OPERATIONS MANAGEMENT PRACTICES AND PERFORMANCE OF INSURANCE BROKERS IN NAIROBI

DANSON GILBERT MAINA NDUYU

D61/73022/2012

A RESEARCH PROJECT REPORT PRESENTED IN PARTIAL FULFILLMENT OF THE REQUIREMENTS FOR THE AWARD OF A DEGREE OF MASTER OF BUSINESS ADMINISTRATION, SCHOOL OF BUSINESS, UNIVERSITY OF NAIROBI

2018

DECLARATION

This project is my original work and has not been presented for the award of degree in another University.

Signed……. Date……

Danson Gilbert Maina Nduyu

Registration number: D61/73044/2012

The project has been presented for the examination with my approval as the supervisor.

Signed……. Date……

Supervisor name: Dr. Magutu P.O (PhD)

ACKNOWLEDGEMENT

I thank God for enabling me carry out this research successfully. I most sincerely thank the University, my supervisors, Dr. Magutu P.O PhD. I also wish to acknowledge H.G Mburu for his guidance, encouragement and knowledge.

I salute my Mother Wangechi for her continued encouragement and prayers during the MBA study program period; my wife Muthoni for her moral support. My sons Maina and Revo I have set the pace.

TABLE OF CONTENTS

LIST OF FIGURES

LIST OF TABLES

ABSTRACT

This research study aimed at establishing the link between the performance of insurance brokers in Nairobi City and Operation Management Practices (OMP). In particular the specific objectives were: i) Determine the extent of the application of the operations management practices by the insurance brokers in Nairobi, ii) Identify the challenges faced by the insurance brokers in Nairobi applying Operations Management Practices and iii) Establish the relationship operations management practices and Performance in insurance brokerage business. The operation management practices contributes immensely on how the firm competes through product and service design, production cost, response time inventory management and supply chain management. An exploratory design was used to identify the extent to which insurance brokers apply OMP and to investigate which OMP are adopted as well to establish the impact of these OMP on the performance of the insurance brokers. The study targeted a population of 53 insurance brokers in Nairobi City and a census was carried out as the population was small to be sampled. The study used questionnaires to collected the necessary data and a total of 45 questionnaires were validly filled and used for the analysis. This was a response rate of 85% which way above the required threshold of 60% by most researchers. The managers surveyed had a minimum of undergraduate degree with 80% and experience of 5 years of 78% within the insurance brokerage firm. The insurance brokers surveyed apply the five OMPs under study but with varying degree. Top on the list machine and equipment maintenance with a mean of 1.8 and standard deviation of 0.75 followed by product and service design with a mean of 2.2 and standard deviation f 0.95 and the rest with a mean more than 2.5. The insurance are faced with several challenges among them lack of documented maintenance programmes with a mean of 1.20 and a standard deviation of 0.45,lack of documented quality management systems with a mean of 1.49 and standard deviation of 0.91 among others. The performance of the insurance firms has improved with the number of claimed increasing over the fours, number of accounts held has also minimally increased and the time taken to settle the claim has reduced over the four year period. There is a linear relationship between the performance of the insurance and the operation management practices. The regression shows that supply chain management practice, machine and equipment maintenance and quality management have a positive relationship while planning and control and product and service design have a negative relationship. The general regression line shows that the equation has an R of 0.55 and all the coefficients are statistically significant at 95% confidence interval. The conclusion is that there is need for the industry to practice these Operation Management Practice as they have an impact and influence on the performance of the insurance broker. The research recommends that the management of the insurance brokers and the regulators should embrace these practices as they enhance the performance of the industry. The research further recommends that a longitudinal study should be carried to establish the link of the variables over time. Further a similar study should be carried out in insurance industry as a whole to establish the link

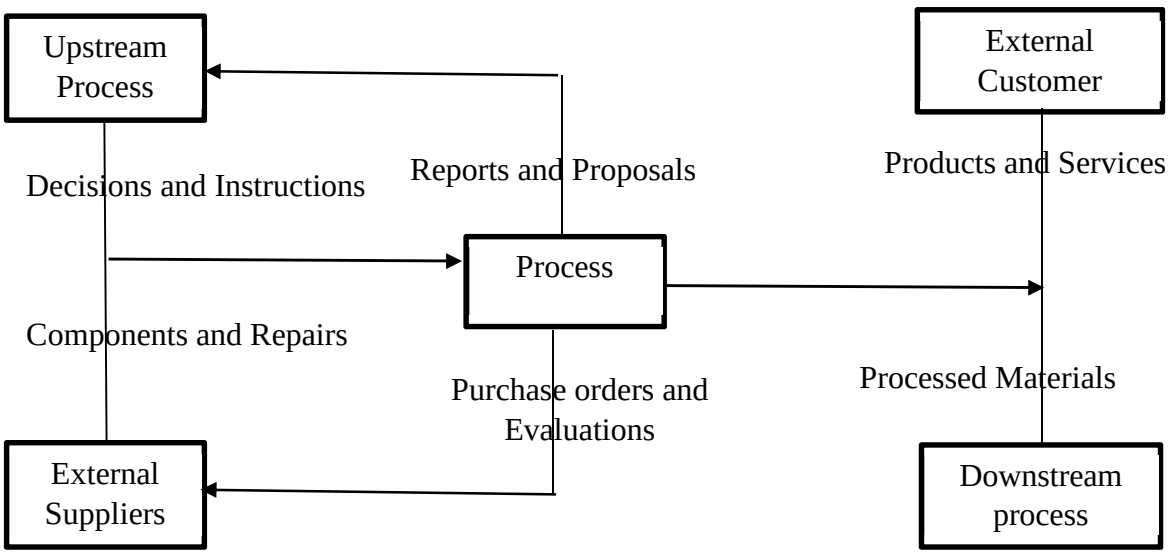
CHAPTER ONE

INTRODUCTION

1.1 Background

The traditional view of an organization is depicted to have three functions according to (Waters, 2002, Reid & Sanders, 2005): Operations, Marketing and Finance. It is in the transformation process (see Figure 1.1) that a product goes between input and output. Russell (2007) argues that a transformation process are a series of activities along a value chain extending from the supplier to the customer. The transformation process can be psychological or informational, physical, locational, exchange, physiological. It is in the transformational process that the input value is increased at each stage leading to a higher value at the output. Non adding value activities should avoided at all times. According to ISO 9001: 2015 a process is defined as a set of interrelated or interacting activities which transform inputs into outputs.

Figure 1.1: ISO 9001: 2015 Process Model Adopted



Source: ISO 9001: 2015 Adopted

According to Porter (1999) a firm's relative position within the industry determines whether a firm's competitiveness is above or below the industry average. There are basically two types of competitive advantage approach a firm can adapt. The firm can adapt a low cost approach or product or service differentiation. A cost leadership approach focus on setting out to become the low cost producer in the market. The low cost leadership focus includes the pursuit of economies of scale, technology, supply chain management and other inputs. In the differentiation approach the firm focuses on product or service uniqueness. The firm seeks to produce a product or service that is unique different from other firms within the industry through product or service design, process design, quality management, efficiency and effectiveness

1.1.1 Operation Management Practices

Operations management practices have a major influence on how the organisation competes through product and service design, cost of production, business location, the response time, inventory management, supply chain management, facility and work layout, budgeting and forecasting, human resource planning, control and management, risk management, operations improvement, project planning and control, Enterprise Resource Planning (ERP) and quality management(Slack, Chambers & Johnstone, 2010). Businesses fail or perform under par for various reasons. Top on this list of why firm fail to compete include failure to recognize the need for operational strategy, failure to take advantage of strengths and opportunities, and/or failing to recognize competitive threats (Stevenson and Hojarti , 2007).

According to Lydon (2007), there are several operations management practices that are applicable to both product and services industry. These management practices applied in include internal lean practices, just-in-time, continuous improvement, total quality management, total productive maintenance and six sigma. The objectives of lean principle as an ideal is to meet customers demand and wants with high quality and with no or minimal waste. Lean principle is a coherent set of ideals that are based on smooth flow through the relevant process by doing everything well and gradually doing them better. The Kaizen principle is a practice for continuous improvement that was originally by Masaak Imai. It is based on the principle that good processes bring good results and is guided by ten basic principles.

Just in Time (JIT) is a philosophy, a method of operations planning and control and an approach to improving competitiveness. The philosophy originated from Japan. The philosophy aims at reducing wastage within the operations and seeking continuous improvement and thereafter to meet the competitive advantage in order to respond the market needs. According to Reid and Sanders (2005), Quality Management seeks to enhance quality by ensuring that everyone within in the is organisation is responsible for quality and defects. Quality management is widely accepted and applied in improving competitiveness around the globe (Samson & Terziovski,1999). Machine and equipment maintenance on the hand involves everybody in ensuring that the machinery and equipment are in good working conditions(Wireman, 2004).

1.1.2 Operations Performance

There is need for business organizations to be competitive in order for them to be in a position to sell their goods and services. According to Stevenson and Hojarti (2007), performance is an integral factor in determining whether a business prospers or not. Porter (1980) defines competitive advantage of a firm as superiority gained by an organization over its competitions Competitiveness is realized when a firm matches its core competencies to the opportunities. Competiveness can at firm level, industry and at national level. (Porter, 1980). Firms compete through a combination of the marketing and operations.

According to Stevenson (2014), organizational performance can be measured against organizational performance indicate (OPI) such as operational efficiency and effectiveness, cost reduction, profitability, sustainability, waste reduction, response time, and internal and external compliance. Operational efficiency is the organizational ability to perform operations with little or no waste of resources and time. Effectiveness is doing the right things while efficiency is doing things right. Thereby efficiency and effectiveness contribute to high business performance since the organisation will execute the right operations the right way.

Cost reduction is involves minimizing operational costs which enhances organizational profitability. Profit is the difference between revenues generated by operation and the cost incurred by the organisation. Profitability is an accounting metric that is used determine the business financial success or failure relative to its size. Sustainability is the ability of

an organisation meet current and future demands for its products and services. Sustainability is basically on economic, environment and social or people aspects of the business.

