcing) to its own employees in order to monitor and control their behavior

properly with the aim of minimizing the transaction cost (Hennart, 1989). However, in practice both TCA and RBV have the significant effect on outsourcing functions (McIvor, 2009).

3.4 Relationship Theory

According to Macneil, a relationship between two actors is a set of norms developed by parties and these norms will to a large degree determine the behavior of the relationship. However, these norms may change over time; it is believed to occur as long as their continuance is valued. The purpose of Relationship Theory (RT) is not to predict the governance mode of a relationship rather it is to describe the behavior in the relationship. The theory is normative in the sense that it describes the behavior that the exchange parties should have. Whereas the transaction is the unit of analysis in the TCA and the unit of analysis in RT is represented by the *dyad* or the relation between the two actors. This implies that the RT focuses on not only for the seller or the buyer relationship but also some other relations for instance, service sector. The norms originally presented by Macneil are described by Blois, (2002). Macneil classifies contracts on a spectrum from relationship theory, exchanges to relational norms with common contractual exchanges lying between these extremes. These norms or principles represent Macneil's description of how the behavior between the actors should be guided. Some of the most important norms are:

1. **Role integrity:** This reflecting that the parties know and understand the tasks that should be performed on the relationship and who of the parties that should perform different tasks.
2. **Preservation of the relationship:** These norms reflect that the parties are interested in preserving the relationship, and demonstrate this willingness with solidarity and flexibility.
3. **Harmonization of relational conflict:** This norm implies that the parties are motivated to solve any conflict that may occur, by showing flexibility and solidarity, and knowing the task they have to perform in order to avoid conflict.
4. **Supra-contractual relations:** Again, this is a norm of harmonization between the parties, building on what Macneil is called a social matrix: Such a matrix is based upon efficient communication between the parties, the existence of a system to avoid

opportunism, and a mechanism that arranges that the promises the parties give to each other actually will be implemented.

5. **Proprietary of the means:** Macneil states that it must be clear for both parties who actually own the assets that are used in the relationship.

The RT is *static*, in the sense that how the contractual relationship at any time is, will be determined by the behavior of the parties. There is no attempt to describe how the relationship is initiated, nor how the relationship develops, nor how the parties may adapt under new circumstances.

Heide & John, (1992) conclude that Macneil's classification scheme contains norms that are at least partially overlapping, and they suggest the following categories of norms

1. **Flexibility:** is meant how willing the parties are to undertake necessary adjustment as circumstances change.
2. **Information exchange:** involves a bilateral expectation that actors will proactively offer valuable information for the partner.
3. **Solidarity:** is meant a bilateral expectation that the parties are willing to behave in such a manner that the relationship can be maintained.

Relationship marketing can be described as the process of creating, maintaining, and strengthen the relationship with customers and other relevant actors. Dwyer et al., (1987) suggest that the basic characteristics of a relationship are as follows:

1. A relationship is something that last over time, which involves that each transaction has to be considered based on the history and future expectations of the relationship.
2. Future relationship/cooperation will be based on a set of implicit and explicit common expectations and confidence/trust.
3. The parties in the relationship can be expected to develop complex personal/social relationships – accordingly, the relationship may also have non-economical elements.

Relationship marketing describes a process over time, which involves a *dynamic* analysis. In order to describe this process in accounting outsourcing, three central concepts are used: trust,

cooperative behavior and commitment. Morgan & Hunt (1994) stated that trust and commitment are necessary assumptions in order to succeed with relationship marketing.

3.5 Resource Base View

Resource-Based Theory or Resource-Advantage Theory or Theory of Competition was proposed in the marketing literature in the early 1990's. The Resource-Based Theory (RBT) is a dynamic process theory of competition that has been used in particular within marketing and strategy. The RBT has contributed in both explaining and predicting several market phenomena, such as (explaining) firm diversity, the scope of the firm, the growth pattern of firms, as well as predicting differences in strategic choices, and differences in performance. Originally, the RBT can be traced back to the work of Penrose, (1959).

The resource base view (RBV) can be defined as the full capabilities of assets, organizational processes, resources, the firm attributes information, and knowledge collected by a firm can design and implement strategies. This can enhance efficiency and effectiveness that produce competitive benefit for the firm (Barney, 1991). Transaction cost economics (TCA) primarily focus on governance. In this regard (McIvor, 2009, p. 23) argued, "*the central theme of transaction costs theory is that the properties of the transaction to determine the governance structure*". Whereas, RBV primarily focuses on production capabilities and skills in order to achieve competitive benefit and performance. Transaction cost economics (TCA) build up an understanding whether in-source or outsource is an appropriate activity for the firm (Stratman, 2008). TCA explains us those tasks that are not firm specific should be outsource, whereas according to RBV functions that are not critical to core competence can be outsourced (Gilley et al., 2004).

What are Resources?

Corporate resources can be identified as the full capabilities of assets, business processes, firm attributes information, and knowledge collected by a company can design and implement strategies that enhance firm efficiency and effectiveness (Draft 1983 in Barney, 1991: 101). Some authors have identified as strengths that develop and implement their strategies (Poter, 1981; Barney, 1991). A framework developed by Barney (1991) mentioned that organizations should use their strengths to seize opportunities that occur in the external environment. Knowledge can be found in databases, reports and information systems. Sometimes the knowledge is locked in the head of the employee and knowledge can be hard to find or even lost to the organization when the employee leaves the company. For this reason it is important to have a knowledge management strategy, so that the strategy can capture the knowledge in the knowledge reservoir and deliver it to others who can benefit and use it to the advantage of the firm (The Economist Intelligence, 2005).

Categories of Resources

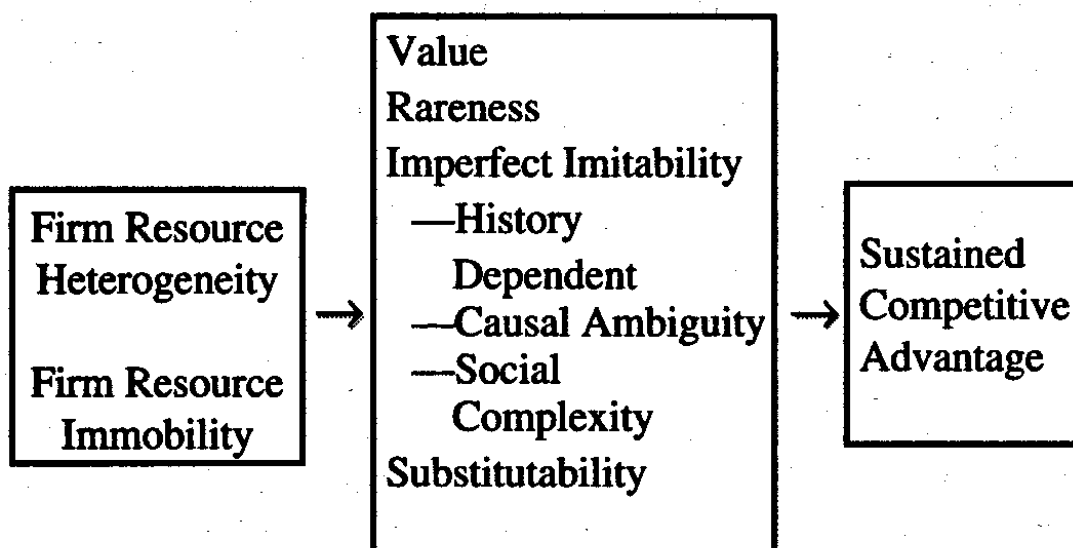
Barney (1991) has categorized resources into three categories:

- Physical resources include physical technology, plants and equipment, geographic location, access to raw materials.
- The human capital resource contains training experience, judgment, intelligence, relationships and inside individual managers and workers in the company.
- The organizational capital resource includes formal reporting structure formal and informal planning, controlling and coordination system, informal relations among the group within a firm and among firms.

In order to gain sustainable competitive advantages, resource must be valuable, rare, imperfectly imitable, and cannot be strategically equivalent substitute for these resources (Barney, 1991). It is crucial that important knowledge is transferred within the company and to its subsidiaries, but the knowledge shouldn't be available for competitors. According to (Fang et al., 2007: 1053); "*A successful long-term diversification relies on the transfer of valuable and rare resources, like knowledge, between the subsidiaries of a firm*". Therefore, we have a so-called "paradox" where resources are supposed to be rare and inimitable, and these resources should resist transfer

substitution and imitation. But then again a company is dependent on transferring resources to achieve a sustainable competitive advantage.

Figure 1: Barney (1991) Sustainable Competitive Advantage



Valuable Resources

Firm's resources are valuable when they help companies to implement strategies which will enhance efficiency and effectiveness. Moreover, resources enable firms to capture opportunities and minimize the threats occurring in the external environment. However, if it does not work to exploit an opportunity or minimize a threat, it is a weakness. Valuable resources or capabilities can be identified by looking at the company's value chain. If some asset in a company has allowed working more effectively in a certain portion of the value chain, then it can be considered as a valuable resource.

Rare Resources

If competitors' own resources which focal company has then the particular company cannot achieve sustainable competitive advantages. Because of competitors can implement the same type of strategies which the focal company can implement. Rarity is when a firm has a valuable resource or capability that is absolutely unique within competitors. To implement some strategies there should be a blend of resources such as physical resources, human capital resource, organizational capital resource. If competitors unable to achieve these resources, then the company can acquire sustainable competitive advantages because resource only belong to the company.

Imperfectly Imitable

Firms' resources can be imperfectly imitable when:

1. The ability of a firm to acquire a resource is reliant upon unique historical conditions.

Firm's intrinsically historical and social entities and ability to obtain resources depend on place in time and space. Further the performances of a firm depend both on industry structure and the historical events that firm pays up to now. If a company owns valuable and rare resources as a result of the unique way through history, then a company can employ these resources to prepare strategies to gain competitive advantages.

2. The association between the resources possessed by a firm and firm sustained competitive advantage is causally ambiguous.

If the relationship between company owned resources and competitive advantages is difficult to identify then it can create sustainable competitive advantages to the company. Because of competitors cannot understand the relationship. Therefore, they are unable to duplicate the firm strategies. This relationship is the reason what some companies perform extremely well than others.

3. The resource generating a firm advantage is socially complex. Some events happening in the organizations are socially complex and difficult to understand; for example, the relationship

between the stakeholders, reputation among the suppliers. We can say these situations help organizations to perform well but difficult to explain.

Substitutability

If two firms have equal type resources they can implement same strategies. Substitutability can be occurring in two ways. First, it should not be able to imitate exactly the other firm's resources. Secondly, the firm's resource can be strategically substituted.

3.6 General Overview of Prior Studies

The below table relates broadly to outsourcing and firm performance with reference to SMEs. It was observed that the majority of these studies were done in the developed countries such as Australia, Belgium, Netherlands, Norway, USA, Taiwan, Malaysia, Bulgaria and Thailand, only 4 studies were done in Iran and India. Out of all studies there were no study done in Pakistan regarding the outsourcing of management accounting functions.

Furthermore, we can see the studies summarized in below table 1. A majority of researcher used Transaction Cost Economics (TCA) in their theoretical framework such as Kamyabi & Devi, (2011); Kamyabi & Devi, (2011)c; Everaert et al., (2010); Kotabe & Mol, (2009); Alvarez-Suescun, (2010); Nicholson et al., (2006); Ellram et al., (2008); Gilley et al., (2004); Wang, (2002); Watjatrakul et al., (2005); Steven et al., (2009).

The second most used theory in below studies is Resource Base View (RBV) by Kamyabi & Devi, (2011); Kamyabi & Devi, (2011)b; Lamminmaki, (2008); Alvarez-Suescun, (2010); Carey et al., (2006); Gilley et al., (2004); Kotabe & Mol, (2009); Lee et al., (2008); Kotabe & Mol, (2009).

The third most used theory is Relationship Theory (RT) by Everaert et al., (2010); Gooderham et al., (2004), Lee et al., (2008); Steven et al., (2009). Some other theories are Resource Dependence Theory by Lee et al., (2008) and Human Resource Theory by Delmotte, (2008).

Table 1: Summery of Prior Studies

Author	Dependent Variable	Independent variable	Sample Used/Size	Findings	Methodology/ Measurement
Kamyabi & Devi, (2011)	-Management accounting outsourcing	-Asset specificity -Environmental uncertainty -Behavioral uncertainty -Trust in accountant -Technical competence -Degree of competition -Corporate strategy	658 questionnaires used through postal mail survey of Iranian manufacturing SMEs in 2011.	1 Asset specificity is negatively correlated with accounting outsourcing (O/A). 2 Envionmental uncertainty is not significantly negative correlated with A/O. 3 Behavioral uncertainty is negatively correlated with A/O. 4 Trust in accountant are significantly positively correlated with A/O. 5 Technical competence is positively correlated with A/O. 6 Competition is also positively correlated with A/O functions. 7 Coporate strategy is positively correlated with A/O.	Multiple linear regression analysis was performed.
Kamyabi & Devi, (2011)b	-Accounting outsourcing -Firm performance	-Owner/Manager knowledge -Technical competence	658 questionnaires used through postal mail survey of Iranian manufacturing	1 Owner/Manager knowledge and technical competence is significantly is associated with accounting outsourcing. 2 Firm sizes are not significantly	Multiple linear regression analysis was performed.

		- Firm size	SMEs in 2011.	associated with A/O. 3 Outsourcing has significant positive effect on firm performance.	
Kamyabi & Devi, (2011)c	-Accounting outsourcing -Firm performance	-Assets Specificity -Trust in accountant - Degree of competition	658 questionnaires used through postal mail survey of Iranian manufacturing SMEs in 2011.	1 Asset specificity is significantly negatively associated with accounting outsourcing but not with the performance. 2 Trust in accountant and competition is significantly positively associated with outsourcing and firm performance. 3 Outsourcing has a significant positive effect on firm performance. 4 Outsourcing mediate the relationship between (trust in accountant and competition) and firm performance but outsourcing did not mediate the relations between asset specificity.	Multiple linear regression analysis was performed.
Everaert et al., (2010)	Accounting outsourcing	-Asset specificity -Environmental uncertainty	A survey was sent to 1200 SMEs in Belgium through post and received	1 Asset specificity is marginally associated with A/O. 2 Trust in Accountant is significantly positive associated	Multiple linear regression analysis was performed.

		<ul style="list-style-type: none"> -Behavioral uncertainty -Frequency -Trust 	135 surveys back.	<p>with accounting outsourcing.</p> <p>3 Environmental uncertainty and behavioral uncertainty are not significantly negative associated with intensity.</p> <p>4 Frequency has significant negative correlation with accounting outsourcing (A/O).</p>	
Jayabalan et al., (2009)	Accounting outsourcing	<ul style="list-style-type: none"> -Type of business - Firm size - No of years in business - Number of employees in the firm 	Online questionnaire was sent to 1500 Malaysian SMEs and 164 respondent answers back.	1 Out of 164 SMEs 119 (2/3) were currently or previously in involved in accounting outsourcing practices.	Descriptive statistics
Lamminmaki, (2008)	<ul style="list-style-type: none"> -Degree of accounting department involved in outsourcing -Degree of accounting system sophistication in outsourcing 	<ul style="list-style-type: none"> - Competition -Size -Hotel quality -Professional qualification -Owner/operator structure -Performance - Outsourcing part 	Data collected through phone interviews and surveys of 356 Australian hotel financial controller. The response rate was 34%.	1 Hotel size, hotel quality and professional qualification are significantly positively correlate with outsourcing intensity. However, competition has no significant correlation with degree of outsourcing.	Regression analysis and descriptive statistics

		of the long term strategic agenda			
Kotabe & Mol, (2009)	Firm performance	-Outsourcing -Market uncertainty	1147 manufacturing firm and interview were held regarding their outsourcing trend in Netherland.	1 H1 A negative curvilinear relationship between outsourcing and firm performance is confirmed.	Regression analysis and descriptive statistics
Gooderham et al., (2004)	The degree to which small firm uses its authorized accountant as a business advisor	-Long term relationship with accountant -Perceived competence in statutory accountancy services -Perceived competence in business advisory services -Firm size	Structured telephone interview of 320 SMEs from Norway were collected	1 Perceived competence in statutory accountancy services and perceived competence in business advisory services are supported.	Linear regression, Ordered logit, and Binary logit.
Ruhanita et al., (2010)	Outsourcing		Case study method were used		
Alvarez-Suescun, (2010)	IT Outsourcing	-Physical assets - Human assets - Capability	Data were collected through an online questionnaire with final response rate was 45 useable	1 Physical specificity negatively influences the outsourcing. However, human specificity is not supported	Descriptive statistics and Binomial logit regressions.

		<ul style="list-style-type: none"> -Behavioral uncertainty -Prior experience -Strategic contribution 	questionnaires (40.54%).	<p>2 Behavioral uncertainty negatively associated with outsourcing.</p> <p>3 Strategic contribution and firm prior experience are significantly influenced toward outsourcing decisions.</p>	
Carey et al., (2006)	Outsourcing internal audit	<ul style="list-style-type: none"> -Cost saving -Firm size -Technical competence -Corporate strategy 	A sample of 99 companies listed on the Australian stock exchange	<p>1 There is an association between internal audit outsourcing and cost saving in the short run.</p> <p>2 There is no association between internal audit outsourcing and firm size.</p> <p>3 There is a positive association between technical competence of external service provider and outsourcing of internal audit.</p> <p>4 Corporate strategy is not significantly associated with internal audit outsourcing.</p>	Logistic regression
Nicholson et al., (2006)	Accounting outsourcing	Transaction cost economics	Interview based case study from India		
Delmotte & Sels, (2008)	HR outsourcing	<ul style="list-style-type: none"> -Strong focus on strategic HR - Strong focus on 	Panel surveys yearly basis (2002, 2003 and 2004) in	1 Strategic focus on HR shows a positive relationship with the degree of HR outsourcing.	Descriptive statistics

		cost cutting in HR	Balgria.	2 Cost cutting focus on HR shows a less clear picture and not confirm the relationship.	
Ellram et al., (2008)	Offshoring outsourcing of professional services	<ul style="list-style-type: none"> -Transaction frequency -Level of assets specific investment -Uncertainty in the external environment -Uncertainty regarding performance of the contract exists 	Data collected through interviews with 10 high-ranking supply management executives	<p>1 It is supported that firm likely to outsource larger volume professional categories and find small volume categories uneconomic.</p> <p>2 Higher the level of asset-specific investment required, less likely the category to be outsourced is partially supported.</p> <p>3 Uncertainty in the external environment less likely to be offshore professional service is supported.</p> <p>4 Uncertainty of firms about its requirements, less likely to offshore, is also supported after some modification.</p>	Descriptive statistics
Gilley et al., (2004)	Firm performance	<ul style="list-style-type: none"> -Training outsourcing -Payroll outsourcing 	The sample consists of 94 manufacturing firms in USA.	1 Training outsourcing and payroll outsourcing has a significant positive effect on firm performance.	Linear regression
Kotabe & Mol, (2009)	Firm performance	-Peripheral outsourcing	Data collected through mail, 558 manufacturing	1 Peripheral outsourcing and core outsourcing is not supported by the firm	Descriptive statistics and linear regression and

		<ul style="list-style-type: none"> -Core outsourcing -Generic firm strategy -Environment dynamism 	<p>companies top executives were contacted out of which 94 were used.</p>	<p>performance.</p> <p>2 Firm strategy and environmental dynamism were proposed as moderators of the outsourcing intensity-firm performance relationship</p>	<p>correlation</p>
Lee et al., (2008)	IT Outsourcing arrangement	<ul style="list-style-type: none"> -Mutual trust -Knowledge sharing -Mutual dependency 	<p>A field survey (163 respondents were used) method was adopted with a confirmatory analysis approach.</p>	<p>1 Mutual trust and knowledge sharing is positively correlated with outsourcing arrangement.</p> <p>2 The relationship between mutual trust and knowledge sharing will be moderated by the degree of mutual dependency is not supported.</p>	<p>Regression analysis and descriptive statistics</p>
Wang, (2002)	Outsourcing success	<ul style="list-style-type: none"> -Asset specificity -Uncertainty -Reputation -Post contractual opportunism 	<p>A postal questionnaire was used by randomly selected 1000 manufacturing, 500 service firms and 100 largest financial firms from Taiwan. Out total 163 survey were used.</p>	<p>1 Reputation and asset specificity are significantly positively correlated with outsourcing success (supported)</p> <p>2 Uncertainty and opportunism are significantly negatively correlated with the outsourcing success (supported)</p>	<p>Multiple regression analysis</p>
Wajatrakul et al., (2005)	Sourcing decisions	<ul style="list-style-type: none"> -High specificity -Low behavioral uncertainty 	<p>Semi-interviews and email questionnaire were used for data collection in</p>	<p>1 When specificity is high firm use insourcing</p> <p>2 if behavioral uncertainty is</p>	<p>Descriptive statistics</p>

		-High environment uncertainty	Thailand.	low firm decision is insourcing 3 when environmental uncertainty is high firm decisions is insourcing.	
Steven et al., (2009)	-Partnership performance -Opportunism behavior -Cooperative behavior -Formal contract -Trust	-Asset specificity -Opportunism behavior -Cooperative behavior -Formal contract -Trust	Through mailed 3149 firms and Their corresponding contact persons In our sampling frame in Hong Kong	1 Asset specificity is not significantly positively correlated with a formal contract. 2 Asset specificity is positively correlated with trust (supported) 3 Formal contracts is not negatively significant associated with opportunism (not supported) 4 Trust is positively correlated with cooperative behavior (supported) 5 Opportunistic behavior negatively significantly correlates with partnership performance (supported) 6 Cooperative behavior is positively significant correlated with partnership performance (supported)	Regression and correlation analysis

The above table of studies lists all the important literature for this research. These studies have tried to explain the influence of various decision factors on the outsourcing of accounting functions in SMEs. Most of the studies used a sample of owners or top executives of SMEs, mainly involved in manufacturing sectors. A majority of studies had less than 200 owners/managers in their sample size range, most common sample size was average out. For the purpose of this research the sample type and size selected is 500 of the population as a research sample.

3.7 Selection of Independent Variables & Hypothesis Generation

From the above table of literature several variables were taken under consideration in different circumstances and situations. Based on those, for the purpose of this study the independent variable selected are frequency of routine tasks, the frequency of non-routine tasks, asset specificity, environmental uncertainty, behavioral uncertainty, opportunism, trust in accountant, commitment, cooperative behavior, accounting competence, competition and outsourcing strategy as their independent variables. These independent variables are discussed as follows, also from the explanation several hypotheses shall be drawn respectively.

3.7.1 Frequency

According to the literature reviewed earlier in frequency of accounting tasks is the important element taking into account while making management accounting outsourcing decisions. Transaction frequency means the frequent or recurrent of the transaction (Murrey, 2001). The frequency of management accounting tasks can be classified as 1) periodicity of the accounting task and 2) the size of tasks (Everaert et al., 2010). Periodicity of accounting tasks in particular describes as each of the four accounting tasks of SMEs can be performed daily, weekly, monthly, quarterly, semi-yearly and yearly. However, there are certain laws on accounting exist when it comes to the preparation of financial statements once a year. Most companies often enter daily or monthly bills and prepare interim reports and year-end reports. The frequency for accounting into two categories: A. Routine accounting tasks (entry of financial invoices, interim reporting and the volume of transactions in the last year for routine tasks performed) and B. non-routine accounting activities (period end accounting and preparation of financial statements). According to Williamson, (1985: 60) high frequency trading will lead to the choice of hierarchical governance means that the internalization - the company chooses to produce the product, instead

of buying it from a supplier. However, very few studies have analyzed the impact of frequency on the choice of the form of governance. The size of the accounting activities also matters for the entry of invoices that require resources, for example, the number of employees required to enter the 20 invoices that compare to enter 200 invoices per month. A company with 20 bills each month has a lower frequency as compare to the company has 200 bills each month. Therefore, an old company (20 bills) is more attractive to outsource accounting function than later one. (Everaert et al., 2010). Based on the earlier discussion, we hypothesis as follows:

Hypothesis 1: The higher the frequency of accounting routine tasks the less intensively accounting functions are outsourced.

