THE DETERMINANTS OF FINANCIAL PERFORMANCE IN GENERAL INSURANCE COMPANIES IN KENYA

BY

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DECLARATION

I, the undersigned, declare that this is my original work and has not been submitted to any other college, institution or university other than the University of Nairobi for academic credit.

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This project report has been submitted with my approval as the University Supervisor:-

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DEDICATION

To my dad and mum who taught me the value of education.

ABSTRACT

The contribution of general insurance industry in Kenya to her gross domestic product is at 2.08 %. This is quite low inspite of the rising awareness of the importance of insurance and the efforts by insurance companies to expand their presence. This is by introducing micro insurance and takaful, as well as use of alternative distribution channels. In this context, the present study tried to establish the factors determining the profitability of non-life insurers operating in Kenya taking return on asset as dependent variable. The sample for this study include all the 23 general insurance companies in Kenya and it used the data pertaining to four financial years from year 2009-2012. For this purpose, firm specific characteristics such as leverage, retention ratio, liquidity, underwriting risk, equity capital, size, management competence index, ownership and age were regressed against Return on Assets. This study led to the conclusion that profitability of general insurers in Kenya is positively and significantly influenced by leverage, equity capital, and management competence index. Size of the firm (measured as the natural logarithm of total assets) and ownership structure (foreign ownership) have a negative and significant effect on performance of general insurers in Kenya. Further, liquidity has a negative and a marginally significant effect on performance of general insurers in Kenya. The study does not find evidence for the effect of age of the firm on performance of general insurers in Kenya. The study recommends that for general insurers in Kenya to perform better in terms of their return on assets, they should improve on their leverages, equity capital and quality of staff.

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ABBREVIATIONS

AKI: Association of Kenya Insurers

CSP: Corporate Social Performance

GDP: Gross Domestic Product

IRA: Insurance Regulatory Authority

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CHAPTER ONE: INTRODUCTION

1.1 Background of the Study

As part of the general financial system, insurance companies provide unique financial services to the growth and development of every economy. Such specialized financial services range from the underwriting of risks inherent in economic entities and the mobilization of large amount of funds through premiums for long term investments (Agiobenebo and Ezirim, 2002). The risk absorption role of insurers promotes financial stability in the financial markets and provides a sense of peace to economic entities. The business world without insurance is unsustainable since risky business may not have the capacity to retain all kinds of risks in this ever changing and uncertain global economy (Ahmed, Ahmed, and Ahmed, 2010).

The insurance companies' ability to continue to cover risk in the economy hinges on their capacity to create profit or value for their shareholders. A well-developed and evolved insurance industry is a boon for economic development as it provides long-term funds for infrastructure development of every economy (Charumathi, 2012). The Insurance Regulatory Authority - the regulatory body of the Kenyan insurance sector, has intensified supervision, field visits, and coupled by a risk-based assessment of insurers' activities. All of these changes have resulted in a keener competition in the industry. Thus, it is in the interest of every insurer to identify the critical factors that determine business success.

Besides, the 2007/2009 financial crises and the growing competition in the Kenyan insurance industry have rekindled the need to assess the determinants of insurers' profitability on the premise that a sound and lucrative insurance industry is needed to create a resilient financial market (Agiobenebo and Ezirim, 2002). Much of the

extensive empirical literature on the determinants of profitability is mostly focused on the banking industry. Very little is known about the insurance industry especially from the perspective of an emerging market like Kenya. This paper seeks to open the flood gates for more scientific research and academic debate into Kenyan general insurers' financial performance.

1.1.1 Financial Performance of General Insurance Companies

In general, financial performance is a measure of an organization's earnings, profits, appreciations in value as evidenced by the rise in the entity's share price (Asimakopoulos, Samitas, and Papadogonas, 2009). In insurance, performance is normally expressed in net premium earned, profitability from underwriting activities, annual turnover, returns on investment and return on equity.

These measures can be classified as profit performance measures and investment performance measures. Profit performance includes the profits measured in monetary terms. Simply, it is the difference between the revenues and expenses. These two factors, revenue and expenditure are in turn influenced by firm-specific characteristics, industry features and macroeconomic variables (Buyinza, 2010) and (Indranarain, 2009). Investment performance can take two different forms. One the return on assets employed in the business other than cash, and two, the return on the investment operations of the surplus of cash at various levels earned on operations.

At the micro level, profit is the essential pre-requisite for the survival, growth and competitiveness of insurance firms and the cheapest source of funds (Buyinza, 2010). Without profits insurers can't attract outside capital to meet its set

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objectives in this ever changing and competitive globalized environment. Profit does not only improve upon insurers' solvency state but it also plays an essential role in persuading policyholders and shareholders to supply funds to insurance firms (Harrington and Wilson, 1989). Thus, one of the objectives of management of insurance companies is to attain profit as an underlying requirement for conducting any insurance business.

1.1.2 Determinants of Financial Performance of General Insurance Companies

General Insurer's profitability is influenced by both internal and external factors. Whereas internal factors focus on an insurer's specific characteristics, the external factors concern both industry features and macroeconomic variables. The profitability of insurance companies can also be appraised at the micro, meso, and macro levels of the economy. The micro level refers to how firm-specific factors such as size, capital, efficiency, age, and ownership structure affect profitability.

The meso and macro levels refer to the influence of support-institutions and macroeconomic factors respectively. These factors include; Debt leverage which is measured by the ratio of total debt to equity (debt/equity ratio). This ratio shows the degree to which a business is utilizing borrowed money. It reflects insurance companies' ability to manage their economic exposure to unexpected losses. This ratio represents the potential impact on capital and surplus of deficiencies in reserves due to financial claims (Adams and Buckle, 2000).

Another determinant of financial performance is the level of liquidity. Liquidity refers to the degree to which debt obligations coming due in the next twelve

months can be paid from cash or assets that will be turned into cash. Insurance liquidity is the ability of the insurer to fulfil their immediate commitments to policyholders without having to increase profits on underwriting and investment activities and/or liquidate financial assets (Chaharbaghi and Lynch, 1999). The cash and bank balances are to be kept sufficient to meet the immediate liabilities towards claims due for payment but not paid.

The size of the firm is another factor that determines an insurance company's financial performance. The size of the firm affects its financial performance in many ways. Large firms can exploit economies of scale and scope and thus being more efficient compared to small firms (Ahmed, Ahmed, and Ahmed, 2010). The size is determined by net premium which is the premium earned by an insurance company after deducting the reinsurance ceded. The premium base of insurers decides the quantum of policy liabilities to be borne by them (Teece, 2009). Net Premium is expressed as the Total Premium earned less Reinsurance ceded.

Another factor is the age of a company. Evidently, older firms are more experienced, have enjoyed the benefits of learning, are not prone to the liabilities of newness, and can therefore; enjoy superior performance (Shiu, 2004). Older firms may also benefit from reputation effects, which allow them to earn a higher margin on sales. On the other hand, older firms are prone to inertia, and the bureaucratic ossification that goes along with age; they might have developed routines, which are out of touch with changes in market conditions, in which case an inverse relationship between age and profitability or growth could be observed (Demirgüç-Kunt and Maksimovic, 1998).

The other factor determining financial performance is underwriting risk which reflects the adequacy, or otherwise, of insurers' underwriting performance (Adams and Buckle, 2000). Sound underwriting guidelines are pivotal to an insurer's financial performance. The underwriting risk depends on the risk appetite of the insurers. The ratio of Benefits Paid to Net Premium is a measure of underwriting risk.

Equity Capital which is the capital raised from owners in the company, is the residual claimant or interest of the most junior class of investors in assets, after all liabilities are paid; if liability exceeds assets, negative equity exists (Hansen, 1999). In an accounting context, shareholders' equity (or stockholders' equity, shareholders' funds, shareholders' capital) represents the remaining interest in the assets of a company, spread among individual shareholders of common or preferred stock; a negative shareholders' equity is often referred to as a positive shareholders' deficit (Lee, 2008). More capital influx will enable the players to expand and open new branches, which in turn will incur more operating expenses.