Waste reduction involves the process and practice of reducing effluents to the environments so as to promote a society that is sustainable. Response time is time that it takes for an organisation to react or respond to the needs of the customers and clients. Compliance is the ability for to conform to set standards, requirements, specifications policies, procedure and legal requirement. Compliance may be internal or external. Internal compliance is the ability for the organisation to conform to its internal standards, policies, procedures and other internal requirements. External compliance refers to the ability for an organization to comply to external requires such as regulatory requirement and legal requirements.

1.1.3 The Insurance Brokerage Industry in Kenya

An insurance broker as defined by the Insurance Act (2003) of Kenya as an intermediary concerned with the placing of insurance business with an insurer or reinsurer for the expectation of payment by way of brokerage fee and or commission. An insurance broker works with many insurance companies to find the very best available policies for clients.

The insurance concept was first conceived in Kenya during the British colonial period whereby they used to insure through foreign insurance brokers. Insurance brokers play a key role in the intermediation of risks by facilitating the absorption of risk on behalf of the

risk-taker and hence they are very important in the economy. Over the years the role of a broker has changed from that of a matchmaker to a service provider.

1.2 Research Problem

Business firms are today operating in a global and highly competitive business environment and for them to survive, they must focus on efficiency, sustainability, profitability and cost reduction. Globalization has highly changed the way businesses are traditionally conducted. Globalization has created both business opportunities as well as challenges to both products based and service based business firms. The objective of any business firm is to offer products and services that satisfy its customers. The key to performance is determining what the customers and clients want and then directing the efforts towards meeting their needs and expectations.

A number of studies have been done to ascertain various operations management practices, in the pharmaceutical industry, Mogoi (2010) looked at the operational management practices on the procurement of pharmaceutical products in developing countries with a focus on Kenya Medical Supplies Agency (KEMSA) and found out that most of the organisations had operation management policies.

According to Mudaki, Wanjere, Ochieng and Odera (2012), the main threat to the insurance in Kenya is lack of information to the insuring public, fraud and mismanagement of the insurance broker including insurance companies thereby hampering their performance in general. For a business to be sustainable it must provide high quality products and service

in a timely manner and must minimize operational costs. Various research studies have been conducted in insurance industry in Kenya. However there is scanty studies address the effect of Operations Management Practices in relation to the performance of insurance brokers in Kenya. Mwangi (2013), focused on the influence of profitability as measure of performance; however he did link OMP to performance. Wabita (2013), in a study focusing on the factors of performance found out growth affects financial performance.

Kitua (2009) investigated on the internet as a source of competitive advantage for insurance firms in Kenya and found out that internet is a source of competitiveness in the insurance industry in Kenya. Modern business firms are operating in a very competitive environment as to some years back. For any business to survive it needs to focus on efficiency and effectiveness profitability, sustainability, quality, cost reduction, customer relationship among other factors. The businesses need to focus on flexibility and prompt responses. For this reason, there is need for organizations to apply Operations Management Practices to avoid waste, to be effective and efficient, sustainable and profitable. Therefore, the study intends to establish the operations management practices applied by the insurance brokers and what impact they have on the performance of these firms. Little has been done in the insurance industry to determine whether operation practices are applied by insurance brokers and which of these practices are contributing to enhanced performance.

1.3 Research Objectives

The general objective of this study was to determine the operations management practices applied by insurance brokers and their effect on the competitiveness This research was guided by the following specific objectives

1. Determine the extent of the application of the operations management practices by the insurance brokers in Nairobi.
2. Identify the challenges faced by the insurance brokers in Nairobi applying Operations Management Practices
3. Establish the relationship operations management practices and Performance in insurance brokerage business

1.4 Value of the Study

This study will be significant to various segments of the society. To begin with, it is a basic research designed to contribute to better understanding of the Insurance industry and to the operational constraints and remedies to Insurance brokers.

Academia and researchers in the area of operations management will gain knowledge from this study on the various operations management practices applied by insurance brokers in Kenya as well as challenges encountered in the application process these practices. This will ignite academia to undertake further research on various other aspects of operations management practices.

The results of this study will also inform insurance brokers, policymakers and the government on improvements that may be required in the business environment to enhance operations management practices of businesses. It will also provide the regulatory authorities with systems to ensure application of quality in service delivery, efficiency in operations and increase performance of business.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

This chapter discusses the theoretical framework, operations management practices, performance and conceptual framework.

2.2 Theoretical Framework

The theoretical framework is important in any research study as it plays a role in the understanding the factors underlying the study. In this section the theory of constraint is highlighted.

2.2.1 Theory of Constraints

This is a new approach to management of production and operation that was developed by Godratt in the late 1970's. It has two major parts or components; a philosophy and a generic approach for investing, analysing and creating solution called the thinking process. The philosophy underpins the working principle of ongoing improvement. The main objective of TOC is on system improvement and concentrates on bottlenecks within the system (Nave, 2002). The philosophy behind the theory of constraints is that the management focusses on continuously improving the firm's operations in order to enhance competitiveness through analysis of problem and creating solutions for the same

2.3 Operations Management Practices

The section discusses the operation management practices which include supply chain management(SCM), product and service design, process and capacity design layout design, work layout and flow management, HR planning and control management, quality management, Enterprise Resource Planning (ERP), operations improvement, project planning and control and risk management.

2.3.1 Supply Chain Management

Supply chain management is concerned with the acquisition and procurement of raw material and the development and implementation of strategies for planning and controlling the overall supply and procurement process. SCM is valuable to organizational performance as competition is among the supply chain, and high levels of SCM practice can enhance organizational performance (Li, Ragu – Nathan, Ragu – Nathan & Rao,2006). The aim of SCM is coordinate information and material across the supply as means to enhance organizational performance. SCM concept has in the recent attracted considerable interest from researchers, academicians, business executives and professionals in general (Choon Tan, Lyman & Wisner 2002). Capabilities associated with SCM are known for their importance in enhancing profitability(Chaffey, 2007).

According to Arawati and Hassan (2008),strategic partnerships with suppliers, improving customer relationship and internal lean practices are the prerequisites of Performance. There is need to bring on board the Suppliers after all that's why the business exists. In this case you delight your supplier to maintain your relevance and improve your performance.

According to Alsmadi, Almani and Jerisat (2012) lean practices have a long time been applied to manufacturing but it has gained popularity within the service industry. Research has shown that there exists a relationship between internal lean practices, quality, delivery, flexibility and cost (Chavez, Gimenez, Fynes, Wiengarten & Yu, 2013, Alsmadi et.al 2012). Lean practices focus on quality, cost and quantity to avoid wastage and enhance performance.

Supply Chain Management practice is key to organizational performance and keen attention by the management is required to enhance performance. According to Kemunto (2016), there is need to pay keen attention to OMP especially SCM, Scheduling and inventory management.

2.3.2 Product and Service Design

According to Slack, Chambers and Johnstone (2010), product and service designed are interrelated in that processes are used to produce services and products. It would be useless to commit product and service design without considering how products and services are to be produced since any small change in the process would alter the product or the service. There compelling evidence that or service design contributes to the organizational performance (Xia, Singhal and Zhang, 2016).

The product and service entails converting intellectual property into tangibles ie goods and service as they are required in for sustainability and growth. Product and process design greatly affect the quality of the product or service, cost and sustainability and well as

efficiency and effectiveness. Byegon (2015) conducted a study on OMP in the sugar industry and concluded the job design ,facility layout, Process, product and service design are key to achieving higher performance in a firm. Poor implement of product design is responsible for poor performance of the product hence affecting negatively the overall organizational performance. According to Mbithi, Muturi and Rambo (2015), performance of an organisation respond positively if the implementation is well planned but it affects negatively otherwise.

2.3.3 Planning and Control

Planning and control is a management tool that is utilized to achieve stated goals and objectives. According to Anil and Suresh (2006), any production system comprises of four key factors of Quality, Quantity, Cost and Time. The main objectives of Planning and Control is to achieve optimal resource utilization, production objectives in terms of Quality, Quantity, Cost and Timelines to avoid production delays as well as to supply desired goods and services to the market. Planning consists of planning of processes, forecasting, Material Requirement planning, material planning ,equipment planning and Human resource planning.

2.3.4 Quality Management

The business environment dictates that products and services should meet the customers preferences, wants and needs to remain profitable. Quality management as a practice attempts to address these concerns. It is the responsibility of everyone within the organisation to ensure that these concerns are well addressed. The importance of quality

management is demonstrated by the number of companies achieving ISO 9001:2015 certification. According to Chavez, Gimenez, Fynes, Wiengarten & Yu,(2013), there exists a relationship between quality and operational efficiency. Quality management is a holistic management practice and principle that attempts at continuously improving all divisions of the firm. This is only achievable if the concept of total quality is utilized from the acquisition of goods to customer service after sale (Kaynak, 2003).

2.3.5 Facility Layout

Facility layout is key in determining the performance of an organisation. One basic assumption of facility layout is that cost incurred in moving inventory and workforce is optimal. Easy access to well-designed walkways, parking areas and paths contribute to good facility layout. Facility layout should be designed based on the degree of customer contact and service required by the customer. For instance hospital service is the best example for adaptation of process layout. According to Mahmood, Karem, Rashid and Abdula (2017), the quality of health services are improved by good facility design through redesigning physical facilities.

2.3.6 Machine and Equipment Maintenance

Having reliable equipment and machines to deliver services and products to the clients demands and wants provides a competitive edge to the firm. Maintenance of reliable equipment and machines may be approached by either having a remedial maintenance or preventive maintenance for continuity of production.

In evaluating maintenance policies a business may consider several options and trade-offs, among them: to centralize or to decentralized, use of contracts or in-house maintenance, the number of standby machines to hold, repair or replacement of defective equipment, individual or group replacement, the amount of replacement capacity that should be kept available and the extent to which preventive and remedial maintenance should be used (Dilworth 1992).

2.4 Organizational Performance

Business performance enhances competitiveness which is the firm's ability to achieve market superiority over its competitors. The easiest way to compare firms within the industry is by examining the various performance preferences such as quality, profitability, cost reduction, sustainability. Stevenson and Hojarti (2007) stated that performance is critical in assessing whether a firms will succeed or not. According Reid and Sanders (2005), most of the successful world – class companies have been performing by embracing operation management practices. Performance at firm level is crucial and is dependent on the practices adopted.