Hypothesis 2: The higher the frequency of accounting non-routine tasks the less intensively accounting functions are outsourced.

3.7.2 Asset Specificity

The literature suggested that the asset specificity is another factor that plays an important role while making the decision towards outsourcing of management accounting functions. There are two types of specific assets including physical assets (land, equipment and machinery etc.) and human assets (skills, ability, knowledge etc.) to gain and sustain a competitive position by successfully applied valuable assets to specific transactions. For instance, assets specificity refer to expertise, competence, knowledge, skills and capabilities concerning the accounting functions. In this regards Barney, (1991) categorized resources as physical resources include physical technology, plants and equipment, geographic position, access to raw materials whilst human capital resource contains training, experience, judgment, intelligence and relationships inside individual, managers and workers in the firm. According to Chang et al., (2009) when asset specificity is low it is most likely that core business transactions might be governed by outsourcing. Moreover, the human asset specificity is a vital for internal audit and outsourcing accounting services from a professional accountant (Everaert et al., 2010). Furthermore, Everaert et al., (2010) found that there is a significant association between accounting outsourcing and asset specificity. Therefore, TCA and RBV literature argue that asset specificity is a vital part to

consider in outsourcing decisions (Watjatrakul, 2005; Everaert et al., 2010). Finally, our first hypothesis based on the earlier discussion is as follows:

Hypothesis 3: The higher the level of asset specificity of accounting functions, the lower the intensity of outsourcing of accounting functions.

3.7.3 Environmental Uncertainty

Studies show that environmental uncertainty is another significant factor that influences the outsourcing decision in SMEs outsourcing. The environmental uncertainty in an accounting context means the firm has less information in the term of predictability and stability of the workload of accounting related functions causes instability in the business process (Everaert et al., 2010). In practice, unstable accounting activities are consequence of change in corporate strategy and structure, unstable sales and purchase invoice, seasonal factors are involved workload in business. Moreover, in the term of TCA Ellram et al., (2008) found that if the firm is capable of forecasting appropriately the accounting related functions that leads to lower the transaction cost, in such case, it is the more likely firm going for outsourcing services. Furthermore, the lower the predictability of accounting functions will lead to higher the transaction cost and it is less likely firm will outsource accounting services (Everaert et al., 2010; Lamminmaki, 2008). Therefore, the higher the level of environmental uncertainty will raise transaction cost it is less likely the firm choice external professional accountant (Kotabe & Mol, 2009) rather firm prefers to perform accounting functions through internal accountant (Ellram et al., 2008). Hence, based on the earlier discussion, the following hypothesis is proposed:

Hypothesis 4: The higher the level of environmental uncertainty of accounting functions, the lower the intensity of outsourcing of accounting functions.

3.7.4 Behavioral Uncertainty

Studies have pointed out the importance of behavioral uncertainty in relation to outsourcing of accounting functions. The behavioral uncertainty in an accounting context means the difficulty to interpret and evaluate the accountant's ability, efficiency and effectiveness in a assign job as per

his contractual obligations in SMEs (Dibbern & Heinzl, 2009). In this regards Everaert et al., (2010) concluded that high behavioral uncertainty causes high transaction costs, due to writing, negotiating, monitoring and enforcing contracts, all done to prevent opportunistic behavior. Therefore, if the firm cannot predict the true performance quality of service provider related to accounting functions, the owners/managers of SMEs prefers accounting functions internally, believing that the external accountant will be expensive to plan (Nicholson et al., 2006; Alvarez-Suescun, 2010; Everaert et al., 2010). Hence, the higher the level of behavioral uncertainty causes rise in transaction cost it is less likely that firm draft external professional accountant rather firm prefer internal accountant to perform accounting functions (Lamminmaki, 2008). As a result, the following hypothesis is proposed:

Hypothesis 5: The higher the level of behavioral uncertainty of accounting functions, the lower the intensity of outsourcing of accounting functions.

3.7.5 Opportunism

A majority of authors has looked into opportunism in different management areas. Opportunism in accounting outsourcing means one party (outsourcing firm) tolerate the increase cost or decrease revenue as a consequence of the other party (professional accountant) opportunistic behavior. Of course, not all people behave opportunistically all the time – the problem is that we do not ex ante know who that under certain circumstances may behave opportunistically. The assumption of opportunism can also be found in the principal – agent theory, and bureaucratic theories, while the relational contracting theory suggests that trust is a better description of the relationship between two actors. *“Opportunism describes a condition of ‘self-interest seeking with guile’ that includes propensities to disseminate, distort, fail to disclose, and otherwise act in an untrustworthy and even fraudulent manner for purposes of the translator’s own gain”* Wang, (2002: 161). We distinguish between ex ante and ex post opportunism, depending on whether we analyze before or after the contract is entered. Ex ante implies that one of the parties (A) retains important information, or that the party claims to be another type than he/she really is – this is called misrepresentation. Under such circumstances, the other party (B) risks to choose a non-optimal exchange partner. This form of opportunism leads to adverse selection. A well-known

example is the second hand car salesman, who has private information about the quality of the car. The buyer may thus be led of choosing a car of inferior quality. Furthermore, the opportunistic behavior of service provider decrease trust, commitment, cooperation, satisfaction and specially damage the long run relationship between individual firm and professional accountant (Kwon & Suh, 2005; Lee, 1998; Joshi & Stump, 1999). According to Everaert et al., (2010) an external accountant has developed such a relationship with the manager or owner that accountant carry on commitment, take action, act predictable manner and minimize opportunism. The opportunistic behavior of service provider has a big influence economic decision and the complementary factor in the governance of exchange relationships. Consequently, based on the discussion above, the hypothesis is proposed as follows:

Hypothesis 6: The stronger the perception that the external accountant will behave opportunistically, the less intensely the accounting functions are outsourced.

3.7.6 Trust of the SME Owner/Manager in an External Accountant

The literature suggested that the trust is another factor that plays an important role in business relations. The definition of trust in the service provider entails as one party believe on the other party based on economic indications that the other party is an expert and capable to carry out the commitment and behave in a consistent way (Lee et al., 2008). According to Everaert et al., (2010) an external accountant can develop such a relationship with the manager or owner that accountant carry on commitment, take action, act predictable manner and minimize opportunism. Many studies show that there is a relationship between outsourcing and external service provider should be an analyzed based on TCA (Brouthers, 2003; Everaert et al., 2010; Greenberg et al., 2008 in Kamyabi & Devi, 2011). According to Kim et al., (2007) Trust is the influential indicator for outsourcing decisions. Greenberg et al., (2008) indicate that there is a significant association of trust and outsourcing the business governance process. Trust seems as the key indicator in SME outsourcing accounting functions. If both parties observe that the other party does not behave opportunistically, this may lead to the development of a trust. Obviously, trust will be important in order to avoid and/or resolve conflicts that may arise. When the parties have trust in each other, this will increase the likelihood of information exchange, even such type of

information that in the initial stage of the relationship would be considered to be confidential. Such information exchange will contribute to increased knowledge of the other party and thereby strengthen trust. Generally, a trust is believed to decrease the need for formal control mechanism such as monitoring, the high degree of control/centralization of decision-making etc. However, it should be noted that trust is not the opposite of the concept opportunism that you may have trust to a partner but even so you may act opportunistically. Therefore, Everaert et al., (2010) emphasizes on the role of trust of the owner/manager of external accountant services was significantly and positively associated with accounting outsourcing decision. Trust is basically a sociological factor that has a big influence economic decision and complementary factor in the governance of exchange relationships. Consequently, based on the discussion above, the hypothesis is proposed as follows:

Hypothesis 7: The higher the level of trust of the SME owner/manager in the external accountant, the more intensely the accounting functions are outsourced.

3.7.7 Commitment

Studies show that commitment is another factor in Relationship Theory that plays an essential role in sustainable long run mutually beneficial relations among actors. Commitment refers to an implicit or explicit pledge of relational continuity between exchange partners. Commitment has also been described as a willingness at both parties to make all efforts to maintain the relationship (Morgan & Hunt, 1994). Commitment presupposes that the parties perceive a common goal for the relationship and that they actively work together to reach this goal. If so, the parties must be willing to exchange important information to the other party, even if this type of information could be perceived to be confidential. Furthermore, commitment involves that at least one of the parties is willing to make the necessary adjustment – even those who are not profitable for the party in question, but only profitable for the relationship as a whole. To change the external accountant/service provider would not only imply economic costs (shift costs/transaction costs) but also non-economical costs such as terminating friendship/social ties could be included. Commitment in accounting outsourcing activities means that owners/managers make all efforts to maintain the long term relations with external service providers. If the trust to the external accountant is reduced, this is likely to have a negative effect

on the commitment to SMEs owners/managers. If so, the SMEs owners/managers perceive short term relations with service providers. However, there is not necessarily a positive relationship between trust and commitment; you could have a great trust to an external accountant while without having a large commitment to the service providers. The degree of commitment in a management accounting outsourcing relationship is likely to be influenced the perceived benefits of continuing the relationship, and the anticipated costs of breaking the relationship. It is imperative that the short run benefits do not offset long run benefits. In general, if SMEs owners/managers and the external accountant in a relationship are too short term oriented, in cooperation parties will have an incentive to exploit one another as quickly as possible and exit the relationship. In contrast, if the actors are too long-standing and do not periodically experience benefits, their incentive to hold up the relationship will wane. Consequently, based on the discussion above, the hypothesis is proposed as follows:

Hypothesis 8: The higher the level of commitment among SME owner/manager and external accountant, the more intensely the accounting functions are outsourced.

3.7.8 Cooperative Behavior

According to literature review earlier different researchers have looked into the importance of cooperative behavior in business relations. Cooperation is defined as collective activities engaged by exchange parties to achieve bilateral expected benefits in terms of flexibility, information exchange, solidarity and mutual problem solving (Steven et al., 2009; Morgan & Hunt, 1994). Specifically, flexibility is referring to a situation that how do willing parties undertake the necessary adjustment as circumstances change. Information exchange involves a mutual expectation that the actors will proactively give information useful to the partner. Furthermore, solidarity is meant a bilateral expectation that the parties are willing to behave in such a manner that the relationship can be maintained. In addition, shared problem solving argues that the actors have the same opinion to share the necessary responsibility for handling with problems and sustaining their relationship (Pearce, 2001). Moreover, the high level of trust among actors leads to cooperative behavior. These norms imply that in management accounting outsourcing relationship parties are motivated to solve any conflict that may occur, by showing flexibility, information exchange, problem solving, solidarity, and knowing the task they have to perform in

order to avoid conflict. Finally, the strong interpersonal relationships between accounting service providers and SMEs owners and managers generate flexibility and a responsiveness that benefit the overall relationship. Hence, previous arguments are summarized in the following hypothesis:

Hypothesis 9: The higher the level of cooperative behavior among SME owner/manager and external accountant, the more intensely the accounting functions are outsourced.

3.7.9 Accounting Competence

The literature suggested that accounting competence is another significant factor that attracts SMEs towards outsourcing of management accounting functions. According to the resource based view (RBV) accounting competence provides a company an advantage, especially when compared with companies that do not have a comparable level of accounting competence. Moreover, it is difficult to imitate or substitute, whether it is protected by patents or by casual ambiguity (Fang, et al., 2007). RBV enforced owner/manager to recognize accounting competence of professional accountant in order draft outsourcing decisions (Kamyabi & Devi, 2011). Furthermore, many studies focuses that the external accountant can possess a competitive advantage over the internal accountant due to specialized skills, competence, market knowledge, qualification and industry experience (Nandan, 2010; Carey et al., 2006; Brandau & Hoffjan, 2010). In addition, RBV more significantly focuses on information as a resource of competence, SMEs with lack of accounting competence, outsource professional accountant in order to obtain the appropriate information to achieve the highest degree of competition (Kotabe & Mol, 2009; Gooderham, et al., 2004; Kamyabi & Devi, 2011). Hence, if the owner/manager of SMEs found that the professional accountant can possess high competencies over the internal accountant, it is more likely that firm outsource professional accountant rather firm depend on internal accountant for accounting functions (Kamyabi & Devi, 2011). Accordingly, the above arguments are summarized as follows:

Hypothesis 10: The stronger the level of perception that external accountants are more technically competent than the internal accountant, higher the intensity of outsourcing of accounting functions.

3.7.10 Competitive Pressure

According to literature viewed earlier competition among SMEs is equally important towards outsourcing of management functions. Resource based view (RBV) identified the economic concept of competition and transaction cost occurs when markets fail to function as a perfect market (i.e. homogenous product, perfect information and free mobility of resources etc.) (Greenberg et al., 2008). The TCA can help organizations in the selection of proper governance structures in the term of outsourcing to control the transaction cost (Greenberg et al., 2008). However, RBV facilitates firm to understand resources, skills, competence and capabilities in order to influence competitive position in the market (McIvor, 2009). For instance, many claim that in the competitive environment, the association between outsourcing and internal resource gaps is critical to consider (Espino & Robaina, (2005). Therefore, in such a competitive pressure situation smaller firms are forced to outsource external resources for future survival and growth to achieve their goals (Gooderham et al., 2004). Furthermore, the competitive pressure intensity forced SMEs rely on external accountants to cut costs for achieving sustainable competitive advantages (Delmotte & Sels, 2008; Jiang & Qureshi, 2006). Hence, it was found that accounting functions and governance are positively associated with the level of competition (Chenhall, 2003). Hence, previous arguments on TCA and RBV are summarized in the following hypothesis:

Hypothesis 11: The firms that face more intense competition will outsource more accounting functions.

3.1.11 Outsourcing Strategy

The literature suggested that the firm outsourcing strategy is another factor that is essential to consider towards outsourcing of management accounting functions. Studies indicate that this factor is more influential for those companies that find easy to move around or already outsourcing some non-core management functions at their desire external service providers in order to save the cost. Outsourcing of non-core functions keep companies to concentrate towards firm core tasks to be more competitive in a business environment. For example, company structures, processes and financial matters must be taken into account in decision making (Espino & Robaina, 2004). According to Carey et al., (2006) argues that firm strategy of

outsourcing non-traditional activities (i.e. accounting functions) is more likely to increase firm competence, capabilities and experience that lead to managing the risk of non-core functions (HR functions etc.) by outsourcing. Hence, *“the propensity for outsourcing non-traditional services (e.g. Accounting functions) is likely to be higher in companies that actively outsource their business processes than in companies with low-outsourcing activity”* (Kamyabi, & Devi, 2011: 85). Based on the earlier discussion, we hypothesis as follows:

Hypothesis 12: The stronger the strategy of a firm for outsourcing of non-core activities, the greater the tendency for outsourcing of accounting functions.

3.8 Selection of Dependent Variables

The two most common dependent variables viewed in the literature above come out to be outsourcing and firm performance. From the table above sixteen out of twenty studies used outsourcing as a dependent variable. These studies are Kamyabi & Devi, (2011); Everaert et al., (2010); Jayabalan et al., (2009); Lamminmaki, (2008); Gooderham et al., (2004); Ruhanita et al., (2010); Alvarez-Suescun, (2010); Carey et al., (2006); Nicholson et al., (2006); Delmotte & Luc, (2008); Ellram et al., (2008); Lee et al., (2008); Wang, (2002) and Watjatrakul, (2005).

Four out of twenty studies used firm performance as a dependent variable i.e. the studies of Kamyabi & Devi, (2011); Kotabe & Mol, 2009; Gilley et al., (2004) and Gilley & Rasheed, (2000). Different studies looked at different variables and their relations to others in different settings. This research will consider the dependent variables in a similar way that Kamyabi & Devi, (2011) with little modification. For this purpose it is important to know that what does outsourcing, accounting outsourcing and firm performance actually means.

3.8.1 Outsourcing

A majority of authors has looked into outsourcing, sixteen out twenty studies have looked at the various aspects of outsourcing. The term outsourcing means transferring the whole or a portion of the workload to the external service provider rather than performing internally. Moreover, SMEs considers the overall outsourcing intensity including both routine and non-routine activities separately. Furthermore, these external service providers refer to both an independent

accountant and accounting firms (Everaert et al., 2010). In addition, accounting outsourcing is also referred outsource all or portions of accounting functions to a professional accountant in order to achieve competitive advantage (Maelah et al., 2010). In Pakistan, the term professional accountant refers to a member of the Institute of Chartered Accountant of Pakistan (ICAP) or other valid certificate from partner accounting firms in order to perform accounting, auditing, taxation or other related services.

3.8.2 Firm Performance

Studies have highlighted the importance of SMEs performance after outsourcing of management accounting, IT, and human resources management. Four out of twenty studies in the table above noted performance as an independent variable (Kotabe & Mol, 2009; Kamyabi & Devi, 2011c; Kamyabi & Devi, 2011b; Gilley et al., 2004 and Kotabe & Mol, 2009). The RBV approach provides a set of resources, skills and capabilities to examine the strong competitive advantages, which, in turn, affect the performance. In this regard Marshall et al., (2007) point out that "*a major concern of the RBV is how the capacity of an organization to develop and affect its competitive position and performance.*" Prahalad & Hamel (1990) concluded that the company can achieve performance by focusing on those resources that provide an essential core complementary competence. According to TCA, outsourcing of specific resources, negatively affect the performance of the company due to opportunistic behavior of the service provider. The major concern of the TCA is the choice of the governance of the organization with the characteristic of minimizing transaction costs tend to improve the performance of the company (Vita, 2010). In addition, the relationship between outsourcing and performance of the company depends on the strategy of the organization, general activities, routines and the dynamic environment (Gilley & Rasheed, 2000; Klaas et al., 2001). Finally, outsourcing services minimize risk, reduce bureaucratic complexity, reduce overhead costs and uncertainty; enable SMEs to achieve economies of scale in the overall business operations, which, in turn, improve business performance (Holcomb & Hitt, 2007). Accordingly, based on the argument above, hypothesis are proposed as follows:

Hypothesis 13: Outsourcing of accounting activities is positively associated with the firm performance.

H14: Outsourcing will mediate the relationship between (a) Frequency of routine tasks, (b) Frequency of non-routine tasks, (c) Assets Specificity, (d) Environmental Uncertainty, (e) Behavioral Uncertainty, (f) opportunism , (g) Trusts in Accountant, (h) Cooperative Behaviour, (i) Commitment, (j) Accoutning Competence, (k) competition and (l) Outsourcing Strategy and firm performance, respectively.

4. CONCEPTUAL FRAMEWORK AND HYPOTHESES

4.1 Introduction

This chapter presents the overall conceptual framework and hypotheses, with a short introduction of conceptual framework. The relations or impact of direction of the independent, control and dependent variables can be viewed. Finally, to look at what direction the independent variables mediate in the model.

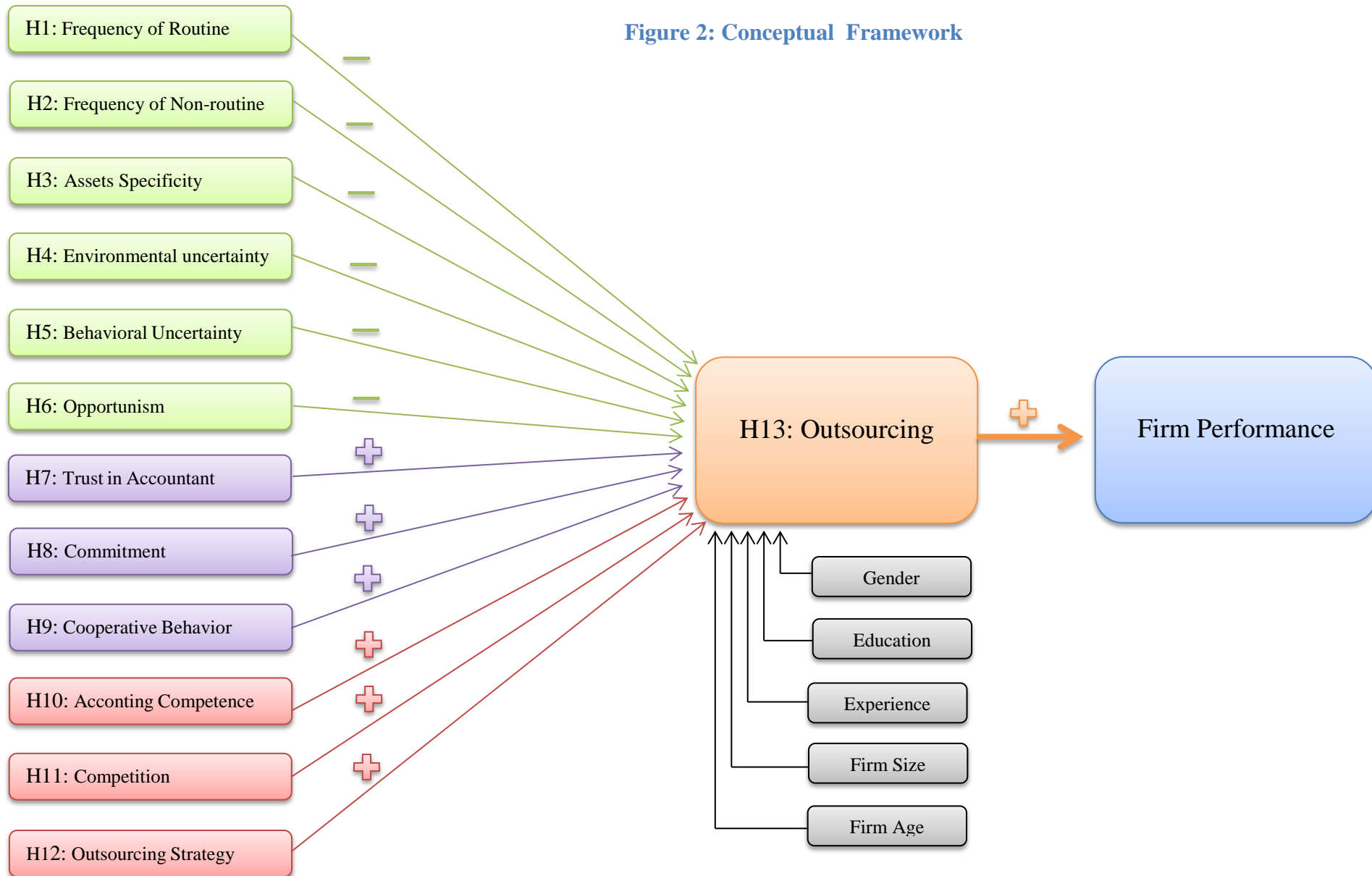
A conceptual framework portrays the relationships and the type of relationships among the concepts. Moreover, a conceptual framework acts as a map that offers possible courses of action to achieve the preferred results. It is generally built by affiliation and to define the relationship between the problem statement, the purpose and design of the study. In this research a conceptual framework can be constructed by defining the nature and scope of this study. It can be developed on the basis of theoretical issues and the available literature.

After reviewing the previous literature, the dependent variables tested by Kamyabi & Devi, (2011) were believed to be most important for current research. This research will be conducted to find out which factors (independent variables) have significant influence on accounting outsourcing (mediating variable) and firm performance (dependent variable) of SMEs in Pakistani context. This study has been conducted in 9 cities of Punjab region including Lahore, Rawapindi, Faisalabad, Sailkot, Multan, Islamabad, Gujrat, Gujranwala, and Taxila is providing a large spectrum of respondents from manufacturing SMEs. The selected variables in this research are given in table 2.