Retention ratio is the percentage of the underwritten business which is not transferred to reinsurers. A higher retention ratio with lower claims ratio is likely to impact on the performance of insurers' positively. Theoretically, a more efficient insurance company should have growth in profits since it is able to maximize on its net premiums and net underwriting incomes (Charumathi, 2012).

Another factor that impacts the financial performance of an insurance company is the ownership. There are two main dimensions of the ownership structure: Ownership concentration that is., the distribution of shares owned by majority shareholders and identity of owners especially, foreign investors and institutional

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investors. Ownership structure influences the management of the company to either pay dividends or interest, or decide whether to retain much of its profits for further use in the company (Agiobenebo and Ezirim, 2002).

1.1.3 General Insurance Companies in Kenya

According to an IRA annual report released in the year (2012), the Kenyan general insurance industry comprises of 23 companies. Other players in this sector include one hundred and seventy four (174) licensed insurance brokers, four thousand and eight hundred and three (4,803) insurance agents, one hundred twenty nine (129) investigators, ninety six (96) motor assessors, twenty (20) loss adjusters, one claims settling agent, eight (8) risk managers and twenty six (26) insurance surveyors.

According to the association of Kenya Insurers, general insurance penetration as at 2012 stood at 2.08%, this was represented by gross written premium of Kshs 71.46 Billion. The general insurers' profitability stood at Kshs 11.82 Billion. The general insurance premium grew by 17.78% in 2012 further underpinning the growth potential the industry presents. The insurance industry is currently experiencing disruptive change driven by regulation and competition. The amendments under the Finance Act, 2012 that took effect on 1st January, 2013 have resulted in remarkable changes in the structure, competition, efficiency and the growth of the industry. Section 2 of the Insurance Act, Cap 487 was amended to allow the Authority to assess the suitability of a significant owner.

A significant owner is defined as a person who holds more than ten (10%) percent of the controlling or beneficial interest in a person licensed under this Act. Under Section 3A the functions of the Authority were expanded to allow the authority to issue supervisory guidelines, come up with prudential standards, and also share

information with other regulatory authorities all aimed at strengthening the regulators role. The Authority was also given power to conduct inquiries or investigations in furtherance of its supervisory role. Under Section 54 Insurers are now required to submit their quarterly returns within thirty (30) days after the end of each quarter.

The performance of the Kenyan insurance industry is in tandem with the global industry (IRA, 2012). The industry has consistently recorded growth over the years with gross written premium for general insurance companies rising from Kshs 25.39 Billion in 2005 to Kshs 71.46 Billion in 2012 (IRA, 2012). Despite the enhanced growth in premiums, insurance penetration continues to be far below the desired benchmark. The contribution of total insurance premiums to GDP, which measures insurance penetration, in real terms, is 3.16% as against 14.16% in South Africa; 8.0% in Namibia and 5.94% in Malaysia(Swiss, 2013). The industry has also witnessed growth in the number of insurance entities. The number of insurance companies grew from 42 in 2008 to 46 in 2012. As at December 2012, the Insurance Regulatory Authority had licensed 23 non-life insurance firms and 12 composite firms (both life and non-life).

The industry has also witnessed increase in the incurred net claims totaling Kshs 48.36 billion in 2012 compared to Kshs 37.69 billion in 2011, representing an increase of 28.31%. There has also been increase in complaints from the general public against various insurers for reasons such as: differences between benefits promised by insurers from what is stated in policy documents, insurers' failure to stop deductions of premiums after policy has been surrendered, payment of rather low surrender values, and delays in paying claims.

1.2 Research Problem

The concept of financial performance has received a significant attention from scholars in the various areas of business and strategic management (Barney, 1991). It is of primary concern of virtually all business stakeholders in any sector since financial performance is an ingredient to organizational health and ultimately its survival (Batra, 1999). High performance reflects management effectiveness and efficiency in making the use of company's resources; this contributes to the economy at large (Ansah-Adu, Andoh, and Abor, 2012).

For instance, the Kenyan insurance industry is a vital part of the entire financial system. Apart from banks, insurance companies command a great share in contribution to financial intermediation process of many economies (Agiobenebo and Ezirim, 2002). As such, their success means the success of the economy; their failure means failure to the economy (Ansah-Adu, Andoh, and Abor, 2012).

Identifying the key success indicators of insurance companies can help in facilitating the design of policies that may improve the profitability of the insurance industry. Hence, the determinants of insurers' profitability have attracted a keen interest of investors, scientific researchers, financial markets analysts and insurance regulators (Asimakopoulos, Samitas, and Papadogonas, 2009). The scientific knowledge of the determinants of insurers' profitability has further been reinvigorated by the 2007/2009 global economic and financial crises.

In his MBA project, Mwangi (2013) sought to establish the factors; and the extent to which they influence financial performance of insurance companies. He used profitability as a financial performance indicator. He noted that interest rate

fluctuations, liquidity, and competition are the key factors that influence financial performance of Kenyan insurance companies, but he did not state their relationship.

In his Msc Finance research project, Wabita (2013) sought establish the determinants of financial performance of insurance companies in Kenya. He established that; growth of the insurance industry positively affects financial performance, leverage of the insurance industry negatively affects financial performance, and the amount of tangible assets held by the industry positively affects financial performance. His finding was quite different from those found by Mwangi (2013).

Mutugi (2012) sought to establish factors that influence financial performance of life assurance companies in Kenya. His findings varied slightly from the results of the two immediate former researchers above in that he concluded that capital structure, innovation and ownership structure are determinants of financial performance, but did not specify the relationship.

Literatures from past studies reveal that the findings from most researchers have not reached to a common conclusion. Specifically, their findings did not indicate the relationship between the various factors which they found to determine financial performance of general insurance companies of Kenya. Furthermore, the findings by Mwangi (2013), Wabita (2013), and Mutugi (2012) were inconclusive. Studies elsewhere reveals that the factors that influence organizational performance are specific and different in different markets. The question that really begs and is the subject of this study is what are the determinants of financial performance of general insurance companies in Kenya? The study will seek to establish the

relationship between financial performance in insurance companies and its determinant variables.

1.3　Research Objective

The study aims to establish the determinants of financial performance in general insurance companies in Kenya.

1.4　Value of the Study

The study will be useful to academics, regulators and industry players by giving a multidimensional view to financial performance, informing policy and enhancing general insurance practice. It will enrich the theory of financial performance by providing insights on the underlying determinants once evaluated by an industry in application. The multi-dimensional perspective will provide a theoretical basis for this research and insights obtained will enrich the theories of resource based view, stakeholder perspective, causality, dynamic capability and open system theory.

It will further inform regulatory policy for the general insurance industry as it will provide the regulator with tools to appraise a firm's stability that is critical in the risk based supervisory framework. In Kenya, the regulators of financial services are contemplating consolidation. The study will provide input to policy formulation on performance when drafting the framework for consolidated regulation. Finally, it will assist the practice of general insurance in Kenya by identifying best practice with respect to performance determinants for adoption. The government for instance can use the research findings or conclusions, to better the reporting, performance and regulation of the insurance industry thus reequip the industry to undertake the emerging risks.

CHAPTER TWO: LITERATURE REVIEW

2.1   Introduction

This chapter elaborates the concept of determinants of financial performance by reviewing various literal works on financial performance.

2.2   The Theoretical Foundation

This reviews studies that have been done in the area of determinants of firm performance. The specific theories covered here are the stakeholder theory, the theory of causality, the open system theory, resource based view theory and dynamic capability theory.

2.2.1 The Stakeholder Theory Perspective

There have been many queries on what organizational leaders should pursue as a goal of the firm in order to attain the optimal organizational performance. Laplume (2008), notes that most scholarly works on stakeholder theory generally credit R. Edward Freeman as the "father of Stakeholder Theory." Freeman's Strategic Management: A Stakeholder Approach is widely cited in the field as being the foundation of Stakeholder Theory, although Freeman himself credits several other bodies of literature in the development of his approach which includes Strategic Management, Corporate Planning, Organization Theory, and Corporate Social Responsibility.