2.4.1 Operation Management Practices and Performance

According to (Vonderembse et al., 2006),Competition has shifted beyond the firm’s level to the centre of the performance of the business owing to rapid change. There is need for business organizations to competitive in order for them to be in a position to sell their goods and services in the market place. According to Stevenson and Hojarti (2007), Productivity is an integral factor in determining whether a business prospers or not.

2.5 Empirical Studies on Operation Management Practices

Operation Management Practices (OMP) have recently become crucial in the business set as they enhance performance. Studies have shown these practices contribute to enhancing firm performance. In study conclude by Li, Ragu – Nathan, Ragu – Nathan & Rao (2006), investigating the effect of SCM practices and competitive advantage and organization performance established that SCM practices can enhance performance of an organisation and concluded there is for the management to embrace SCM practices as they enhance competitiveness and organizational performance.

Kemunto (2016) conducted a study on operations management practices and performance of telecommunications firms in Kenya and established there was significant effect of OMP adopted by telecommunication companies in Kenya. Further the researcher concluded that there is need to invest more in Quality improvement. The study also revealed there was a positive relationship between OMP and performance of the firms and therefore the management should invest more in OMP.

Bengat (2015) on his study on operations management practices and performance of agricultural non-governmental organizations in Nairobi County, established that there is a positive effect on performance in Agricultural NGOs operating in Nairobi county and concluded that OMP reinforce performance by increasing efficiency and effectiveness of organizations. Further the researcher found that the use of OMP is considered as a Key factor to continuous improvement of quality in delivery of services and organizational performance.

Chon Tan, Lyman & Wisner (2002), in their study on Supplier Chain Management :A strategic perspective in the USA surveyed managers in order to study the prevalent Supplier Chain Management practices and found that Supplier Chain Management practices were correlated with firm performance. The researchers concluded that SCM practices are key ingredients to higher organizational performance. A study conducted by Arawati and Hassan(2008) titled The Strategic Supplier Partnership in a Supply Chain Management with Quality and Business Performance in Malaysian manufacturing sector, concluded that SCM practices have the capability of enhancing quality performance which improves business performance in the long run.

Kariuki (2012) in a study in a study investigating effect of Product development on Financial Performance of Commercial Banks in Kenya found out that there was a positive association between product development and financial Performance of Commercial Banks.

In a study conducted in Kenya by Mbithi, Muturi and Rambo(2015), investigating effect of product development strategy in the sugar industry found out that a well thought out product and process design is responsible for high performance and well thought out implementation process enhances Performance. The researchers further concluded that product design is a crucial ingredient in enhancing performance and improvement of product and development of new ones can enhance capacity utilization.

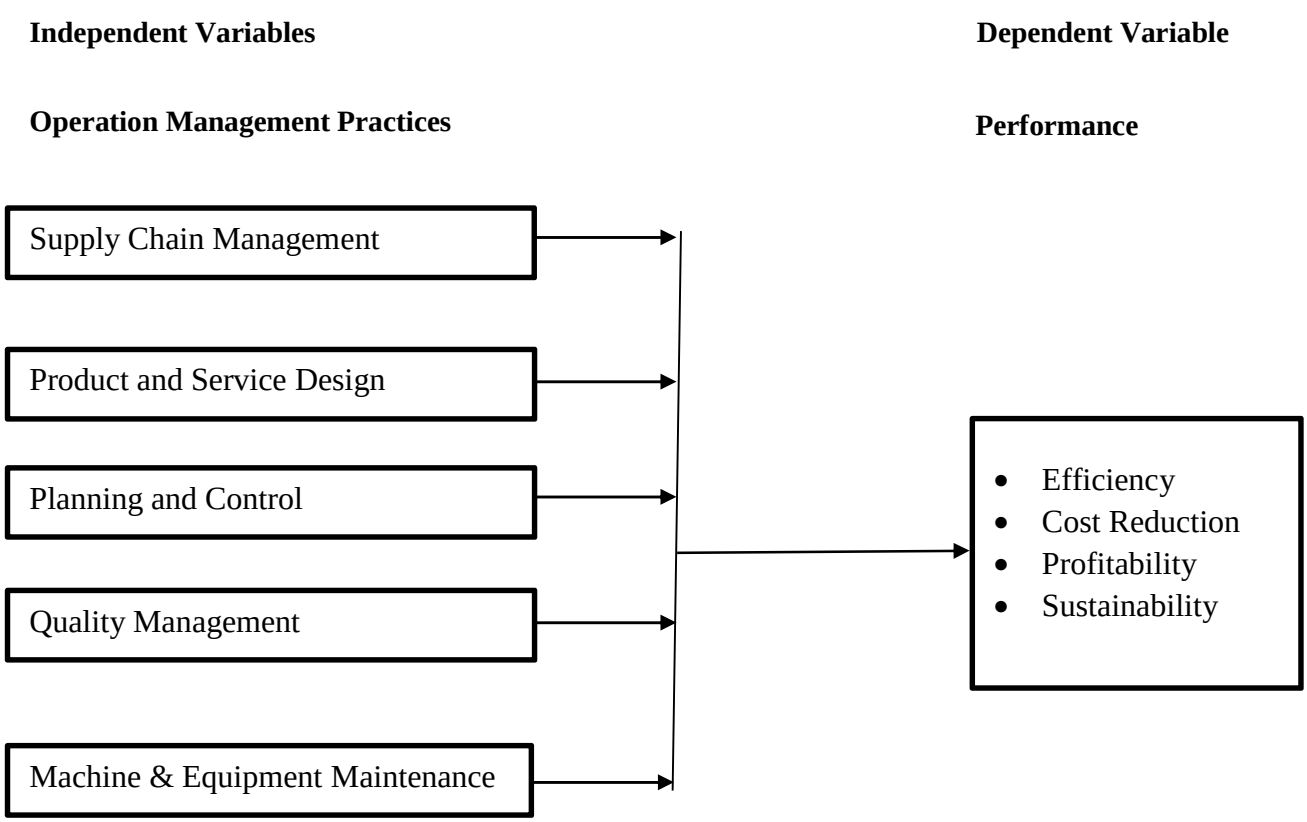
In a study conducted in Iraq by Mahmood, Karem, Rashid, and Abdula (2017), investing facility layout design and its impact on the healthcare service quality in teaching hospital and pediatrics teaching hospital in Sulaymaniyah city, the found out healthcare service quality is responsive to facility layout. The researchers concluded that better facility is responsible for high quality service delivery and in addition helps the organisation in achieving it aims, goals and objectives.

2.6 Conceptual Framework

Conceptual framework is defined as a graphical representation of the relationship that exists between the dependent research variable and the independent research variable. The conceptual framework is usually helpful to the researcher as it is possible to visualize the relationship between the research variables easily and quickly (Mugenda and Mugenda, 2008).

The conceptual framework, which was adopted by this study, had both independent variables and dependent variable. The independent variables consist of operations Management Practice while the dependent will be firm performance. (Figure 2.1).

Figure 2.1: Conceptual Model



CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

In this section, the research design is discussed; the target population, sampling design, data collection and data analysis are presented.

3.2 Research Design

This was an exploratory study which will be designed to identify the extent to which Kenyan insurance brokers apply operations management practices and to also investigate which operation management practices are adopted in the operation strategy into the overall competitive strategy of Kenyan insurance brokers. Research design will be done through survey. Surveys are concerned with describing, recording, analyzing and interpreting conditions that exist.

3.3 Target Population

This study targeted 53 insurance brokers situated in Nairobi. From each organisation the researcher targeted operations Managers.

3.4 Sample Design

Since the population was small the researcher did a census whereby the research instruments were distributed to all the members of the population. According to Singh and Masuku (2014), when the population is small it advisable to include all the members of the population so to avoid sampling errors.

3.5 Data Collection

Primary data was used in this study because it is quick to get, inexpensive, efficient, accurate and flexible (Mugenda and Mugenda, 2003). The primary data was collected through a questionnaire targeting heads of departments of operations managers as they were well placed to understand the operations of the insurance broker.

The questionnaire was divided into three sections. The general information section was designed to provide bio-data of the insurance broker. The second part of the questionnaire was to provide information on the operations management practices applied by the Insurance brokers. The third part was to provide data that was used to verify and supplement information given in section two.

3.6 Data Analysis

The researcher organized, tabulated and summarized the collected data. Charts and graphs was used to illustrate the findings. Descriptive analysis was used on the all the objectives. To measure Operation Management Practices, respondents asked to report the level of importance and application considering different Operation Management Practices through the Likert scale of 1 to 5. Statistical Package for Social Sciences (SPSS) and Microsoft Excel was used in the data analysis. The researcher determined the mean and standard deviation of the all the attributes for the variable. After determining the mean and standard deviation the research drew conclusion regarding the link between the variables. In order to establish the relationship between the operations management practices and performance, the researcher conducted a multiple regression and the regression model used

was

$$Y = \beta_0 + \beta_1 X_1 + \beta_2 X_2 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + \beta_5 X_5 + \varepsilon \ldots\ldots\ldots\ldots\ldots\ldots\ldots 1$$

Where

Y = Performance

X_1 = Product and Service Design

X_2 = Supply Chain Management

X_3 = Planning and Control

X_4 = Quality Management

X_5 = Machine and Equipment Maintenance

ε = The error term

CHAPTER FOUR

DATA PRESENTATION, ANALYSIS AND INTERPRETATION

4.1 Introduction

In this chapter, the researcher presents the analysis together with the interpretation of the findings from the study. The analysis is presented in form of tables and graphs showing the relationship between variables each followed by the relevant interpretation. The chapter is organized in term of the study objectives as well as the demographic information regarding the insurance brokers and the managers who were our target population. The study had three specific objectives that guided the research. These research objectives were:

1. Determine the extent of the application of the operations management practices by the insurance brokers in Nairobi.
2. Identify the challenges faced by the insurance brokers in Nairobi applying Operations Management Practices
3. Establish the relationship between the operations management practices and Performance in insurance brokerage business

4.2 Background Information

4.2.1 Response Rate

This study targeted 53 insurance broker within Nairobi City. After coding and checking for accuracy in the data, 45 questionnaires were found useful for the study. This gave a response rate of 85%. According to Arora (1996), a questionnaire that produces above 75% response rate has done extremely well. Babbie (2004) argues that response rate of 50% is

acceptable to analyze and publish, 60% is good and 70% is very good. Mugenda and Mugenda (2003), states that a response rate of 50% or more is adequate.

