# THE EFFECT OF BUSINESS PROCESS OUTSOURCING ON THE FINANCIAL PERFORMANCE OF COMMERCIAL BANKS IN KENYA

MUGA MERCY AWINO

D61/61722/2010



A Research Project Submitted in Partial Fulfillment of the Requirements for the Award of a Degree in Master of Business Administration at the University of Nairobi

**AUGUST 2012** 

#### DECLARATION

I declare that this research project is my original work and has never been submitted to

any other University for assessment or award of a	degree.
Signature	Date
Mercy Awino Muga	
This project has been submitted with my authority	as the University supervisor.
Signature Signature	Date Mulic
Dr. Josiah Aduda	
Senior Lecturer,	

University of Nairobi, School of Business.

#### **DEDICATION**

I dedicate this paper to my family and more importantly to my mother, a constant in my life-Mrs.Julia Adhiambo Muga for her encouragement, support and prayers while undertaking this study. This one is for you.

#### **ACKNOWLEDGEMENT**

I would like to express my sincere gratitude to everyone who has supported me in one way or another through their prayers, moral, financial support and encouragement. Your support is highly appreciated.

To my family and friends-your encouragement has kept me going and for that am sincerely grateful. It is because of your support that I have managed to get this far. May God bless you abundantly.

I would like to thank my supervisor, Dr. Josiah Aduda, for his guidance, direction and advice accorded to me throughout the period of under taking this project. Your efforts, counsel and supervision are highly appreciated.

# TABLE OF CONTENTS

Declarationii
Dedicationiii
Acknowledgementiv
Table of contentsv
List of tablesvii
list of figuresviii
Abstractix
CHAPTER ONE: INTRODUCTION 1
1.1Background
1.1.1Business Process Outsourcing Concept
1.1.2Financial Measures of Performance
1.1.3 Commercial Banks in Kenya
1.2 Statement of the Problem
1.3 Objective of the Study5
1.4 Value of the Study5
CHAPTER TWO: LITERATURE REVIEW6
2.1 Introduction
2.2 Overview of Business Process Outsourcing6
2.3Theories of Business Process Outsourcing
2.3.1Transaction Cost Theory
2.3.2Research Based Theory
2.3.3Resource Dependency Theory
2.3.4 Agency Theory9
2.3.5Theory of Core Competences
2.3.6 Economy of Information Theory
2.4 Review of Empirical Studies
2.5 Chapter Summary
CHAPTER THREE: RESEARCH METHODOLOGY14
3.1 Introduction
3.2 Research Design

3.3 Population	14
3.4 Sample Size	14
3.5 Data collection Methods	14
3.6 Data Analysis	14
CHAPTER FOUR: DATA ANALYSIS AND INTERPRETATION	16
4.1 Introduction.	16
4.2 Descriptive Analysis	16
4.3 D-I-D Regression model	17
4.4 Accounting Based Performance measures	18
4.4.1Return on Assets (ROA)	18
4.4.2 Return on Equity	19
4.4.3Return on Capital Employed	20
4.5Summary and Interpretation of the findings	22
CHAPTED FIVE CUMMARY CONCLUCIONS AND DECOMMENDATION	ONE 24
CHAPTER FIVE: SUMMARY, CONCLUSIONS AND RECOMMENDATION	
5.1 Summary	24
5.2 Conclusion	24
5.3 Policy Recommendations	25
5.4 Limitations of the Study	26
5.5 Suggestions for other studies	27
REFERENCES	28
APPENDIX	i

# LIST OF TABLES

Table 4.1 Percentage distribution of Banks by the year they started outsourcing	16
Table 4.2. Difference-in-Difference regression model results	18
Table 4.3. Mean ROA, ROCE, ROE and TA by year.	21

# LIST OF FIGURES

Figure 4.1 Percent distribution of banks by year they started outsourcing	. 17
Figure 4.2 (a). Evolution of ROA over time	. 19
Figure 4.2(b). Evolution of ROE over time.	. 20
Figure 2(c) Evolution of (c) ROCE over time	. 2

#### **ABSTRACT**

Outsourcing is a widely used business practice for organizations that are in an effort to improve firm performance and add value to their firms. Empirical studies show that outsourcing has very limited positive impact on firm performance. However, there is to date no research that has exclusively focused on the impact that outsourcing of business processes has had on firm performance ,especially in the banking industry, which is one of the most technology-intensive industries. This paper attempts to fill this gap by comparing the firm performance of 43Kenyan banks that have outsourced some of their functions.

The comparison is made based on before and after results of performance of the banks, using accounting performance measures. The research results show that there is a difference in the performance measures between the period the banks began outsourcing their business processes compared to the prior period.

The research results suggest that the inherent costs and risks brought by business process outsourcing do not exceed the positive effects such that business process outsourcing might enhance banks' performance. However, as a suggestion to future research, a more sophisticated performance measurement system that includes soft measures other than only solid accounting ratios may be an optional method to measure the firm performance.

# CHAPTER ONE INTRODUCTION

#### 1.1Background

In recent years, advances in information technology has revolutionized the way companies conduct business. Outsourcing of business processes is one of the key outcomes that has come about as a result of advances in technology. Due to its IT-intensive business processes, the potential for outsourcing appears to be particularly high in the banking industry. This is further enhanced by the fact that most of the data in the banking sector are in digital from coupled with increased use of internet, Gewald and Dibbern (2005). When a firm has already integrated its operational functions, the decision to outsource such functions to the market should be made if it is necessary to create or protect firm value.

It is expected that, by outsourcing some or all of their IT and business operations to third-party providers, banking institutions can achieve greater transparency and efficiency of their infrastructure and business processes. IT outsourcing gives banks the opportunities to access to world class skills, realize fast project start-up and borrow best examples in the banking industry. All of these translate into lower costs and higher quality services, which increase the competitiveness of banks and impacts on the financial performance.