At the heart of stakeholder theory, is the investigation of the relationship between corporate social performance (CSP) and corporate financial performance. As a

"theory of organizations", stakeholder theory helps to nourish a relational model of organizations by revisiting questions about "who" is actually working with (and in) the firm and hence who should, as a cardinal principle be given priority in order to achieve the maximum value of the firm both today and in the long-run (Freeman, 1984).

Stakeholder theory is part of a comprehensive project that views the organization-group relationship as both a foundation and a norm (Bernadette, Krishnamurty, Brown, Janny, and Karen, 2001). It provides a framework for investigating the relationship between corporate social performance (CSP) and corporate financial performance. Studies from empirical studies have supported stakeholder theory which asserts that the dominant stakeholder group – shareholders, financially benefit when management meets the demands of multiple stakeholders (Bernadette, Krishnamurty, Brown, Janny, and Karen, 2001).

Specifically, change in CSP has been positively linked with growth in sales for the current and subsequent years (Laplume, Karan, and Reginald, 2008). This implies that there are short-term and long-term benefits obtained from improving CSP. However, the stakeholder theory has been criticized. The political philosopher Charles Blattberg criticized the theory for assuming that the interests of the various stakeholders can be, at best, compromised or balanced against each other (Blattberg, 2004). He argues that its emphasis on negotiation as the chief mode of dialogue for dealing with conflicts between stakeholder interests is far-fetched. He recommends conversation instead and this leads him to defend what he calls a 'patriotic' conception of the corporation as an alternative to that associated with stakeholder theory.

2.2.2 The Theory of Causality

The theory of causation dates back to the days of Aristotle. Mure (1975), notes that Aristotelian science consists of causal investigation of a specific department of reality. If successful, such an investigation results in causal knowledge; that is, knowledge of the relevant or appropriate causes. The emphasis on the concept of cause explains why Aristotle developed a theory of causality which is commonly known as the doctrine of the four causes. In his article , "Aristotle on Adequate Explanations" Moravcsik (1974) states that for Aristotle, a firm grasp of what a cause is, and how many kinds of causes there are, is essential for a successful investigation of the world around us.

Simply, the theory of causation states that; "everything has a cause and an effect, everything is a cause and/or effect of some sort, one cause can be the effect of another thing, and that one effect can be the cause of another thing (Herbert and Rescher, 1966). In studying the relationship between two or more variables, it is the concept of which variable causes the other and in which direction (the analysis of the relationship) is always involved. However, the distinction between causation and correlation is very important in scientific thought since correlation does not imply causation (Holland, 1986). While correlation refers to how closely two sets of information or data are related and measured by square of the correlation coefficient R^2, causation is "the act or process of causing; the act or agency which produces and effect" and is measured by R, the Pearson product-moment correlation coefficient (Devlin, Gnanadesikan and Kettenring, 1975).

2.2.3 The Open System Theory

Bertanlanffy (1988) defined an open system as a system in exchange of matter with its environment, presenting import and export, building up and breaking down of its material components. Open systems theory has varied applications in various disciplines such as social science, anthropology, history amongst others. In management the theory states that as organizations and communities conduct their business they influence and change their external environments, while at the same time being influenced by external changes in local and global environments. This two way influential change is known as active adaptive change.

Open system theory of management states that as organizations conduct their business, they influence and change their external environments while at the same time being influenced by external changes in local and global environments (Chaharbaghi and Lynch, 1999). This two way influential change is known as change active adaptive. Organizations and communities are open systems, changing and influencing each other over time. To be able to study an organization under this feature the following terms and definitions are outlined.

The boundary refers to an arbitrary line that outlines the area to be studied in the organization. The environment which includes all identified aspects and influences to the area under study that are outside the system. Inputs in this context will refer to anything that comes into the identified system from the environment. These will include customers' orders, power supplies, technological equipment, raw material and labor. Processes refer to the whole cycle that converts inputs into outputs.

This encompasses production, planning processes as well as marketing the organization's products and completing the sales process (Chaharbaghi and Lynch,

1999). Outputs will refer to anything that leaves the identified system and is transferred to the environment. They will include products and services but the systems approach also considers waste and losses as outputs. This systems approach identified the negative feedback control loop as he most common adaptive mechanism for open system. The negative feedback control loop, attempts to eliminate those differences that are identified between the desired results and actual results.

2.2.4 Resource Based View Theory

Mahoney and Pandian (1992) states a resource based view of a firm explains its ability to deliver sustainable competitive advantage when resources are managed such that their outcomes cannot be imitated by competitors, which ultimately creates a competitive barrier. Barney (1991) summarizes the criteria for evaluating resources as VRIN that is, Valuable, Rare, In-imitable and Non substitutable.

Resource based view provides the understanding that certain unique existing resources will result in superior performance and ultimately build a competitive advantage. Sustainability of such advantage will be determined by the ability of competitors to imitate such resources. However, the existing resources of a firm may not be adequate to facilitate the future market requirement, due to volatility of the contemporary markets. There is a vital need to modify and develop resources in order to encounter the future market competition.

Makadok (2001) emphasizes the distinction between capabilities and resources by defining capabilities as a special type of resource, specially an organizationally embedded non-transferable firm specific resource whose sole purpose is to improve the productivity of the other resources possessed by the firm. The resource based view

has been a common interest for management researchers and numerous writings could be found for the same. A resource based view of a firm explains its ability to deliver sustainable competitive advantage when resources are managed such that their outcomes cannot be imitated by competitors, which ultimately creates a competitive barrier (Mahoney and Pandian 1992).

2.2.5 Dynamic Capability Theory

Teece (1997) defines dynamic capability as the firm's ability to integrate, build and reconfigure internal and external competences to address rapidly changing environments. Organizations and their employees need capability to learn quickly and to build strategic assets. New strategic assets such as capability, technology and customer feedback have to be integrated within the company. Existing strategic assets have to be transformed or reconfigured. Dynamic capability is essentially the learning of an organization, development of new assets and the transformation of existing assets.

Teece (2009) over time a firm's assets may become co-specialized, meaning that they are uniquely valuable in combination. An example is where the physical assets, human resources and the intellectual property of a company provide synergistic combination of complementary assets. Such co-specialized assets are therefore more valuable in combination than in isolation.

The combination gives a more sustainable competitive advantage. Dynamic capability framework considers the ability of a firm to integrate, build and reconfigure internal and external competences to address rapidly changing environments. This framework or theory refers to the resources in the resource base theory as proposed by Barney

(1986) and Wernerfelt (1984). They are those specific physical, human and organizational assets that can be used to implement value creating strategies.

Grant (1996) and Pisano (1994) while observing dynamic capabilities are the antecedent organizational and strategic routines by which managers alter their resource base, acquire and shed resources, integrate them together and recombine them to generate new value creating strategies. They say that dynamic capabilities consist of identifiable and specific routines with some integrating resources for example product development routines by which managers combine their varied skills and functional backgrounds to create revenue products and services.

Hansen (1999) also indicates that other dynamic capabilities focus on reconfiguration of resources within firms. Transfer processes including routines for replication and brokering are used by managers to copy, transfer and recombine resources, especially of measures. Another potential problem with this is that measures remain loose and their relationships with each other are not understood (Malmi, 2005).

2.3 Empirical Literature

Several empirical studies have linked diverse factors with financial performance. Makadok (2001) emphasizes that holding appropriate resources in an organization can help enhance organizational performance. The resource based view has been a common interest for management researchers and numerous writings explain its ability to deliver sustainable competitive advantage when resources are managed to ensure their outcomes cannot be imitated by competitors, hence a competitive barrier for the firm (Mahoney and Pandian 1992).

Studies by Chen and Wong (2004) on the Pakistan life industry revealed that size, investment and liquidity are significant determinants of the profitability of insurers. However, Ahmed (2011) studied the Pakistani life insurance industry, and noted that liquidity is not a significant determinant of insurers' profitability. They posited that, whereas size and risk (loss ratio) are significant and positively related to the profitability of insurance firms, leverage is negative and hence decreases the profitability of insurers significantly.