Table 4.1: Response Rate

	Respondents
Questionnaires Distributed	53
Questionnaires Received	45
Response Rate %	85

4.2.2 Demographic Information

Besides the specific objectives the researcher studied the demographic data regarding the managers in the study population. These demographic factors that the researcher sought information included the academic levels and the length of time these manager have worked in the respective insurance brokers.

The research study showed that most mangers had a least a degree with 44% having a bachelor's degrees and above. The details are shown in table. On the other hand most of the mangers had worked in the respective insurance brokerage firm for more than 10 years with a percentage of 58% as indicated in table 4.2.

Table 4.2: Academic Levels of Managers

	Frequency	%	Cumulative %
Certificate	9	20.0	20.0
Undergraduate	10	22.2	42.2
Post Graduate	10	22.2	64.4
Others	16	35.6	100.0
Total	45	100.0	

Figure 4.1: Academic Levels of Managers

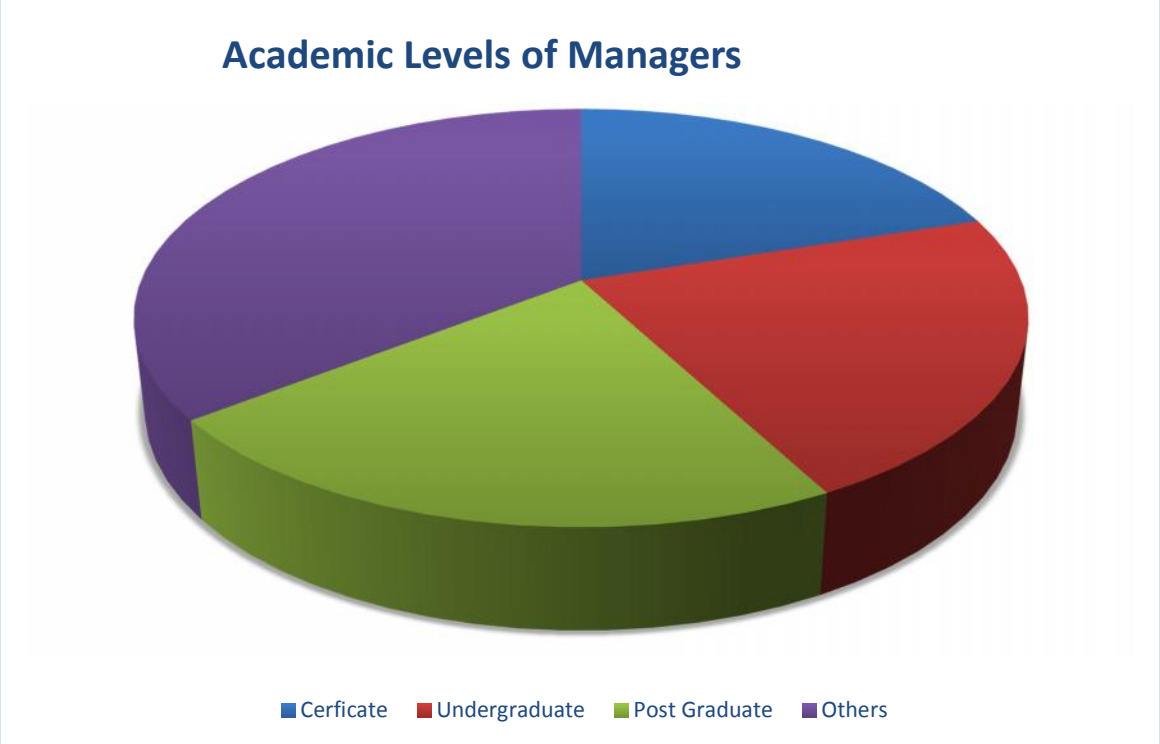
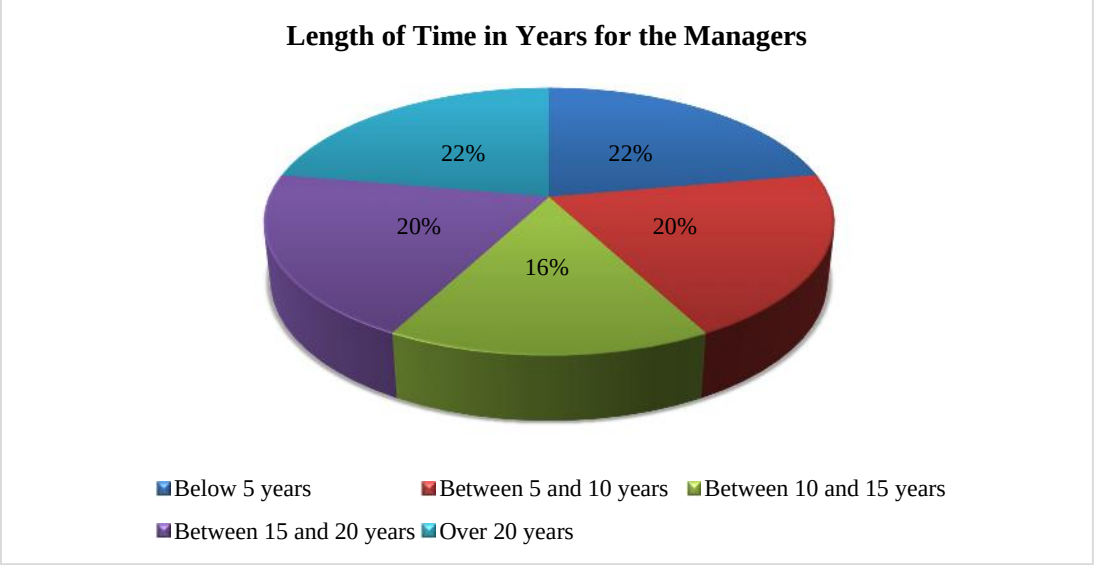


Table 4.3: Length of Time of Managers

	Frequency	%	Cumulative %
Below 5 years	10	22.2	22.2
Between 5 and 10 years	9	20.0	42.2
Between 10 and 15 years	7	15.6	57.8
Between 15 and 20 years	9	20.0	77.8
Over 20 years	10	22.2	100.0
Total	45	100.0	

Figure 4.2: Length of time in years for managers



4.3 Application of OMP by Insurance Brokers

The research study intended to establish the extent to which the insurance brokers applied the operation management practices (OMP). The researcher to this end established that the insurance brokers were applying at least one of the five OMPs. These OMPs included

Machine and Equipment Maintenance, Quality Management, Supply Chain Management, Product and Service Design and Planning and Control. From the study it was clear that the insurance broker apply machine and equipment maintenance more than any other practice with a mean of 1.8 (Standard deviation of 0.75) followed by product and service design with a mean of 2.2 (Standard deviation of 0.95) then Supply chain management with a mean of 2.5 (Standard deviation of 0.96), then planning and control with a mean of 2.8 (Standard deviation of 1.31) and lastly Quality management with a mean of 3.0 (Standard deviation of 1.48) as shown in table 4.4. These results indicate that the insurance brokers apply the operation management practices in one way or another

Table 4.4: Application of OMP by Insurance Brokers

Description	Mean	SD
Supply Chain Management	2.50	0.96
Product and Service Design	2.20	0.95
Machine and Equipment Maintenance	1.80	0.75
Quality management	3.00	1.48
Planning and Control	2.80	1.31

From the findings, most of insurance brokers agree to the fact that they machine and equipment maintenance ranks higher than any other practice. The lower the mean the better since the Likert scale starts at 1 with strongly agree and ends at 5 with strongly disagree. The lower the standard deviation the better since the measures of dispersion shows how scattered the elements are from the mean.

4.3.1 Machine and Equipment Maintenance

The insurance broker agree that there is a strong documentation of maintenance programmes within their brokerage firms. Most of the respondent agree that the insurance brokers maintain proper documentation of the maintenance programme with a mean of 1.38 (standard deviation of 0.569).The insurance brokers on the hand agree that the machine and equipment maintenance is done when there is less work or when equipment or machine has broken down with a mean of 1.71 (Standard deviation of 0.910).

The brokers agree that there is regular inspection of the machines and equipment and it is the responsibility of every operator to ensure that this done regularly with a mean of 1.87 and standard deviation of 0.98. The brokers also agree that the their firms have well-kept records regarding machine and equipment maintenance and work records with a mean of 1.98 and a standard deviation of 0.774 From the study it is also clear that the insurance brokers are neutral on checklists on the maintenance with a mean of 3.07 and a standard deviation of 1.083 The results are summarized in table 4.5.

From the findings it is clear that the insurance brokers utilize all the aspects of the machine and equipment maintenance practice since their means are lower than 2 except maintenance of checklist which has a mean of 3.07 which implies the brokers are non-committal.

Table 4.5: Machine and Equipment Maintenance

Description	Mean	SD
There is a documented maintenance program for machinery and equipment	1.38	0.569
Machine and equipment maintenance is done when there is less work or when equipment breaks down	1.71	0.910
There is regular inspection of machines and facilities and the operators are responsible for their own machine cleaning, lubrication, and regular maintenance.	1.87	0.980
The organization keeps detailed machine and equipment maintenance and work order records	1.98	0.774
The organization has Maintains a standardized maintenance checklists	3.07	1.083

4.3.2 Quality Management Practice

The quality management as a practice is not taken seriously by the insurance brokers. All the aspects that the researcher sought had a mean of above 3. The insurance brokers feel are non-committal on all the aspects investigated. On the issue of whether the insurance brokers have documented quality management system, the mean was 3.11 with a standard deviation of 1.43. on the issue of whether the magnitude and frequency of quality related occurrences has reduced significantly over the past one year the mean was 2.91 with a standard deviation of 1.53. concerning whether the organization welcomes and acts on end user complaints, the data showed a mean of 3.09 and a standard deviation of 1.31

Enquiring on the issue of whether Quality levels are determined by end user bench marks and the regulatory authorities, the researcher found a mean of 3.11 with a standard deviation of 1.46 while on whether the employees are encouraged to check the quality of each operation they complete before proceeding to the next operation, there was a mean of 3.22 and a standard deviation of 1.60.