### 1.1.1Business Process Outsourcing Concept

Business Process Outsourcing is a process that involves the <u>contracting</u> of the operations and responsibilities of specific business functions or <u>processes</u> to a third-party service provider. Today IT outsourcing has become a very common way of allocating or reallocating business resources from an internal source to an external source Parkhe (2007). Information System (IS) refers to the flow of information in an organization and between organizations, encompassing the information, the business caters, uses and stores. Information System is the combination of Information Technology (hardware, software) and its applications, which also incorporates the human aspects Gulla, Gupta (2009).

In most occasions, IS and IT are used interchangeably. IT outsourcing is a business practice that a client transfers property, responsibility or decision rights to an IT products

or services vendor Wang et al. (2008), Barthélemy, Geyer (2005). On one hand, IT Outsourcing can be regarded as a make-or-buy decision in the context of IT management: should a certain IT functions be integrated into the firm or should they be acquired from the market? On the other hand, IT outsourcing is more than purchasing and consulting but a long-term relationship between contract-grantor and service provider. IT outsourcing activities include data center operations, help desk, software development, e-commerce, hosted applications (software as a service), network operations, disaster recovery services and so on.

The main purpose for banks to outsource IT is to focus on their core competencies (Gupta, Gupta 1992, Lacity, Hirschheim 1994, Grover, Myun & Teng 1994, Smith, Mitra & Narasimhan 1998). Job division enables different parties to focus on what they are expert in. Banks are good at banking and IT companies are good at information technology. Banking is the core business of banks while technology is the core business of IT companies. The outside vendors are able to provide more efficient and reliable services, which lead to the economies of scale as well as the economies of scope. By outsourcing part or all of the IT functions and services to the outside vendors, banks can make use of the outside professional services and concentrate more on their core business. A Datamonitor survey (2006) revealed that banks are increasingly turning to outsourcing as the means to achieve their major business and IT goals.

Cost reduction is another important motivation that banks choose to outsource their IT (Gupta, Gupta 1992, Lacity, Hirschheim 1994, Ang, Straub 1998). The need to reduce costs may arise from lower growth opportunities, higher debt, or falling profitability. In such cases, IT outsourcing is part of a larger cost-cutting effort for the entire company.

Other reasons for banks to outsource IT include improving corporate efficiency, increasing flexibility, providing better service and enhancing the transparency (Wang et al. 2008, Smith, Mitra & Narasimhan 1998, Kishore et al. 2003). However, besides the benefits brought by IT outsourcing, there are also some adverse effects associated with this practice. Some argue that instead of cutting cost, IT outsourcing actually brings extra costs such as vendor selection costs, legal contract costs and layoff costs Barthélemy, Geyer (2005). Some also point out the risks followed by IT outsourcing: loss of

management control, loss intelligent assets, loss of in-house IT capability, loss of innovative ability, loss of key IS employees and the risk of the default of outside venders (Smith, Mitra & Narasimhan 1998).

#### 1.1.2Financial Measures of Performance

There are many aspects of the performance of commercial banks that can be analyzed. Aburime (2009) observed that the importance of bank profitability can be appraised at the micro and macro levels of the economy. At the micro level, profit is the essential prerequisite of a competitive banking institution and the cheapest source of funds. It is not merely a result, but also a necessity for successful banking in a period of growing competition on financial markets. Hence the basic aim of every bank management is to maximize profit, as an essential requirement for conducting business.

At the macro level, a sound and profitable banking sector is better able to withstand negative shocks and contribute to the stability of the financial system. Bank profits provide an important source of equity especially if re-invested into the business. This should lead to safe banks, and as such high profits could promote financial stability (Flamini et al, 2009).

Measures of after-tax rates of return, such as the return on average total assets (ROA) and the return on total equity (ROE),Return on Investment(ROI),Net Interest Margin(NIM) are widely used to assess the performance of firms, including commercial banks. Bank regulators and analysts have used ROA and ROE to assess industry performance and forecast trends in market structure—as inputs in statistical models to predict bank failures and mergers—and for a variety of other purposes where a measure of profitability is desired. The main purpose of this study is to examine if IT outsourcing can actually enhance banks performance using accounting-based measures such as return on assets (ROA), return on equity (ROE), return on capital employed (ROCE).

#### 1.1.3 Commercial Banks in Kenya

A commercial Bank is an institution which accepts deposits, makes business loans and offers related services. They also allow for a variety of deposits accounts, such as checking, savings and time deposit. These institutions are run to make profits.

Commercial banks are licensed and regulated by the central banks of their jurisdiction(countries) in which they operate. In Kenya, the Central Bank of Kenya(CBK) licenses, supervises and regulates commercial banks as mandated under the Banking Act. Currently, there are a total of 43 licensed commercial Banks that are operational in Kenya as evidenced from the Central Bank website.

#### 1.2 Statement of the Problem

The main aim of any business is to make profit, and no firm can be in profitability if its operation cost is higher than its income. One way of reducing cost is by out sourcing of non -core activities or core activities which provide less benefits for resources engaged than alternative uses. Jiang and Qureshi (2006) demonstrate that, during the last decade, most academic studies have focused on understanding outsourcing decision determinants and outsourcing process control.

Numerous reasons why outsourcing is initiated have been identified by researchers. Organizations may expect to achieve many different benefits through successful outsourcing. Although there are significant risks that may be realized if outsourcing is not successful. There is an abundance of outsourcing literature where many benefits, risks, motivators, and decision factors have been presented although the relationships, commonalities and disparity among the contents of these studies have not been investigated.

In Kenya, studies that relate to outsourcing are few and include: Survey on frequently outsourced function .Gatere (2008)survey of outsourcing selected financial activities by publicly quoted companies, Kinyua (2000)Outsourcing of logistics practices of medium and large Kenyan manufacturing firms. Wanjohi(2010)also studied the benefits and risks involved in outsourcing security services at Kenya Tea Development Authority.