Table 2: Variables and Reference

VARIABLES	REFERENCE
Dependent Variables	
Outsourcing	Kamyabi & Devi, (2011) and New Measures
Firm Performance	Kamyabi & Devi, (2011)
Independent Variables	
Frequency of Routine Tasks	Everaert et al., (2010)
Frequency of Non-routine Tasks	Everaert et al., (2010)
Asset Specificity	Kamyabi & Devi, (2011)
Environmental Uncertainty	Kamyabi & Devi, (2011)
Behavioral Uncertainty	Kamyabi & Devi, (2011)
Opportunism	New Measures
Trust in Accountant	Kamyabi & Devi, (2011); New Measures
Commitment	New Measures
Cooperative Behavior	New Measures
Accounting Competence	Kamyabi & Devi, (2011)
Competition	Kamyabi & Devi, (2011)
Outsourcing Strategy	Kamyabi & Devi, (2011)

Figure 2: Conceptual Framework



The theoretical framework of our research contains of 14 hypotheses. In the first twelve hypotheses conceptual framework (above) consists of *independent variable* – frequency of routine tasks, frequency of non-routine tasks, assets specificity, environmental uncertainty, behavioral uncertainty, opportunism, trust in accountant, commitment, cooperative behavior, accounting competence, competition, outsourcing strategy; *dependent variable* – performance; *mediating variable* – management accounting outsourcing and *control variable* – gender, education, experience, firm size and firm age. Hypotheses assume that there is a negative correlation between frequency of routine tasks, the frequency of non-routine tasks, asset specificity, environmental uncertainty, behavioral uncertainty and opportunism with accounting outsourcing whilst there is a positive correlation between trust in accountant, commitment, cooperative behavior, accounting competence, competition and outsourcing strategy with accounting outsourcing. In addition, accounting outsourcing has positive correlation with firm performance.

H14: Outsourcing will mediate the relationship between (a) frequency of routine tasks, (b) frequency of non-routine tasks, (c) asset specificity, (d) environmental uncertainty, (e) behavioral uncertainty, (f) opportunism , (g) trusts in accountant, (h) commitment, (i) cooperative behavior, (j) accounting competence, (k) competition and (l) outsourcing strategy and firm performance, respectively.

H14 consists of the same 12 independent variables, only in this case dependent variable – outsourcing is considered as *mediating variable*, and dependent variable is firm performance.

A variable (M) as a mediator if it carries the influence of a given independent variable (X) for a given dependent variable (Y). To test the effect of mediating accounting outsourcing on a given conceptual framework (figure 2). It is important to understand the direction (positive/negative) of variables presented in the conceptual framework for later analysis. We use the same conditions recommended by Baron & Kenny (1986). First, the independent variables must show significant positive/negative effect on the mediating variable (accounting outsourcing) which shows H1, H2, H3, H4, H5 and H6 is negatively correlated with outsourcing whilst H7, H8, H9, H10, H11, H12 is positively correlated with outsourcing. Second, the independent variables H1, H2, H3, H4, H5 and H6 have also shown a negative correlation on the dependent variables (firm performance)

whilst H7, H8, H9, H10, H11, H12 is positively correlated with firm performance in the conceptual framework. In addition, mediating variable accounting outsourcing H13 is positively correlated with firm performance. Finally, the mediator variables must also affect the dependent variable in a same direction of both the independent variables and the mediator variable on the dependent variable. Hypotheses assume that increasing outsourcing by SMEs will improve the firm performance.

5. RESEARCH METHODOLOGY

5.1 Introduction

This chapter presents the overall research design, data sampling as well as data collection techniques. Furthermore the statistical methods used for the analysis of the variables of the study are also discussed.

5.2 Empirical Context and Data Collection

The research design is a master plan of action that begins with the definition of research questions, the selection of appropriate variables for the study, the methods of collecting the desired data and to analyze the same for accurate results. When the research design encompasses, the entire scope of framework and research methodology is a part of it. This phase is to decide and implement the appropriate data collection and data analysis for the study. (Ghauri & Gronhaug, 2010).

The current research is a cross sectional study and following a descriptive research design. Thus, the search began with a prior knowledge of the area of interest. The prior studies were used to identify the dependent variables and develop a concise research question. Some specific hypothesis were also drawn from the same theoretical knowledge are previous studies. The detailed characteristics of this phenomenon have been described and research question was formalized. To analyze the relationship exist between the dependent variables and independent variables the responses were measured once from the respondents.

After careful selection of appropriate research plans, the next step is to select the type of data needed to answer the research question. There are two types of data: 1) secondary data and 2) the primary data. For the purpose of this study, the analysis is based on primary data that was collected specifically for this study.

5.2.2 Sampling

According to Ghauri & Gronhaug, (2010) when the research problem is specified and an appropriate research approach & data source is developed, the next step of research is to choose the elements that form the information is needed. For that purpose initially a population and consequently a sample must be identified. First, the population included in this study is identified.

Population

Population refers to a larger group of study units that are targeted for a specific study. For this research, the identified target population is around 400,000 SMEs in Pakistan, and more especially SMEs involved in the manufacturing sector such as cotton, surgical, textile, sports goods, leather and pharmaceutical etc.

Sampling Frame

The sampling frame is the listing of the elements from which the actual sample will be drawn. For this particular research, the list of manufacturing sectors SMEs operating in Punjab region was obtained from SMEDA official website for 9 industrial cities such as Lahore, Faisalabad, Sialkot, Multan, Gujrat, Rawapindi, Islamabad, Taxila and Gujararanwala. This list includes company name, nature of business, website, phone number and location of business operation. As these are larger and most developed industrial cities of Pakistan, it provides a larger SMEs base related to the manufacturing sector for data collection.

Sampling Procedure

The convenience sampling procedure was used for data collection. A wide variety of manufacturing SMEs from 9 cities were chosen either very close or relatively convenient distance.

Sampling Size

The question of sample size depends on several factors. Some of these factors are statistical and some of non-statistical nature. For this research, the sample of 500 SMEs was decided based on previous studies. Data collection contained until filled surveys were collected from a total of 334

SMEs owners/managers/CFOs from the above mentioned locations. Each respondent completed a questionnaire having 101 statements on 7-point Likert scale (1 = strongly disagree to 7 = strongly agree). Mostly, the measuring elements (statements questionnaires) were adopted by previous studies.

5.2.3 Data Collection Methods & Tool

An outsourcing questionnaire survey was carried out in 9 cities of Punjab Province in Pakistan. The responses were collected on the basis of face to face interaction and interviews with SMEs owners/managers/CFOs. Throughout the research 500 SMEs owners/managers/CFOs were contacted by personal visit to each company office as well as approach SMEs owners/managers via Chamber of Commerce, during the monthly meeting of member companies in each city. A structured questionnaire with close and open ended question format was used (see appendix 1). The medium of the survey questionnaire was presented in English. However, the researcher explained the same to respondents in native Urdu language for clear understanding. Moreover, some respondents were randomly approached during the weekly or monthly members meeting in different Chamber of Commerce. It was quite convenient for us to get maximum respondents at one location. Some willing and some unwilling to participate respondents were encountered. However, majority of SMEs owner/managers were cooperative and answered the questionnaire. As the total sample size for this research was decided to be approximate 334, around 25 to 70 completely filled questionnaires each of the 9 different locations were used for analysis. The main reason to get the questionnaires filled face to face was that personal contact encourage and motivates the SMEs owners/managers/CFOs to give more accurate data and also verbal communication in native language takes less time to get the questionnaire completed. Respondents were clearly informed and explained that they are participating in a study for a Master's Thesis research. Finally, we had only 302 usable responses, representing a very effective response rate of 73 percent.

Completed interviews (completed)

Response rate = $\frac{\text{Completed}}{\text{Completed} + [\text{completed}/(\text{completed} + \text{ineligible})] \times (\text{refusals} + \text{not reached})}$

$$334/334+(334/(334+32))*(29+105) = 73\%$$

5.3 Measurement and Operationalization of Variables

When the data collection is completed, the data analysis can start. There is a wide choice of methods which one can use for the statistical analysis, so a strategy should be chosen for the research. First, the most appropriate method has to be chosen. In our research we are going to use multivariate statistical analysis. Furthermore, we will use dependence techniques, because our hypotheses distinguish dependent and independent variables.

Data analysis should be started with data examination and adjustment to corresponding data analysis method and input format. Data coding is a systematic method in which to compress wide data sets into smaller analyzable units through the formation of categories and concepts derived from the data (Lockyer, 2004). The data screening is used to identify a miscoded, missing, or messy data. Overall, cleaning raw data by determining normality and linearity problem, outliers influences and the missing value presence proved to increase R-squared values. An outlier is an observation that lies outside the overall pattern of distribution (Moore & McCabe, 1999). If outliers are observed, they should be eliminated from research data in order not to distort the findings. In case of missing data respondents should be contacted once again and find out the missing data, or otherwise use mean values.

It's important to pay attention how to classify a measurement because it will have an impact on the kinds of numerical analysis you can perform on the data later on. There are typically four levels of measurement that are defined: nominal, ordinal, interval, and ratio. We will measure dependent and independent variables, rated on seven point Likert-type scale by focusing on Cronbach's alpha must be above 70% for high adequacy.

The most important study of the literature comes out to be Kamyabi & Devi, (2011) and Everaert et al., (2010). It studied a similar phenomenon, for example, the factors affecting SMEs attitude towards accounting outsourcing. However, the study was conducted in Iran and Belgium. As the research question and geographical location under scrutiny in their study are somewhat similar to current research, hence it was made the basic contextual compass. It allowed to look at the dependent and independent variables in a clear light and provided the basis for more valid and accurate comparisons. For this research variables is operationalized as per study of Kamyabi & Devi, (2011), Everaert et al., (2010) and new measures.

Table 3: Variables Measurement and Sources

Variables (Items)	Source
<p>Outsourcing (1= not outsourcing to 7= totally outsourced)</p> <p>1-Bookkeeping</p> <p>2-Interim reporting</p> <p>3-Period-end accounting</p> <p>4- Preparation of financial statements</p> <p>5-Product/services costing</p> <p>6-Budgeting/forecasting</p> <p>7-Customer profitability analysis</p> <p>8- Financial planning</p> <p>9- Management accounting</p> <p>10- Internal audit</p> <p>11- Tax consultancy</p> <p>12-Business advice</p> <p>13-Management consultancy</p> <p>14-Financing advice</p> <p>15- IT consultancy</p> <p>16- Project evaluation services</p> <p>17- External audit (annual, interim)</p> <p>18- Sectorial/Corporate Affairs with SECP</p> <p>19- Special financial assignment (fixed asset evaluation, gratuity tax, employee</p>	<p>Adopted from Kamyabi & Devi, (2011) and New Measures</p>

<p>provident funds etc.</p> <p>20- Credit services</p> <p>21- Insurance Processing</p> <p>22- Banking</p>	
<p>Frequency of Routine Tasks</p> <p>1. Entry of purchase invoices, sales invoices and financial transactions (1 daily; 6 annually) *</p> <p>2. Preparation of interim profit and loss account (1 daily; 6 annually) *</p> <p>3. The total amount of invoices (sales and purchases) that the accountant has processed during the previous year?</p>	<p>Adopted from Everaert et al., (2010)</p>
<p>Frequency of Non-routine Tasks</p> <p>1. Period end accounting (1 daily; 6 annually) *</p> <p>2. Preparation of financial statements (1 daily; 6 annually) *</p>	<p>Adopted from Everaert et al., (2010)</p>
<p>Asset specificity (1= totally disagree to 7= totally agree)</p> <p>1. To acquire the routine accounting tasks the accountant needs to acquire company specific information</p> <p>2. To perform the non-routine accounting tasks the accountant needs to acquire company-specific information</p> <p>3. The accounting software is custom-tailored to our company</p> <p>4. The way we perform the accounting tasks are unique to our company</p> <p>5. It would be costly in terms of time and resources to switch to an external accountant at the end of the financial year.</p>	<p>Adapted from Everaert et al., (2010)</p>

<p>Environmental uncertainty (1= totally disagree to 7= totally agree)</p> <ol style="list-style-type: none"> 1. During the previous year, there was a lot of variation in the workload related to routine accounting tasks 2. During the previous year, there was a lot of variation in the workload related to non-routine accounting tasks (e.g., Period end-accounting) 3. During the previous year, there were relevant changes in the business organization of the company (e.g., Acquisitions, changes in corporate structure) 	<p>Adopted from Everaert et al., (2010)</p>
<p>Behavioral uncertainty (1= totally disagree to 7= totally agree)</p> <p>Is it possible to determine whether the accountant has correctly (accurately) performed the following activities? *</p> <ol style="list-style-type: none"> 1. Entering up purchase invoices, sales invoices and financial transactions 2. Preparation of interim reports (e.g., Interim profit and loss account) 3. Period end accounting (depreciations, stock changes, loans, accruals and deferred income, etc.) 4. Preparation of financial statements (balance sheet, profit and loss account) 	<p>Adapted from Poppo & Zenger (1998); Everaert et al., (2010)</p>
<p>Opportunism</p> <ol style="list-style-type: none"> 1-Sometime external accountant alters the facts slightly in order to get what they need 2-External accountant breaches the formal and informal agreements to their benefit 3-Sometime external accountant lies about certain things in order to protect their interest 4-Sometime external accountant promises to do things without actually doing them 	<p>New Measures</p>

<p>later</p> <p>5-Sometime external accountant does not fulfill obligations in accordance with our contract.</p> <p>6-Sometime external accountant tries to take advantage from us</p> <p>7-Sometime external accountant tries to mislead us</p> <p>8-Sometime external accountant tries to deceive us</p> <p>9-Sometime external accountant tries to withhold information</p> <p>10-Sometime external accountant compromises on ethics</p>	
<p>Trust on accountant (1= totally disagree to 7= totally agree)</p> <p>1-The owner/manager has confidence that the external accountant will treat fairly, this means to correctly charge for the performed duties</p> <p>2- The owner/manager has confidence that the external accountant will inform correctly</p> <p>3-The owner/manager has confidence that the external accountant will accurately perform the duties</p> <p>4- The owner/manager feels that external accountant care about what happens to us</p> <p>5 -The relationship between the owner-manager and the external accountant is based on trust.</p>	<p>Adopted from Everaert et al., (2010)</p>
<p>Commitment</p> <p>1-We do not have long term plans for working with this accountant.</p> <p>2-We see this accountant developing into a long term service provider</p>	<p>New Measures</p>

<p>Cooperative behavior</p> <p>1-Flexibility in response to requests for changes is a characteristic of this relationship</p> <p>2-Exchange of information on this relationship takes place frequently, informally and openly</p> <p>3-In most aspects of this relationship the parties are jointly responsible for getting things done</p>	New Measures
<p>Accounting competence (1= very limited competence and 7 = very highly competent).</p> <p>1. Specialized industry wide knowledge</p> <p>2. Expertise in internal control</p> <p>3. Experience and qualifications</p> <p>4. Depth of understanding of your firm</p> <p>5. Expertise in computerized information systems (CIS) accounting</p> <p>6. Expertise in risk management</p>	Adopted from Gooderhan et al., (2004); Kamyabi & Devi, (2011)
<p>Competition (1= very weak competition to 7= very fierce competition)</p> <p>1-Product characteristics</p> <p>2- Promotional strategies among rivals</p> <p>3-Access to distribution channels</p> <p>4- Service strategies to customers</p> <p>5-Product (Service) Variety</p>	Based on Rivard et al., (2006); lamminmaki, (2008); Kamyabi & Devi, (2011)
<p>Outsourcing strategy (1= lower score to 7= higher score.</p> <p>1-Information technology</p>	Adopted from Carey et al., (2006); Everaert et al., (2010)

<p>2-Human resource management</p> <p>3-Facilities management</p> <p>3-Logistics.</p>	
<p>Firm Performance</p> <p>Financial performance</p> <ol style="list-style-type: none"> 1. Profitability 2. Growth in sales 3. Return on assets 4. Cash flow <p>Non-financial performance</p> <ol style="list-style-type: none"> 1. Lifestyle 2. Independence 3. Job security <p>Other</p> <p>1-The outsourcing has contributed to our core competencies and competitive advantages.</p> <p>2-The outsourcing has realized the goals we set out to achieve</p> <p>3-Overall, we are very satisfied with the performance of this outsourcing of accounting tasks</p>	<p>Sarapaivanich & Kotey (2006); Kamyabi & Devi, (2011) and New Measures</p>
<p>Gender</p> <ol style="list-style-type: none"> 1. Male 2. Female 	

<p>Education</p> <ol style="list-style-type: none"> 1. University degree 2. Lower than a university degree 	<p>Everaert et al., (2010); Kamyabi & Devi, (2011)</p>
<p>Experience</p> <ol style="list-style-type: none"> 1. Less than 5 years 2. 5 -10 years 3. 11-15 years 4. 16-20 years 5. More than 20 	<p>Audet & St-Jean, (2007); Kamyabi & Devi, (2011)</p>
<p>Firm Age</p> <ol style="list-style-type: none"> 1. Less than 2 years 2. 2-5 years 3. 6-10 years 4. 11-15 years 5. 16-20 years 6. More than 20 	<p>(Kamyabi & Devi, 2011; Delmotte & Luc, 2008)</p>
<p>Firm Size</p> <ol style="list-style-type: none"> 1. Less than 20 employees 2. 20-30 employees 3. 31-50 employees 4. 51-100 employees 5. More than 100 employees 	<p>(Gooderham et al., 2004; Kamyabi & Devi, 2011)</p>

5.3.1 Dependent Variable

The choice of outsourcing and firm performance is considered as the dependent variable. The respondents had to choose their firm level of outsourcing practices on several different factors. Then measure the impact of outsourcing on firm performance.

1. Management Accounting Outsourcing

In order to achieve the objective of this research, we consider the twenty two types of management accounting functions with the assumption (based on Kamyabi & Devi, 2011 and new measures) that these functions are applicable and frequently performed by the accountants in Pakistan. Moreover, the participant of this study will be asked to indicate the percentage of the workload for each task that was performed by an internal accountant as compare to the workload performed by an external accountant. Furthermore, we looked at the outsourcing intensity of routine tasks (book keeping, interim reporting, etc.) and non-routine tasks (income statement, profit and loss account, balance sheet and Pakistani corporate tax on profit or gain adjustment etc.) performed by the external accountant. Therefore, in order to measure the accounting outsourcing functions, we used the measurement developed by (Kamyabi & Devi, 2011) on a 7 point Likert type scale, asking respondents to indicate the level of management accounting functions outsourcing of each item with 1= not outsourcing to 7= totally outsourced. The variable detail can be seen in appendix 1.

2. Firm Performance

In this study, firm performance classified into three types of performance 1) Financial performance 2) nonfinancial performance and 3) overall firm performance after outsourcing. Financial performance indicated as four types (profitability, growth in sales, return on assets and cash flow) whereas non-financial performance indicated as three types (lifestyle, independence, and job security) and overall performance indicated as three types (outsourcing has contributed to our core competencies and competitive advantages, outsourcing has realized the goals we set out to achieve, we are very satisfied with the performance of this outsourcing of accounting tasks). Thus, in order to measure financial and non-financial firm performance, we used the measures previously tested and validated by (Sarapaivanich & Kotey, 2006; Kamyabi & Devi, 2011) with satisfactory reliability of Cronbach's alpha 0.98 whereas, to measure the overall firm

performance, we used new measures. First of all, the respondents of this study will be asked to indicate their level of importance attached with four financial and three non-financial performance goals on a 7 point Likert type scale of each item with 1= not at all important to 7= very important. Second of all, asking respondents to indicate the level of satisfaction (financial and non-financial performance goals) in past two financial years on a 7 point Likert type scale with 1= strongly dissatisfied to 7= very satisfied. In addition, each 'satisfaction' score was multiplied with the 'importance' score in order to compute the weighted average performance index. The variable detail can be seen in appendix 1.

5.3.2 Independent Variables

The independent variable is also known as a predictor or explanatory variables that is supposed to explain the dependent variable (Hair, 2006). The respondent was asked to notify the level of importance they attached to each of the selected independent variables in outsourcing accounting functions. As mentioned earlier 12 independent variables were derived from the prior studies and the responses were taken from these variable from the respondents. Below each variable is explained one by one.

1. Frequency for Routine and Non-routine Tasks

Frequency is defined in this study as by combining a periodicity measure (daily, weekly, monthly, quarterly, semi-annually and annually) with a volume measure (transactions, number of invoices etc.) similar to Everaert et al., (2010). Frequency of routine and non-routine tasks in management accounting outsourcing means the frequent or recurrent of accounting (sales/purchase invoices with volumes, interim reporting) transaction (Murrey, 2001). Moreover, as we previously divided accounting tasks into routine and non-routine tasks. In order to identify the frequency of routine tasks, we combined the periodicity measure of routine tasks with the volume of transaction (invoices) whereas for non-routine tasks, we combined periodicity measure for period end with the period end financial statement preparation similar to Everaert et al., (2010). Therefore, in order to measure the frequency, we adopted the measurement use by Everaert et al., (2010) on a 6 point Likert type scale, asking respondents to indicate the frequency to what extent periodicity and volume related routine and non-routine workload is being

outsourced of each item with 1= daily to 6= annually. Appendix 1 shows the measurement details.

2. Asset Specificity

The term asset specificity in accounting outsourcing includes human assets (human capital) and physical assets that refer to the degree to which an asset is valuable in the context of the specific transaction. (Kamyabi & Devi, 2011). Accounting tasks are particularly people intensive that involved specialized knowledge, skills and capabilities to perform firm management accounting functions properly. Therefore, assets specificity measure primarily refers to human asset specificity which accountants need such as specialized knowledge to perform specific accounting tasks (Everaert et al., 2010). Thus, in order to measure the asset specificity, we used measures previously tested and validated by (Everaert et al., 2010; Poppo & Zenger, 1998) to ask respondents by splitting the items into two (routine tasks, non-routine tasks) on a 7 Likert scale 1= totally disagree to 7= totally agree, whether the accountant need to acquire firm specific information in order to adequately perform the management accounting practices. The variable detail can be seen in appendix 1.

3. Environmental Uncertainty

Environmental uncertainty in an accounting context has been defined as instability and unanticipated changes related to the accounting workload as a result of volatility in a business process (Everaert et al., 2010; Kamyabi & Devi, 2011). In practice, unstable accounting activities are consequence of change in corporate strategy and structure, unstable sales and purchase invoice, seasonal factors, governmental policies etc. involves workload for business. Therefore, in order to measures the environmental uncertainty, we adopted the measurement use by Everaert et al, 2010; Kamyabi & Devi, (2011) on a 7 point Likert type scale, asking participants to indicate to what extent the routine and non-routine workload may vary with each item with 1= totally disagree to 7= totally agree. The measurement of these items is shown in appendix 1.

4. Behavioral Uncertainty

Behavioral uncertainty is defined in this study as the difficulty of measuring the performance of the accountant related assign accounting workload as per his assign contractual obligations in

SMEs (Kamyabi & Devi, 2011). Therefore, to measure the behavioral uncertainty, we adopted the measures previously tested and validated by (Everaert et al., 2010; Kamyabi & Devi, 2011; Poppo & Zenger, 1998) with Cronbach's alpha 0.88. Furthermore, the respondents will be asked to determine the behavioral uncertainty of each accounting task (items) whether or not accountant correctly performed management accounting practices on a 7 Likert type scale with 1= totally disagree to 7= totally agree. Appendix 1 shows the measurement details.

5. Opportunism

The term opportunism in accounting outsourcing we mean that an actor (professional accountant), if she/he has the opportunity – may act to serve their own interests, at the expense of the SMEs owner/manager. “*Opportunism describes a condition of ‘self-interest seeking with guile’ that includes propensities to disseminate, distort, fail to disclose, and otherwise act in an untrustworthy and even fraudulent manner for purposes of the translator’s own gain*” (Wang, 2002: 161). Moreover, Opportunism in accounting outsourcing means one party (outsourcing firm) tolerate the increase cost or decrease revenue as a consequence of the other party (professional accountant) opportunistic behavior. Of course, not all people behave opportunistically all the time – the problem is that we do not ex ante know who that under certain circumstances may behave opportunistically. Therefore, to measure opportunism in accounting outsourcing services, the respondents will be asked at what extent they perceived the external accountant opportunistic behavior on a 7 Likert scale 1= totally disagree to 7= totally agree. The measurement of these items is shown in appendix 1.