Table 4.6: Quality Management Practice

Description	Mean	SD
The organization has a documented quality management system in place	3.11	1.43
The magnitude and frequency of quality related occurrences has reduced significantly over the past one year	2.91	1.53
The organization welcomes and acts on end user complaints	3.09	1.31
Quality levels are determined by end user bench marks and the regulatory authorities.	3.11	1.46
All employees are encouraged to check the quality of each operation they complete before proceeding to the next operation.	3.22	1.60

From the findings it is clear that the insurance brokers are non-committal on the issue of quality management systems with a mean of above 3.

4.3.3 Supply Chain Management Practice

Supply chain management as a practice is ranked position 3 in terms of usage with a mean of 2.50 and a standard deviation of 0.96. In terms of the different aspects, that the research sought to investigate all of them had a mean of less than 3 implying that most of the brokers tend to agree the fact supply chain management is practiced by the brokers. The details of the findings are in the table 4.7.

Table 4.7: Supply Chain Management Practices

Description	Mean	SD
The company has a list of preferred suppliers	2.53	1.11
Are there on time deliveries from suppliers?	2.87	1.39
The company has mutual relationship with the supplier	2.58	1.29
Is there reduction of stocks in stores?	2.84	1.41
There is constant burden and disorganization, with a high level of Work-in-Progress items	2.67	1.28

4.3.4 Product and Service Design Practice

The insurance brokers sector report that product and service is as a practice is ranked number 2 with a mean of 2.2 and standard deviation of 0.95. On the different component of the practice it is clear that the mean is lower than 3 implying that the insurance tend to agree that product and design is practiced. The different components range from a mean of 2.16 to 2.33. As shown in the table 4.8.

Table 4.8: Product and Service Design Practices

Description	Mean	SD
The services comply with the legal requirements in the country	2.23	1.37
The services comply with the internal organizational requirements	2.20	1.39
Provide services that are easily accessible by the customers	2.33	1.27
Provide services that are easily acceptable to the customers	2.41	1.40
Company follows keenly on what others are doing in the insurance industry	2.16	1.35

From the findings, it is clear that the insurance brokers tend to agree to the fact that product and service design is practiced in the insurance brokers sector.

4.3.5 Planning and Control Practice

Planning and control as a practice is mildly with a mean of 2.8 and a standard deviation of 1.31. On different components it is clear that the means range from 2.60 to 2.73. This implies that the insurance brokers tend to be non-committal on the practice. This information is shown in table 4.9.

Table 4.9: Planning and Control Practices

Description	Mean	SD
The services comply with the legal requirements in the country	2.73	1.37
The services comply with the internal organizational requirements	2.60	1.39
Provide services that are easily accessible by the customers	2.73	1.27
Provide services that are easily acceptable to the customers	2.91	1.40
Company follows keenly on what others are doing in the insurance industry	2.76	1.35

4.4 Challenges Encountered by Insurance Brokers

The sought to identify the challenges that the insurance brokers faced in establish or practicing operation management. The study ranked lack of documented Operation Management practices, lack of documented quality management systems, lack of documented maintenance programmes, lack of partnership with the suppliers and finally lack of supply chain management policies. Lack of documented maintenance programmes topped the list with a mean of 1.20 (standard deviation of 0.45) followed by lack of documented quality management systems with a mean of 1.49 (standard deviation of 0.91) lack of partnership with suppliers followed with a mean of 1.64 (standard deviation of 1.18)

followed by lack of documented OM practices with a mean of 1.76 (standard deviation of 1.25) followed by lack of SCM policies with a mean of 2.18 (standard deviation of 1.51) and finally planning and control tools a mean of 2.56 (standard deviation of 1.57) This information is shown in table 4.10.

Table 4.10: Challenges encountered by Brokers

Description	Mean	S D
Lack of OMP	1.76	1.25
Lack of Documented QM	1.49	0.91
Lack of Partnership with Vendors	1.64	1.18
Lack of Documented MEM	1.20	0.45
Lack of SCM Policies	2.18	1.51
Lack Planning and control	2.56	1.57

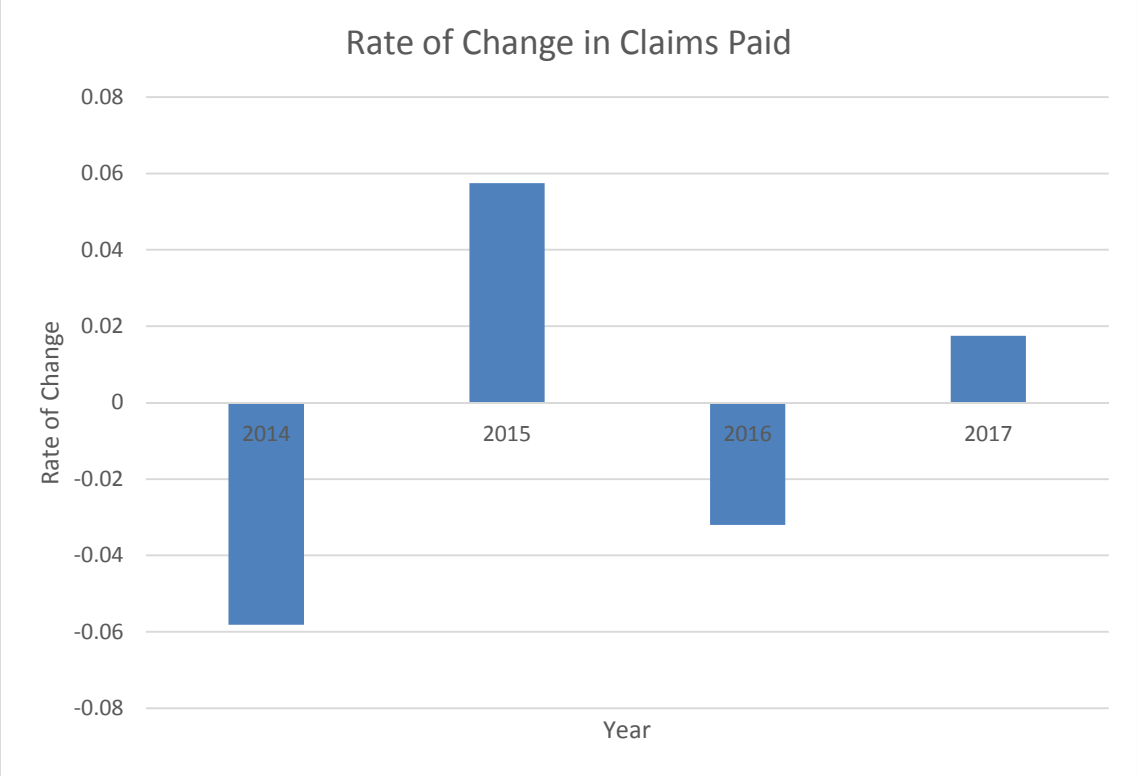
From the findings it is clear that most of the insurance broker tend to agree that the major challenge that they encounter in practicing OMP is topped by lack of documented MEM and the least challenge is lack of planning programmes with a mean of 2.56.

4.5 Firm Performance and Operation Management Practices

The study intended to establish the relationship between the performance of the insurance brokers and operation management practices. The study link the performance in terms of changes in the number of accounts, the rate of claims paid as well as the time taken to pay those claims. The mean rate of claim payable ranged from 79.2% to 83.5%. The average

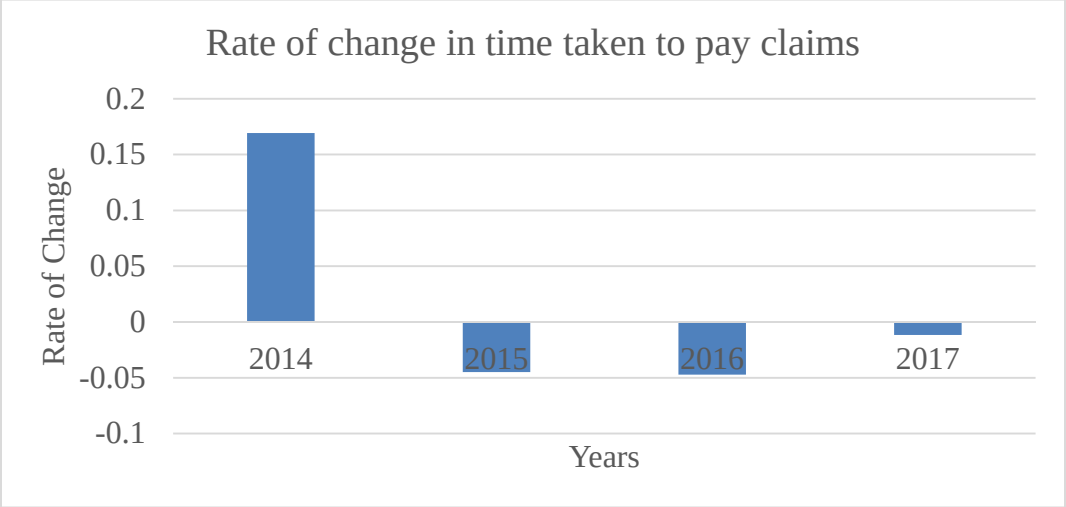
rate of time taken to pay those claims ranged from 55 days to 62 days for the four years of 2013 to 2017. The mean number of accounts ranged from 76 to 81. The claims paid reduced by 6% in 2014, but increased by the same rate in 2015. In 2016, it reduced by 3% but increased by 2% in the year 2017. In general, the rate remained relatively constant with a standard deviation of 4% in the four years. This is shown in figure 4.3.