While outsourcing is now broadly understood to be an attractive option, its specific impact on firms' performance, i.e. outsourcing result, has not yet been well confirmed by research. The main purpose of this study is to find an answer to the question, Can business process outsourcing have an impact on the financial performance of commercial banks and to what extent?

#### 1.3 Objective of the Study

The objective of this study is to establish the relationship between business process outsourcing and the financial performance of commercial banks.

#### 1.4 Value of the Study

The findings have regulatory policy implications, and in particular the urgent need for formulating a guidelines to regulate the apparent proliferation of outsourcing practices in the Kenyan banking sector, given its prominence. The central bank can come up with measures to ensures best practices are employed by Kenyan commercial banks when outsourcing some of their function.

The management of the banks can use this information to evaluate the effectiveness or otherwise of outsourcing their non core functions, with special emphasis on IT. It will guide in future decision making process on whether or not it's a viable option to outsource.

The study will also be useful to the outsourcing firms as the can improve their services by observing best practices that are consistent with laid down rules and regulations of Central Bank concerning outsourcing services. Competition among the firms can also improve on the quality of services offered.

The Investors of the banks can also use the information to determine if their funds/investment are being into worthwhile investment that will enable them maximize returns. They can closely monitor the performance of the firm.

# CHAPTER TWO LITERATURE REVIEW

#### 2.1 Introduction

# 2.20verview of Business Process Outsourcing

Scholars that study the determinants or drives behind IT outsourcing suggest that IT outsourcing decisions are generally motivated by expected benefits brought by IT outsourcing. A survey conducted by Cappemini Ernst & Young in 2004 listed cost cutting, strategic reasons, risk reduction and better quality as the top drivers for IT outsourcing. Several studies have been carried out about outsourcing but what is of interest in this study is the effect it will have on firm performance and specifically, commercial banks. This chapter will examine the theories that talk about outsourcing of business processes. The researcher will also look at the empirical studies carried out in this area and their outcomes.

#### 2.3Theories of Business Process Outsourcing

#### 2.3.1Transaction Cost Theory

TCT has been developed to facilitate an analysis of the "comparative costs of planning, adapt-ting, and monitoring task completion under alternative governance structures" Williamson(1985). The unit of analysis in TCT is a transaction, which "occurs when a good or service is transferred across a technologically separate interface" Williamson(1985). Transactions costs arise for ex ante reasons (drafting, negotiating, and safeguarding agreements between the parties to a transaction) and ex post reasons (maladaption, haggling, establishment, operational, and bonding costs). Decision-makers must weigh up the production and transaction costs assoc iated with executing a transaction within their firms (in sourcing) versus the production and transaction costs associated with executing the transaction in the market (outsourcing). If they choose to use the market, they must then determine the appropriate type of contract to use.

Williamson (1985) argues that two human and three environmental factors lead to transactions costs arising. The two human factors are: Bounded rationality which says that humans are unlikely to have the abilities or resources to consider every state-contingent outcome associated with a transaction that might arise and Opportunism-Humans will act

to further their own self-interests. The three environmental factor are: Uncertainty which exacerbates the problems that arise because of bounded rationality and opportunism. Small numbers trading which dictates that if only a small number of players exist in a market-place, a party to a transaction may have difficulty disciplining the other parties to the transaction via the possibility of withdrawal and use of alternative players in the marketplace. Lastly, Asset specificity which states that the value of an asset may be attached to a particular transaction that it supports. The party who has invested in the asset will incur a loss if the party who has not invested withdraws from the transaction. The possibility (threat) of this party acting opportunistically leads to the so-called "hold-up" problem.

Williamson argues that three dimensions of a transaction affect the type of governance structure chosen for the transaction: asset specificity, uncertainty, and frequency. As asset specificity and uncertainty increase, the risk of opportunism increases.

Thus, decision-makers are more likely to choose a hierarchical (firm-based) governance structure. As frequency increases, the comparative advantage of using market governance structures decreases because the costs of hierarchical governance structures can be amortized across more instances of the transaction.

# 2.3.2Research Based Theory

Lacity and Willcocks' use of the specialization dimension rather than specificity dimension of assets when analyzing their cases, however, may be fortuitous. The level of specialization of an asset may be a reasonable proxy for whether the asset constitutes a strategic resource to an organization. Strategic resources are the focus of a major theory that competes with TCT to account for the sourcing decisions made by organizations—namely, the resource-based view (RBV) of the firm.

While TCT focuses on the costs associated with conducting exchanges between two separable entities, the RBV concentrates on those factors that enable firms to gain a competitive advantage. Its proponents (e.g., Barney, 1991; Mata, Fuerst, and Barney, 1995) observe that some companies appear to earn sustained, abnormal returns. They argue this outcome arises because they have access to key resources they have access

to key resources (Barney 1991). These strategic resources share four characteristics. They are valuable, rare, imperfectly imitable, and have no easy substitute.

These four characteristics in combination enable a firm to protect a competitive advantage. Unless the resource is valuable, competitive advantage will not arise. By definition, valuable resources generate high returns. If the resource is not rare, many competitors can obtain it. Thus, the advantages obtained through using the resource cannot be sustained.

Strategic resources are also difficult to imitate. Factors like causal ambiguity, social complexity, and history can prevent a competitor from fully understanding how a set of resources leads to competitive advantage, thereby impeding replication of the resources. For example, Wal-Mart has earned above-average returns for more than ten years (Wal-Mart, 2000). Nonetheless, the products sold by Wal-Mart are not unique, the technology it is using is widely available, the layout of its stores is observable, and its strategy has even been published (Stalk, Evans, and Shulman, 1992). With all this information, competitors are still struggling to find the right mix of resources and actions. Finally strategic resources must be difficult to substitute. If substitution is possible, a competitive advantage cannot be sustained (Barney, 1991).

The value of different resources affects the boundary decisions of a firm (Barney, 1999). Firms will try to retain in-house activities that take advantage of their strategic resources. Outsourcing these resources would deprive organizations of their competitive advantage and subsequent abnormal returns Duncan (1998). Where resources are not strategic, however, they will look to outsource them.