6. Trust in Accountant

Trust in accountant is defined in this research as the expectation of executive/owner/manager that the accountant is competent, will fulfill its legal obligations, will behave predictable manner and will charge fairly for services provided (Zaheer et al., 1998; Everaert et al., 2010). Hence, based on measurement proxies from prior studies (Everaert et al., 2010; Kamyabi & Devi., 2011) and using new measures, we will ask participants to indicate at what extent their trust on professional accountant for each item on a 7 point Likert type scale with 1= totally disagree to 7= totally agree. The measurement of these items is shown in appendix 1.

7. Cooperative Behavior

Cooperative Behavior in accounting outsourcing is the relationship between SMEs owners/managers and accounting service providers in terms of flexibility, information exchange, solidarity and to solve overall accounting problems. Cooperation is defined as coordinated actions taken by exchange parties to achieve bilateral expected benefits in terms of flexibility, information exchange, solidarity and shared problem solving (Steven et al., 2009; Morgan & Hunt, 1994). Therefore, to measure cooperative behavior in accounting outsourcing services, the respondents will be asked to indicate the level of cooperation in a relationship on a 7 Likert scale 1= totally disagree to 7= totally agree. The measurement of these items is shown in appendix 1.

8. Commitment

Commitment in accounting outsourcing activities means that the motivation owners/managers make all efforts to maintain the long term relations to an external service provider. Moreover, commitment refers to an implicit or explicit pledge of relational continuity between exchange partners. Commitment has also been described as a willingness at both parties to make all efforts to maintain the relationship (Morgan & Hunt, 1994). Furthermore, the respondents will be asked to determine the level of commitment on a 7 Likert type scale with 1= totally disagree to 7= totally agree. Appendix 1 shows the measurement details.

9. Accounting Competence

Accounting competence is defined in this study as the external accountant possess specialized skills, competence, market knowledge, qualification and industry experience over internal accountant (Nandan, 2010; Carey et al., 2006; Brandau & Hoffjan, 2010). Hence, based on measurement proxies from prior studies (Kamyabi & Devi, 2011; Gooderhan et al., 2004), we will ask participants to indicate at what extent the firm perceives its professional accountant as a technical competent for each item on a 7 point Likert type scale with 1= very limited competence to 7= very highly competent. The measurement of these items is shown in appendix 1.

10. Competition

Competition is defined in this study as a competitive pressure situation where smaller firms are forced to outsource external resources for future survival and development (Gooderham et al., 2004). Many claim that in the competitive environment the association between outsourcing and internal resource gaps is critical to consider (Espino & Robaina, (2005). Therefore, the competitive pressure intensity forced SMEs rely on external accountants to cut costs for achieving sustainable competitive advantages (Delmotte & Sels, 2008; Jiang & Qureshi, 2006). Hence, based on measurement proxies from prior studies (Kamyabi & Devi, 2011; Rivard et al., 2006), asking respondents to indicate the intensity of their firm competition for each item on a 7 point Likert type scale with 1= very weak competition to 7= very fierce competition. Appendix 1 shows the measurement details.

11. Outsourcing Strategy

Firm outsourcing strategy is defined in this study as company structures, processes and financial matters must be taken into account for outsourcing decision making (Espino & Robaina, 2004). Thus, in order to measure the outsourcing strategy, we will use the similar measures previously tested and validated by (Kamyabi & Devi, 2011; Carey et al., 2006) to ask respondents to indicate their firm strategy with respect to outsourcing of non-core functions of the items on a 7 Likert scale with the range from 1= lower score to 7= higher score. The variable detail can be seen in appendix 1.

5.3.3 Control Variables

1. Firm Size

Firm size is defined in this study as the number of employees working in each firm is an important factor affecting accounting outsourcing decision (Carey et al., 2006; Delmotte & Sels, (2008). Hence, based on measurement proxies from prior studies (Gooderham et al., 2004; Kamyabi & Devi, 2011), asking respondents to indicate how many people work in the firm. Respondents are divided into five categories. Appendix 1 shows the measurement details.

2. Firm Age

Firm age is defined in this research as a year in which business was registered is an important factor affecting outsourcing intensity (Delmotte & Sels, 2008). Therefore, we included firm age as a second control variable. Hence, in order to measure the firm age, we will use the similar measures previously tested and validated by (Kamyabi & Devi, 2011; Delmotte & Sels, 2008) to ask respondents to indicate the year when the business was registered. Respondents are divided into six categories. The variable detail can be seen in appendix 1.

3. Education

Education is an important factor includes personal characteristics (education) of the SMEs managers/owners that significantly affect outsourcing intensity (Everaert et al., 2010). Therefore, we included education as a third control variable. Hence, based on measurement proxies from prior study (Everaert et al., 2010; Kamyabi & Devi, 2011), asking respondents to indicate their highest level of education. Appendix 1 shows the measurement details.

4. Experience

For measuring the experience in this study, we refer to Audet & St-Jean (2007) argued that the external services utilization is negatively associated with the experience of the SMEs owners/managers. Therefore, we included experience as a fourth control variable in this study. Hence, we will use the similar measures previously tested and validated by (Audet and St-Jean., 2007; Kamyabi & Devi, 2011) asking respondents to indicate how long they worked in the business. Respondents are divided into five categories. The variable detail can be seen in appendix 1.

5.4 Factor Analysis: Identifying Key Factor Influencing Outsourcing Practices

Factor analysis is a statistical technique used to reduce the redundancy in the observable variables. In this research factor analysis is used to reduce the number of dimensions identified for the independent variables and to classify accurately in larger dimensions (variables). The specific elements that capture broader dimensions and are highly correlated are assumed to be members of the same element or a common set of variables or factors (Hair, 2006). Factor analysis also provides the structure of interrelationships among large variables into a single variable or a common factor (Field, 2009). Factor analysis is chosen according to the Kaiser-Meyer-Olken (KMO) measure, which examines and evaluates the adequacy of the sample and the criteria of relevance factors. If the KMO test values are between 0.5 and 0.7, they are considered moderate, and values between 0.7 and 0.8 is considered good, values between 0.8 to 0.9 are considered excellent and values greater than 0.9 are classified as superb for factor analysis. On the other hand any value less than 0.5 to 0 indicates that the factor may not be appropriate and requires more data collection for accurate predictions (Field, 2009).

Barlett's test of sphericity is a statistical test used to investigate the hypothesis that the variables are not correlated with each other within the population, while each variable is perfectly correlated with itself and no correlation with any of these variables (Prashar & Mittal, 2011). However, before the factor analysis, we conducted an analysis of reliability for all independent and dependent variables from the questionnaire. There are many items were deleted during the process of improving the reliability for each of the concepts. The following table shows the test results of reliability, KMO and factor loading for all independent and dependent variables of TCA, RBV, RT, outsourcing and firm performance separately.

Table 4: Reliability and Factor Analysis of all Independent and Dependent Variables

CONSTRUCTS	ITEMS	SOURCES	KAISER-MEYER-OLKIN (KMO)	FACTOR LOADINGS
Independent Variables				
Frequency of Routine Tasks (alpha= 0.49)	6. Entry of purchase invoices, sales invoices and financial transactions*	Everaert et al., (2010)	.50	.817
	7. Preparation of interim profit and loss account*			.817
Frequency of Non-Routine Tasks (alpha= 0.67)	8. Period end accounting*	Everaert et al., (2010)	.50	.894
	9. Preparation of financial statements*			.894
Assets Specificity (alpha= 0.68)	12. To perform the non-routine accounting tasks the accountant needs to acquire company-specific information	Poppo & Zenger (1998); Everaert et al., (2010)	.65	.826
	14. The way we perform the accounting tasks are unique to our company			.736
	15. It would be costly in terms of time and resources to switch to an external accountant at the end of the financial year.			.823
Environmental Uncertainty (alpha= 0.78)	17. During the previous year, there was a lot of variation in the workload related to non-routine accounting tasks (e.g., period end-accounting)	Everaert et al., (2010)	.50	.909
	18. During the previous year, there were relevant changes in the business organization of the company (e.g., acquisitions, changes in corporate structure)			.909
Behavioral Uncertainty (alpha= 0.65)	19. Entering up purchase invoices, sales invoices and financial transactions	Everaert et al., (2010)	.68	.543

	20. Preparation of interim reports (e.g., interim profit and loss account)			.729
	21. Period end accounting (depreciations, stock changes, loans, accruals and deferred income, etc.)			.757
	22. Preparation of financial statements (balance sheet, profit and loss account)			.836
Opportunism (alpha= 0.86)	23. Sometime external accountant alters the facts slightly in order to get what they need.	New Measures	.81	.657
	24. External accountant breaches the formal and informal agreements to their benefit.			.839
	25. Sometime external accountant lies about certain things in order to protect their interest.			.712
	26. Sometime external accountant promises to do things without actually doing them later			.680
	27. Sometime external accountant does not fulfil obligations in accordance with our contract.			.868
	30. Sometime external accountant tries to deceive us			.863
Trust in Accountant (alpha= 0.81)	34. The owner/manager has confidence that the external accountant will inform correctly	Everaert et al., (2010); New Measure	.80	.926
	36. The owner/manager feels that external accountant care about what happens to us.			.753
	37. The relationship between the owner-manager and the external accountant is based on trust.			.902
Commitment (alpha= 0.68)	41. We do not have long term plans for working with this accountant*.	New Measures	.50	.876
	42. We see this accountant developing into a long term service provider.			.876
Cooperative Behavior (alpha= 0.59)	45. Flexibility in response to requests for changes is a characteristic of this relationship.	New Measures	.50	.843
	46. Exchange of information in this relationship takes place frequently, informally and openly.			.843

Accounting Competence (alpha= 0.65)	48. Accountant has specialized industry wide knowledge	Gooderhan et al. (2004); Kamyabi & Devi, (2011)	.55	.878
	49. Accountant has expertise in internal control			.747
	51. Accountant has depth of understanding of your firm			.680
Competition (alpha= 0.65)	54. Product characteristics	Kamyabi & Devi, (2011)	.54	.899
	55. Promotional strategies among rivals			.562
	56. Access to distribution channels			.848
Outsourcing Strategy (alpha= 0.51)	60. Does your company outsource human resource management	Carey et al. (2006); Everaert et al., (2010)	.50	.820
	61. Does your company outsource facilities management			.820
Dependent Variables				
Accounting Outsourcing (alpha= 0.80)	64. Interim reporting	Kamyabi & Devi, (2011)	.77	.836
	65. Period-end accounting			.837
	66. Preparation of financial statements			.687
	71. Management accounting			.625
	74. Business advice			.760
	75. Management consultancy			.532

Firm Financial Performance (alpha= 0.58)	93. The outsourcing has a positive impact on growth in sales		.50	.830
	94. The outsourcing has a positive impact on return on assets			.830
Firm Non-Financial Performance (alpha= 0.72)	96.The outsourcing has a positive impact on lifestyle		.59	.809
	97. The outsourcing has a positive impact on independence			.794
	98.The outsourcing has a positive impact on job security			.624
Firm Overall Performance (alpha= 0.54)	99. The outsourcing has contributed to our core competencies and competitive advantages.		.63	.876
	100. The outsourcing has realized the goals we set out to achieve.			.731
	101.Overall, we are very satisfied with the performance of this outsourcing of accounting tasks			.818

* (reverse coded)

Before going further into the research, it is important to test the reliability and validity of selected constructs one by one in the above table. We conducted reliability tests repeatedly, until we get more than (.50) reliability for each concept and left with 52 variables out of 96. After testing the reliability a factor analysis was performed, the variables having less (0.5) commonalities were removed from the list. Initially, there were 52 of the 96 decision variables considered for the factor analysis in this research. Using Principle Component Analysis as the extraction method for each construct, 47 variables were extracted. However, using both tests of reliability and factor analysis of each of the constructs, 49 items have been removed from the list. These elements were, one from **Frequency** “Total amount of invoices (sales and purchases) that the accountant has processed during the previous year”; two items of **Asset specificity** “To acquire the routine accounting tasks the accountant needs to acquire company specific information”, “The accounting software is custom-tailored to our company”; one items of **Environment uncertainty** “During the previous year, there was a lot of variation in the workload related to routine accounting tasks”; four of **Opportunism** “Sometime external accountant try to take advantage from us”, “Sometime external accountant try to mislead us”, “Sometime external accountant try to withhold information”, “Sometime external accountant compromise on ethics”; two items of **Trust in accountant** “The owner/manager has confidence that the external accountant will treat fairly, this means to correctly charge for the performed duties”, “The owner/manager has confidence that the external accountant will accurately perform the duties”; one items of **Cooperative behaviour** “In most aspects of this relationship the parties are jointly responsible for getting things done”; three items of **Accounting competence** “Accountant has experience and qualifications”, “Expertise in computerized information systems (CIS) accounting”, “Accountant has expertise in risk management”; two items of **Competition** “Service strategies to customers”, “Product (Service) Variety”; two items of **Outsourcing strategy** “Does your company outsource Information technology”, “Does your company outsource Logistics”; sixteen items of **Accounting outsourcing** “Bookkeeping”, “Budgeting/forecasting”, “Customer profitability analysis”, “Financial planning”, “Internal audit”, “Tax consultancy”, “Financing advice”, “IT consultancy”, “External audit”, “Secretarial/Corporate Affairs with SECP”, “Special financial assignment”, “Credit services”, “ Insurance Processing”, “ Banking”; two items of **Performance** “The outsourcing has positive impact on profitability”, “The outsourcing has positive impact on cash flow”.

5.4.1 Factor Analysis for TCE, RBV, RT, Outsourcing and Firm Performance

To check the internal consistency of the instruments the reliability Cronbach's alpha was used to determine the homogeneity of the measurement tool. To check the reliability of the variables and their items, the reliability test of all variables was performed. Consequently, the variable values less than 0.5 were dropped (except variable frequency) and only those with values greater than 0.5 were considered appropriate and were considered for further analysis.

Table 5: KMO and Bartlett's Test for TCA, RT, RBV, Outsourcing and Firm Performance

	Kaiser-Meyer-Olkin	Approximate Chi-Square	Degree of Freedom	Significance level
Transaction Cost Economics (TCA)	.646	2430.787	120	.000
Relationship Theory (RT)	.579	765.914	21	.000
Resource Base View (RBV)	.470	474.872	21	.000
Management Accounting Outsourcing	.771	631.354	15	.000
Firm Performance	.537	601.290	28	.000

Transaction Cost Economics (TCA)

For TCA the KMO measure of sampling adequacy is 0.646 which falls into the range of moderate, which shows that the data is considered accurate to run factor analysis. Bartlett's test of sphericity shows significance and the nature of data and is also very suitable to perform factor analysis. Initially there were 19 out of 22 TCA decision variables considered in order to check accounting outsourcing. By using Principle Component Analysis as extraction method sixteen variables were extracted under five factors in below table. The remaining three items were removed from the list. These elements were "Entry of purchase invoices, sales invoices and financial transactions", "Preparation of interim profit and loss account" "Sometime external accountant promises to do things without actually doing them later". These elements were deleted from the final analysis as they showed little or no correlation with the broader dimensions and consequently to the dependent variables. Varimax with Kaiser Normalization rotation method was used to support the interpretation of data for management accounting outsourcing influencing factors.

Table 6: Rotated Component Matrix for TCA

	<u>Factor 1</u> Opportunism	<u>Factor 2</u> Asset Specificity	<u>Factor 3</u> Behavioral Uncertainty	<u>Factor 4</u> Frequency	<u>Factor 5</u> Environment Uncertainty
8. Period end accounting				.834	
9. Preparation of financial statements				.857	
12. To perform the non-routine accounting tasks the accountant needs to acquire company-specific information		.768			
14. The way we perform the accounting tasks are unique to our company		.658			
15. It would be costly in terms of time and resources to switch to an external accountant at the end of the financial year.		.809			
17. During the previous year, there was a lot of variation in the workload related to non-routine accounting tasks					.905
18. During the previous year, there were relevant changes in the business organization of the company					.906
19. Entering up purchase invoices, sales invoices and financial transactions			.588		
20. Preparation of interim reports (e.g., interim profit and loss account)			.564		
21. Period end accounting (depreciations, stock changes, loans, accruals and deferred income, etc.)			.809		
22. Preparation of financial statements (balance sheet, profit and loss account)			.698		
23. Sometime external accountant alters the facts slightly in order to get what they need.	.722				
24. External accountant breaches the formal and informal	.792				

agreements to their benefit.					
25. Sometime external accountant lies about certain things in order to protect their interest.	.736				
27. Sometime external accountant does not fulfill obligations in accordance with our contract.	.858				
30. Sometime external accountant tries to deceive us	.815				

Extraction Methods: Principal Component Analysis.

Rotation Methods: Varimax with Kaiser Normalization

Relationship Theory (RT)

For Relationship Theory the KMO measure of sampling adequacy is 0.579 which also falls into the range of moderate, which shows that the data is considered accurate to perform factor analysis. While running the factor analysis, the variables having less (0.5) commonalities were removed from the list. Primarily there were 7 RT decision variables considered in order to check SMEs decisions toward accounting outsourcing. By performing Principle Component Analysis as the extraction method seven variables were extracted under three factors in below table. Varimax with Kaiser Normalization rotation method was used to support the interpretation of data for management accounting outsourcing influencing factors. Factor 1 indicated high loading on that is “The owner/manager has confidence that the external accountant will inform correctly”, “The owner/manager feel that external accountant care about what happens to us” and “The relationship between the owner-manager and the external accountant is based on trust”. Furthermore, all three items covered in factor 1 match closely and relate to one another and hence this factor is labeled as Trust in accountant.. Factor 2 had two sub-items noted as “We do not have long term plans for working with this accountant (reverse coded)” and “We see this accountant developing into a long term service provider”. This factor was grouped under Commitment. The variables under the factor 3 were noticed as “Flexibility in response to requests for changes is a characteristic of this relationship” and “Exchange of information on this relationship takes place frequently, informally and openly”. This indicates the cooperative behavior of an external accountant with SMEs owner/managers while outsourcing of accounting tasks.

Table 7: Rotated Component Matrix for RT

	Factor 1 Trust in Accountant	Factor 2 Commitment	Factor 3 Cooperative Behavior
34. The owner/manager has confidence that the external accountant will inform correctly	.941		
36. The owner/manager feels that external accountant care about what happens to us.	.705		
37. The relationship between the owner-manager and the external accountant is based on trust.	.904		
41. We do not have long term plans for working with this accountant.		.886	
42. We see this accountant developing into a long term service provider.		.858	
45. Flexibility in response to requests for changes is a characteristic of this relationship.			.740
46. Exchange of information in this relationship takes place frequently, informally and openly.			.914

Extraction Methods: Principal Component Analysis.

Rotation Methods: Varimax with Kaiser Normalization

Resource Base View (RBV)

For RBV the KMO measure of sampling adequacy is 0.470 which somewhat falls into the range of moderate, which shows that the data is considered accurate to run factor analysis. Bartlett's test of sphericity shows significance and the nature of data and is also very suitable to perform factor analysis. In the beginning there were 8 RBV decision variables considered in order to confirm accounting outsourcing practices. After running Principle Component Analysis as the extraction method in SPSS seven variables were extracted under three factors. The remaining one item was removed from the list. This element was "Promotional strategies among rivals". Varimax with Kaiser Normalization rotation method was used to support the interpretation of data for management accounting outsourcing influencing factors. As we can see below, Factor 1 indicated high loading on that is "Product characteristics" and "Access to distribution channels". This indicates the intensity of competition among businesses while outsourcing of accounting functions. Factor 2 has items like "Accountant has specialized industry wide knowledge", "Accountant has expertise in internal control", "Sometime Accountant has depth of understanding of your firm". Here all three items covered in factor 2 match closely and relate to one another and hence this factor is labeled as accounting competence. The variables under the factor 3 were noticed as "Does your company outsource human resource management", "Does your company outsource logistics. Finally, combined these items are labeled under the name of firm outsourcing strategy.

Table 8: Rotated Component Matrixa for RBV

	<u>Factor 1</u> Level of Competition	<u>Factor 2</u> Accounting Competence	<u>Factor 3</u> Outsourcing Strategy
48. Accountant has specialized industry wide knowledge		.876	
49. Accountant has expertise in internal control		.707	
51. Accountant has depth of understanding of your firm		.716	
54. Product characteristics	.908		
56. Access to distribution channels	.878		
60. Does your company outsource human resource management			.856
61. Does your company outsource facilities management			.759

Extraction Methods: Principal Component Analysis.

Rotation Methods: Varimax with Kaiser Normalization

Management Accounting Outsourcing

For accounting outsourcing the KMO measure of sampling adequacy is 0.771 which falls into the range of good, which shows that the data is considered accurate to perform factor analysis for moderating variable. At the beginning of this research there were 22 variables were considered, 15 were based on previous studies and 7 were included after having 5 interviews with SMEs owners/manager/CFO in Pakistan. By using Principle Component Analysis as the extraction method six variables were extracted under one factor. The remaining sixteen items were removed from the list. Varimax with Kaiser Normalization rotation method was used to support the interpretation of data for management accounting outsourcing influencing factors and firm performance. As we can see below, Factor 1 has items like “Interim reporting”, “Period-end accounting”, “Preparation of financial statements” Management accounting” “Business advice” and “Management consultancy”. Here all six items covered in factor 1 match closely and relate to one another and hence this factor is labeled as management accounting outsourcing.

Table 9: Rotated Component Matrixa for Management Accounting Outsourcing

	<u>Factor 1</u> Management Accounting Outsourcing
64. Interim reporting	.836
65. Period-end accounting	.837
66. Preparation of financial statements	.687
71. Management accounting	.625
74. Business advice	.760
75. Management consultancy	.532

Extraction Methods: Principal Component Analysis.
Rotation Methods: Varimax with Kaiser Normalization

Firm Performance

For Firm Performance the KMO measure of sampling adequacy is 0.537 which also falls into the range of moderate, which shows that the data is considered accurate to perform factor analysis for the dependent variable. Initially there were 17 variables were considered out of that 14 were taken from from the study of Kamyabi & Devi, (2011) and 3 new variables. Firstly, seven variables was related to asked the owners/managers/CFO, the level of importance attached the financial (profitability, growth in sales, return on assets and cash flow) and nonfinancial (life style, independence and job security) firm performance goals. Then, the next seven variables were used to ask respondents to indicate their level of satisfaction with the above seven financial and non financial variables on 7 point Likert scale. Furthermore, each 'satisfaction' score was multiplied with the 'importance'score in order to compute the weighted average performance index. After multiplying for each firm, variables were reduced to seven weighted average financial and non financial variables plus three new variables to measure the firm performance. By using Principle Component Analysis as the extraction method eight variables were extracted out of 10 variables, under three factors. The remaining two items were removed from the list. These elements were "The outsourcing has a positive impact on profitability", "The outsourcing has a positive impact on cash flow". These elements were deleted from the final analysis as they showed little or no correlation with the broader dimensions and having less (0.5) commonalities. As we can see below, Factor 1 has items like "The outsourcing has contributed to our core competencies and competitive advantages.", "The outsourcing has realized the goals we set out to achieve" and "Overall, we are very satisfied with the performance of this outsourcing of accounting tasks". Here all three items covered in factor 1 match closely and relate to one another and hence this factor is labeled as a firm overall performance. The variables under the factor 2 were noticed as "The outsourcing has a positive impact on lifestyle", "The outsourcing has a positive impact on independence" and "The outsourcing has a positive impact on job security". Combined these items are labeled under the name of Non-financial firm performance. Finally, factor 2 had three sub-items noted as "The outsourcing has a positive impact on return on assets" and "The outsourcing has a positive impact on cash flow". This factor was grouped under firm financial performance.