Malik (2011) delved into the determinants of the financial performance of 35 listed life and non-life companies covering the period of 2005 to 2009. Although his study covers both sectors of the insurance business, much of his findings confirmed those of Ahmed (2011). Malik found that whereas size and capital have strong positive association with insurers' profitability, loss ratio and leverage have strong inverse relationship with profitability.

Adams and Buckle (2003) studied the Bermuda insurance industry and noted that highly geared and low liquid Bermuda insurers perform better and that their underwriting risk is directly related to a resilient financial performance. This suggests that actuarial risk and operational risks are well managed by Bermuda insurers. They further postulated that insurers' size and scope of business do not have significant influence on financial performance.

The findings by Adams and Buckle about the Bermuda market concurred with the results of an earlier study by Adams (1996) about the New Zealand insurance market. Adams (1996) established that firm-specific factors such as leverage and underwriting risk were positive and significantly related to investment earnings of life insurers.

However, studies by Charumathi (2012) in the Indian life insurance sector contradicted Adams & Buckle (2003) and Adams (1996). In his study, Charumathi (2012) claims that the profitability of life assurers is positive and significantly influenced by the size of an insurer as measured by net premiums. He further advanced that leverage, premium growth and equity capital have strong inverse relationship with insurers' profitability.

Mwangi (2013) conducted an investigative study, through a descriptive survey, on the factors that influence the financial performance of insurance companies in Kenya. He sought to establish some of the key factors that determine financial performance and the extent to which they influence financial performance of insurance companies. He used profitability as a financial performance indicator. He noted that interest rate fluctuations, liquidity, and competition are the key factors that influence financial performance of Kenyan insurance companies, but he did not state their relationship.

Wabita (2013) conducted a descriptive research design to establish the determinants of financial performance of insurance companies in Kenya. He established the three factors that majorly influenced financial performance of Kenyan Insurance companies as follows; growth of the insurance industry positively affects financial performance, leverage of the insurance industry negatively affects financial performance, and the amount of tangible assets held by the industry positively affects financial performance. The three factors that his study found to majorly influence financial performance were quite different from those found by Mwangi (2013).

Mutugi (2012) sampled 23 insurance companies and applied a descriptive study design, and used both primary and secondary data to establish the determinants of the financial performance of life assurance companies in Kenya. His findings varied slightly from the results of the two immediate former researchers above in that he concluded that capital structure, innovation and ownership structure are determinants of financial performance. Again, he did not indicate the kind of a relationship between the independent variables and financial performance - dependent variable.

2.4 Summary of Literature Review

Literatures from past studies reveal that the findings from most researchers have not reached to a common conclusion. The findings by Mwangi (2013), Wabita (2013), and Mutugi (2012) were inconclusive. They established many and differing factors that determine financial performance of insurance companies in Kenya but did not indicate the relationship between the various factors. Studies elsewhere reveals that the factors that influence organizational performance are specific and different in different markets.

Remarks by Ostroff and Schmidt (1993) posit that there is need for a multi-dimensional view of performance. This imply that different models or patterns of relationships between corporate performance and its determinants demonstrating the various sets of relationships between dependent and independent variables.

CHAPTER THREE: RESEARCH METHODOLOGY

3.1 Introduction

This chapter describes the research design that was adopted, the study population, the sampling, and the methods of collecting data, the research procedures, method of analyzing and presenting data.

3.2 Research Design

Research design constitutes the blue print for collection, measurement, and analysis of data (Cooper and Schindler, 2001). This research study adopted descriptive research design in the study and focused on the General Insurance Industry. Descriptive design is used to obtain information concerning the current status of the phenomena to describe what exists with respect to variables or conditions in a situation. In the study, the design sought to establish factors affecting profitability of the insurance firms'.

3.3 Population

Cooper and Schindler (2001), define a population as the total collection of elements about which we wish to make some inferences. The population of this study comprised all the 23 general Kenyan insurance firms. The study used data for the 4 financial periods, 2009-2012.

3.4 Data Collection

This study used secondary data. Secondary data is data that has been collected by someone else other than the user (Donald and McBurney, 2009). Bryman and Bell (2007) states that common sources of secondary data for social science include

censuses, surveys, organizational records and data collected through qualitative methodologies or qualitative research. Primary data, by contrast, are collected by the investigator conducting the research.

Secondary data analysis saves time that would otherwise be spent collecting data and particularly in the case of quantitative data, provides larger and higher-quality databases than would be unfeasible for any individual researcher to collect on their own. In addition to that, analysts of social and economic change consider secondary data essential, since it is impossible to conduct a new survey that can adequately capture past change and/or developments (Corti and Bishop (2005).

The study used data available for the last four years in the insurance study. The data required was drawn from Association of Kenya Insurers database, public disclosures and annual reports of the respective companies. Hence, a content analysis on the company's annual reports was a major source of the data for the study. The study applied the return on assets (ROA), the dependent variable Y as the measure of performance.

The X variables; Leverage (LEV), Retention ratio (R), Liquidity (LIQ), Underwriting Risk (UWR), Equity Capital (EC), Size (A), Management Competence Index (MI), Ownership (F), Age (Y) were computed using the data obtained from the annual reports of the companies as well as from the Association of Kenya Insurers database.

The independent variables used for this study were picked on the basis that most researchers such as; Mwangi (2013), Wabita (2013), and Mutugi (2012) who studied the Kenyan insurance market, as well as Curak et al. (2011), Adams and Buckle (2000), and Shiu (2004) in their studies seeking to establish the factors that influence

performance in insurance companies linked a relationship between the above factors and financial performance of insurance companies. The independent variables were computed from the data obtained through content analysis using the formulas in the table below.

Table 3.1:   Independent variables Computation Formulas

	Variables	Formula
X1	Leverage (LEV)	Total debt/Equity
X2	Retention ratio (R)	Net Premium (Total Premium earned - Reinsurance ceded)/Gross Premium
X3	Liquidity (LIQ)	Current Assets/Current Liabilities
X4	Underwriting Risk (UWR)	Benefits paid/Net Premium
X5	Equity Capital (EC)	Log of Equity Capital
X6	Size (A)	Log of total assets
X7	Management Competence index (MI)	Profit /number of professionals
X8	Ownership (F)	Number of foreign owners
X9	Age (Y)	Number of years since establishment

3.5   Data Analysis

The collected secondary data was analyzed using Statistical Package for Social Science (SPSS) version 20. A regression analysis was conducted on the data set. The Pearson Product Moment was used to analyze the data in which correlation coefficient (R^2) and the coefficient of determination (R) of the data set (for each determinant of financial performance) were established. The findings from the analysis were organized, summarized and presented using tables, and used to answer the study question.

The relationship between the factors that affect financial performance of Kenyan insurance companies for the purpose of this study was depicted using the expression;

$$R_i = \alpha + \beta_1 x_1 + \beta_2 x_2 + \beta_3 x_3 + \beta_4 x_4 + \beta_5 x_5 + \beta_6 x_6 + \beta_7 x_7 + \beta_8 x_8 + \epsilon_i$$

Where; X is the independent variable, α is the Y intercept, β is the coefficient, and ϵ is the error term. The statistical tests of significance that were carried out were to determine the p value which was derived from the ANOVA statistics.

CHAPTER FOUR: DATA ANALYSIS, RESULTS AND DISCUSSION

4.1 Introduction

This chapter presents the results of the study. The chapter is organized as follows; the first section provides the results of descriptive analysis on the variables used in the study. The second section presents the results of the regression analysis. The final section is the discussion of findings.

4.2 Response Rate

The data was gathered from 22 general insurance companies on the variables of interest representing a 95.65% response rate. This was after one firm (Concord) was dropped from the sample as it had been placed under receivership as at the time of this study and therefore data on it was unavailable for the recent years

4.3 Descriptive Results

The actual data used in this study is available in appendix II. Table 4.1 provides a summary of descriptive statistics on the variables.