# 2.3.3Resource Dependency Theory

The theory posits that all organizations are interactive with external environment because any organization is dependent on the resources from the environment, such as labor, capital, information, or market (Aldrich, 1976). Using resource dependence theory, Cheon et al. (1995) argued that the dimensions of task environments determine an organization's dimensions of resources, which, in turn, determine an organization's IT outsourcing decisions. Therefore, IT outsourcing is the outcome of the dependence of an organization on the critical resources that can be acquired from external environment.

The main perspective of Resource-Dependence Theory is that the exchange with the outside can gain resources needed for life. Therefore, the interdependence and power relationship exist between two organizations; that is to say, organizations must depend on resources to ensure their survival. In order to gain resources, organizations must interact with external resource controllers, hence the need for dependence on their environment.

According to the perspective of Resource-Dependence Theory, when organizations face the exchange of resources and externally environmental uncertainty, they will tend to connect with important production factors in external environment, which results in the occurrence of cooperation relationship Pfeffer andGerald (1978). Meaning to say, after the establishment of the cooperation relationship, one organization can appropriate others' resources for its own use. Therefore, the cooperation relationship has the function of mutual supplement with each other's resources. Meanwhile, the interdependence will occur between two organizations.

# 2.3.4 Agency Theory

The theory argues that, in a principal-agent relationship, the agent cannot perfectly implement the goals set up by the principal, Jensen and Mechling (1976). Based on Eisenhardt's (1988) dichotomy of behavior- versus outcome-oriented principal-agent relationship, Cheon et al. (1995) posited that the adoption of insourcing (behavior-oriented contract) versus outsourcing (outcome-oriented contract) can be determined by the magnitude of agency costs, which are the sum of monitoring costs by the principal, the bonding costs by the agent, and the residual loss of the principal.

#### 2.3.5Theory of Core Competences

The concept of core competences has been developed on the basis of the resource-based theory. Prahalad and Hamel (1990) defined the core competencies as the collective learning in the organisation, especially how to coordinate diverse production skills and integrate multiple streams technologies. The application of concept of core competences in outsourcing became very popular among researchers. The concept has been predominantly use to develop and test various outsourcing decision frameworks arguing that the core activities shall remain in house. Learning and communication premises of

the concept made it also applicable in the Managing relationship and Reconsideration phases. Vendor's competences are assumed to be one of the most important factors that influence success of an outsourcing arrangement (Levina and Ross, 2003; Feeney et al., 2005).

# 2.3.6 Economy of Information Theory

It has been admitted that the information is not perfect and new economical models emerged to explain situations where two parties possess unequal or none quantity of information. One of the first works in the area was development of the search theory Stigler (1961). The identification of sellers and the discovery of their prices are only one sample of the vast role of the search for information in economic. Another key concept of the economy of information is the concept of signaling developed by Spence (1973). His essay is about markets in which signaling takes place and in which the primary signalers are relatively numerous and in the market sufficiently infrequently that they are not expected to invest in acquiring signaling reputation. Application of the economy of information in outsourcing is associated to activities of searching, selecting, and contracting the vendor. However, the economics of information hasn't been used explicitly in the studies of the outsourcing process.

#### 2.4 Review of Empirical Studies

Jiang and Qureshi (2006) study the outsourcing research from 1990 to 2003. As discussed in their article, in the last decade, most academic studies have focused on understanding outsourcing decision determinants and outsourcing process control while the results of outsourcing have not yet been well confirmed by existing research (Jiang, Qureshi 2006). They also generalize that, when researchers measure the financial results of outsourcing, they rely only on managers' estimates other than tangible metrics such as public available accounting data.

Generally speaking, two assessing methodologies have been applied to measure the outcomes of outsourcing. One focuses on the assessment of how well the perceived objectives are satisfied after outsourcing. Survey, case study and interviews are the main methods used to gather data (Lacity, Hirschheim (1994), Weeks, Feeny (2008). The

other methodology conducts performance based analysis using public available financial data such as stock price (Hayes, Hunton & Reck 2000, Oh, Gallivan & Kim 2006) and financial accounting data (Wang et al. 2008, Jiang, Qureshi 2006).

However, most available studies concerning the results of outsourcing rely upon perceived metrics rather than direct measures, which are likely to be influenced by subjective perceptions (Jiang, Qureshi 2006). The interviewees usually only think about their own fields or departments instead of taking the whole picture of the firm into consideration. Studies that based on objective financial data are very limited. The study of Jiang and Qureshi (2006) reveal that only four out of 168 articles used the hard evidence –public available data rather than self-reported data to analyze the results of outsourcing.

To address the research gap, Jiang et al. (2006) later conduct an empirical study to provide a more objective evaluation of outsourcing impact using public available accounting data. They study 51 publicly traded firms that outsourced parts of their operations between 1990 and 2002 and find out that firms with outsourcing announcement have significantly higher SG&A/Sales ratio (selling, general and administrative expenses/ total sales), exp/sales ratio (operating expense/ total sales) and PPE (property, plant and equipment) turnover (sales/fixed asset). However, no significant difference was found in assets turnover (sales/assets), ROA and net profit margin.

They conclude that outsourcing can improve a firm's cost-efficiency but not its productivity and profitability. This research is regarded as the first one that empirically tests the relation between the outsourcing decision and the firm's financial performance Jiang, Frazier & Prater (2006). Gonzalez et al (2006) conduct a literature review focused on IT outsourcing articles published in journals that enjoy high prestige in the IS area between 1988 and 2005. Their research find that the studies of outsourcing determinants and reasons why firms choose to outsource are the most frequently studied topics in the IS field Gonzalez, Gasco & Llopis (2006). Surprisingly, the studies concerning the outcomes of IT outsourcing are not very well developed.