Table 10: Rotated Component Matrix for Firm Performance

	<u>Factor 1</u> Firm Overall Performance	<u>Factor 2</u> Firm Non-Financial Performance	<u>Factor 3</u> Firm Financial Performance
93. The outsourcing has a positive impact on growth in sales			.828
94. The outsourcing has a positive impact on return on assets			.817
96. The outsourcing has a positive impact on lifestyle		.839	
97. The outsourcing has a positive impact on independence		.778	
98. The outsourcing has a positive impact on job security		.544	
99. The outsourcing has contributed to our core competencies and competitive advantages.	.849		
100. The outsourcing has realized the goals we set out to achieve.	.696		
101. Overall, we are very satisfied with the performance of this outsourcing of accounting tasks	.844		

Extraction Methods: Principal Component Analysis.

Rotation Methods: Varimax with Kaiser Normalization

5.5 Statistical Methods

For this research correlation and multiple linear regression analysis using SPSS software was used to analyze the relationship and influence of various factors suggested above on accounting outsourcing practices and performance of SMEs in Pakistan. The dependent variable in the present research is firm performance and accounting outsourcing is mediating variable.

5.6 Correlation

The correlation is the first step of the regression analysis, because with correlation, the existence of the relationship between the variables and relationships output can be calculated and confirmed. In addition, if the relationship is confirmed to exist the direction of the relationship is also validated. Thirdly, the intensity of the relationship between variables is measured and included. Finally, correlation analysis can also explain the importance or significance of the relationship between variables (Hair, 2006). The correlation coefficient ranges from -1 to +1, where -1 indicates a perfect negative correlation and 1 indicating a perfect positive correlation, and 0 indicates no correlation at all. This means that if a positive relationship occurs between the independent and dependent variables, the later propelled the former directly and vice versa. For the purpose of this research, we examine the correlation between management accounting outsourcing with independent and control variables. In addition, we made the correlation between firm performance with independent and control variables. However, it is important to note that we choose factor 1 (firm overall performance) from table 13 as a dependent variable for further research.

Management Accounting Outsourcing

In appendix 2 the correlations of seventeen variables which are frequency of routine, the frequency of non-routine, asset specificity, environmental uncertainty, behavioral uncertainty, opportunism, trust in accountant, commitment, cooperative behavior, accounting competence, competition, outsourcing strategy, gender, education, experience, firm size and firm age are summarized. The relationships between mediator variable management accounting outsourcing with all independent and control variables are investigated by Pearson product moment correlation coefficient.

Firstly, the table shows first six variables related to transaction cost economic that outsourcing has a negative relation to frequency of routine accounting tasks with $r = -.467^{**}$ and lower negative relation to frequency of non-routine tasks with $r = -.115^*$. Furthermore, variables like asset specificity and environmental uncertainty show lower negative relation with outsourcing with $r = -.131^*$ and $r = -.105$ respectively. Behavioral uncertainty shows $r = -.149^{**}$ medium negative correlation with accounting outsourcing. The variable opportunism indicates a higher negative relation with accounting outsourcing with $r = -.713^{**}$.

Secondly, the variables related to relationship theory such as trust in accountant and cooperative behavior show the high positive relation with outsourcing with $r = .567^{**}$ and $r = .344^{**}$. However, the variable commitment shows negative $r = -.119^*$ correlation with outsourcing.

Thirdly, the next three variables are related to resource base view theory. The two variables accounting competence and competition shows high positive relation with outsourcing with $r = .200^{**}$ and $r = .268^{**}$ respectively. However, outsourcing Strategy shows the negative relation with outsourcing with $r = -.238^{**}$.

In addition, out of five controlling variables only experience and firm size variables shows medium positive relation with outsourcing with $r = .126^*$ and $r = .125^*$ respectively. Moreover, firm age and education show the very low negative relation with $r = -.020$ and $r = -.033$ respectively and gender very lower positive relations $r = .034$ by outsourcing of accounting functions.

Finally, On the basis of Pearson correlation it can be concluded that frequency of routine tasks, frequency of non-routine tasks, asset specificity, environmental uncertainty, behavioral uncertainty, opportunism, trust in accountant, cooperative behavior, accounting competence, competition, outsourcing strategy, experience and firm size have respectable positive/negative relating to management accounting outsourcing.

Firm Performance

In appendix 3 the correlations of seventeen variables which are frequency of routine, frequency of routine, frequency of non-routine, asset specificity, environmental uncertainty, behavioral uncertainty, opportunism, trust in accountant, commitment, cooperative behavior, accounting competence, competition, outsourcing strategy, gender, education, experience, firm size and firm

age are summarized. The relationships between dependent variable firm performance with all independent variables are investigated by Pearson product moment correlation coefficient.

First of all, the table shows first six variables related to transaction cost economic that firm performance has a negative relation to frequency of routine accounting tasks with $r = -.544^{**}$ and medium negative relations with frequency of non-routine tasks with $r = -.169^{**}$. Furthermore, variable like asset specificity and environmental uncertainty show the very lower negative relation with $r = -.012$ and $r = .047$ respectively. In addition, behavioral uncertainty show very low positive relation with firm performance with $r = -.080$. The variables opportunism indicates a higher negative relation with firm performance with $r = -.598^{**}$.

Second of all, the variables related to relationship theory such as trust in accountant and cooperative behavior show the high positive relation with firm performance with $r = .363^{**}$ and $r = .380^{**}$. However, the variable commitment indicates high negative $r = -.285^{**}$ correlation with firm performance.

A third of all, the next three variables are related to resource base view theory. The two variable accounting competence and outsourcing strategy indicate very low positive relation with firm performance with $r = .057$ and $r = .028$ respectively. Competition shows high positive relation with firm performance with $r = -.221^{**}$.

In addition, out of five controlling variables gender and experience variables shows medium positive relation with outsourcing with $r = .103^*$ and $r = .119^*$ respectively. Firm size indicates a medium negative relation with firm performance with $r = -.129^*$. Moreover, education show very low negative relation with $r = -.013$ and firm age very lower positive relation $r = .014$ with firm performance .

Finally, On the basis of Pearson correlation it can be concluded that frequency of routine tasks, the frequency of non-routine tasks, opportunism, trust in accountant, commitment, cooperative behavior, competition, experience and firm size have respectable positive/negative relation to firm performance.

5.6.1 Multicollinearity

The concept of multicollinearity (or collinearity) is used to express the situation when a strong correlation is observed between two or more predictor variables. These high correlations lead to problems when trying to draw conclusions about the relative contribution of each variable to the success of the predictive model, the two most common measures for multicollinearity is the variance inflation factor (VIF) and tolerance (Hair, 2006). If the VIF values are below 10 then it shows no reason to worry and if the tolerance values less than 0.1 then it indicate a serious problem (Field, 2009). Multicollinearity can be calculated using SPSS diagnostic tests between the variables using the variance inflation factors (VIF) and tolerance values. In this research, there is no multicollinearity problem because all the independent variables were found to be above 0.2 tolerance value and VIF value less than 10 (see table 12 & 13). The value of VIF and tolerance indicate that further moving towards the multiple regression analysis can be made.

6. RESULTS

6.1 Introduction

This chapter focuses on the descriptive analysis and regression analysis of the data set available to test the hypotheses. Furthermore, the significant relational variables between accounting outsourcing and firm performance are identified.

6.2 Descriptive Statistics

Descriptive statistics were used to describe the basic characteristics of the data in a study. They provide simple summaries about the sample and measures. Together with demographic analysis and simple graphics, they form the basis of virtually every quantitative analysis of data. Simple frequencies, means, standard deviation, correlation between variables and histograms are used to detect coding errors, identify outliers, check the distribution of variables.

The summary of the demographics of the respondents selected for the study are presented below in Table 11. A sample size of 500 respondents was selected for this study. Out of which 32 were incomplete or ineligible, 29 refusals and 105 not reached. The remaining 302 acceptable responses, response rate 73 percent, which is highly adequate for the nature of this study.

The sample consisted of 65 female and 237 male owners/managers. The dominant gender being male as they are more involved in the business in developing countries like Pakistan. The frequency of education levels among respondents was 242 holds university degree 80.1 percent and 61 was lower than university degree 18.9 percent. This indicates that owners/managers of SMEs are well qualified. The frequency of experience of owners/managers indicates that majority (168) of respondents has less than five years experience which is 55.6 percent. The next highest experience range is 67 respondents has 5-10 years working experience in SMEs. The distribution of firm size on the basis of number of employees came out to be 62 firms indicate the range 101-150 employees (20.5 percent) highest, 53 firms indicate less than 20 employees (16.6 percent) second highest, 48 firms show 151-200 numbers of employees (15.9 percent) third largest and so on. This all indicates that most firms have less than 20 employees and the rest lies between 100-200 employees. The majority of the firm age had a range from 2-5 years old (33.8

percent). The second highest age is 72 firms indicate the age between 16-20 years old (23.8 percent) and so on. The statistics about the demographics in a tabular form are given as follows:

Table 11: The Demographic Profile of Respondents

Variables	Description	Frequency	Percentage
Gender	Male	237	78.5
	Female	65	21.5
Education	University Degree	242	80.1
	Lower than University Degree	61	18.9
Experience	Less than 5 years	168	55.6
	5 -10 years	67	22.2
	11-15 years	38	12.6
	16-20 years	11	3.6
	More than 20	17	5.6
Firm Size	Less than 20 employees	53	17.5
	20-30 employees	29	9.6
	31-50 employees	36	11.9
	51-100 employees	27	8.9
	101-150 employees	62	20.5

	151-200 employees	48	15.9
	201-250 employees	47	15.6
	More than 250	-	-
Firm Age	Less than 2 years	17	5.6
	2-5 years	102	33.8
	6-10 years	44	14.6
	11-15 years	24	7.9
	16-20 years	72	23.8
	More than 20	42	13.9

6.3 Multiple Regressions Analysis

A multiple regression analysis is carried out for identifying factors impacting the choice of management accounting outsourcing. The mediator variable for this study is recognized as management accounting outsourcing, dependent variable as the firm performance, whereas the independent or predictor variables identified are frequency of routine tasks, the frequency of non-routine tasks, asset specificity, environmental uncertainty, behavioral uncertainty, opportunism, trusts in accountant, commitment, cooperative behavior, accounting competence, competition and outsourcing strategy. For the purpose of this study five control variables (i.e. Gender, education, experience, firm size and firm age) were also included based on earlier literature.

6.4 Main Effects

Table 12 shows the coefficients (B), t-value and the level of significance of the predictor variables. This table shows that out of 12 independent variables 11 has significant impact on management accounting outsourcing. Now with the help of multiple linear regression analysis we can test our hypothesis which we constructed in chapter three. We can also investigate which independent variables included in the model contribute to the prediction of the dependent variable (firm performance) in later analysis. For testing the hypothesis we will use the regression coefficient beta (β), t-value and significance level. Furthermore, a comparison among the contribution of each independent variables with the help of β beta value shall be conducted. In addition, this table shows that out of the 12 independent variables and 5 control variables; 7 independent variables have a highly significant impact on accounting outsourcing; 3 independent variables have a medium impact and 1 have a very less significant impact; whereas 2 control variables have little significant impact and 3 are insignificant in impacting the management accounting outsourcing.

H 1: The higher the frequency of accounting routine tasks the less intensively accounting functions are outsourced.

The results indicate that frequency of accounting routine tasks ($\beta = -.388$, $t = -6.300$, $p < 0.01$) have a negative effect on management accounting outsourcing. This means that the higher the frequency of sales/purchase entry and interim reporting volume, the less likely SMEs owners/managers outsource external accounting services. This hypothesis was supported.

H 2: The higher the frequency of accounting non-routine tasks the less intensively accounting functions are outsourced.

H2 suggested that frequency of non-routine tasks ($\beta = .207$, $t = 4.822$, $p < 0.01$) have a positive effect on management accounting outsourcing. The values are significant but the effect is in the opposite direction that expected. Hence, this hypothesis was not supported.

H 3: The higher the level of asset specificity of accounting functions, the lower the intensity of outsourcing of accounting functions.

Results reveal that asset specificity of accounting tasks ($\beta = -.190$, $t = -3.596$, $p < 0.01$) have a negative effect on management accounting outsourcing. Hence, this hypothesis was supported.

H 4: The higher the level of environmental uncertainty of accounting functions, the lower the intensity of outsourcing of accounting functions.

The results indicate that the link between the environmental uncertainty and management accounting outsourcing is generating coefficient and t-value ($\beta = -.042$, $t = -1.649$, $p < 0.1$) have a negative relation. Hence, the H4 was supported but less significant level.

H 5: The higher the level of behavioral uncertainty of accounting functions, the lower the intensity of outsourcing of accounting functions.

H5 suggested that behavioral uncertainty of accounting functions ($\beta = -.167$, $t = -3.280$, $p < 0.01$) has a negative effect on management accounting outsourcing. This means that the behavior of external accountant is uncertain and difficult to predict for SMEs owners/managers whether the external accountant has accurately performed the certain accounting tasks. Therefore, H5 was supported.

H 6: The stronger the perception that the external accountant will behave opportunistically, the less intensely the accounting functions are outsourced.

The results reveal that opportunistic behavior of the external accountant ($\beta = -.386$, $t = -6.285$, $p < 0.01$) have a negative relationship with the management accounting outsourcing practices. The result indicates that the opportunism of external accountant influence SMEs owners/managers to not consider outsourcing of management accounting functions rather internalized them. Hence, H6 was supported.

H 7: The higher the level of trust of the SME owner/manager in the external accountant, the more intensely the accounting functions are outsourced.

The results indicate that trust in external accountant ($\beta = .426$, $t = 9.360$, $p < 0.01$) is positively significantly associated with the management accounting outsourcing practices. This means the SMEs owners/managers believe that external accountant will treat them appropriately while performing their duties. This hypothesis was supported.

H 8: The stronger the level of commitment between the SME owner/manager and external accountant, the more intensely the accounting functions are outsourced.

H8 suggested that commitment ($\beta = -.222$, $t = -4.775$, $p < 0.01$) has a negative effect on management accounting outsourcing. The values are significant but the effect is in the opposite direction that expected. This means commitment between external accountant and SMEs owners/manager in developing a long run relationship is not positively associated. Hence, this hypothesis was not supported.

H 9: The higher the level of cooperative behavior between the SME owner/manager and the external accountant, the more intensely the accounting functions are outsourced.

The results show that cooperative behavior ($\beta = -.060$, $t = -.996$, $p > 0.1$) has a negative relationship with management accounting outsourcing practices. The values are insignificant and the effect is in the opposite direction that expected. Therefore, H9 was not supported.

H 10: The stronger the level of perception that external accountants are more accounting competent than the internal accountant, higher the intensity of outsourcing of accounting functions.

The results show that accounting competence ($\beta = .119$, $t = 2.273$, $p < 0.05$) has a positive effect on management accounting outsourcing functions. This indicates that external accountant accounting competence is positively associated with the outsourcing of accounting decisions by SMEs in Pakistan. Thereby, H10 was supported.

H 11: The firms that face more intense competition will outsource more accounting functions.

H11 suggested that Intensity of competition ($\beta = .107$, $t = 2.202$, $p < 0.05$) has a positive effect on management accounting outsourcing. This indicates that the higher competition among SMEs in Pakistan, the more likely firms outsource accounting functions to obtain competitive advantages. Therefore, this hypothesis was supported.

H 12: The stronger the strategy of a firm for outsourcing of non-core activities, the greater the tendency for outsourcing of accounting functions.

H12 results reveal that SMEs outsourcing strategy ($\beta = -.082$, $t = -1.650$, $p < 0.1$) have a negative effect on management accounting outsourcing practices. The values are significant but the effect is in the opposite direction that expected. Therefore, H12 was not supported.

H13: Outsourcing of accounting activities is positively associated with the firm performance.

The results indicate that management accounting outsourcing practices ($\beta = .606$, $t = 15.415$, $p < 0.01$) have a positive effect on firm performance. This means that more the SMEs owners/managers consider external service providers to do the accounting tasks the better will be the firm performance as compared to internalizing the accounting activities. Hence, this hypothesis was supported.

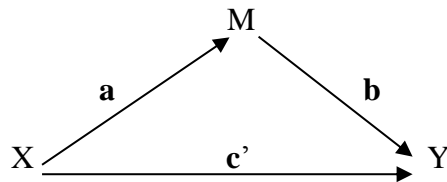
6.5 Control Effects

Assume that gender, firm size, age, manager educational background and experience might also have an impact on accounting outsourcing functions by SMEs. For this reason, we will use adjusted R-Square indicates that all independent variable (frequency of routine, the frequency of non-routine, asset specificity, environmental uncertainty, behavioral uncertainty, opportunism, trusts in accountant, commitment, cooperative behavior, accounting competence, competition, outsourcing strategy) has significant effects on outsourcing while controlling the firm age, size and manager/owner experience (see Table 12).

Among the control variables; gender, education and firm size having $\beta = .039$, $t = .447$, $p > 0.1$; $\beta = .053$, $t = .695$, $p > 0.1$ and $\beta = -.015$, $t = -.876$, $p > 0.1$ respectively had an insignificant effect on management accounting outsourcing. In addition, experience and firm age were found to have a less significant positive effect on management accounting outsourcing having $\beta = .041$, $t = 1.340$, $p < 0.1$ and $\beta = .032$, $t = 1.473$, $p < 0.1$ respectively.

6.6 Mediation Effects

A variable (M) as a mediator if it carries the influence of a given independent variable (X) for a given dependent variable (Y). A conceptual framework with a mediator variable can be described as follows:



Firstly, c in the first figure represents the total effect of X on Y, c' is called the direct effect. Secondly, the effect of X on M (mediator variable) is a , while the effect of M on Y is represented by b .

In case that c' is zero, there will be a complete mediation: X has no longer effect on Y when controlling for M. Partial mediation is the case when $c' < c$, but when c' still is different from zero.

There are alternative statistical methods for analyzing the effect of a mediator or intervening variable. The most commonly used procedure by (Baron and Kenny, 1986; Judd and Kenny, 1981) for establishing mediation can be described as follows:

1. Show by ordinary least square regression that the independent variable X is correlated with the dependent variable Y, by finding the regression coefficient c to be significantly different from zero.

2. Show that the independent variable X is correlated with the mediator M, by using M as the criterion ('dependent') variable in a regression analysis is represented by **b**.
3. Show that the mediator M affects the dependent variable Y, and find the regression coefficient b.
4. To establish that M completely mediates the X – Y relationship, the effect of X controlling for M (c') should be zero. The effects in both steps 3 and 4 are estimated with the same equation.

If all 4 steps are met, there will be a complete mediation (that is, $c' = 0$). When the condition for step 4 is not met, a partial mediation is indicated.

To test the effect of mediating management accounting outsourcing on a given relationship between dependent variables (firm performance) and independent variables (frequency of routine tasks, the frequency of non-routine tasks, asset specificity, the uncertainty of the environment, the uncertainty of behavior, opportunism, trust accounting, commitment, cooperative behavior, competence accounting, competition and outsourcing strategy), we use the same conditions recommended by Baron & Kenny (1986). First, the independent variables have shown a significant influence on the dependent variable (firm performance) in a regression of the independent variable on the dependent variable. Second, the independent variables must show significant effect on the mediating variable (accounting outsourcing) in the regression analysis. Third, the mediator (accounting outsourcing) must significantly affect the dependent variable firm performance in the regression analysis. Finally, the mediator variables must also affect the dependent variable in a regression of both the independent variables and the mediator variable on the dependent variable.

Table 12: Results of Multiple Regression Analysis for Direct Effects

Independent Variables	Management Accounting Outsourcing			Performance
	Model 1	Model 2	Model 3	Model 4
	Coefficient (t-value)	Coefficient (t-value)	Coefficient (t-value)	Coefficient (t-value)
Controls				
Gender	.075 (.502)	-	.039 (.447)	-
Education	-.140 (-1.070)	-	.053 (.695)	-
Experience	.123 (2.319)**	-	.041 (1.340)*	-
Firm Size	-.066 (-2,241)**	-	-.015 (-.876)	-
Firm Age	-.020 (-.542)	-	.032 (1.473)*	-
Main Effects				
Frequency of routine tasks	-	-.392 (-6.504)***	-.388 (-6.300)***	-
Frequency of non-routine	-	.205 (4.833)***	.207 (4.822)***	-
Asset specificity	-	-.201 (-3.847)***	-.190 (-3.596)***	-
Environmental uncertainty	-	-.039 (-1.567)*	-.042 (-1.649)*	-
Behavioral uncertainty	-	-.156 (-3.083)***	-.167 (-3.280)***	-
Opportunism	-	-.391 (-6.655)***	-.386 (-6.285)***	-
Trust in accountant	-	.434 (9.690)***	.426 (9.360)***	-
Commitment	-	-.225 (-4.885)***	-.222 (-4.775)***	-
Cooperative behavior	-	-.057 (-.969)	-.060 (-.996)	-
Accounting competence	-	.115 (2.214)**	.119 (2.273)**	-
Competition	-	.093 (1.972)**	.107 (2.202)**	-
Outsourcing strategy	-	-.096 (-1.961)**	-.082 (-1.650)*	-
Accounting Outsourcing	-	-	-	.606 (15.415)***
Constant	3.724 (11.497)	7.559 (10.395)	7.161 (9.527)	2.647 (18.318)
R2	.037	.699	.705	.442
Adjusted R2	.021	.686	.687	.440
F statistic	2.282	55.126	39.105	237.623
Maximum VIF	1.012	2.820	3.050	1.000

N= 302 * p<0.1, ** p<0.05, and ***p<0.01

Table 13: Results of Regression Analysis for Mediation Effects

Independent Variables	Accounting Outsourcing	Firm Performance	
	Model 5	Model 6	Model 7
	Coefficient (t-value)	Coefficient (t-value)	Coefficient (t-value)
Frequency of routine tasks	-.392 (-6.504)***	-.560 (-8.755)***	-.428 (-6.575)***
Frequency of non-routine	.205 (4.833)***	.249 (5.539)***	.180 (4.055)***
Asset specificity	-.201 (-3.847)***	-.049 (-.880)	.019 (.347)
Environmental uncertainty	-.039 (-1.567)*	-.001 (-.030)	.012 (.489)
Behavioral uncertainty	-.156 (-3.083)***	.011 (.197)	.063 (1.214)
Opportunism	-.391 (-6.655)***	-.284 (-4.546)***	-.152 (-2.388)***
Trust in accountant	.434 (9.690)***	.152 (3.197)***	.006 (.117)
Commitment	-.225 (-4.885)***	-.366 (-7.500)***	-.291 (-6.018)***
Cooperative behavior	-.057 (-.969)	.099 (1.591)*	.118 (1.994)**
Accounting competence	.115 (2.214)**	-.027 (-.496)	-.066 (-1.250)
Competition	.093 (1.972)**	.107 (2.142)**	.076 (1.587)*
Outsourcing strategy	-.096 (-1.961)**	-.207 (-3.995)***	-.175 (-3.527)***
Accounting Outsourcing	-	-	.336 (5.627)***
Constant	7.559 (10.395)	9,653 (12.504)	7.111 (8.255)
R2	.699	.598	.638
Adjusted R2	.686	.581	.622
F statistic	55.126	35.298	38.524
Maximum VIF	2.820	2.820	3.321

N= 302 * p<0.1, ** p<0.05, and ***p<0.01

H14: Outsourcing will mediate the relationship between (a) frequency of routine tasks, (b) frequency of non-routine tasks, (c) asset specificity, (d) environmental uncertainty, (e) behavioral uncertainty, (f) opportunism, (g) trusts in accountant, (h) commitment, (i) cooperative behavior, (j) accounting competence, (k) competition and (l) outsourcing strategy and firm performance, respectively.