Table 4.1:   Summary Descriptive Statistics

Variable	N	Mean	Std. Dev	Minimum	Maximum	Median
Performance (ROA)	22	0.06	0.03	0.01	0.13	0.06
Leverage (LEV)	22	2.85	2.05	1.12	9.73	2.20
Retention Ratio (R)	22	0.70	0.14	0.46	0.98	0.71

Liquidity (LIQ)	22	1.48	0.21	1.10	1.89	1.50
Underwriting Risk (UWR)	22	0.96	0.50	0.51	2.35	0.75
Equity Capital (EC)	22	14.04	0.75	12.84	15.63	13.92
Size (A)	22	15.30	0.91	13.81	17.17	15.18
Management Competence Index	22	26,442	17,212	2,866	59,590	18,190
Ownership (F)	22	6.88	16.28	0.00	52.25	40.41
Age (Y)	22	37.59	21.22	3.00	94.00	34.00

Source: Research Findings

Table 4.1 shows that the performance ranged from ROA of 1% (Kenindia) to 13% (Gateway). The mean ROA was 6% with a standard deviation of 3% and a median of 6%. Leverage ranged from 1.12 (Corporate) to 9.73 (Kenindia) with an average leverage of 2.85, a median of 2.20 and a standard deviation of 2.05. Retention ratio ranged from 46% (ICEA Lion) to 98% (Directline) with an average of 70%, a median of 71% and a standard deviation of 14%. Liquidity ranged from 1.10 (Kenindia) to 1.89 (Corporate) with a mean liquidity of 1.48, a median of 1.50 and a standard deviation of 0.21. Underwriting risk ranged from 51% (Kenya Orient) to 235% (Britam). The mean underwriting risk was 96% with a standard deviation of 50% and a median of 75%. The log of equity capital ranged from 12.84 (Kenya Orient) to 15.63 (Britam) with an average of 14.04, a median of 13.92 and a standard deviation of 0.75. Size of the firms ranged from 13.81 (Kenya Orient) to 17.17 (Jubilee) with a mean of 15.30, a median of 15.18 and a standard deviation of 0.91. Management competence index ranged from 2,866 (Kenya Orient) to 59,590 (Britam) with a mean index of 26,442, a median of 18,190 and a standard deviation of 17,212. Foreign ownership ranged from 0% to 52.25% (Jubilee). The mean foreign ownership was 6.88%, a median of 40.41% with a standard deviation of 16.28%. The results also showed that age ranged from 3 years (ICEA Lion) to 94 years (UAP) with a mean 37.59 years, a median of 34 years and a standard deviation of 21.22 years.

4.3   Regression Results

A correlation analysis was run with all the variables in the study. The correlation matrix is presented in Table 4.2. This was done to show whether the independent variables were serially correlated. When this happens, a regression analysis produces spurious results.

Table 4.2:   Correlation Matrix

	ROA	LEV	R	LIQ	UWR	EC	A	MI	F
LEV	-0.464								
R	0.291	-0.126							
LIQ	0.451	-0.815	0.195						
UWR	-0.338	0.562	-0.287	-0.415					
EC	-0.093	0.207	-0.152	-0.237	0.529				
A	-0.312	0.601	-0.254	-0.591	0.693	0.897			
MI	0.333	0.243	-0.232	-0.180	0.391	0.593	0.605		
F	-0.108	0.192	0.078	-0.130	0.343	0.636	0.597	0.552	
Y	0.166	0.071	0.133	0.129	0.171	0.425	0.335	0.216	0.596

Note: LEV = Leverage, R = Retention Ratio, LIQ = Liquidity, UWR = Underwriting risk, A = Size, MI = Management competence index, F = Age

Table 4.2 shows that most of the correlations were below 0.90. Usually, a decision to delete variable from a model rests with the researcher based on the fundamentals. In this case, a decision has been made to retain all the variables since none of them have a correlation more than 0.90. Thus, there is no multicollinearity between the independent variables. A multiple regression analysis was carried out with the dependent variable being ROA to proxy firm performance and a number of independent variables.

Table 4.3 presents the model summary of the multiple regression analysis using OLS method. The results estimate the fitness of the model used in the study.

Table 4.3:   Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.9492(a)	.9011	. 7740	.0140

Source: Research Findings

The standard error of the regression was found to be 0.014 which means that the average distance of the data points from the fitted line is about 0.014% of ROA. The R^2 shows that the model predicts 90.11% of the variance in performance. The adjusted R^2 shows that the model accounts for 77.40% of performance after adjusting for errors.

Table 4.4:   ANOVA

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	0.011965	9	0.001329	7.09	.009[b]
	Residual	0.001313	7	0.000188		
	Total	0.13278	16			

Source: Research Findings

From the ANOVA statistics in table above, the processed data, which is the population parameters, had a significance level of 0.9% which shows that the data is ideal for making a conclusion on the population's parameter as the value of significance (p-value) is less than 5%. The F critical at 5% level of significance was 7.09 since F calculated is greater than the F critical (value = 2.262), this shows that the overall model was significant. This is an indication that leverage, retention ratio, liquidity, underwriting risk, equity capital, size, management competence index, ownership, and age influence profitability of general insurers.

 Table 4.5 shows the results of the coefficients of the model used in the study. The coefficients, the standard error of coefficients, the t-value, and the p-value are shown. The results in the table show which variables have a significant effect on performance and how each of the variables affect performance of insurance firms.

Table 4.5:   Coefficients

	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
Constant	1.299	.425		3.06	.018
Leverage	.210	.055	.153	3.78	.007
Retention ratio	.014	.036	.001	.038	.713
Liquidity	-.372	.158	-.254	-2.36	.051
Underwriting risk	.026	.015	.012	1.72	.128
Equity capital	1.030	.280	.845	3.68	.008
Size	-1.033	.278	-.731	-3.72	.007
Management competence index	.000	.000	.000	6.20	.000
Ownership	-.002	.000	-.000	-3.56	.009
Age	.000	.000	.000	.680	.518

Source: Research Findings

The regression result in Table 4.5 clearly shows that there is a positive relationship between the return on assets and the insurance leverage (Total Debt/ Equity) The Beta coefficient for this variable is positive and significant at 5% with a P-Value of 0.007. Its t-test value is 3.78, the standardised coefficient Beta value is 0.153 while the un standardised coefficient Beta value is 0.210

The study revealed that there is a positive relationship between the return on assets and equity capital. The coefficient for the natural logarithm of equity capital is positive and significant, p=0.008. Its t-test value is 3.68. The un standardised coefficient of equity capital equals to 1.03 and its standardised coefficient Beta value is 0.845. Further, the results show that size of the firm had a negative and significant effect on performance, p = 0.007. Its t-test value is -3.72. The un standardised coefficient of size equals to -1.033 and its standardised coefficient Beta value is -

0.731. It was also revealed that management competence index had a positive and significant effect on performance, p = 0.000. Its t-test value is 6.20. The un standardised coefficient of management competence index equals to 0.000 and its standardised coefficient Beta value is 0.000 The study showed that foreign ownership had a negative and significant effect on performance, p = 0.009. Its t-test value is -3.56. The un standardised coefficient of foreign ownership equals to -0.002 and its standardised coefficient Beta value is 0.000.

The results in Table 4.5 also show that retention ratio as determined by net premium had a positive but insignificant effect on performance, p = 0.713. Its t-test value is 0.038. The un standardised coefficient of retention ratio equals to 0.014 and its standardised coefficient Beta value is 0.001 Further, while liquidity had a negative effect on performance of firm, it was marginally significant, p = 0.051. Its t-test value is -2.36. The un standardised coefficient of liquidity equals to 0.158 and its standardised coefficient Beta value is -0.254. Underwriting risk had a positive but insignificant effect on performance, p = 0.128. Its t-test value is 1.72. The un standardised coefficient of underwriting risk equals to 0.026 and its standardised coefficient Beta value is 0.012. The results also showed that age had a positive but insignificant effect on performance, p = 0.518. Its t-test value is 0.680. The un standardised coefficient of age equals to 0.000 and its standardised coefficient Beta value is 0.000.

4.4   Discussion of Research Findings

Leverage reflects the ability of insurance companies to manage their exposure to unexpected losses. In this study, leverage was measured as the ratio of debt to equity.