There was some focus on the economic determinants of IS outsourcing of the banking industry in US. Data was collected from surveys with senior IT managers in 243 US banks. The outcome of the study was that IS outsourcing in banks is strongly influenced by production and cost advantage offered by vendors. Transaction costs play a role in the outsourcing decision but they are much smaller than production costs .financial slack is not found to be a significant explanatory., Starub (1998).

A conceptual framework to examine the impact of IT outsourcing on firm performance was examined. They study a sample of 120 companies with IT outsourcing announcement from 1993 to 2003. Their research suggest that IT outsourcing firms have significantly higher SGAS (selling, general and advertising expenses / net sales) and significant lower ROA compared with the non-outsourcing counterparts one year after IT outsourcing, but there is no significant difference in ROA, ROE, ROI and other measures in the rest of the years (Wang et al,2008)

Influences on the perceived risks on banking manager's intention to outsource business process was also studied. It covered 90% of the cumulated German Banking and financial industry. The outcome was that perceived risk has a significant impact on manager's attitude towards outsourcing.

The efficiency of accounting service was also carried out in 786 UK based firms both in the public and private sector organizations. The results was that outsourcing provision is likely to offer worthwhile savings to small firms allowing them to shed competitive weaknesses and operate at efficient or best practice levels. SME'S have the potential to transform a previously unmanageable activity into an efficient or best practice activity that can grow or contract with the business.

In a Survey carried out in forty commercial banks operating in Kenya on the area of the perceived benefits and risks of outsourcing and the determinants of banks' decision to outsource, It was concluded that Bank size measured as total asset is significantly associated with outsourcing decisions. Bank performance measured as Return on Assets and ratio of Non- Performing Loan (NPL) is not statistically associated with outsourcing

decisions. Similarly, banks wage bill and total operational expenses are not significant determinants of outsourcing decisions. Barako, Gatere (2008).

# 2.5 Chapter Summary

The existing empirical studies concerning IT outsourcing in the banking industry focus mainly on the determinants (drives) and the risks of IT outsourcing. The research methodologies are either case study or survey. None of these studies examines the IT outsourcing impact on firm level performance. In addition, the data used in the studies are mostly subjective data gathered from surveys or interviews. Most of them applied public available accounting data into their research. Most studies carried out did not focus on Africa as a continent and therefore some of the findings may not be applicable in Kenyan scenario given that the industries are influenced differently. Therefore, this study will focus on the IT outsourcing impact on firm performance in the banking industry in Kenya using audited and public available accounting data.

#### **CHAPTER THREE**

#### RESEARCH METHODOLOGY

#### 3.1 Introduction

This chapter discusses the research methodology that has been adopted in the study. This includes the research design, the population under study, sample size and design, data collection methods and analysis techniques.

#### 3.2 Research Design

The study carried out is descriptive in nature. It has adopted a causal research design in investigating the relationship between business process outsourcing and financial performance of commercial banks in Kenya.

#### 3.3 Population

The population comprises of the 43 licensed commercial banks that are operating in Kenya.

#### 3.4 Sample Size

The study adopted a census method, where data under consideration was for the years between 1999 to 2008.

#### 3.5 Data collection Methods

The study has used secondary data. The data was collected from the Banking survey of 2009. The banking survey is an annual publication that publishes annual financial statement of all banks in Kenya covering a period of 10 years.

# 3.6 Data Analysis

The study involved collection of quantitative data. The data was analysed using Statistical Package for social sciences (SPSS version 16.0). Descriptive statistics such as standard deviation , means and frequency were used to analyze data. Tables, figures and percentages were also used to present the data.

The study involves correlation analysis to establish the relationship between the variables. The study used the following regression model to establish the relationship between business process outsourcing and performance of commercial banks.

$$P_i = \beta_0 + \beta_1 prepost + \beta_2 TA + \varepsilon_i$$
 with  $\varepsilon_i \sim N(0, \sigma^2)$ 

Where: Pi represents performance measures of a bank. The performance measures are ROA,ROCE and ROE.

 $\beta_0$ ,  $\beta_1$  and  $\beta_2$  are the parameter estimates – with  $\beta_1$  measuring the average effect of outsourcing on performance,

TA is Total Assets of a bank in the respective years, si the error term.

"prepost" is a variable coded 1 if the time/year is the same as or after the start of outsourcing, and 0 otherwise.

# CHAPTER FOUR DATA ANALYSIS AND INTERPRETATION

#### 4.1 Introduction

This chapter gives the descriptive analysis of the findings using Accounting-based measures of performance.

### 4.2. Descriptive Analysis

The data was collected from 43 commercial banks licensed to operate in Kenya over a ten-year period starting from 1999 to 2008. Three banks did not outsource during the study period and hence were excluded from these analysis. This is because they were not fully operational as at the period under study. They are; Family bank, Gulf African Bank and First community Bank.

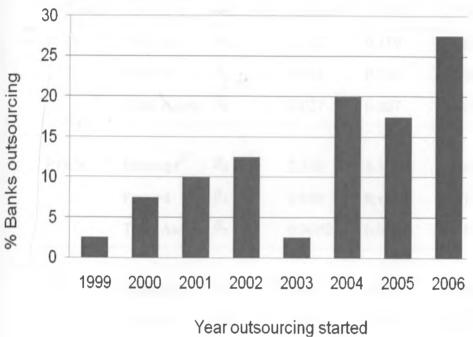
Table 4.1 Percentage distribution of Banks by the year they started outsourcing

Start	of	# banks	% banks
outsourc	eing		
1999		1	2.5
2000		3	7.5
2001		4	10.0
2002		5	12.5
2003		1	2.5
2004		8	20.0
2005		7	17.5
2006		11	27.5
Total		40	100

Source; www.thinkbig.com

Table 1 above, shows that in 1999 only 2.5% of the banks were outsourcing their business functions .As the years progressed on, a higher percentage was registered with 2006 having the highest number of banks in outsourcing i.e. 27.5%. This could be an indication that the banks are embracing outsourcing as the years progress due to perceived benefits.