Figure 4.3: Rate of Change in Claims Paid



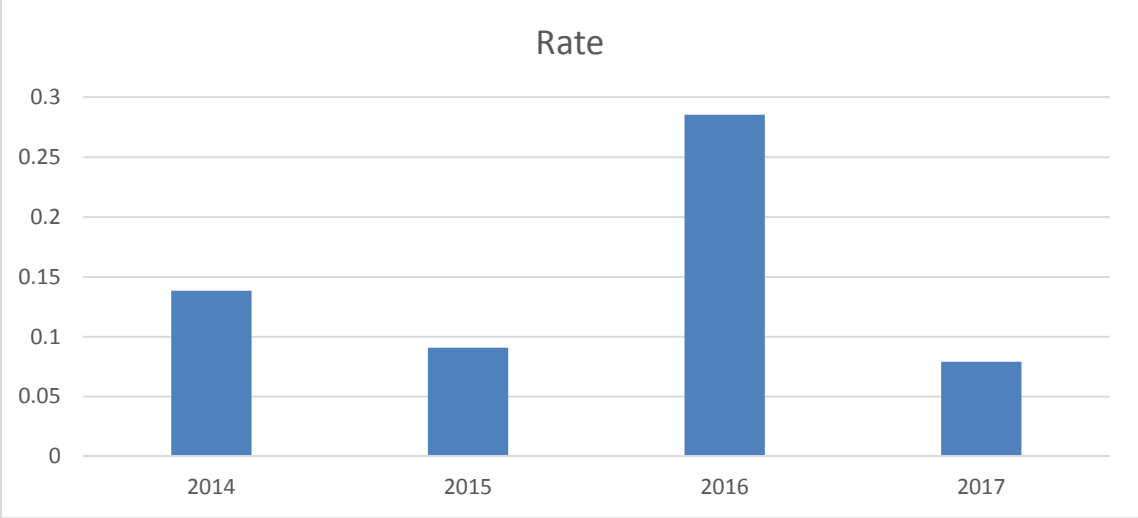
The average rate of change in the time taken in paying the claims increased in 2014 by 17% but decreased in the subsequent year with 5% in both 2015 and 2016 but decreased by 1% in 2017 and the average increase rate of 2% with a 19% standard deviation as shown in figure 4-5.

Figure 4.4: Rate of change in paying claims



The number of accounts held by the insurance brokers increased by 15% in 2014, 9% in 2015, 28% in 2016 and 8% in 2017 with an average increase of 15% with a standard deviation of 2%. This information is shown in figure 4.5.

Figure 4.5: Rate of Change in Accounts held



In general the research concludes that rate of claims paid is relatively constant with a standard deviation of 2% over the four years meaning that the insurance brokers are able to satisfy their customers. The time taken to pay these claims has also improved with a

decrease in rate in time taken to pay these claims. This is positive to the customers' needs as they need to be paid their claims on time. On the other side of the insurance brokers, there has been an improvement in the number of account held by them. This indicates that the customers have trust in them. Towards this end the researcher need to establish the link between the OMP and these performance indicators. The application of OMP has impacted on the performance of the insurance brokers

Table 4.11: Regressor

Regression Statistics	
Multiple R	0.55
R Square	0.30
Adjusted R Square	0.21
Standard Error	0.02
Observations	45

	df	*SS*	*MS*	*F*	*Significance F*
Regression	5	0.007	0.001	3.403	0.012
Residual	39	0.016	0.000		
Total	44	0.024			

	Coefficients	*Standard Error*	*t Stat*	*P-value*
Intercept	0.111	0.013	8.856	0.000
SCM	0.007	0.002	2.893	0.006
P & S	-0.002	0.002	-1.099	0.002
M & E M	0.004	0.002	1.917	0.065
QMgt	0.005	0.002	2.351	0.024
P & C	-0.002	0.002	-0.799	0.043

The equation from the regression is given below

$Y = 0.111 + 0.01X_1 – 0.002X_2 + 0.005X_3 + 0.005X_4 – 0.002X_5$

From the equation above Machine and Equipment Maintenance, Supply Chain Management and Planning and Service Design impacts performance positively while

Quality management and Planning and control have a negative impact. All the coefficients are satistically significant with probabilities less or equal to 0.05.

4.6 Summary

There is enough evidence that all the insurance brokers surveyed apply the operation management practices. Top on list of the application is machine and equipment maintenance with a mean of 1.8 and a standard deviation of 0.75 followed by product and service design with a mean of 2.2 and standard deviation of 0.95 while the rest have means of more than 2.5. A mean of 3 and above means that the managers disagree its application in their respective insurance brokerage firms.

There is enough evidence that the application of the five operation management practices have a positive impact on the general performance of the insurance brokers. From the regression of the data available it is clear that the application of the operation management explains at least 55% of the performance of these insurance brokers. The regression line for the relationship is $Y = 0.111 + 0.01X_1 – 0.002X_2 + 0.005X_3 + 0.005X_4 – 0.002X_5$

From the results it is important for firms to embrace and utilize operation management practices in order to enhance their overall performance.

CHAPTER FIVE

SUMMARY, DISCUSSION, CONCLUSION AND RECOMMENDATION

5.1 Introduction

This chapter seeks to summarize the entire research work. This chapter consists of summary, discussion, conclusions and recommendations based on the findings of the study.

5.2 Summary

The researcher analyzed the data gathered from the field with the sole purpose of satisfying the research objectives therein.

All the insurance brokers survey have embraced and utilized the five operation management practices though at different levels. Surprisingly the insurance brokers are practicing machine and equipment and product and service design more than any other operation management practice with 86% and 51% respectively. The other have been utilized sparingly and no wonder they rank very highly in terms of challenges.

All the insurance brokers have recorded that the more these operation management practices are used the more the firm perform better in terms of timely delivery of claims, increased number of accounts and reduced number of days to pay these claims. Therefore there exists a linear relationship between the operation management practices and the performance. There is a negative relationship between performance and product and service as well as planning and control. It is the humble suggestion of the researcher these two factors affect the performance due possibly it takes for these practices. Product and

service design is time consuming as well as costly. Planning and control on the other hand has cost and time implications that cannot be leaped immediately and that why the insurance brokers have little time for them.

5.3 Discussions

The descriptive and quantitative analysis of the data on the insurance broker in Nairobi City indicate that operations Management Practices are crucial to the improvement of the time taken to pay the customers their claims. For the time taken to reduce on average it is important that the insurance broker embrace the five operation management practices. It is also clear that not all the five operation management practices that the insurance brokers are utilizing maximally.

The improvement in payment of claims is also dependent on the utilization and embracement of the operation management practices. Prompt payment and total clearance of these claims enhance customer satisfaction and also attracts more customers and therefore enhance the number of the accounts held by the insurance brokers. From the research it is also clear that a lot of documentation is lacking which be key to the satisfaction of the customers.

Having more and more accounts held is one but this should be coupled by prompt payments when claims become due. In the instance of having huge volume accounts that are not being settled would be a negative move as more and more customers will be dissatisfied and eventually will withdraw along with others. The day of day that the insurance broker

takes to settle these accounts should also be minimized to a manageable level so as not affect the wellbeing of the clients who are the backbone of the insurance brokerage business.

The coordination and documentation of the operation management practices should also be enhance for the wellbeing of the insurance brokerage firm. From the study it is also clear that the performance in general is affected by the way the operations management practices coexist. The practices should also be supportive of one another and complimentary so as to leap the maximum benefits from these practices. On the other hand the individual insurance broker should prioritize these practices and not implement them just because others are using some.

5.4 Conclusions

Against the background of the data collected and analyzed, the was able to draw the following deductions. Most of the insurance firms prioritize machine and equipment maintenance and product and service design against the other three operation management practices under review. Most of the insurance brokers embrace one or two of these practices while conducting their brokerage business. Slightly below 90% embrace machine and equipment maintenance and slightly above 50% embrace product and service design practices.

From the data there exist a link between the number of accounts and these practices as well as a link between the number claims paid and these practices. There is a link between

the number of days taken to settle the claims and the operation management practices. This in essence implies the more these operation management practices are embraced and used the better the performance of the insurance brokers. The more these operation management practices are embraced, the lesser the time taken to settle the claim payable as well as the increased number of accounts and the more claims are settled in general.

5.5 Recommendations to the Industry

In view of the deduction made from the study, the following recommendations are worth making to the management of the insurance brokers, the ministry concerned and the insurance industry in general.

The management of the insurance brokers should invest, embrace and utilize the operation management practice in order to enhance the performance of their brokerage firms as well as satisfying the customer's needs. The top management should be on the forefront in ensuring that these practices are documented and practiced effectively in order to enhance the performance. Moreover the Ministry of Finance and the Insurance Regulatory Authority (IRA) should lay the necessary framework for the embracement of these operation management practices.

5.6 Recommendations for Further Research

A similar study should be conducted targeting the insurance companies to establish the relationship between the operation management practices and firm performance. The mere fact there is a relationship between the operation management practices and firm

performance insurance does not necessarily mean that there is such relationship in the insurance companies themselves.

Moreover this study was solely conducted on the insurance brokers in Nairobi town. A similar study should be conducted all over the country to establish the link between the variables. This study on the other hand concentrated on cross sectional data whereby it involved observations of some subset of a population of items all at the same time, in which groups can be compared. Cross sectional analysis studies the relationship between different variables at a point time. A longitudinal study should be conducted to determine the relationship between operations Management Practices and firm performance over time.

REFERENCES

Abdiwahab, A, S. (2010). Operations Strategies used in Mobile banking: The case of M-Pesa service by Safaricom Ltd. *Unpublished MBA Project, University of Nairobi.*

Alsmadi, M., Almani, A., & Jerisat, R. (2012). A comparative analysis of Lean Practice in the UK manufacturing and service sector firms. *Total Quality Management & Business Excellence, 23(3 – 4), 381 – 396*

Aquilano, N. J, Chase, R. B, Jacobs, R. F. (2009) Operations and Supply management, 12th Edition. McGraw-Hill/Irwin publishers, USA.