The results in Table 4.5 show that leverage had a positive effect on return on assets. The beta coefficient was positive and significant at 5% with a p-value of 0.007. Its t-value was 3.78 which is greater than the critical value of 1.96. This shows that leverage has a significant positive effect on performance of insurance firms in Kenya. Using standardized coefficient and holding all other factors constant, a 1% increase in leverage of insurance firms in Kenya will lead to a 0.153% increase in their performance. From these results, insurance firms with high leverages in Kenya perform better than those with low leverage.

Retention ratio is a rough measure of how much of risk is being carried by an insurer rather than being passed to reinsurers. In this study, it is measured as the ratio of net premium written to gross premium written. The results in Table 4.5 show that retention ratio has a positive effect on return on assets. The beta coefficient is positive and insignificant at 5% level with a p-value of 0.713. It has a t-value of 0.38 which is less than the critical value. Using standardized coefficient and holding all other factors constant, a 1% increase in retention ratio of general insurance firms in Kenya will lead to a 0.001% increase in their performance. Thus, retention ratio does not significantly affect performance of insurance firms in Kenya.

Liquidity is the ability of the insurers to fulfil their immediate commitments to policyholders without having to increase profits on underwriting and investment activities and/or liquidate financial assets (Adams and Buckle, 2003). This study measured liquidity as the ratio of total assets to total liabilities because it was assumed that most of the assets and liabilities were current. Further, the data from AKI annual reports does not separate current assets and liabilities from non-current ones. It was

therefore difficult to separate the current ones from non-current ones. The results in Table 4.5 show that there is a negative relationship between liquidity and return on assets. The beta coefficient for this variable is negative but marginally significant at 5% level with a p-value of 0.051. Its t-test value is -2.36 which is smaller than the critical value. Using standardized coefficient and holding all other factors constant, a 1% increase in liquidity of general insurance firms in Kenya will lead to a 0.254% decline in their performance. Hence, there is no significant relationship between liquidity and return on assets.

Underwriting risk reflects the adequacy, or otherwise, of insurers' underwriting performance (Adams and Buckle, 2003). In this study, underwriting risk was measured as the ratio of benefits paid to net premium. The results in Table 4.5 show that there is a positive relationship between underwriting risk and return on assets. The beta coefficient is positive but not significant. The t-test value is 1.72 which is less than the critical value. Thus, underwriting risk does not significantly affect return on assets. Using standardized coefficient and holding all other factors constant, a 1% increase in underwriting risk of general insurance firms in Kenya will lead to a 0.012% increase in their performance

Equity capital as a determinant of performance of insurance firms has also been studied in the past. In this study, equity capital was measured as the natural logarithm of equity. From the results in Table 4.5, the study found that equity capital has a positive relationship with return on assets. The beta coefficient is positive and significant at 5% level. Its t-value is 3.68 which is greater than the critical value. Thus, there is a significant positive relationship between equity capital and return on

assets. Using the standardised coefficient of equity capital and keeping all other variables constant, if the value of equity increases by 100, return on assets will increase by 103. Thus, insurers with more capital adequacy will have a comparative advantage to improve their return on assets.

Firm size has been used before as a control variable in performance studies and in this study, the effect of size of insurance firms on their performance was also tested. Size was measured as the natural logarithm of total assets. The results in Table 4.5 show that size had a negative relationship with return on assets. The beta coefficient was negative and significant at 5% level. The t-value was -3.72 which is greater than the critical value. Thus, there is a significant negative relationship between size of an insurance firm and return on assets. The standardised coefficient of size shows that, all other factors remaining constant, an increase in size by 100 leads to a reduction in return on assets by 103. This means that bigger insurance firms may be inefficient and their size does not give them a comparative advantage for improving their performance.

Management competence index was measured as the ratio of net income to number of professionals. In this study, the number of professionals was taken by looking at the number of management team for each insurance firm in the sample. Table 4.5 shows that management competence index had a positive relationship with return on assets. The beta coefficient is positive and significant at 5% level. The t-value is 6.20 which is greater than the critical value. Thus, there is a significant positive relationship between management competence index and return on assets. However, the

standardized and unstandardized coefficients of management competence index show that an increase in the index will lead to a negligible increase in return on assets.

Ownership structure has also been examined before in performance studies. In this study, ownership was measured by the number of foreign owners in the firm. Table 4.5 shows that ownership had a negative effect on return on assets. The beta coefficient is negative and significant at 5% level. The t-value is -3.56 which is greater than the critical value. Thus, return on assets is negatively and significantly influenced by foreign ownership. The standardised coefficient of ownership shows that an increase in foreign ownership by 1% leads to a reduction in return on assets by 0.000%. This is negligible and it may therefore not mean that insurance firms should reduce foreign ownership in their firms since the effect on return on assets is very small.

Age of a firm has also been examined before in performance studies as a control variable. In this study, age was measured as the number of years since establishment of an insurance firm. Table 4.5 shows that age had a positive relationship with return on assets. The beta coefficient is positive but not significant at 5% level. The t-value is 0.68 which is less than the critical value. Thus, there is no significant relationship between age of the firm and return on assets.

CHAPTER FIVE: SUMMARY, CONCLUSION & RECOMMENDATIONS

5.1   Introduction

This chapter presents the summary of findings, conclusions of the study, limitations of the study, recommendations for practice and policy, and suggestions for further research.

5.2   Summary of Findings

This study sought to establish the determinants of financial performance of insurance firms in Kenya. The tested variables were liquidity, leverage, age of the firm, underwriting risk, management competence index, ownership structure, equity capital, and retention ratio. Secondary data was collected on these variables from the AKI annual reports. The data was then organized in Excel spreadsheet and imported into Statistical Package for Social Sciences version 20 for analysis.

The descriptive analysis shows that the mean of return on assets for insurance firms was 0.06. The mean leverage was 2.85, mean retention ratio was 0.70, mean liquidity was 1.48, mean underwriting risk was 0.96 and mean equity capital was 14.04. The mean size was 15.30, the mean management competence index was 26,446, the mean foreign ownership was 6.88 and the mean age was 37.59.

The correlation matrix showed that all the correlations were less than 0.90 and therefore none of the independent variables were serially correlated. The regression analysis shows that the model used accounts for 90.11% of the variance in return on assets. The model was therefore fit to explain the determinants of financial

performance of insurance firms ($F = 7.09$, $p = 0.009$). The results show that leverage, equity capital, size of the firm, management competence index, and foreign ownership had significant effects on return on assets. No significant effects on return on assets was found for age of the firm, underwriting risk, liquidity, and retention ratio.

The study also revealed that the established regression equation was;

$Y = 1.299 + 0.21 X_1 + 0.014 X_2 - 0.372 X_3 + 0.026 X_4 + 1.03 X_5 - 1.033 X_6 - 0.002 X_8$

From the regression analysis the study found that there was a negative relationship between financial performance and liquidity, size and foreign ownership. The study further revealed that there was a positive relationship between leverage, retention ratio, underwriting risk, equity capital and financial performance of general insurers. At 5% level of significance and 95% level of confidence, equity capital had the greatest positive effect on financial performance of general insurance companies, followed by leverage, followed by underwriting risk then retention ratio while size had the greatest negative effect on financial performance of general insurance companies, followed by liquidity then ownership. Age had no effect on return on assets of general insurance companies.

5.3   Conclusion

This study concludes that profitability of general insurers in Kenya is positively and significantly influenced by leverage and equity capital. Size of the firm (measured as the natural logarithm of total assets) and ownership structure (foreign ownership) have a negative and significant effect on performance of general insurers in Kenya. Further, at 5% level of significance, liquidity has a negative and marginally significant effect on performance of general insurers in Kenya. Retention ratio of the

firm (measured as the net premium) and underwriting risk have a positive and insignificant effect on performance of general insurers in Kenya The study does not find evidence for the effect of management competence index and age of the firm on performance of general insurers in Kenya.

In view of the untapped huge insurance market, the introduction of new products in the market and the significant improvement in service delivery platforms being experienced in the insurance industry will no doubt propel the insurance industry to a higher level of growth. This is underpinned by the huge potential of untapped insurance market in the country coupled by the ongoing efforts by the Government in strengthening the regulatory environment of the financial services sector, which include the review of the Insurance Act and the importance placed on insurance services under Vision 2030.