Figure 4.1 Percent distribution of banks by year they started outsourcing.



rear outsourcing started

The Figure 1 above shows that most banks in the initial yeas from 1998 and 2000 were a bit reluctant to outsource but as the years progressed on,i.e between 2002 and 2006 more and more banks begun outsourcing some of their business processes with 2006 having the most number of banks doing so.

# 4.3 D-I-D Regression model

This is used to measure difference in performance between different periods. In this case, it was used to compare performance of the banks before and after outsourcing. The results are shown below.

Table 4.2. Difference-in-Difference regression model results.

Outcome	Covariate	Parameter	Estimate	Se	P value
ROA	Intercept	$\beta_0$	1.362	0.259	1.871
	Prepost	$eta_1$	0.451	0.364	1.166
	Total Assets	$\beta_2$	0.027	0.007	0.041
ROCE	Intercept	$\beta_0$	2.238	4.384	0.610
	Prepost	$\beta_1$	8.846	6.168	0.152
	Total Assets	$\beta_2$	0.0002	0.0001	0.118
ROE	Intercept	$eta_{o}$	0.498	0.021	<0.001
	Prepost	$\beta_1$	0.011	0.030	0.720
	Total Assets	$\beta_2$	0.000006	0.000001	< 0.001

The parameter estimates together with their standard errors (se) from the D-I-D regression model are presented in Table 2 above. The positive values of  $^{\beta_1}$  indicate that outsourcing had, on average, a positive effect (an increase/improvement) on all the three outcomes. For ROA, there was a 0.451 units increase after outsourcing as compared to before outsourcing after adjusting for Total assets. The results also showed, on average, an 8.85 units increase after outsourcing as compared to the period before outsourcing after controlling for total assets. Finally, for ROE, there was a 0.011 units increase after outsourcing as compared to before outsourcing.

#### 4.4 Accounting Based Performance measures

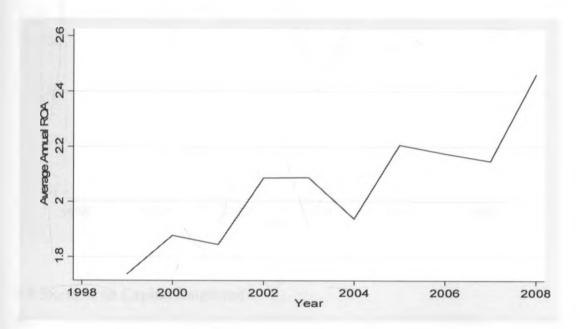
#### 4.4.1Return on Assets (ROA)

ROA is calculated as income before extraordinary items ,divided by total assets multiplied by 100. Generally speaking, ROA represents the total picture of the profitability of a firm. It gives a quick indicator whether the business is earning a profit on each shilling invested. A rising ROA is favourable. As banks outsource part or all of their

services, they are able to focus on their core business, hence generate more profit. They also realize economies of scale.

### Figure 4.2 (a). Evolution of ROA over time.

Figure 2(a) below indicates that there is increase in ROA between 1998 and 2003,in 2004 however, a drop was registered but in 2005 to 2008,an increase in ROA recorded.



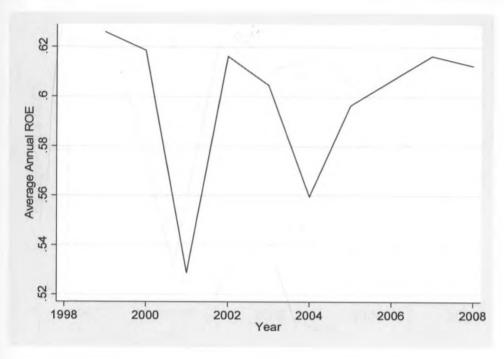
#### 4.4.2Return on Equity

ROE is calculated as income before extra ordinary items divided by common equity, multiplied by 100.ROE represents the earnings that the return for each shilling of average shareholder equity in the company. Equity constitutes a portion of banking assets so its usually higher tha ROA. There has been an increase in values of ROE over the years. It measures the banks ability to meet shareholder requirement i.e. share holder value oriented measure.

An example of it outsourcing is that it brings cutting edge technology at a relatively low price. Since they rely on IT, the banks can adopt it which leads to improved processes hence value creation. Cost reduction and risk control also result in improving shareholder value. Therefore banks that outsource contribute to creating shareholder value.

### Figure 4.2(b). Evolution of ROE over time.

Figure 2(b) below indicates that there is increase in ROE between 1998 and 2003,in 2004 however, a drop was registered but in 2005 to 2008,an increase in ROE recorded.



# 4.4.3Return on Capital Employed

ROCE is calculated by Net Income divided by total Assets less Liabilities. It is a ratio that indicates how efficiently and profitable the company's Investments are. It measures how effectively the firm uses the capital invested to generate profits.

It is undisputable that outsourcing of it involves huge capital outlays ,therefore ROCE measures the monetary gain from the investment. The level of capital investment of a firm will impact on the performance of a firm.

Figure 2(c) Evolution of (c) ROCE over time

Figure 2(c) below indicates that there is increase in ROCE between 1998 and 2003,in 2004 however, a drop was registered but in 2005 to 2008,an increase in ROCE recorded

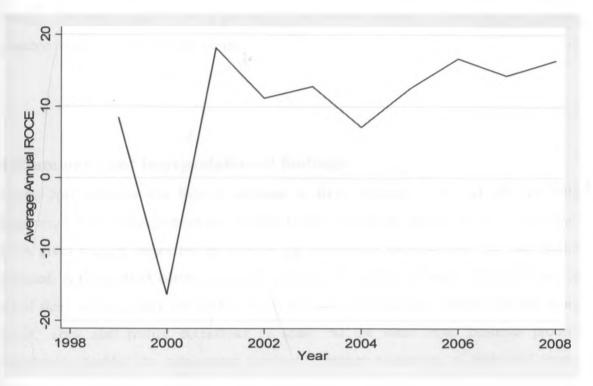


Table 4.3. Mean ROA, ROCE, ROE and TA by year.