We persuade the three conditions recommended by Baron & Kenny (1986) and conducted multiple regression analyses shown in the Table 12 and 13.

The first condition, the results indicate a significant association between eight independent variables (frequency of routine tasks, the frequency of non-routine tasks, opportunism, trust in accountant, commitment, cooperative behavior, competition and outsourcing strategy) and dependent variable (firm performance) in a regression analysis (Model 6) of the independent variable on the dependent variable, thereby confirming first condition.

The second condition is also satisfied for seven independent variables; frequency of routine tasks, the frequency of non-routine tasks, opportunism, trust in accountant, commitment, competition and outsourcing strategy have shown a significant influence on the mediating variable (accounting outsourcing) in a regression analysis (Model 5) of the independent variable on the mediating variable.

The third condition, the mediator variable accounting outsourcing have shown a significant effect on the dependent variable firm performance in the regression analysis (Model 4), confirming the third condition.

As a consequence, it shows that asset specificity, environmental uncertainty, behavior uncertainty, cooperative behavior and accounting competence are not associated with firm performance (Model 6 and 7). In addition, cooperative behavior not related to mediating variable outsourcing (Model 5).

Finally, accounting outsourcing has a full mediating role of the relationship between trust in the accountant and firm performance because trust has no significant association ($\beta = .152$, $t = 3.197$, $p < 0.01$ to $\beta = .006$, $t = .117$, $p > 0.1$) with firm performance when including the mediating variable in the regression equation (Model 7). Furthermore, the negative effects of frequency of routine tasks reduce their strength ($\beta = -.560$, $t = -8.755$, $p < 0.01$ to $\beta = -.428$, $t = -6.575$, $p < 0.01$), opportunism ($\beta = -.284$, $t = -4.546$, $p < 0.01$ to $\beta = -.152$, $t = -2.388$, $p < 0.01$), commitment ($\beta = -$

.366, $t = -7.500$, $p < 0.01$ to $\beta = -.291$, $t = -6.018$, $p < 0.01$) and outsourcing strategy ($\beta = -.207$, $t = -3.995$, $p < 0.01$ to $\beta = -.175$, $t = -3.527$, $p < 0.01$) respectively and remain statistically significant. In addition, the positive effects of frequency of non-routine tasks also reduce their strength ($\beta = .249$, $t = 5.539$, $p < 0.01$) to $\beta = .180$, $t = 4.055$, $p < 0.01$) and competition ($\beta = .107$, $t = 2.142$, $p < 0.05$) to $\beta = .076$, $t = 1.587$, $p < 0.1$) respectively and remain statistically significant. Overall, the above results indicate that accounting outsourcing fully mediates the relationship between **(g)** trust in accountant and firm performance and partially mediates the relationship between **(a)** frequency of routine tasks, **(b)** frequency of non-routine tasks, **(f)** opportunism, **(h)** commitment, **(k)** competition, **(l)** outsourcing strategy) and firm performance, but it does not mediate the relationship between **(c)** asset specificity, **(d)** environment uncertainty, **(e)** behavior uncertainty, **(i)** cooperative behavior and **(j)** accounting competence) and performance. Hence, H14 was partially supported.

7. DISCUSSION

7.1 Introduction

This chapter details the research results in the light of the previous literature and theories discussed earlier. Comparisons shall be made to find similarities and inconsistency between the current results with respect to prior studies. Furthermore the some of the reasons for such contradictions shall also be discussed here.

7.2 Discussion

The results and hypothesis testing showed that eleven out of twelve independent variables including; frequency of routine tasks, frequency of non-routine tasks, asset specificity, environmental uncertainty, behavioral uncertainty, opportunism, trusts in accountant, commitment, accounting competence, competition and outsourcing strategy had significant impact on the management accounting outsourcing decisions. Moreover, we looked at accounting outsourcing as an independent variable and its impact on firm performance which had significant positive impact on firm performance. Furthermore, eight out of twelve independent variables including; frequency of routine tasks, the frequency of non-routine tasks, opportunism, trusts in accountant, cooperative behavior, commitment, competition and outsourcing strategy had significant impact on firm performance. Finally, accounting outsourcing mediate the relationship between seven independent variables (frequency of routine tasks, frequency of non-routine tasks, opportunism, trusts in accountant, commitment, competition and outsourcing strategy.) and firm performance. The aim of this research was to identify the factors affecting the accounting outsourcing choice and which factors carry greater impact on outsourcing and firm performance among Pakistani SMEs.

H1: The first variable was identified that the frequency of routine tasks. The results supported that this variable has a significant negative relationship with accounting outsourcing. This negative relation indicates that the higher frequency of routine tasks it is a less likely firm go for outsourcing of accounting functions. This finding was supported by previous literature (Everaert

et al., 2010; Williamson, 1985). The more the frequency of transactions, company's internalized accounting functions rather to outsource because it is costly to outsourcing from an external party. Usually in routine management accounting tasks the frequency and volume of transactions are very high and same is with Pakistani SMEs. However, for this particular research the results with respect to Pakistani SMEs supported that the frequency of routine accounting tasks is an influential factor in accounting outsourcing.

H2: The second variable affecting the accounting outsourcing has been identified as frequency of non-routine accounting tasks. The results indicate that this variable have a significant positive relationship with accounting outsourcing but the effect is in the opposite direction that expected. This finding was not supported by earlier studies of (Everaert et al., 2010; Williamson, 1985). However, for this particular research the results with respect to Pakistani SMEs supported that the frequency of non-routine accounting tasks is not an influential factor in accounting outsourcing. The difference in results with previous studies might be the different business environment as previous studies were conducted in developed countries.

H3: The third variable, which also appears an influential factor on management accounting outsourcing was asset specificity. The research results found that the asset specificity has a significant negative relationship with accounting outsourcing choice. This finding was supported by earlier studies of (Everaert et al., 2010; Alvarez-Suescun, 2010; Steven et al., 2009). For this particular research the results with respect to the Pakistani SMEs supported that the level of their specific asset defined by Barney (1991) are sufficient. As we know the management accounting activities are mostly human oriented and large number of business institutions give birth thousand new graduates to offer their services with cheap salary packages for SMEs in Pakistan. Therefore, most large SMEs internalized their management accounting functions rather to outsource.

H4: The fourth variable has been identified as environmental uncertainty. The results stated that higher the environmental uncertainty in business operations, then it is less likely the management accounting functions will be outsourced. The research results found that the environmental uncertainty has a significant negative relationship with accounting outsourcing. Prior studies by (Lamminmaki, 2008; Kotabe & Mol, 2009) have also supported this claim. However, two recent

study conducted by Kamyabi & Devi, (2011) and Everaert et al., (2010) does not support this finding. In addition, we found that the majority of SMEs in Pakistan believe that they are uncertain regarding their business operations, due to unstable government policies and especially current energy crises that has a big impact on SMEs manufacturing sector in different part of the country. Therefore, management accounting outsourcing conditions in Pakistan are unreliable in the present situation.

H5: The fifth variable affecting the accounting outsourcing has been identified as behavior uncertainty. The results showed that SMEs who were highly sensitive to the external accountant behavior are less likely to outsource accounting functions. The results supported that behavior uncertainty has a significant negative effect on accounting outsourcing. This was supported in previous studies by (Alvarez-Suescun, 2010; Everaert et al., 2010; Kamyabi & Devi, 2011; Lamminmaki, 2008). However, one recent study conducted by Everaert et al., (2010) does not support this finding. In addition, this was supported by the fact that it is difficult for Pakistani SMEs owners/managers to interpret and evaluate the accountant's ability, efficiency and effectiveness in an assign tasks. Therefore, a country like Pakistan where rules and regulations are not properly implemented in a business environment will bring SMEs owners/manager in situation of high behavioral uncertainty of external service providers and make this research hypothesis supported by previous studies.

H6: The sixth influential variable has been identified as opportunism. As per the hypothesis, higher the level of perceived opportunism of external accountant, the less likely for SMEs owners/managers prefer outsourcing of accounting functions. A majority of authors has looked into opportunism in different management areas. Opportunism in accounting outsourcing means one party (outsourcing firm) tolerate the increase cost or decrease revenue as a consequence of the other party (professional accountant) opportunistic behavior. The results supported that opportunism has a significant negative relationship with accounting outsourcing. The support of finding can again be found in the previous studies by (Steven et al., 2009; Wang, 2002). Opportunistic behavior of an accountant has a big influence on Pakistani SMEs decisions toward accounting outsourcing and complementary factor in the governance of exchange relationships. Therefore, most of the larger SMEs internalized their accounting functions due to threat of opportunistic behavior of an external accountant.

H7: The seventh variable affecting the accounting outsourcing has been identified as trust in accountant. The results supported that trust has a positive significant relationship with management accounting outsourcing. This was supported in previous studies by (Kamyabi & Devi, 2011c; Everaert et al., 2010; Kamyabi & Devi, 2011). In the context of Pakistan, trust is considered as an important and influential factor in business operation, all the business dealing is based on trust, especially when deciding for external service provider. This might also be linked to some level with the cultural preferences of SMEs owners/managers as Pakistan is a highly collective society, where people tend to trust one another. Therefore, for this particular research the results with respect to Pakistani SMEs supported that the trust in external accountant is an influential factor in accounting outsourcing. SMEs prefer to outsource accounting functions in Pakistan due to high level of trust on external accountant.

H8: The eighth influential variable has been identified as commitment. The research results found that the commitment has a significant negative relationship with accounting outsourcing but the effect is in the opposite direction that expected. Previous studies show that commitment plays a key role in the sustainable long run mutually beneficial relationship between the actors. Our result suggests that in a relationship of accounting outsourcing both parties are less committed to the long-term relationship so that we can see the buyer and supplier relationship. The reason may be that it is economic (low movement / transaction costs) for Pakistani SMEs to move from one service provider to another or internalized all accounting functions. Another reason could be the availability of service providers individual or firms because external accountants are providing services to many SMEs at the same time. Third reason could be the small business owners and managers do not want to outsource accounting functions through same external accountant every fiscal year due to the fact that the loss of confidential company information to competitors. These might be some reasons that enforces SMEs to have short term relation with the external accountant in Pakistan. Furthermore, we seen earlier in hypothesis seven a great trust to an external accountant was approved but without a strong commitment to the external accountant. In this study the SMEs owners/managers and external accountant in a relationship are too short-term oriented, both parties will have an incentive to exploit each other as quickly as possible and exit the relationship. This means that less effort to build and maintain long term relations to an external accountant. Therefore, for this particular research the results

with respect to Pakistani SMEs supported that the commitment is not an influential factor in accounting outsourcing.

H9: The ninth variable having an impact on accounting outsourcing was cooperative behavior. The results show that cooperative behavior has an insignificant negative relationship with accounting outsourcing and the effect is in the opposite direction that expected. According to literature review earlier, a majority of authors has looked into the importance of cooperative behavior in business relations. Cooperation is defined as coordinated actions taken by exchange parties to achieve bilateral expected benefits in terms of flexibility, information exchange, solidarity and shared problem solving (Steven et al., 2009; Morgan & Hunt, 1994). The relationship with cooperative behavior and accounting outsourcing was not previously tested. However, it is very unfortunate to see that the cooperative behavior such as flexibility in response, the exchange of information between owners/managers and external accountant is not a significant positive influence on the outsourcing of accounting functions in Pakistani SMEs. The reason for this relationship is not cooperative could be SMEs owners/managers do not want to share their secret information to an external accountant is to avoid the tax. What we saw at the meeting with the owners/managers/CFOs that most SMEs in Pakistan have three separate accounts for different purposes, for example, separate account for banks, for tax department and a firm original account. Therefore, for this particular research results regarding the Pakistani SMEs show that the cooperative behavior is not an important factor in accounting outsourcing.

H10: The tenth variable affecting the accounting outsourcing has been identified as accounting competence. The results proved that accounting competence variable has a positive significant relationship with management accounting outsourcing. The findings of this research were also supported through earlier discoveries by (Carey et al., 2006; Gooderham et al., 2004; Kamyabi & Devi, 2011b; Kamyabi & Devi, 2011). They found that accounting competence is the most important factor that influence outsourcing choice. Studies suggested that the external accountant posses competitive advantage over the internal accountant as they have specialized skills, competence, market knowledge, qualification and industry experience (Nandan, 2010; Carey et al., 2006; Brandau & Hoffjan, 2010). The owners/managers of SMEs in Pakistan found that the professional accountant posses more competencies over the internal accountant. Hence, for this

particular research the results with respect to the Pakistani SMEs proved that the accounting competence is an influential factor affecting the outsourcing decisions.

H11: The eleventh variable has been identified as intensity of competition. The results showed that competition has a positive relationship with accounting outsourcing. This finding was supported by earlier studies of (Kamyabi & Devi, 2011c; Kamyabi & Devi, 2011). However, one study conducted by Lamminmaki, (2008) does not support this finding. Furthermore, the reason may be the Pakistani SMEs outsource accounting functions due to strong competition in the market. Pakistan has a large number of manufacturing SMEs, it is claimed by McIvor (2009) that a company needs to understand its resources to influence the competitive position on the market. Furthermore, the association between competitive environment and internal resource gaps is critical to consider and this can be achieved through outsourcing (Espino & Robaina, 2005). Competitive pressure has a big influence on Pakistani SMEs decisions toward management accounting outsourcing and complementary factor to fulfill an internal resource gap. Therefore, SMEs outsource their management accounting functions in order to be more competitive and efficient in the market.

H12: The twelfth variable affecting the accounting outsourcing has been identified as firm outsourcing strategy. The results indicate that outsourcing strategy has a significant negative relationship with accounting outsourcing but the effect is in the opposite direction that expected. The findings of this research were not supported by earlier discoveries of (Delmotte & Sels, 2008; Kamyabi & Devi, 2011). However, one study conducted by Carey et al., (2006) does support this finding. This was confirmed by the fact that the owners/managers of SMEs are already outsource non-core activities, such as human resources, information technology, logistics and facilities management that do not motivate Pakistani SMEs to outsource accounting functions as well. Thus, for this particular research results regarding the Pakistani SMEs have not proven that business outsourcing strategy is an important factor affecting outsourcing decisions.

H13: The thirteenth variable affecting the firm performance has been identified as accounting outsourcing. The results supported that accounting outsourcing have a significant positive relationship with firm performance. This was supported in previous studies by (Kotabe & Mol, 2009; Kamyabi & Devi, 2011c; Kamyabi & Devi, 2011b; Gilley et al., 2004; Kotabe & Mol, 2009). They found that outsourcing is the most important factor that influences firm

performance. This is so because outsourcing service minimizes the risk, reduce bureaucratic complexity, reduce overhead cost and uncertainty; allow SMEs to achieve economies of scale in production and overall business operation, which in turn, enhance the firm performance. The owners/managers of SMEs in Pakistan found that the professional accountant posses more knowledge, skills, capabilities and competencies over the internal accountant. Hence, for this particular research the results with respect to the Pakistani SMEs supported that the management accounting outsourcing is an influential factor affecting the firm performance.

H14: The fourteenth hypotheses have been identified as outsourcing of accounting activity mediates the relationship between (frequency of routine tasks, the frequency of non-routine tasks, asset specificity, environmental uncertainty, behavioral uncertainty, opportunism, trust in accountant, commitment, cooperative behavior, accounting competence, competition and corporate strategy) and firm performance. The results supported that management accounting outsourcing partially mediate the relationship between (frequency of routine tasks, opportunism, commitment and outsourcing strategy) significant negatively and (frequency of routine tasks, and competition) significantly positively associated with firm performance. In addition, accounting outsourcing fully mediate the relationship between trust in accountant and firm performance. According to the prior study by (Kamyabi & Devi, 2011c; Kamyabi & Devi, 2011b) supported that accounting outsourcing activities mediate the relationship between competition, trust in accountant and accounting competence with firm performance. The results also indicate that accounting outsourcing does not mediate the relationship between asset specificity, environmental uncertainty, behavioral uncertainty, cooperative behavior, and accounting competence with the firm performance. This hypothesis is partially supported in this study. Thereby, for this particular research the results with respect to the Pakistani SMEs supported that the accounting outsourcing mediate the relationship between (frequency of routine tasks, the frequency of non-routine tasks, opportunism, trust in accountant, commitment, competition and outsourcing strategy) with firm performance.

Table 14: Summary of Results

Independent Variables	Direct Effects on Mediator (Outsourcing)	Direct Effects on Dependent Variable (Firm Performance)	Testing for Mediation Effects
Frequency of Routine tasks	Supported	Supported	Partial Mediation
Frequency of Non Routine	Not Supported	Not Supported	Partial Mediation
Assets Specificity	Supported	Not Supported	-
Environmental Uncertainty	Supported	Not Supported	-
Behavioral Uncertainty	Supported	Not Supported	-
Opportunism	Supported	Supported	Partial Mediation
Trust in Accountant	Supported	Supported	Full Mediation
Commitment	Not Supported	Not Supported	Partial Mediation
Cooperative Behavior	Not Supported	Supported	-
Accounting Competence	Supported	Not Supported	-
Competition	Supported	Supported	Partial Mediation
Outsourcing Strategy	Not Supported	Not Supported	Partial Mediation
Accounting Outsourcing	-	Supported	-

Figure 3: Research Model for Outsourcing

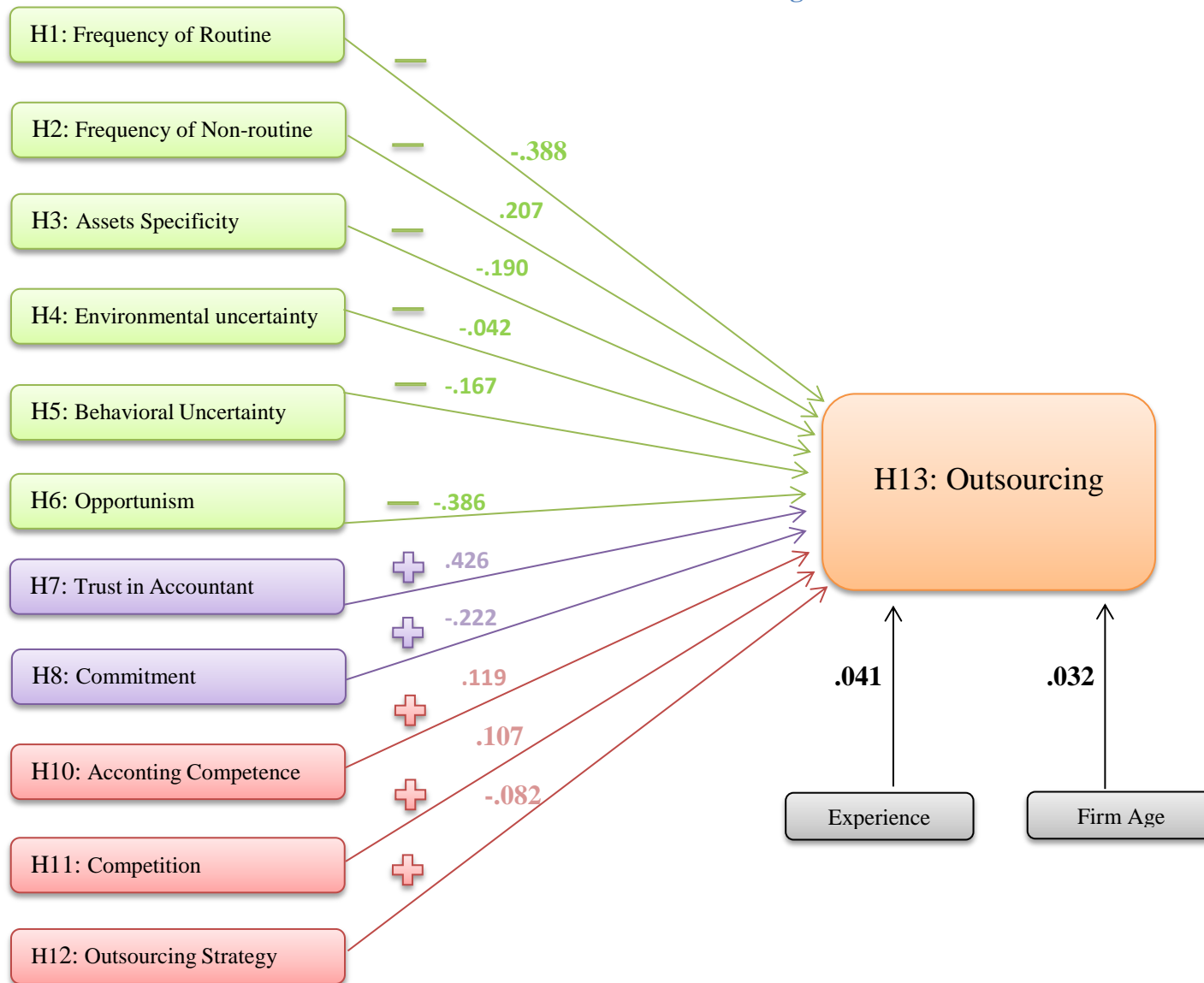
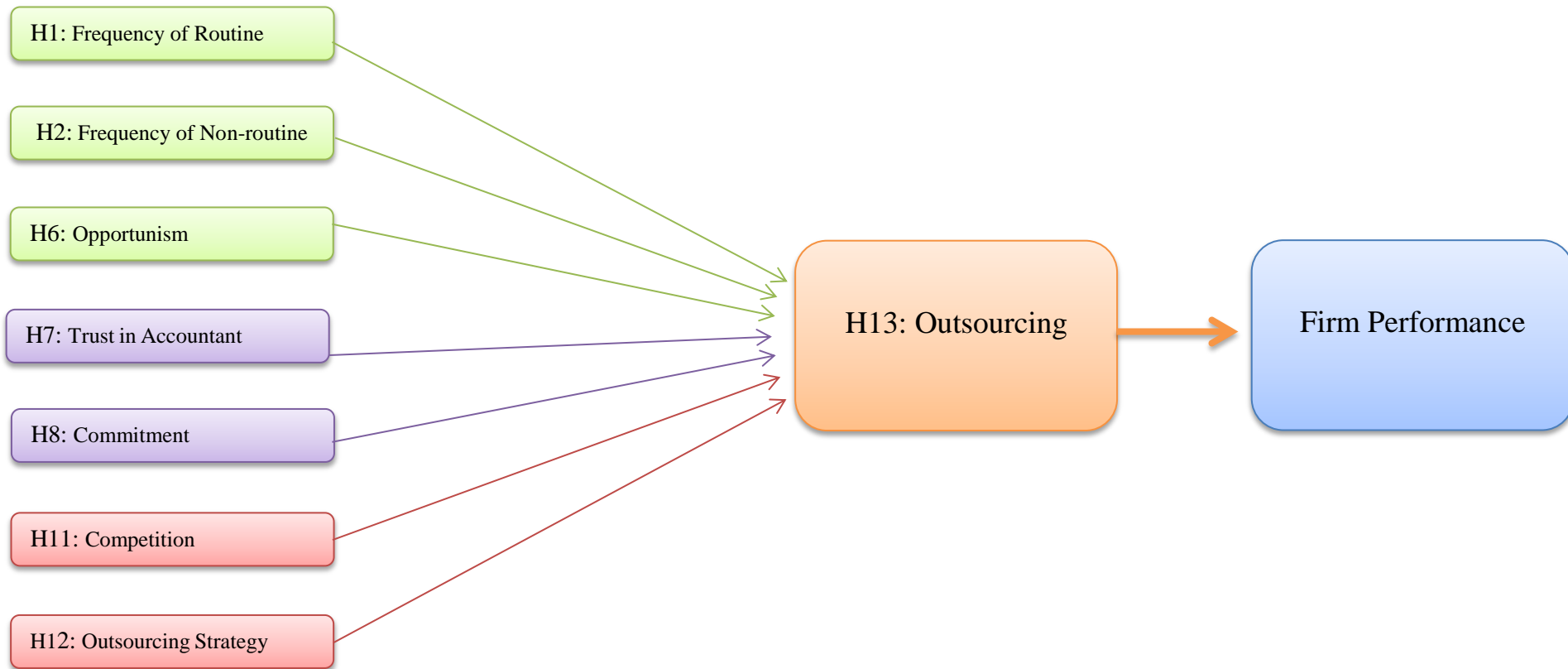


Figure 4: Research Model for Firm Performance (Mediation)



8. CONCLUSION

8.1 Introduction

This chapter focuses on the results and conclusions of the research findings, the implications of the results deduced and limitations of the study.