Some of the new ventures in the last few years include introduction of agriculture and livestock insurance, micro insurance and takaful. A number of hitherto composite companies have successfully demerged into life and non-life Insurance companies. This has certainly enabled the management of these respective companies to focus a lot more on the respective line of business unlike in the past when managements found themselves torn between growing life or non-Life insurance business. The industry, however, continues to face a number of challenges. Competition for business continues to be a very big challenge. In view of the very low levels of product innovation, differentiation remains quite low. This has over the years lead to massive price cutting, a phenomenon that has had a major impact on growth and profitability.

Motor insurance continues to account for the largest portion of the total premium written, currently standing at 45%. With huge losses arising from the very many motor accidents coupled with rampant fraud, general underwriters will have to deliberately look for ways of reducing the impact of their motor portfolio by increasing the volume of the more profitable classes e.g. fire industrial and domestic. This will help them to improve their profitability substantially in the core non-life insurance business than ever before.

5.4   Recommendations

The study recommends that for general insurers in Kenya to perform better in terms of their return on assets, they should improve on their leverages. But insurance firms should be careful not to leverage too much as this can also be detrimental to their bottom-line. Companies that are highly leveraged may be at risk of bankruptcy if they are unable to make payments on their debt; they may also be unable to find new lenders in the future. On the other hand, leverage can increase the shareholders' return on their investment and make good use of the tax advantages associated with borrowing.

The study revealed that higher equity capital should increase firm profitability. The study therefore recommends that firms need to increase their capital adequacy by pumping in more capital in order to improve their performance. It will also be necessary for the companies to properly re-capitalize in order for them to take on large businesses especially in the emerging oil and gas sector without compromising their solvency state. It was also revealed that retention ratio had a positive effect on

profitability. The study therefore recommends a higher retention ratio coupled with a lower claims ratio as is likely to impact on the performance of insurers' positively.

The findings revealed that underwriting risk had a positive effect on profitability. Underwriting Risk reflects the adequacy, or otherwise, of insurers' underwriting performance (Adams and Buckle 2003). Sound underwriting guidelines are pivotal to an insurer's financial performance. The underwriting risk depends on the risk appetite of the general insurers. If more of the insurance products which are sold lead to moral hazard, adverse selection and high outstanding premiums, then high claims will have to be financed through other sources of revenue such as investment income.

The findings revealed no effect for age on financial performance (Return on assets) of Kenya general Insurance Companies. The result suggested that the new insurance companies shouldn't pay attention to age because age of the company has no influence on its good performance. The management competence index on insurance companies has a positive effective in impacting financial performance. The result suggested that the insurance companies should focus on employees' efficiency by choosing the employees who complete higher education.

The study further showed that liquidity have a negative effect on return on assets. This may be due to the excessive attention on having funds to pay claims without a proportionate allocation of resources towards their investment portfolios. The cash and bank balances are however to be kept sufficient to meet the immediate liabilities towards claims due for payment but not paid. The findings also revealed negative

effect for number of foreign owners on financial performance (Return on assets) of Kenya general Insurance Companies.

The study further showed that size has a negative effect on return on assets. That is an increase in total assets such as the establishment of more branches and the adoption of new technologies which are acquired to underwrite more policies may not realize their desired results because of inefficient management of actuarial risks leading to underwriting losses and high outstanding premiums, then investment income and equity capital will have to be used to finance the acquisition of assets. Thus, an increase in assets reduces investment income. Although, the results confirms the findings of Adams and Buckle (2003), it disagrees with the findings of Charumathi (2012) and Malik (2011). There is thus need for general insurers to perform a cost benefit analysis prior increasing assets.

5.5   Limitations of the Study

It was not possible to find all the data on all variables. For instance, liquidity had to be measured as total assets divided by total liabilities with the assumption that most, if not all, of the assets and liabilities were current. The Association of Kenya Insurers annual reports, which the present study relied upon to gather the data, report total assets and total liabilities without dividing them into current and non-current.

The model in the study focused on firm specific determinants of financial performance of general insurers in Kenya. Therefore, other determinants such as macroeconomic factors were not part of the study. Thus, industry and macro-

economic factors were not controlled for in the present study. The use of regression analysis also means that there is an assumption of linearity with the various models which may not be the case besides the study was conducted for a period from year ending 2009 until year ending 2012. As such only the companies having operation over this span have been considered.

5.6   Suggestions for Further Research

Further research needs to be done similar to this by including both general insurers and life insurers. Then, an analysis should be carried out jointly and separately for the two classes of insurers. Studies in the future should also use panel data and introduce other macroeconomic determinants of financial performance of insurance firms in Kenya.

The current research was based on a descriptive research design on the insurance industry. Future studies should be undertaken through a case study. Case study helps in finding in-depth investigation of a single group, or event.

The national budget for the year 2007 recommended recapitalization in the insurance industry which was to take effect on June 2010. There has also been adoption of risk based assessment of insurance performance by the Insurance Regulatory Authority. Then a study need to be undertaken to test the implication of these new stipulations on financial performance.

Further research could examine the determinants of financial performance of Insurance firms such as leverage, retention ratio, liquidity, underwriting risk, equity

capital, size, management competence index, ownership and age and compare results

with those reached in developed markets

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APPENDICES

Appendix I: List of General Insurance Companies in Kenya

1)	African Merchant Assurance Company (AMACO)
2)	APA Insurance Company
3)	British American Insurance Company
4)	Cannon Assurance Company
5)	Chartis Kenya Insurance Company
6)	Co-operative Insurance Company
7)	Corporate Insurance Company
8)	Direct line Insurance Company Ltd
9)	Fidelity Shield Insurance Company
10)	Gateway Insurance Company
11)	Geminia Insurance Company
12)	GA Insurance Company
13)	Heritage Insurance Company
14)	Insurance Company of East Africa (ICEA)
15)	Jubilee Insurance Company
16)	Kenindia Assurance Company
17)	Kenyan Alliance Insurance Company
18)	Kenya Orient Insurance Company
19)	Madison Insurance Company
20)	Mayfair Insurance Company
21)	Trident Insurance Company
22)	UAP Provincial Insurance Company

Appendix II: Data on Insurance Industry 2009-2012

Company	Year	Total Debt	Equity	Gross Premium	Total Assets	Claims & Benefits Paid	Profit	Reinsurance ceded	Est Year
Amaco	2009	929,237	609,810	1,387,417	1,539,047	559049	62,336	371,744	2000
	2010	1,386,979	705,531	1,736,718	2,092,510	704,213	81,454	433,071	2000
	2011	1,532,467	602,818	1,770,765	2,135,285	631,405	42,587	439,023	2000
	2012	1,662,390	686,051	1,912,372	2,348,441	753,876	67,340	476,048	2000
APA	2009	5,700,089	1,340,047	3,633,629	5,555,183	1,935,103	157,814	554,839	2003
	2010	5,037,031	2,032,522	4,611,408	7,069,553	2,513,863	189,265	647,351	2003
	2011	5,924,685	1,718,532	5,019,780	7,643,217	2,914,049	264,956	712,686	2003
	2012	6,764,796	2,524,026	5,590,038	9,288,822	3,168,351	140,063	743,608	2003
British American	2009	11,108,709	5,207,098	1,454,066	16,315,807	2,134,171	421,123	504,552	1965
	2010	14,019,544	7,403,624	1,785,090	21,423,166	3,818,108	891,606	674,672	1965
	2011	16,259,221	4,328,609	2,349,216	20,587,830	2,991,129	858,874	659,646	1965
	2012	23,286,036	6,674,717	3,112,745	29,960,753	3,635,504	1,167,198	869,354	1965
Cannon	2009	711,492	399,088	795,705	1,066,500	344,990	230,851	304,720	1976
	2010	2,065,340	1,457,222	937,443	3,522,562	432,987	429,247	181,902	1976
	2011	2,526,066	1,571,776	1,002,110	4,097,842	873,307	99,361	232,613	1976
	2012	2,386,131	1,988,431	1,065,298	4,374,562	380,520	431,508	325,797	1976
Chartis	2009	662,388	455,221	2,033,698	1,944,617	563,319	114,337	942,522	1972
	2010	2,800,798	776,123	2,613,757	3,576,921	535,698	256,039	1,073,480	1972
	2011	2,979,167	699,755	2,803,897	3,678,922	673,638	289,145	1,268,032	1972