Arawati, A. & Hassan, Z. (2008).The Strategic Supplier Partnership in a Supply Chain Management with Quality and Business Performance. *International Journal of Business and Management Science, 1(2): 129-145,*

Barnes, D (2007). Operations Management: An International Perspective. Cengage Learning Publishers; UK.

Barney, J. B. (2001). Resource – Based theories of competitive advantage : A ten – year retrospective on the resource based view. *Journal of Management, 27 (6), 643 – 650*

Bengat, N., J. (2015). Operations management practices and performance of agricultural non-governmental organizations in Nairobi county. *MBA Project, U.O.N*

Besterfield, D. H., Besterfield-Michna, C., Besterfield, G. H, Besterfield-Sacre, M. (2009) Total Quality Management, 3rd edition. Dorling Kindersley: India.

Boge, E, B. (2010). Effectiveness of the Balanced Scorecard in the implementation of corporate strategy at CFC Life Assurance ltd. *Unpublished MBA project, University of Nairobi.*

Byegon, R. K.(2015).Operations Management Practices And Perceived Service Quality A Case Study Of Kenya Sugar Industry. *Unpublished MBA project, University of Nairobi*

Chaffey, D.(2007). E–Business and E – Commerce Management: Strategy Implementation and Practice. Pearson Education.

Chavez, R., Gimenez, C., Fynes, B., Wiengarten, F., & Yu, W. (2013). Internal Lean Practices and Operational Performance: The contingency perspective of Industry Clock speed. *International Journal of Operational & Product Management, 33(5), 562– 588*

Chelang'at, B. (2010). The extent of Implementation and critical success factors of lean six sigma in commercial banks in Kenya. *Unpublished MBA Project, University of Nairobi.*

Choon Tan, K., Lyman, S.,B, & Wisner, J.,D. (2002). Supply chain management: a strategic perspective. *International Journal of Operations and Production Management 2002;22(6):614–31*.

Clayton, M. (1995). Encouraging the Kaizen approach to quality in a University. *Total Quality Management*, 6(5), 593 – 602

Dilworth, J,B. (1992). Operations management; Design, planning, and control for manufacturing services. McGraw-Hill incorporation.

Dilworth, J. B.(2004) Operations Management –R.R Donnely and sons insurance broker

Everest Jr., A. & Ebert J. Ronald, J., E.(2001). Production and Operations Management concepts, Models and Behavior. Asoke K. Ghosh, Prentice Hall of India Private Limited: India.

Fullerton, R. R. & Wempe, W. F. (2009). Lean manufacturing, non-financial performance measures, and financial performance. *International Journal of Operations & Production Management*, Vol. 29 No. 3, pp. 214-240.

Hafeez, K., Malak, N., & Zhang, Y. (2007). Outsourcing non-core assets and competence of a firm using analytic hierarchy process. *Computer & Operations Research, 34(12), 3592 – 3608*

Hill, T. (2005). Operations Management. 2nd Edition, Palgrave MacMillan Publishers.

Hoyle, R.H, Harris, M.J, Judd, C.M. (2009). Research Methods in Social Relations. 7th Edition, Thomson Learning Inc; USA

Huggins, R., & Thompson, P. (Eds).(2017). Handbook of Regions and competiveness: Contemporary Theories and Perspective on Economic Development. Edward Elgar Publishing

International Society for Pharmaceutical Engineering (2011). Kenyan Pharmaceutical Industry To Grow Despite Global Conditions, http://www.ispe.org

Johnson, G., Scholes, K., Whittington, R. (2008). Exploring Corporate strategy. 8th Edition. Ashford Color Press; UK 44

Jones, D.T, Roos, D, Womack, J.P (1990). The machine that changed the World: Story of Lean Production. Harper Perennial Publishers; USA.

Kariuki, J.W.(2012). The effect of Product development on the financial performance of commercial banks in Kenya. *Unpublished MBA Project. Nairobi: University of Nairobi*

Kaynak, H. (2003). The relationship between total quality management practices and their effects on firm performance. *Journal of Operations Management* 21(4), 405 – 435.

Kemunto, A.,E.(2016). Operations Management Practices and performance of Telecommunications Firms in Kenya

Kim, Y. & Lee, J. (1993). Manufacturing Strategy and Production Systems: An integrated Frame work

Kitua, J (2009), The internet as a source of competitive advantage for insurance firms in Kenya, Unpublished MBA project, School of Business, University of Nairobi

Kothari, C.R. (2004). Research Methodology: Methods and Techniques, 2nd Edition. New Age International Publishers; New York.

Krajewski, L. J, Ritzman, L.P.(1999.) Operations management strategy and analysis. Adison Wesly

Kumar, S., A & Suresh, N.(2006). Production and Operations Management. New Age International

Li, S., Ragu – Nathan, B., Ragu – Nathan,T., S& Rao, S.S(2006), The impact of Supply Chain Management Practices on Compettitve Advantage and Organisational Performace. *Omega,32(2), 107 – 124*

Lowson, R. H.(2001). Retail operational strategies in complex supply chains.*International journal of operations management Vol.22 No.10*

Mahmood, O.K., Karem, J. A. H., Rashid, W.N.,& Abdula, D.F.(2017)Facility layout design and its impact on the Healthcare Service Quality in Teaching Hospital and Pediatrics Teaching Hospital IN Sulaymaniyah City. *International Review of management and marketing, ,7(2),174-179*

Mbirwe, S.W. (2007). A Survey of Positioning Strategies Used by Pharmacies in Nairobi, *Unpublished MBA Project, University Of Nairobi*.

Mbithi, B., Muturi, W.,& Rambo,C(2015).Effect of Product development strategy on Performance in Sugar Industry in Kenya. *International Journal of Academic Research in Business and Social Sciences Vol. 5(12)*

Mbolonzi, W.K. (2014) - Operations management practices and performance of schneider electric Kenya, MBA Project ,U.O.N

Mintzberg, H., Brian, J Sumantra, J. (1995). Strategy Process-Revised European edition (1995)

Mogoi, S.O. (2010). Effects of Operational Management Practices on Procurement of Pharmaceutical Products in Developing Countries: A case of Kenya, Medical Supplies Agency. *Unpublished MBA Project, University Of Nairobi.*

Mudaki, A. L., Wanjere, D., Ochieng, I., & Odera, O. (2012). Effects of operational factors on organizational performance in Kenyan insurance industry. *International journal of business and social science, 3(17), 237-241*

Mugenda, A.G, & Mugenda O.M (2003) Research Methods: Quantitative and Qualitative approaches. Nairobi Africa Centre for Technology Studies. Kenya

Mwangi, C. M. (2013). An Investigation Into Factors That Determine Financial Performance Of Insurance Companies In Kenya. *University of Nairobi Unpublished MBA Project*.

Nandama, W.M. (2010). Strategy Evaluation and Control by Pharmaceutical Manufacturers and Distributors in Kenya, *Unpublished MBA Project, University of Nairobi.*

Nave, D. (2002). How to compare six sigma, lean and theory of constraints, *Quality progress, 35(3*), 73.

Naylor, J. (1996). Operations Management. Pitman Publishing. UK.

Ojung'a, K. (2010). Survey of Market-Share growth Strategies Adopted by Pharmaceutical Companies in Kenya for Branded Prescription Medicine. *Unpublished MBA project, University of Nairobi.*

Owino, K. O (2010). A survey of operations management practices applied by pharmaceutical companies in Kenya, *MBA Project, U.O.N*

Porter, M.E. (1999) Competitive Strategy New York Free press

Reid, R. D. , & Sanders, N. R. (2005). Operations Management: *An integrated Approach*. Hoboken, NJ: John Wiley

Samson, D., & Terziovski, M. (1999). The relationship between total quality management Practices and Operational performance. *Journal of operations Management, 17(4), 393 – 409*

Singh, A. S., & Masuku, M. B. (2017). Sampling techniques & determination of sample size in applied statistics research: An overview. *International Journal of Economics, Commerce and Management 2(11),1-22*

Slack, N., Chambers, S., & Johnstone, R. (2010). *Operations Management* .Pearson Education.

Stephane, G. (1999). Resource based competition and new operations strategy. *International journal of operations and production management vol.19 issue 2*

Stevenson, W. J., & Hojarti M., (2007). Operations Management (vol. 8). Boston: McGraw- Hill/ Irwin

Stevenson, W. J., (2014). Operations Management - Operations and Decision Sciences, 12th Edition McGraw-Hill Series

Tanui, P.K. (2008). A Survey of Quality Management Practices Of Pharmaceutical Manufacturing Companies in Kenya, Unpublished MBA Project, University of Nairobi.

Taylor, B.W. (2007). Operations Management. 4th Edition. Prentice Hall of India: New Delhi.

Thompson, S. (2009). Strategic Management: Concept case 6th edition –Richard D Irwin

Thompson, S. (2010). Crafting and executing Strategy –Gamble 16th edition McGraw-Hill 2008

Wabita, F. M. (2013). Determinants of Financial Performance of Insurance Companies In Kenya. University of Nairobi unpublished Master of Science in Finance project.

Waters, D.(2002) Operations Management. Addison-Wesley Publishers; UK www.gsk.com/mission-strategy/simplify.htm

Wheelwright, S. C & Hayes R.H (1985) Competing through manufacturing-Haward Business Revision Jan-Feb 1985

Wireman, T. (2004). Total Productive Maintenance. Industrial Press Inc

Womack, J.P., Jones, D.T. & Roos, D. (1990), The Machine that Changed the World, Rawson Associates, New York, NY.

Xia, Y., Singhal, V. R. & Peter Zhang, G.(2016). Product Design Award and the market value of the firm. *Production and Operation Management, 25(6*), *1038 –1055*

APPENDICES

APPENDIX I: QUESTIONNAIRE

The questionnaire is divided into three parts as follows: general information, operations management practices, and application and impact of operations management practices in Insurance brokers in Nairobi. Please answer the questions as guided by the instructions in each part. **All the responses will be treated with the confidentiality they deserve.**

PART A: GENERAL INFORMATION

Kindly answer the following questions by ticking in the appropriate box or filling the spaces provided.