8.2 Conclusion

The aim of conducting this research was identifying the important factors affecting the SMEs accounting outsourcing practices in the context of Pakistan. The need for this was the fact that similar studies have been conducted in different setting i.e. Developed countries Europe, America, Australia and one study in Iran, but no data was available for Pakistani SMEs. Furthermore, it was widely noted that the SMEs sector in Pakistan is rapidly changing to a more developed, organized and large scales manner. The research conducted looked at the previous literature and established a base for analyzing outsourcing accounting functions. The hypothesis were tested for the SMEs in the manufacturing sector and the present findings revealed that several factors including frequency of routine tasks, frequency of non-routine tasks, asset specificity, environmental uncertainty, behavioral uncertainty, opportunism, trust in accountant, commitment, accounting competence, competition and outsourcing strategy have a significant impact on management accounting outsourcing. Furthermore, the study also indicates frequency of routine tasks, frequency of non-routine tasks, opportunism, trusts in accountant, commitment, competition and outsourcing strategy are significantly associated with firm performance. Moreover, accounting outsourcing has significantly positively associated with firm performance. In addition, the outsourcing mediate the relationship between frequency of routine tasks, the frequency of non-routine tasks, opportunism, trust in accountant, commitment, competition and outsourcing strategy with firm performance. Finally, among the control variables; gender, education and firm size had an insignificant effect on accounting outsourcing whereas experience

and firm age were found to have a less significant positive effect on management accounting outsourcing

The other objective of the research was to further identify the most favorable variables from the list mentioned above for management accounting outsourcing. In this regard, the findings revealed that trust in accountant is the most important factor, frequency of routine tasks is the second most important, opportunism is the third, commitment is the fourth, frequency of non-routine tasks is the fifth, asset specificity is the sixth, behavioral uncertainty is the seventh, accounting competence is the eighth, competition is the ninth, outsourcing strategy is the tenth and environment uncertainty is the eleventh most important influential factor for accounting outsourcing.

8.3 Contribution of the Study

This research is first to study of management accounting outsourcing practices in the context of Pakistan. Prior studies done with reference to Pakistan did not look into this specific issue. This research is about SMEs outsourcing preferences in the setting of a developing country with increasing competition in the SMEs sector. It focuses on the economy where the SMEs are not yet fully modernized, and emphasizes on how the small and large players differ. This research contributes to the literature analyzing the factors which are affecting accounting outsourcing choices. It also contributes to the management accounting, transaction cost economics, resource base view and relationship theory literature for understanding SMEs owners/managers' perceptions in markets where the SMEs sector shifts from the insourcing way of management accounting to outsourcing. More specifically the empirical findings of this study contribute to the understanding of management accounting outsourcing choices in the context of the Pakistani SMEs environment.

8.4 Implications of the Study

The current research puts forth some useful insights in the field of management accounting outsourcing preferences and SMEs owners/managers' decision making for insourcing or outsourcing choice in Pakistan in particular. If reviewed carefully it provides a clear insight for the SMEs owners/managers to understand and adapt to the outsourcing needs and preferences. The world of outsourcing revolves around gathering information and making calculated decisions regarding SMEs preferences and choices

Furthermore, from the results discussed in the previous chapter it is clear that the SMEs in Pakistan is rapidly shifting towards the management accounting outsourcing. These observations give rise to possibilities for the SMEs owners/managers to improve their business decision through accounting outsourcing.

In addition, the findings reveal that management accounting outsourcing have some advantages over the in-sourcing. In order to gain profit for the long term, SMEs need improvements in their business operations and need to review their accounting business strategies.

Finally, managerial implications of this study will help SME owners/managers and external service providers, their business strategies and reposition itself to face new competition and improve their existing potential by attracting more potential customers to improve business performance.

8.5 Limitations of the Study

The current study has some limitations that can be addressed in future research. Firstly, it only focuses on SMEs involved in the manufacturing sector. Future research should include services sector as well. Furthermore, for this research we use quantitative methods of research, it might be an interesting future researcher can use qualitative methods to understand the entire scenario of SMEs outsourcing practices in Pakistan.

The data collection and sample size were restricted to 302 SMEs only. There may be a chance of biased responses since data was collected during daytime only. This bias may be reflecting the fact that working SMEs owners/managers/CFO are less available during the official working hours and may have different opinions regarding accounting outsourcing practices.

In conclusion, the management accounting scene in Pakistan is changing swiftly towards outsourcing. This is due to the accelerated speed of globalization, flow of information and high cost of doing business. Similarly, the stakeholders are also changing, becoming more knowledgeable and involved in their decisions. There are several internal and external factors affecting the preferences and choices of the SMEs towards management accounting outsourcing today which in turn transforms into better and enhanced profitability.

REFERENCES USED TO ELABORATE THE PROJECT

- Abbott et al. (2007). Corporate governance, audit quality and the Sarbanes Oxley act: evidence from internal audit outsourcing, *The Accounting Review*, 82 (4), 803-835.
- Alvarez-Suescun, E. (2010). Combining transaction cost and resource-based insights to explain IT implementation outsourcing, *Information Systems Frontiers*, Vol. 12, pp. 631-645.
- Audet, J., & St-Jean, E. (2007). Factors affecting the use of public support services by SME owners: evidence from a periphery region of Canada. *Journal of Developmental Entrepreneurship*, 12 (2), 165-180.
- Barney, J. (1991). Firm resources and sustained competitive advantage. *Journal of Management*, 17 (1), 99-120.
- Blois, K. (2002). Business to business exchanges: a rich descriptive apparatus derived from macneil's and menger's analyses. *Journal of Management Studies*, 39: 523–551
- Bin Jiang & Amer Qureshi. (2006). Research on outsourcing results: current literature and future opportunities, *Management Decision*, Vol. 44 Iss: 1 pp. 44 – 55
- Brouthers, K., & Brouthers, L. (2003). Why service and manufacturing entry mode choices differ: The influence of transaction cost factors, risk and trust. *Journal of Management Studies*, 40 (5), 1179–1204.
- Brandau, M., Hoffjan, A.H. (2010). Exploring the involvement of management accounting in strategic decisions and control, *Journal of Accounting & Organizational Change*, Vol.6 No.1 pp72-95
- Quelin, B. and Duhamel, F. (2003). Bringing together strategic outsourcing and corporate strategy: outsourcing motives and risks. *European Management Journal*, 21 (5), 647–661.
- Carey, P., Subramaniam, N., & Ching, K. C. W. (2006). Internal audit outsourcing in Australia. *Accounting and Finance*, 46, 11-30.
- Chang, Y.C., Chen, Y.-C., & Kuo, T.-K. (2009). Strategic technology sourcing in corporate ventures A study of Taiwanese pharmaceutical firms. *International Journal of Entrepreneurial Behaviour & Research*, 15 (5), 497-517.
- Chenhall, R. (2003). Management control systems design within its organizational context: findings from contingency-based research and directions for the future Accounting. *Organizations and Society*, 28 (2–3), 127–168.
- Coase, R. (1937). The Nature of the Firm. *Economica*, 4, 386-405.
- Delmotte., Luc Sels. (2008). HR outsourcing: threat or opportunity?, *Personnel Review*, Vol. 37 Iss: 5, pp. 543 – 563
- Dibbern, J. and A. Heinzl. (2009). Outsourcing of information systems functions in Small

and Medium Sized Enterprises: A test of a multi-theoretical model, *Business Information Systems Engineering* , Vol1. Pp.101-110

- Dwyer, F.R., Schurr, P.H., and Oh, S. 1987. Developing buyer-seller relationships. *Journal of Marketing*, 51 (April), 11-27.
- Espino-Rodríguez, T. F., & Padrón-Robaina, V. (2005). A resource-based view of outsourcing and its implications for organizational performance in the hotel sector. *Tourism Management*, 26, 707–721.
- Everaert, P., Sarens, G., & Rommel, J. (2010). Using transaction cost economics to explain outsourcing of accounting. *Small Business Econ*, 35 (1), 93–112.
- Everaert, P., Sarens, G., & Rommel, J. (2007). Sourcing strategy of Belgian SMEs: empirical evidence for the accounting services. *Production Planning & Control*, 18 (8), 716-725
- E. Mahmoodzadeh, Sh. Jalalinia, F. Nekui Yazdi. (2009). A business process outsourcing framework based on business process management and knowledge management, *Business Process Management Journal*, Vol. 15 Iss: 6, pp. 845 – 864
- Ellram, L. M., Tate, W., & Billington, C. (2008). Offshore outsourcing of professional services: a transaction cost economics perspective. *Journal of Operations Management*, 26 (2), 148–163.
- Fang, Y., Wade, M. Delois, A, and Beamish. (2007). International diversification, subsidiary performance and the mobility of knowledge resources. *Strategic Management Journal*, 28: 1053-1064.
- Finance. (2012). Ministry of finance and economic survey of Pakistan Retrieved 04/18/2013, from http://www.finance.gov.pk/survey_1112.html
- Field, A. (2009). *Discovering statistics using SPSS: (and sex and drugs and rock 'n' roll)*. Los Angeles: SAGE.
- Ghauri, P.N., & Grønhaug, K. (2010). *Research methods in business studies* (4th Edition), London: FT Pearson
- Gilley, K. M., & Rasheed, A. (2000). Making more by doing less: an analysis of outsourcing and its effects on firm performance. *Journal of Management*, 26 (4), 763– 790
- Geographia. (2005). *Geographia of Pakistan* Retrieved 04/18/2013, from <http://www.geographia.com/pakistan/>
- Gilley, K. M., Greer, C. R., & Rasheed, A. A. (2004). Human resource outsourcing and organizational performance in manufacturing firms. *Journal of Business Research*, 57, 232-240.
- Gooderham, P. N., Tobiassen, A., Doving, E., & Nordhaug, O. (2004). Accountants as sources of business advice for small firms. *International Small Business Journal*, 22 (1), 5-22.
- Greenberg, P. S., Greenberg, R. H., & Antonucci, Y. L. (2008). The role of trust in the

governance of business process outsourcing relationships A transaction cost economics approach. *Business Process Management Journal*, 14 (5), 593-608.

- Hasle, P., B. Bager and L. Granerud. (2010). Small enterprises-Accountant as occupational health and safety intermediaries. *Safety Science* 48 (2010) 404–409.
- Hair, J. F. (2006). *Multivariate data analysis*. Upper Saddle River, N.J.: Prentice Hall.
- Hennart, J. (1989). Can the “new forms of investment” substitute for the “old forms”? A transaction costs perspective. *Journal of International Business Studies*, 20 (2), 211–234.
- Heide, J. B., & John, G. (1992). Do norms matter in marketing relationships?. *Journal of Marketing*, 56 (2), 32-44.
- Hussey, D., & Jenster, P. (2003). Outsourcing: The supplier viewpoint. *Strategic Change*, 12, 7-20.
- ICAP. (2012). The Institute of Chartered Accountants of Pakistan Retrieved 04/18/2013, from <http://www.icap.org.pk/web/index.php>
- Jayabalan, J., Raman, M., Dorasamy, M., & Ching, N. K. C. (2009). Outsourcing of accounting functions amongst SME companies in Malaysia: An exploratory study. *Accountancy Business and the Public Interest*, 8 (2), 96-114.
- Jiang, B., & Qureshi, A. (2006). Research on outsourcing results: current literature and future opportunities. *Management Decision*, 44 (1), 44-55.
- Kamyabi, Y. and S. Devi. (2011)b. Using transaction cost economics and resource-based views in management accounting outsourcing: An empirical study of Iranian SMEs, *Middle- East Journal of Scientific Research* 10 (1): 87-98,
- Kamyabi, Y. and S. Devi. (2011)c. An empirical investigation of accounting outsourcing in Iranian SMEs: Transaction cost economics and resource-based views. *International Journal of Business and Management* 6 (3): 81-94.
- Kamyabi, Y. and S. Devi. (2011). The impact of accounting outsourcing on Iranian SME performance: Transaction Cost economics and resource-based perspectives. *World Applied Sciences J.*, 15(2): 244-252.
- Kamyabi, Y. and S. Devi. (2011)c. Use of professional accountants’ advisory services and its impact on SME performance in an emerging economy: A resource-based view. *J. Management and Sustainability*. 1(1): 43-55.
- Kim, J., So, S., & Lee, Y. (2007). The effects of trust on the intention of adopting business process outsourcing: An empirical study. *International Journal of Computer Science and Network Security*, 17 (10).
- Klein, P. G. (2005). The make-or-buy decision: Lessons from empirical studies. In C. Me´nard & M. Shirley (Eds.), *Handbook of institutional economics* (pp. 435–464). New York: Springer.
- Kotabe, M., M.J. Mol. (2009). Outsourcing and financial performance: A negative curvilinear effect, *Journal of Purchasing and Supply Management*, Pages 205–213.

- Lamminmaki, D. (2008). Accounting and the management of outsourcing: An empirical study in the hotel industry. *Management Accounting Research*, 19, 163–181.
- Lee, J.-N., Huynh, M. Q., & Hirschheim, R. (2008). An integrative model of trust on IT outsourcing: Examining a bilateral perspective. *Information System Frontier*, 10, 145–163.
- Leslie R. Odom and Robin K. Henson. (2002). Data screening: Essential techniques for data review and preparation. A paper presented at the annual meeting of the Southwest Educational Research Association, Feb. 15, 2002, Austin, Texas. Document available online http://www.eric.ed.gov/ERICWebPortal/search/detailmini.jsp?_nfpb=true&_ERICExtSearch_SearchValue_0=ED466781&ERICExtSearch_SearchType_0=no&accno=ED466781
- Lockyer, Sharon. (2004). Coding qualitative data." In *The sage encyclopedia of social science research methods*, Edited by Michael S. Lewis-Beck, Alan Bryman, and Timothy Futing Liao, v. 1, 137-138.
- Marshall et al. (2007). Influences and outcomes of outsourcing: Insights from the telecommunications industry, *Journal of Purchasing and Supply Management*, pp. 245–260
- Marriott, N. and Marriott, P. (2000). Professional accountants and the development of a management accounting service for the small firm: barriers and possibilities. *Manage. Acc. Res.*, 11(4), 475–492.
- Mittal, K. C., & Prashar, A. (2011). Retail purchase behaviour in food and grocery in Punjab: A study of retail strategy. [Article]. Vilakshan: *The XIMB Journal of Management*, 8(2), 71-80.
- McIvor, R. (2009). How the transaction cost and resource-based theories of the firm inform outsourcing evaluation, *Journal of Operations Management*, 27, 45-63.
- McIvor, R., Humphreys, P., McKittrick, A., & Wall, T. (2009). Performance management and the outsourcing process lessons from a financial services organisation. *International Journal of Operations & Production Management*, 29 (10), 1025-1048
- Morgan, R.M. and Hunt, S.D. (1994). The commitment-trust theory of relationship marketing. *Journal of Marketing*, 58 (July), 20-38.
- Moore, D. S. and G. P. McCabe. (1999). *Introduction to the practice of statistics*. New York, W.H. Freeman & Company
- Nandan. (2010). Management accounting needs of SMEs and the role of professional accountants: A renewed research agenda. *Journal of Applied Management Accounting Research*, 8 (1): 65-78.
- Nicholson, B., Jones, J., & Espenlaub, S. (2006). Transaction costs and control of outsourced accounting: Case evidence from India, *Management Accounting Research*, 17, 238–258.

- Pearce, J. L. (2001). *Organization and management in the embrace of government*. Mahwah, NJ: Erlbaum.
- Penrose, E.T. (1959). *The theory of growth of the firm*. London: Basil Blackwell.
- Ruhanita Maelah, Aini Aman, Noradiva Hamzah, Rozita Amiruddin, Sofiah Md Auzair, (2010). Accounting outsourcing turnback: process and issues, *Strategic Outsourcing: An International Journal*, Vol. 3 Iss: 3, pp. 226 – 245
- Milgrom, P. and Roberts, J. (1992). *Economics, Organization and Management*. New Jersey: Prentice-Hall.
- Stratman, J. K. (2008). Facilitating offshoring with enterprise technologies: reducing operational friction in the governance and production of services, *Journal of Operations Management*, 26 (2), 275–287.
- SMEDA. (2013). Small and Medium Enterprises Development Authority Pakistan Retrieved 04/18/2013, from <http://www.smeda.org/>
- Steven S. Lui; Yin-yee Wong; Weiping Liu, (2009). Asset specificity roles in interfirm cooperation: Reducing opportunistic behavior or increasing cooperative behavior?, *Journal of Business Research*, Volume 62, Issue 11
- SBP. (2013). The State Bank of Pakistan Retrieved 04/18/2013, from <http://www.sbp.org.pk/search/results.asp?cx=002167901857236840991:v55i2sdnxf&cof=FORID:11&q=%20smes>
- The Economist Intelligence Unit. (2005). *Know how: Managing knowledge for competitive advantage*, Page 5
- Williamson, O. (1985). *The economic institutions of capitalism*. New York: Free Press.
- World Bank. (2011). *The World Bank* Retrieved 04/18/2013, from <http://www.worldbank.org/en/country/pakistan>
- Wang, E.T.G. (2002). Transaction attributes and software outsourcing success: an empirical investigation of transaction cost theory, *Information Systems Journal* (2002) 12, 153–181
- Zaheer, A., McEvily, B., & Perrone, V. (1998). Does trust matter? Exploring the effects of interorganizational and interpersonal trust on performance. *Organization Science*, 9 (2), 141–159.
- Zikmund, W. G., Babin, B. J., Carr, J. C., & Griffin, M. (2010). *Business research methods*. [Mason, Ohio]: South Western Cengage Learning.

Appendices

Appendix 1: Questionnaire

PLEASE ANSWER THE FOLLOWING QUESTIONS BY CROSSING (×) THE RELEVANT BLOCK OR WRITING DOWN YOUR ANSWER IN THE SPACE PROVIDED.

EXAMPLE of how to complete this questionnaire:

Your gender?

If you are female:

Male	1
Female	2

Section A – Background information

This section of the questionnaire refers to background or biographical information. Although we are aware of the sensitivity of the questions in this section, the information will allow us to compare groups of respondents. Once again, we assure you that your response will remain anonymous. Your co-operation is appreciated.

1. Gender

Male	1
Female	2

2. Education

University degree	1
Lower than university degree	2

3. Experience

less than 5 years	1
5 -10 years	2
11-15 years	3
16-20 years	4
More than 20	5

4. Firm Size

Less than 20 employees	1
20-30 employees	2
31-50 employees	3
51-100 employees	4
101-150 employees	5
151-200 employees	6
201-250 employees	7
More than 250	8

5. Firm Age

Less than 2 years	1
2-5 years	2
6-10 years	3
11-15 years	4
16-20 years	5
More than 20	6

Section B

To what extent do you think the accounting tasks frequency (recurrence of transactions) happened. Please indicate your answer using the following 6 point scale where 1= daily (D), 2= weekly (W), 3= monthly (M), 4= quarterly (Q), 5= half yearly (H) and 6= annually (A).

Frequency	D	W	M	Q	H	A
6. Entry of purchase invoices, sales invoices and financial transactions	1	2	3	4	5	6
7. Preparation of interim profit and loss account	1	2	3	4	5	6
8. Period end accounting	1	2	3	4	5	6
9. Preparation of financial statements	1	2	3	4	5	6
10. Total amount of invoices (sales and purchases) that the accountant has processed during the previous year	1	2	3	4	5	6

Section C

This section explores your company attitude toward outsourcing accounting functions. To what extent do you agree with each of the following statements? Please indicate your answers using the following 7-point scale where:

1. = Strongly disagree (SD)
2. = Disagree (D)
3. = Partially Disagree (PD)
4. = Neutral (N)
5. = Partially Agree (PA)
6. = Agree (A)
7. = Strongly Agree (SA)

Assets specificity	SD	D	PD	N	PA	A	SA
11. To acquire the routine accounting tasks the accountant needs to acquire company specific information	1	2	3	4	5	6	7
12. To perform the non-routine accounting tasks the accountant needs to acquire company-specific information	1	2	3	4	5	6	7
13. The accounting software is custom-tailored to our company.	1	2	3	4	5	6	7
14. The way we perform the accounting tasks is unique to our company	1	2	3	4	5	6	7
15. It would be costly in terms of time and resources to switch to an external accountant at the end of the financial year.	1	2	3	4	5	6	7
Environmental uncertainty							
16. During the previous year, there was a lot of variation in the workload related to routine accounting tasks (e.g book keeping, interim reports etc)	1	2	3	4	5	6	7
17. During the previous year, there was a lot of variation in the workload related to non-routine accounting tasks (e.g., period end-accounting)	1	2	3	4	5	6	7
18. During the previous year, there were relevant changes in the business organization of the company (e.g., acquisitions, changes in corporate structure)	1	2	3	4	5	6	7
Behavioral uncertainty Is it possible to determine whether the accountant has correctly (accurately) performed the following activities?							
19. Entering up purchase invoices, sales invoices and financial transactions	1	2	3	4	5	6	7
20. Preparation of interim reports (e.g., interim profit and loss account)	1	2	3	4	5	6	7
21. Period end accounting (depreciations, stock changes, loans, accruals and deferred income, etc.)	1	2	3	4	5	6	7
22. Preparation of financial statements (balance sheet, profit and loss account)	1	2	3	4	5	6	7
Opportunism							
23. Sometime external accountant alter the facts slightly in order to get what they need.	1	2	3	4	5	6	7
24. External accountant breaches the formal and informal agreements to their benefit.	1	2	3	4	5	6	7
25. Sometime external accountant lies about certain things in order to protect their interest.	1	2	3	4	5	6	7

26. Sometime external accountant promises to do things without actually doing them later	1	2	3	4	5	6	7
27. Sometime external accountant does not fulfill obligations in accordance with our contract.	1	2	3	4	5	6	7
28. Sometime external accountant try to take advantage from us	1	2	3	4	5	6	7
29. Sometime external accountant try to mislead us	1	2	3	4	5	6	7
30. Sometime external accountant try to deceive us	1	2	3	4	5	6	7
31. Sometime external accountant try to withhold information	1	2	3	4	5	6	7
32. Sometime external accountant compromise on ethics	1	2	3	4	5	6	7
Trust on accountant							
33. The owner/manager has confidence that the external accountant will treat fairly, this means to correctly charge for the performed duties	1	2	3	4	5	6	7
34. The owner/manager has confidence that the external accountant will inform correctly	1	2	3	4	5	6	7
35. The owner/manager has confidence that the external accountant will accurately perform the duties	1	2	3	4	5	6	7
36. The owner/manager feel that external accountant care about what happens to us.	1	2	3	4	5	6	7
37. The relationship between the owner-manager and the external accountant is based on trust.	1	2	3	4	5	6	7
Asset Specificity 2							
38. We have invested a lot of time and effort in building up our relationship with this accountant.	1	2	3	4	5	6	7
39. If this accountant were to switch to one of our competitors, it would be a big loss to us.	1	2	3	4	5	6	7
40. If this accountant were sharing our company secret information to one of our competitors, it would be a big loss to us.	1	2	3	4	5	6	7
Commitment							
41. We do not have long term plans for working with this accountant.	1	2	3	4	5	6	7
42. We see this accountant developing into a long term service provider.	1	2	3	4	5	6	7

43. We have formal agreements that detail the obligations of both parties.	1	2	3	4	5	6	7
44. We do not have specific well detailed agreements with this accountant.	1	2	3	4	5	6	7
Cooperative Behavior							
45. Flexibility in response to requests for changes is a characteristic of this relationship.	1	2	3	4	5	6	7
46. Exchange of information in this relationship takes place frequently, informally and openly.	1	2	3	4	5	6	7
47. In most aspects of this relationship the parties are jointly responsible for getting things done.	1	2	3	4	5	6	7

Section D

To what extent do you perceive the external accountant is accounting competent source of management accounting functions? Please indicate your answer in the following by using 7 point scale where 1= very limited competent (VLC) and 7= very highly competent (VHC).