Year	ROA		ROCE	ROCE		ROE		TA	
	Mean	Se	Mean	se	Mean	se	Mean	se	
1999	1.74	0.51	8.47	5.20	0.63	0.04	10440.49	2998.58	
2000	1.88	0.60	-16.29	25.90	0.62	0.06	9853.46	2763.52	
2001	1.84	0.33	18.19	6.27	0.53	0.07	10201.85	2757.84	
2002	2.09	0.32	11.20	3.15	0.62	0.06	11030.59	2994.16	
2003	2.09	0.79	12.85	2.39	0.60	0.06	14359.51	3123.39	
2004	1.94	0.45	7.14	4.61	0.56	0.05	13505.60	3552.49	
2005	2.21	0.46	12.51	1.84	0.60	0.04	15191.33	3655.15	
2006	2.18	0.77	16.68	2.14	0.61	0.05	18006.38	4177.74	
2007	2.15	0.64	14.34	4.08	0.62	0.04	23053.65	5373.33	
2008	2.46	0.46	16.39	2.62	0.61	0.04	29887.13	6930.14	

Table 3 above represents the evolution of ROA (panel a), ROCE (panel b), and ROE (panel c) over time. Generally, all the three plots suggest an upward trend in the outcome, especially after the year 2004 (immediately following a drop observed in the period 2002-2004) – By then, a total 55% of the banks had already started outsourcing, suggesting possible positive effect of outsourcing.

# 4.5Summary and Interpretation of findings

Figure 2(a) indicates that there is increase in ROA between 1998 and 2003,In 2004 however, a drop was registered but between 2005 to 2008,an increase in ROA recorded. ROA gives a quick indication of whether the business is earning profit on each dollar invested. A rising ROA across periods is generally favorable. As banks outsource part or all of their services, they are able to focus on their core business, hence generate more profit. They also realize economies of scale. At the same time, business process outsourcing enables the outsourcing receiver to realize economies of scale and scope, which will help to cut operational costs. Therefore, it is rational to conclude that banks with outsourcing activities have higher profitability as observed in the period after outsourcing compared with the period before they started outsourcing, which reflects on the numerical value of ROA.

From Figure 2(b), it can be noted that there is an increase in ROE between 1998 and 2003, in 2004 however, a drop was registered but in 2005 to 2008, an increase in ROE was recorded. ROE measures the extent of meeting shareholder requirements. This shareholder value-oriented measure provides a summary level picture of whether a bank is contributing to or detracting from shareholder value. Since they rely on IT, the banks can adopt IT outsourcing. One of the advantages of IT outsourcing is that it brings the cutting-edge technology to outsourcing receiver at a relatively low price. In such an information-intense industry as the banking industry, emerging technology is usually accompanied with business process change, which will lead to value creation. In addition, other benefits brought by IT outsourcing such us cost deduction and risk control can also

contribute to shareholder value. All in all, it can be assumed that banks with IT outsourcing activities contribute more to shareholder value.

Figure 2(c) indicates that there is an increase in ROCE between 1998 and 2003,in 2004 however, a drop was registered but in 2005 to 2008,an increase in ROCE was noted. It is notable that outsourcing of business processes involves huge capital outlay. Therefore ROCE measures the monetary gain from the investment. The level of capital investment of a firm will impact on the performance of a firm. It can be assumed that outsourcing firms ensure that capital invested it outsourcing some of the functions have positive impact.

Table 3 represents the evolution of ROA (panel a), ROCE (panel b), and ROE (panel c) over time. TA was used to control for the value of assets since different banks have different capital base. Generally, all the three plots suggest an upward trend in the outcome, especially after the year 2004 (immediately following a drop observed in the period 2002-2004) – By then, a total 55% of the banks had already started outsourcing, suggesting possible positive effect of outsourcing.

The parameter estimates together with their standard errors from the D-I-D regression model are presented in Table 2. The positive values of  $\beta_1$  indicate that outsourcing had, on average, a positive effect i.e an increase/improvement on all the three measures of performance. For ROA and ROE there was slight increase after outsourcing as compared to before outsourcing after adjusting for Total assets. The results also showed that ROCE recorded the greatest increase in performance after outsourcing as compared to the period before outsourcing after controlling for total assets. It can be assumed that outsourcing banks have had an improvement using the performance measures.

#### CHAPTER FIVE

#### SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

#### 5.1 Summary

Outsourcing is a widely used business practice for organizations. One of the main reasons for this is to reduce costs, increase efficiency which have an overall impact on the performance of organizations. Several studies have been carried out on the area of outsourcing but none of them have examined the impact that outsourcing has on overall firm performance using accounting measures of performance.

The aim of this study was to establish if there is a relationship between business process outsourcing and financial performance of banks in the banking industry in Kenya and further to see if outsourcing can actually enhance bank's performance. The paper focuses exclusively on the banking industry due to its intensive IT application and enormous IT investment .Objective accounting measures such as ROE, ROA and ROCE are chosen as firm-level performance measures .

Difference-in-difference analysis method has been used in this paper to make comparison between firm performance before outsourcing and performance after outsourcing using the relevant measures of performance.

The sources of Information in the research study was secondary data from Banking surveys done between the year 1999 to 2008. Generally, all the studied Banks indicated increase in ROA, ROE and ROCE over the ten year period. The results of the study indicate a positive effect on the various performance measures used thereby leading to the opinion that outsourcing may be beneficial to firms that engage in it.

These findings complement previous studies conducted by Jiang et. (Al 2006)that found a positive relationship between outsourcing and firm performance.

#### 5.2 Conclusion

The aim of the paper is to establish whether or not outsourcing has an impact on firm performance. Therefore data was collected on 43 Commercial banks that are operating in Kenya. Analysis was done which included use of Mean comparison tests and a statistical model were used to evaluate performance difference before and after outsourcing of some of the banks' business functions. Both mean comparison statistical tests and the

regression model show that there is some significant difference in all the performance measures in the sample group.