1. Name of the Organisation. …….
2. What is your highest level of Academic Qualification? [ ] PhD [ ] Masters [ ] Bachelors [ ] Diploma [ ] Certificate [ ] Other (specify)……..
3. Number of years you have worked with the organization

   Under 5 year ☐ Over 5 but Less than 10years ☐

   Over 10 but less than 15 ☐ Over 15 but less than 20 ☐

   Over 20 years ☐
4. Does operations department play an important role in the organization?

   Yes [ ] No [ ]

PART B: OPERATIONS MANAGEMENT PRACTICES BY INSURANCE BROKERS IN NAIROBI.

1. Indicate on a scale of 1 – 5 to what extent you agree with the following about your organization.

   1=Strongly Agrees 2 = Agree 3 = Neutral 4 = Disagree 5 =Strongly Disagree

Sno.	Description	Rating				
1	**Machine and Equipment Maintenance**	**1**	**2**	**3**	**4**	**5**
i.	There is a documented maintenance program for machinery and equipment					
ii.	Machine and equipment maintenance is done when there is less work or when equipment breaks down					
iii.	There is regular inspection of machines and facilities and the operators are responsible for their own machine cleaning, lubrication, and regular maintenance.					
iv.	The organization keeps detailed machine and equipment maintenance and work order records					
v.	The organization has standardized maintenance checklists					
2.	**Quality Management**	**1.**	**2.**	**3.**	**4.**	**5.**
i.	The organization has a documented quality management system in place					
ii.	The magnitude and frequency of quality related occurrences has reduced significantly over the past one year					

iii.	The organization welcomes and acts on end user complaints					
iv.	Quality levels are determined by end user bench marks and the regulatory authorities.					
v.	All employees are encouraged to check the quality of each operation they complete before proceeding to the next operation.					
3.	**Supply Chain Management**	**1.**	**2.**	**3.**	**4.**	**5.**
i.	The company has a list of preferred suppliers					
ii.	Are there on time deliveries from suppliers?					
iii.	The company has mutual relationship with the supplier					
iv.	Is there reduction of stocks in stores?					
v.	There is constant burden and disorganization, with a high level of Work-in-Progress items					
4.	**Product and Service Design**	**1.**	**2.**	**3.**	**4.**	**5.**
i.	The services comply with the legal requirements in the country					
ii.	The services comply with the internal organizational requirements					
iii.	Provide services that are easily accessible by the customers					
iv.	Provide services that are easily acceptable to the customers					
v.	Company follows keenly on what others are doing in the insurance industry					
5.	**Planning and Control**	**1.**	**2.**	**3.**	**4.**	**5.**

i.	There is reducing times for new product's development and commercialization					
ii.	The organization has flexibility in adapting to different production capacity					
iii.	Employees fully understand the goals, policies, and objectives of this organization					
iv.	Does the business have a budgeting committee					
v.	The company has a system for remedial and reward					

PART C: APPLICATION AND IMPACT OF OPERATIONS MANAGEMENT PRACTICES BY INSURANCE BROKERS IN NAIROBI.

1. Indicate on a scale of 1 – 5 to what extent you agree with the following about your organization.

1 = strongly Agrees 2 = Agree 3 = Neutral 4 = Disagree 5 =strongly disagree

Sno.	Description	Rating				
		1	**2**	**3**	**4**	**5**
i.	Supply Chain Management					
ii.	Product and Service Design					
iii.	Machine and Equipment Maintenance					
iv.	Quality management					
v.	Planning and Control					

2.The importance of OMP's on Insurance Brokers in Nairobi

Please indicate by ticking (√) the extent to which the following operations management practices are important in your organization as per the following scale of 1 – 5

1 = Not at all important	2 = Some Importance	3 = Desirable	4 = Very Important	5 =Top Priority

Sno.	Description	Rating				
		1	**2**	**3**	**4**	**5**
i.	Supply Chain Management					
ii.	Product and Service Design					
iii.	Machine and Equipment Maintenance					
iv.	Quality management					
v.	Planning and Control					

3.The importance of OMP's in Insurance Brokers' Performance In Nairobi.

Please indicate by ticking (√) the extent to which the following operations management practices are important in your organization as per the following scale of 1 – 5

1 = strongly Agrees 2 = Agree 3 = Neutral 4 = Disagree 5 =strongly disagree

Sno.	Description	Rating				
		1	**2**	**3**	**4**	**5**
i.	SCM has a strong positive impact on most of the KPIs used to measure insurance performance					

ii.	Product and design system positively affects the insurance performance and in particular that of its production through improved supply chain performance by way of quantities required and when they are required					
iii.	The adoption of Quality has been positively associated with the improvement of general performance, with a higher operation efficiency and with better financial results					
iv.	Planning and control improves organizational performance, through the efficiency with which employees are deployed and also through improved productivity					
v.	Machine and Equipment maintenance is a powerful practice for the optimal utilization of production assets and human capital.					

Performance Indicators

Kindly provide the following information to help determine the performance index for your insurance broker.

Performance Measure	Unit of Measure	2013	2014	2015	2016	2017
Claims Payable	No of Claims					
No of Claims Paid	No of Claims					
Time taken to pay the claims	Days					
Cost	Kshs					
Profit before Tax	Kshs					
No of Accounts	No of Accounts					

APPENDIX II: WORKPLAN

Date '07/2017 Activity	13-05 To 22-05	23-06 To 16-07	16-07 To 07-11	08-8/18 To 15-8/18	16-10 To 29-10	1- To 15- 09/18	16- To 30- 09/18
1							
2							
3							
4							
5							
6							
7							

Key

1. Identification of The Problem
2. Proposal Writing
3. Questionnaire Formulation
4. Testing
5. Data Collection
6. Data Analysis
7. Compiling Final Report

APPENDIX III – BUDGET

Sno	Item	Kshs
1	Printing of Paper	3,000
2	Photocopy	6,000
3	Telephone Calls And Internet	5,000
4	Transport	7,000
5	Labour	10,000
6	Postages	1,000
7	Contingencies (10 % of Total Cost)	3,200
	Total	35,200

APPENDIX IV: LIST OF INSURANCE BROKERS IN NAIROBI

Sno.	IRA Registration Number	Insurance Broker
1	IRA/06/122/2017	AA Insurance Brokers Limited
2	IRA/06/526/2017	Afriq Insurance Brokers Limited
3	IRA/06/452/2017	Alexander Forbes Risk & Insurance Brokers
4	IRA/06/313/2017	AMS Insurance Brokers Limited
5	IRA/06/014/2017	Aon Kenya Insurance Brokers Limited
6	IRA/06/539/2017	Apis Insurance Brokers Limited
7	IRA/06/114/2017	Aristocrats Insurance Brokers Limited
8	IRA/06/058/2017	Assured Insurance Brokers Limited
9	IRA/06/531/2017	Bapa Insurance Brokers Limited
10	IRA/06/582/2017	Bluecover Insurance Brokers Limited
11	IRA/06/555/2017	Broadcover Insurance Brokers Limited
12	IRA/06/487/2017	Busam Insurance Brokers Limited
13	IRA/06/125/2017	Canopy Insurance Brokers Limited
14	IRA/06/443/2017	Centaur Insurance Brokers Limited
15	IRA/06/095/2017	Chancery Wright Insurance Brokers Limited
16	IRA/06/319/2017	Chester Insurance Brokers Limited
17	IRA/06/002/2017	Clarkson Insurance Brokers Limited
18	IRA/06/054/2017	Consolidated Insurance Brokers Limited
19	IRA/06/045/2017	Crownscope Insurance Brokers Limited
20	IRA/06/284/2017	Disney Insurance Brokers Limited
21	IRA/06/471/2017	Dynamique Insurance Brokers Limited
22	IRA/06/008/2017	Eagle Africa Insurance Brokers Limited
23	IRA/06/194/2017	Formax Insurance Brokers Limited
24	IRA/06/329/2017	Four Stars Insurance Brokers Limited
25	IRA/06/019/2017	Gachichio Insurance Brokers Limited
26	IRA/06/110/2017	Getrio Insurance Brokers Limited
27	IRA/06/051/2017	H. G. Thanawalla Insurance Brokers Limited
28	IRA/06/029/2017	H. S. Jutley Insurance Brokers Limited
29	IRA/06/586/2017	Hawk Bay Insurance Brokers Limited
30	IRA/06/441/2017	Hillstone Insurance Brokers Limited
31	IRA/06/510/2017	Homeland Insurance Brokers Limited
32	IRA/06/461/2017	Hp Insurance Brokers Limited
33	IRA/06/527/2017	J W Seagon Insurance Brokers (K) Limited

34	IRA/06/347/2017	Kenbright Insurance Brokers Limited
35	IRA/06/121/2017	Lema Insurance Brokers Limited
36	IRA/06/013/2017	Liaison Group (Insurance Brokers) Limited
37	IRA/06/412/2017	Lifecare International Insurance Brokers Limited
38	IRA/06/291/2017	Macly Insurance Brokers Limited
39	IRA/06/382/2017	Mic Global Risks Insurance Brokers Limited
40	IRA/06/436/2017	Miran Insurance Brokers Limited
41	IRA/06/505/2017	Nyadwe Insurance Brokers Limited
42	IRA/06/495/2017	Octagon Insurance Brokers Limited
43	IRA/06/077/2017	Pacific Insurance Brokers (Ea) Limited
44	IRA/06/033/2017	Pelican Insurance Brokers (K) Limited
45	IRA/06/463/2017	Plan & Place Insurance Brokers Limited
46	IRA/06/280/2017	Prime Mover Insurance Brokers Limited
47	IRA/06/497/2017	Prosperity Insurance Brokers Limited
48	IRA/06/583/2017	Questgroup Insurance Brokers Limited
49	IRA/06/148/2017	Roberts Insurance Brokers Limited
50	IRA/06/544/2017	Royal Associates Insurance Brokers Limited
51	IRA/06/324/2017	Samnel Insurance Brokers Limited
52	IRA/06/442/2017	Smartguard Insurance Brokers Limited
53	IRA/06/483/2017	Snowcaps Insurance Brokers Limited