Accounting Competence	VLC						VHC
48. Accountant has specialized industry wide knowledge	1	2	3	4	5	6	7
49. Accountant has expertise in internal control	1	2	3	4	5	6	7
50. Accountant has experience and qualifications	1	2	3	4	5	6	7
51. Accountant has depth of understanding of your firm	1	2	3	4	5	6	7
52. Expertise in computerized information systems (CIS) accounting	1	2	3	4	5	6	7
53. Accountant has expertise in risk management	1	2	3	4	5	6	7

Section E

This section explores your company intensity of competition in the following. Please indicate your answers using the following 7-point scale where: 1= very weak competition (VWC) and 7= very fierce competition (VFC)

Competition	VWC						VFC
54. Product characteristics	1	2	3	4	5	6	7
55. Promotional strategies among rivals	1	2	3	4	5	6	7
56. Access to distribution channels	1	2	3	4	5	6	7

57. Service strategies to customers	1	2	3	4	5	6	7
58. Product (Service) Variety	1	2	3	4	5	6	7

Section F

This section explores your company outsourcing strategy with respect outsourcing of non-core functions followings. Please indicate your answer in the following on 7 scale point where 1= lower score (LS) and 7= higher score (HC)

Outsourcing strategy	LS						HS
59. Does your company outsource Information technology	1	2	3	4	5	6	7
60. Does your company outsource Human resource management	1	2	3	4	5	6	7
61. Does your company outsource Facilities management	1	2	3	4	5	6	7
62. Does your company outsource Logistics	1	2	3	4	5	6	7

Section G

This section explores your company level of outsourcing of the accounting tasks. Please indicate your answers using the following 7-point scale where: 1= not outsourced (NO) and 7= totally outsource (TO)

Outsourcing	NO						TO
63. Bookkeeping	1	2	3	4	5	6	7
64. Interim reporting	1	2	3	4	5	6	7
65. Period-end accounting	1	2	3	4	5	6	7
66. Preparation of financial statements	1	2	3	4	5	6	7
67. Product/services costing	1	2	3	4	5	6	7
68. Budgeting/forecasting	1	2	3	4	5	6	7
69. Customer profitability analysis	1	2	3	4	5	6	7
70. Financial planning	1	2	3	4	5	6	7
71. Management accounting	1	2	3	4	5	6	7
72. Internal audit	1	2	3	4	5	6	7

73. Tax consultancy (annually, monthly, filing of IT, GST, WHT returns etc.)	1	2	3	4	5	6	7
74. Business advice	1	2	3	4	5	6	7
75. Management consultancy	1	2	3	4	5	6	7
76. Financing advice	1	2	3	4	5	6	7
77. IT consultancy (IT solutions for accounting software)	1	2	3	4	5	6	7
78. Project evaluation services	1	2	3	4	5	6	7
79. External audit (annual, interim)	1	2	3	4	5	6	7
80. Secretarial/Corporate Affairs with SECP	1	2	3	4	5	6	7
81. Special financial assignment (fixed assets evaluation, gratuity tax, employee provident funds etc.	1	2	3	4	5	6	7
82. Credit services	1	2	3	4	5	6	7
83. Insurance Processing	1	2	3	4	5	6	7
84. Banking	1	2	3	4	5	6	7

Section H

To what extent do you perceive the level of importance attached to the following? Please indicate your answer in the following by using 7 point scale where 1= not at all important (NAI) and 7= very important (VI).

Performance	NAI						VI
85. Profitability of a firm	1	2	3	4	5	6	7
86. Growth in Sales	1	2	3	4	5	6	7
87. Return on assets	1	2	3	4	5	6	7
88. Cash flow	1	2	3	4	5	6	7
89. life style	1	2	3	4	5	6	7
90. Independence	1	2	3	4	5	6	7
91. Job security	1	2	3	4	5	6	7

Section I

Please circle the appropriate number to indicate the degree to which you agree to disagree with each of the following statements regarding the performance of firm after outsourcing Where 1=Strongly Disagree (SD) and 7= Strongly Agree (SA)

Performance	SD	D	PD	N	PA	A	SA
92. The outsourcing has positive impact on profitability	1	2	3	4	5	6	7
93. The outsourcing has positive impact on growth in sales	1	2	3	4	5	6	7
94. The outsourcing has positive impact on return on assets	1	2	3	4	5	6	7
95. The outsourcing has positive impact on cash flow	1	2	3	4	5	6	7
96. The outsourcing has positive impact on life style	1	2	3	4	5	6	7
97. The outsourcing has positive impact on independence	1	2	3	4	5	6	7
98. The outsourcing has positive impact on job security	1	2	3	4	5	6	7
99. The outsourcing has contributed to our core competencies and competitive advantages.	1	2	3	4	5	6	7
100. The outsourcing has realized the goals we set out to achieve.	1	2	3	4	5	6	7
101. Overall, we are very satisfied with the performance of this outsourcing of accounting tasks	1	2	3	4	5	6	7

Thank you for your co-operation in completing this questionnaire.

Appendix 2: Correlation with Management Accounting Outsourcing

Dependent Variable	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
1-Accounting Outsourcing	1																	
Independent Variables																		
2-Frequency (for Routine)	-,467**	1																
3-Frequency (Non Routine)	-,115*	,376**	1															
4-Assets Specificity	-,131*	-,305**	-,183**	1														
5-Environment Uncertainty	-,105	,036	,035	-,055	1													
6-Behavioral Uncertainty	-,149**	-,184**	-,149**	,542**	,005	1												
7-Opportunism	-,713**	,585**	,274**	,028	,026	,085	1											
8-Trust in Accountant	,567**	-,357**	-,268**	,236**	-,073	,183**	-,492**	1										
9-Commitment	-,119*	-,096	,304**	,022	,045	-,248**	,032	-,082	1									
10-Cooperative Behavior	,344**	-,194**	-,102	-,433**	,059	,038	-,433**	,176**	-,111	1								
11- Accounting Comptence	,200**	,020	,273**	,097	,020	-,016	-,209**	,077	,197**	-,069	1							
12- Competition	,268**	-,008	-,156**	-,224**	-,006	-,219**	-,264**	,106	-,072	,397**	,045	1						
13- Outsourcing Strategy	-,238**	-,028	,119*	,060	,072	-,283**	,418**	,146*	,132*	-,105	-,067	,178**	1					
14-Gender	,034	-,094	-,079	,081	,054	,061	-,027	,093	,029	,053	-,084	,032	,002	1				
15-Education	-,033	,069	-,070	-,078	,016	-,015	,028	-,050	-,027	,094	-,049	-,033	-,046	,035	1			
16-Experience	,126*	,014	,037	-,134*	-,078	-,067	-,073	,017	-,036	,105	,003	,022	-,027	-,005	,102	1		
17-Firm Size	,125*	,124*	,040	-,021	,002	-,021	,108	-,075	,019	,049	,019	,044	,069	-,136*	-,096	,001	1	
18-Firm Age	-,020	-,009	-,039	,053	,085	,129*	,107	,009	-,003	-,009	-,016	-,047	-,036	,098	-,036	-,006	-,026	1

Appendix 3: Correlation with Firm Performance

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
Dependent Variable																		
1-Firm Overall Performance	1																	
Independent Variables																		
2-Frequency (for Routine)	-,544**	1																
3-Frequency (Non Routine)	-,169**	,376**	1															
4-Assets Specificity	-,012	-,305**	-,183**	1														
5-Environment Uncertainty	-,047	,036	,035	-,055	1													
6-Behavioral Uncertainty	,080	-,184**	-,149**	,542**	,005	1												
7-Opportunism	-,598**	,585**	,274**	,028	,026	,085	1											
8-Trust in Accountant	,363**	-,357**	-,268**	,236**	-,073	,183**	-,492**	1										
9-Commitment	-,285**	-,096	,304**	,022	,045	-,248**	,032	-,082	1									
10-Cooperative Behavior	,380**	-,194**	-,102	-,433**	,059	-,038	-,433**	,176**	-,111	1								
11- Accounting Comptence	,057	,020	,273**	,097	,020	-,016	-,209**	,077	,197**	-,069	1							
12- Competition	,221**	-,008	-,156**	-,224**	-,006	-,219**	-,264**	,106	-,072	,397**	,045	1						
13- Outsourcing Strategy	,028	-,238**	-,028	,119*	,060	,072	-,283**	,418**	,146*	,132*	-,105	-,067	1					
14-Gender	,103	-,094	-,079	,081	,054	,061	-,027	,093	,029	,053	-,084	,032	,002	1				
15-Education	-,013	,069	-,070	-,078	,016	-,015	,028	-,050	-,027	,094	-,049	-,033	-,046	,035	1			
16-Experience	,119*	-,014	,037	-,134*	-,078	-,067	-,073	,017	-,036	,105	,003	,022	-,027	-,005	,102	1		
17-Firm Size	-,129*	,124*	,040	-,021	,002	-,021	,108	-,075	,019	,049	,019	,044	,069	-,136*	-,096	,001	1	
18-Firm Age	,014	-,009	-,039	,053	,085	,129*	,107	,009	-,003	-,009	-,016	-,047	-,036	,098	-,036	-,006	-,026	1

Appendix 4: Model One (Control Effect on Outsourcing)

Model Summary^b

Model 1	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics					Durbin-Watson
					R Square Change	F Change	df1	df2	Sig. F Change	
	,193 ^a	,037	,021	1,04084	,037	2,282	5	294	,047	1,918

a. Predictors: (Constant), Age, Experience, Size, Education, Gender

b. Dependent Variable: Management Accounting Outsourcing

ANOVA^b

Model 1	Sum of Squares	df	Mean Square	F	Sig.
Regression	12,362	5	2,472	2,282	,047 ^a
Residual	318,504	294	1,083		
Total	330,866	299			

a. Predictors: (Constant), Age, Experience, Size, Education, Gender

b. Dependent Variable: Management Accounting Outsourcing

Coefficients^a

Model 1	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95,0% Confidence Interval for B		Collinearity Statistics	
	B	Std. Error	Beta			Lower Bound	Upper Bound	Tolerance	VIF
	(Constant)	3,724	,324				11,497	,000	3,087
Gerder	,075	,149	,029	,502	,616	-,218	,367	,972	1,028
Education	-,140	,131	-,062	-1,070	,286	-,397	,117	,978	1,023
Experience	,123	,053	,133	2,319	,021	,019	,227	,989	1,011
Size	-,066	,029	-,130	-2,241	,026	-,123	-,008	,974	1,027
Age	-,020	,038	-,031	-,542	,588	-,095	,054	,988	1,012

a. Dependent Variable: Management Accounting Outsourcing

Appendix 5: Model two (Direct Effect on Outsourcing)

Model Summary^b

Model 2	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics					Durbin-Watson
					R Square Change	F Change	df1	df2	Sig. F Change	
	,836 ^a	,699	,686	,58616	,699	55,126	12	285	,000	1,606

a. Predictors: (Constant), Outsourcing Strategy, Frequency of Non-Routine Tasks, Environmental Uncertainty, Behavioral Uncertainty, Cooperative Behavior, Accounting Competence, Commitment, Competition, Frequency of Routine Tasks, Trust in Accountant, Asset Specificity, Opportunism

b. Dependent Variable: Management Accounting Outsourcing

ANOVA^b

Model 2	Sum of Squares	df	Mean Square	F	Sig.
Regression	227,283	12	18,940	55,126	,000 ^a
Residual	97,921	285	,344		
Total	325,205	297			

a. Predictors: (Constant), Outsourcing Strategy, Frequency of Non-Routine Tasks, Environmental Uncertainty, Behavioral Uncertainty, Cooperative Behavior, Accounting Competence, Commitment, Competition, Frequency of Routine Tasks, Trust in Accountant, Asset Specificity, Opportunism

b. Dependent Variable: Management Accounting Outsourcing

Coefficients^a

Model 2	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95,0% Confidence Interval for B		Collinearity Statistics	
	B	Std. Error	Beta			Lower Bound	Upper Bound	Tolerance	VIF
(Constant)	7,559	,727		10,395	,000	6,128	8,990		
Frequency of Routine Tasks	-,392	,060	-,317	-6,504	,000	-,510	-,273	,444	2,254
Frequency of Non-Routine Tasks	,205	,042	,198	4,833	,000	,121	,288	,628	1,592
Asset Specificity	-,201	,052	-,196	-3,847	,000	-,304	-,098	,408	2,449
Enviormental Uncertainty	-,039	,025	-,052	-1,567	,118	-,088	,010	,974	1,026
Behavioral Uncertainty	-,156	,050	-,139	-3,083	,002	-,255	-,056	,523	1,914
Opportunism	-,391	,059	-,363	-6,655	,000	-,507	-,275	,355	2,820
Trust in Accountant	,434	,045	,411	9,690	,000	,346	,522	,586	1,705
Commitment	-,225	,046	-,189	-4,885	,000	-,315	-,134	,705	1,418
Cooperative Behavior	-,057	,059	-,045	-,969	,333	-,172	,059	,480	2,084
Accounting Competence	,115	,052	,086	2,214	,028	,013	,217	,698	1,434
Competition	,093	,047	,075	1,972	,050	,000	,186	,725	1,379
Outsourcing Strategy	-,096	,049	-,076	-1,961	,051	-,192	,000	,704	1,421

a. Dependent Variable: Management Accounting Outsourcing

Appendix: 6 Model three (Direct Effect on Outsourcing with Control Variables)

Model Summary^b

Model 3	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics					Durbin-Watson
					R Square Change	F Change	df1	df2	Sig. F Change	
	,840 ^a	,705	,687	,58629	,705	39,105	17	278	,000	1,635

a. Predictors: (Constant), Outsourcing Strategy, Gender, Experience, Competition, Education, Environmental Uncertainty, Age, Accounting Competence, Size, Behavioral Uncertainty, Frequency of Routine Tasks, Commitment, Cooperative Behavior, Trust in Accountant, Frequency of Non-Routine Tasks, Asset Specificity, Opportunism

b. Dependent Variable: Management Accounting Outsourcing

ANOVA^b

Model 3	Sum of Squares	df	Mean Square	F	Sig.
Regression	228,511	17	13,442	39,105	,000 ^a
Residual	95,560	278	,344		
Total	324,070	295			

a. Predictors: (Constant), Outsourcing Strategy, Gender, Experience, Competition, Education, Environmental Uncertainty, Age, Accounting Competence, Size, Behavioral Uncertainty, Frequency of Routine Tasks, Commitment, Cooperative Behavior, Trust in Accountant, Frequency of Non-Routine Tasks, Asset Specificity, Opportunism

b. Dependent Variable: Management Accounting Outsourcing

Coefficients^a

Model 3	Unstandardized Coefficients		Standardized	t	Sig.	95,0% Confidence Interval for B		Collinearity Statistics	
	B	Std. Error	Beta			Lower Bound	Upper Bound	Tolerance	VIF
	(Constant)	7,161	,752				9,527	,000	5,681
Gender	,039	,086	,015	,447	,655	-,131	,208	,932	1,073
Education	,053	,076	,023	,695	,487	-,096	,201	,937	1,067
Experience	,041	,031	,045	1,340	,181	-,019	,102	,948	1,055
Size	-,015	,017	-,030	-,876	,382	-,049	,019	,912	1,097
Age	,032	,022	,049	1,473	,142	-,011	,075	,942	1,062
Frequency of Routine Tasks	-,388	,062	-,314	-6,300	,000	-,509	-,267	,427	2,344
Frequency of Non-Routine	,207	,043	,200	4,822	,000	,123	,292	,615	1,627
Asset Specificity	-,190	,053	-,185	-3,596	,000	-,294	-,086	,400	2,499
Environmental Uncertainty	-,042	,025	-,055	-1,649	,100	-,091	,008	,956	1,046
Behavioral Uncertainty	-,167	,051	-,148	-3,280	,001	-,267	-,067	,523	1,913
Opportunism	-,386	,061	-,357	-6,285	,000	-,507	-,265	,328	3,050
Trust in Accountant	,426	,046	,403	9,360	,000	,337	,516	,572	1,749
Commitment	-,222	,046	-,185	-4,775	,000	-,313	-,130	,708	1,412
Cooperative Behavior	-,060	,060	-,048	-,996	,320	-,178	,058	,464	2,157
Accounting Competence	,119	,052	,089	2,273	,024	,016	,222	,694	1,442
Competition	,107	,049	,085	2,202	,028	,011	,203	,709	1,410
Outsourcing Strategy	-,082	,050	-,065	-1,650	,100	-,180	,016	,687	1,455

a. Dependent Variable: Management Accounting Outsourcing

Appendix: 7 Model Four (Outsourcing Direct Effect on Firm Performance)

Model Summary^b

Model 4	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics					Durbin-Watson
					R Square Change	F Change	df1	df2	Sig. F Change	
	,665 ^a	,442	,440	,71653	,442	237,623	1	300	,000	1,694

a. Predictors: (Constant), Management Accounting Outsourcing; b. Dependent Variable: Overall Performance

ANOVA^b

Model 4	Sum of Squares	df	Mean Square	F	Sig.
Regression	121,998	1	121,998	237,623	,000 ^a
Residual	154,023	300	,513		
Total	276,021	301			

a. Predictors: (Constant), Management Accounting Outsourcing; b. Dependent Variable: Performance

Coefficients^a

Model 4	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95,0% Confidence Interval for B		Collinearity Statistics	
	B	Std. Error	Beta			Lower Bound	Upper Bound	Tolerance	VIF
	(Constant)	2,647	,144				18,318	,000	2,362
Management Accounting Outsourcing	,606	,039	,665	15,415	,000	,529	,684	1,000	1,000

a. Dependent Variable: Overall Performance

Appendix: 8 Model Five (Direct Effect on Firm Performance)

Model Summary^b

Model 5	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics					Durbin-Watson
					R Square Change	F Change	df1	df2	Sig. F Change	
	,773 ^a	,598	,581	,62228	,598	35,298	12	285	,000	1,870

a. Predictors: (Constant), Outsourcing Strategy, Frequency of Non-Routine Tasks, Environmental Uncertainty, Behavioral Uncertainty, Cooperative Behavior, Accounting Competence, Commitment, Competition, Frequency of Routine Tasks, Trust in Accountant, Asset Specificity, Opportunism

b. Dependent Variable: Overall Performance

ANOVA^b

Model 5	Sum of Squares	df	Mean Square	F	Sig.
Regression	164,020	12	13,668	35,298	,000 ^a
Residual	110,361	285	,387		
Total	274,381	297			

a. Predictors: (Constant), Outsourcing Strategy, Frequency of Non-Routine Tasks, Environmental Uncertainty, Behavioral Uncertainty, Cooperative Behavior, Accounting Competence, Commitment, Competition, Frequency of Routine Tasks, Trust in Accountant, Asset Specificity, Opportunism

b. Dependent Variable: Overall Performance

Coefficients^a

Model 5	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	95,0% Confidence Interval for B		Collinearity Statistics	
	B	Std. Error	Beta			Lower Bound	Upper Bound	Tolerance	VIF
	(Constant)	9,653	,772				12,504	,000	8,133
Frequency of Routine Tasks	-,560	,064	-,494	-8,755	,000	-,685	-,434	,444	2,254
Frequency of Non-Routine Tasks	,249	,045	,262	5,539	,000	,161	,338	,628	1,592
Asset Specificity	-,049	,055	-,052	-,880	,380	-,158	,060	,408	2,449
Enviornmental Uncertainty	-,001	,026	-,001	-,030	,976	-,053	,051	,974	1,026
Behavioral Uncertainty	,011	,054	,010	,197	,844	-,095	,116	,523	1,914
Opportunism	-,284	,062	-,287	-4,546	,000	-,406	-,161	,355	2,820
Trust in Accountant	,152	,048	,157	3,197	,002	,058	,246	,586	1,705
Commitment	-,366	,049	-,336	-7,500	,000	-,462	-,270	,705	1,418
Cooperative Behavior	,099	,062	,086	1,591	,113	-,024	,222	,480	2,084
Accounting Competence	-,027	,055	-,022	-,496	,620	-,135	,081	,698	1,434
Competition	,107	,050	,095	2,142	,033	,009	,206	,725	1,379
Outsourcing Strategy	-,207	,052	-,179	-3,995	,000	-,310	-,105	,704	1,421

a. Dependent Variable: Overall Performance

Appendix: 9 Model Six (Mediation Effects)

Model Summary^b

Model 6	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics					Durbin-Watson
					R Square Change	F Change	df1	df2	Sig. F Change	
	,799 ^a	,638	,622	,59128	,638	38,524	13	284	,000	1,812

a. Predictors: (Constant), Management Accounting Outsourcing, Environmental Uncertainty, Commitment, Asset Specificity, Outsourcing Strategy, Competition, Accounting Competence, Frequency of Non-Routine Tasks, Cooperative Behavior, Behavioral Uncertainty, Trust in Accountant, Frequency of Routine Tasks, Opportunism

b. Dependent Variable: Overall Performance

ANOVA^b

Model 6	Sum of Squares	df	Mean Square	F	Sig.
Regression	175,090	13	13,468	38,524	,000 ^a
Residual	99,290	284	,350		
Total	274,381	297			

a. Predictors: (Constant), Management Accounting Outsourcing, Environmental Uncertainty, Commitment, Asset Specificity, Outsourcing Strategy, Competition, Accounting Competence, Frequency of Non-Routine Tasks, Cooperative Behavior, Behavioral Uncertainty, Trust in Accountant, Frequency of Routine Tasks, Opportunism

b. Dependent Variable: Overall Performance

Coefficients^a

Model 6	Unstandardized Coefficients		Standardized	t	Sig.	95,0% Confidence Interval for B		Collinearity Statistics	
	B	Std. Error	Beta			Lower Bound	Upper Bound	Tolerance	VIF
	(Constant)	7,111	,861				8,255	,000	5,415
Frequency of Routine Tasks	-,428	,065	-,378	-6,575	,000	-,556	-,300	,386	2,588
Frequency of Non-Routine Tasks	,180	,044	,190	4,055	,000	,093	,268	,581	1,722
Asset Specificity	,019	,054	,020	,347	,729	-,088	,125	,388	2,577
Enviormental Uncertainty	,012	,025	,018	,489	,625	-,037	,062	,966	1,035
Behavioral Uncertainty	,063	,052	,061	1,214	,226	-,039	,165	,506	1,977
Opportunism	-,152	,064	-,154	-2,388	,018	-,277	-,027	,307	3,259
Trust in Accountant	,006	,052	,006	,117	,907	-,096	,109	,441	2,267
Commitment	-,291	,048	-,266	-6,018	,000	-,386	-,196	,651	1,537
Cooperative Behavior	,118	,059	,103	1,994	,047	,002	,235	,478	2,091
Accounting Competence	-,066	,053	-,054	-1,250	,212	-,169	,038	,686	1,458
Competition	,076	,048	,067	1,587	,114	-,018	,170	,715	1,398
Outsourcing Strategy	-,175	,050	-,151	-3,527	,000	-,273	-,077	,694	1,440
Management Accounting Outsourcing	,336	,060	,366	5,627	,000	,219	,454	,301	3,321

a. Dependent Variable: Overall Performance