The results indicate that outsourcing had, on average, a positive effect (an increase/improvement) on all the three outcomes that were used as measures of performance. For ROA, there was an increase in performance after outsourcing compared to before outsourcing after adjusting for Total Assets. Total assets parameter was included as a control since value of assets may vary from one bank to another. Indeed, as presented earlier, the values of ROA, ROCE and ROE were higher after outsourcing than before the banks had began outsourcing some of their business processes. Therefore, according to the research result of this paper, the conclusion is that outsourcing can enhance performance of commercial banks. This information is beneficial to banks that generally outsource their functions.

#### 5.3 Policy Recommendations

The study has revealed the importance of business process outsourcing to banks and the particular and urgent need for formulating guidelines to regulate the apparent proliferation of outsourcing practices in the Kenyan banking sector, given it's prominence. The Cental Bank can come up with measures to ensure best practices are employed by banks when outsourcing their functions.

It would be important for the vendors in the outsourcing industry to categorise outsourcing activities. The three general categories are: business process outsourcing (BPO), systems outsourcing and applications outsourcing (Gillis 2002). Business process outsourcing (BPO) indicates the labor-intensive work that does not rely heavily on technology. It could apply to procurement, accounts payable, call center, human resource, billing and collection, back-office operations and other labor-intensive functions. Systems outsourcing refers to pure technology, such as operating systems, network management, desktop management, data center management, disaster recovery and other generic aspects of technology. Applications outsourcing includes the

work related to banks everyday business such as lending, taking deposits and dealing with customers. This categorization can help examine the specific impact on performance in a clear way.

It would be also of importance for a body that regulates outsourcing to be formed given the prominence of outsourcing. This will ensure that only best practices are done according to laid rules and regulations so that firms can maximize on the benefits of outsourcing.

#### 5.4 Limitations of the Study

Like any other study, there are some limitations in this paper that future research may be able to improve on. First, there are generally three types of outsourcing activities: business process outsourcing, systems outsourcing and applications outsourcing. However, this paper does not study if different types of outsourcing activities have different influence on banks' performance. This study did not focus on a specific area in outsourcing. According to the different types, the aggregation over all the categories may offset favourable impacts on certain categories. It might be meaningful to know which category has the most impact on bank's performance which can serve as a guidance of outsourcing practices in the banking industry.

In this paper, only three most frequently used firm-level performance measures ROA, ROE and ROCE are selected. Other firm performance measures such as profit margin on sales, return on total capitalization and EVA (Economical Value Added) can also serve as good firm performance indicators. More specifically, when analyzing an individual bank except for firm performance, capital levels and asset quality are the other two key areas to consider. Capital acts as a cushion against potential losses, it is a means of expansion and it can determine a bank's ability to pay dividends.

The only control used in the study is the Total Assets to control the firm size of the different banks. However, other factors also come into play which affect the performance of banks but have not been factored in the model used. E.g. firm performance can be affected by performance in prior period termed as 'halo' effect.

Lastly, as already mentioned in the former sections, the performance measurement system used in this paper is the most traditional accounting based measurement system. Non-accounting measures can also be used to evaluate effectiveness or otherwise of the outsourcing process.

#### 5.5 Suggestions for other studies

A suggestion to future research is that a more sophisticated performance measurement system that includes -soft measures other than only solid accounting ratios may be an optional method to measure the firm performance. Future study can investigate the outsourcing impact on other performance measurements other than the ones discussed above.

Future research can also develop more comprehensive firm performance measurement system, which includes not only financial measures but also other non-financial measures such as the increase in customer value and the improvement of customer-centric processes.

Research can also be carried out to establish the long-term sustainability of outsourcing as means of costs reduction vis a vis establishing and maintaining their own in-house departments. Studies should be done to establish if outsourcing is beneficial to a firm in the long run.

More studies should be carried out to establish if outsourcing results to loss of control or decision making in firms that engage in it and come up with recommendations and guidelines to control the outsourcing process and come up with standard rules and guidelines to govern the industry players.

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#### **APPENDIX**

#### LICENSED COMMERCIAL BANKS IN KENYA

- 1 ABC BANK
- 2 BANK OF AFRICA
- 3 BANK OF BARODA
- 4 BANK OF INDIA
- 5 BARCLAYS BANK
- 6 CFC-STANBIC
- 7 CHASE BANK
- 8 CITY BANK
- 9 CITI FINANCE BANK
- 10 COMMERCIAL BANK OF AFRICA
- 11 CONSOLIDATED BANK
- 12 CO-OPERATIVE BANK OF KENYA
- 13 CREDIT BANK
- 14 DEVELOPMENT BANK OF KENYA
- 15 DIAMOND TRUST BANK
- 16 DUBAI BANK
- 17 ECOBANK
- 18 EQUITORIAL COMMERCIAL BANK
- 19 EOUITY BANK
- 20 FAMILY BANK
- 21 FIDELITY BANK
- 22 FINA BANK
- 23 FIRST COMMUNITY BANK
- 24 GIRO COMMERCIAL BANK
- 25 GUARDIAN BANK
- 26 GULF AFRICAN BANK
- 27 HABIB A.G ZURICH
- 28 HABIB BANK
- 29 HOUSING FINANCE COMPANY OF KENYA
- 30 I&M BANK
- 31 IMPERIAL BANK
- 32 KENYA COMMERCIAL BANK
- 33 K-REP BANK
- 34 MIDDLE EAST BANK
- 35 NATIONAL BANK OF KENYA
- 36 NIC BANK
- 37 ORIENTAL COMMERCIAL BANK
- 38 PARAMOUNT UNIVERSAL BANK

- 39 PRIME BANK
- 40 SOUTHERN CREDIT BANK
- 41 STANDARD CHARTERED BANK
- 42 TRANS-NATIONAL BANK
- 43 VICTORIA COMMERCIAL BANK