	2012	3,117,452	1,068,830	3,203,367	4,186,282	762,680	343,185	1,341,232	1972
CIC General	2009	1,281,565	534,135	1,652,979	1,815,700	807,851	131,753	219,271	1968
	2010	4,886,352	2,607,716	2,961,208	7,494,068	2,007,214	485,914	358,300	1968
	2011	6,818,681	4,294,560	4,580,309	11,113,241	3,149,844	586,063	772,125	1968
	2012	6,215,511	2,360,749	6,557,122	8,576,260	3,141,964	675,242	739,129	1968
Corporate	2009	71,184	166,548	368,231	566,665	186,726	52,015	68,450	1982
	2010	674,292	612,823	359,874	1,287,115	265,764	237,903	51,644	1982
	2011	789,619	632,355	324,826	1,421,974	237,320	19,532	68,118	1982
	2012	856,808	833,029	322,236	1,689,837	246,564	220,233	93,283	1982
Directline	2009	44,917	356,700	1,188,241	1,523,009	545,630	46,535	27,288	1985
	2010	1,890,791	413,564	1,573,296	2,304,356	975,250	55,183	32,579	1985
	2011	2,454,766	453,867	1,802,180	2,908,633	990,805	176,731	29,884	1985
	2012	2,853,879	654,581	2,051,764	3,508,460	1,119,314	238,369	34,657	1985
Fidelity	2009	144,164	439,603	796,930	1,242,949	394,195	116,909	206,168	1940
	2010	1,089,298	724,281	863,792	1,813,579	434,835	203,562	188,890	1940
	2011	1,158,701	790,449	1,011,865	1,949,150	525,544	251,295	187,957	1940
	2012	1,323,880	902,208	1,080,205	2,226,088	497,973	137,833	260,179	1940
Gateway	2009	64,128	372,455	623,014	1,429,455	259,745	31,951	82,015	1982
	2010	941,255	394,945	523,463	1,336,199	308,493	22,490	25,398	1982
	2011	1,035,668	1,070,179	519,300	2,105,847	203,812	675,233	47,305	1982
	2012	1,351,226	681,978	443,527	2,033,204	317,800	8,122	57,753	1982
Geminia	2009	125,395	572,803	619,301	1,285,865	224,916	356,323	204,220	1981
	2010	1,414,390	704,402	770,130	2,118,792	293,864	65,762	243,141	1981
	2011	1,562,870	791,511	899,008	2,354,381	366,484	100,698	258,511	1981

	2012	1,811,984	1,135,878	1,072,303	2,947,862	432,503	168,321	333,278	1981
GA Insurance	2009	165,203	790,429	1,119,900	2,301,877	444,401	109,127	352,666	1979
	2010	2,782,062	1,242,976	1,411,585	4,025,038	559,266	135,349	478,117	1979
	2011	3,368,813	1,171,601	1,817,674	4,540,414	720,251	200,200	607,157	1979
	2012	4,140,315	1,402,278	2,351,860	5,542,593	918,831	337,316	891,452	1979
Heritage	2009	257,986	1,344,225	1,918,978	3,365,432	900,047	43,175	269,180	1976
	2010	4,420,005	1,735,860	2,477,112	6,155,865	1,194,601	197,161	366,745	1976
	2011	4,395,389	1,581,593	3,248,925	5,976,982	1,287,974	641,434	750,921	1976
	2012	2,968,364	1,865,384	3,405,694	4,833,748	1,018,378	545,709	1,259,389	1976
ICEA Lion	2009	372,056	1,021,323	1,740,228	3,125,658	835,262	205,278	416,674	2011
	2010	4,218,789	1,662,016	1,835,477	5,880,805	530,716	438,345	918,501	2011
	2011	4,326,777	1,969,146	1,860,869	6,295,923	514,796	530,516	940,256	2011
	2012	6,415,943	2,535,030	3,919,901	8,950,973	1,055,544	413,616	1,601,940	2011
Jubilee	2009	704,348	1,238,341	3,689,991	5,394,379	2,068,939	578,800	371,153	1937
	2010	20,335,097	2,624,862	4,711,566	22,959,959	4,988,630	1,114,428	1,192,963	1937
	2011	25,056,533	2,921,283	6,660,922	27,977,816	5,264,220	864,187	1,730,508	1937
	2012	29,859,218	4,971,957	8,085,352	34,831,175	7,380,622	430,273	2,500,559	1937
Kenindia	2009	318,340	913,276	2,833,971	3,241,971	1,122,438	261,505	1,031,084	1979
	2010	12,994,816	1,903,732	3,341,735	14,898,458	2,688,074	429,637	1,119,212	1979
	2011	17,863,411	1,542,164	3,565,694	19,405,575	3,202,025	-128,605	1,313,534	1979
	2012	20,324,484	1,812,910	3,376,542	22,137,394	3,719,174	205,903	1,395,458	1979
Kenya Alliance	2009	150,652	639,717	294,766	2,425,750	54,396	311,666	31,771	1979
	2010	2,092,906	1,007,024	502,240	3,099,931	109,946	289,059	44,008	1979
	2011	2,041,713	1,123,579	785,403	3,165,292	233,321	149,281	81,222	1979

	2012	2,241,531	1,277,086	950,893	3,518,617	368,835	114,235	174,629	1979
Kenya Orient	2009	324,129	284,269	586,789	608,398	236,004	35,543	55,126	1982
	2010	391,612	329,624	777,797	721,236	385,170	2,377	81,607	1982
	2011	632,255	363,709	1,026,344	995,964	348,632	31,177	126,696	1982
	2012	834,835	437,676	1,302,060	1,272,510	453,051	52,416	132,213	1982
Madison	2009	144,672	344,554	664,152	857,046	318,500	65,140	103,803	1988
	2010	3,565,013	798,631	939,862	4,363,644	1,007,251	165,764	146,198	1988
	2011	4,245,534	878,316	1,080,192	5,123,850	1,134,059	109,685	180,259	1988
	2012	4,347,339	1,597,818	1,002,016	5,945,157	1,184,612	719,502	366,069	1988
Mayfair	2009	97,905	295,147	561,162	779,504	214,881	1,698	235,449	2005
	2010	97,358	363,132	702,078	1,334,490	296,090	22,591	261,007	2005
	2011	1,279,379	382,209	1,004,197	1,661,587	363,512	23,378	411,238	2005
	2012	1,733,242	439,327	1,258,446	2,172,569	520,892	29,271	549,540	2005
Trident	2009	318,788	575,450	517,850	2,182,039	267,826	328,622	163,460	1982
	2010	1,550,901	645,963	605,292	2,196,864	312,260	70,192	147,753	1982
	2011	1,999,453	695,213	723,684	2,692,166	444,845	69,250	225,226	1982
	2012	2,190,980	1,859,089	675,594	4,050,068	273,777	26,343	258,663	1982
UAP	2009	1,124,846	2,822,201	3,064,856	6,464,008	1,510,605	164,838	538,845	1920
	2010	4,161,570	3,044,047	2,866,576	7,205,617	1,537,083	388,101	779,559	1920
	2011	4,552,825	3,186,369	4,715,514	7,739,194	1,881,895	975,736	779,324	1920
	2012	5,808,994	4,859,553	5,925,796	10,668,547	2,481,897	195,873	1,018,953	1920

Appendix III: Summarized Data

Company	LEV	LIQ	UWR	EC	A	MI	F	Y	ROA	R
Amaco	2.12	1.47	0.56	13.39	14.52	5,766.30	-	14.00	0.03	0.73
APA	2.82	1.35	0.76	14.55	15.90	13,206.31	-	11.00	0.02	0.85
British American	2.91	1.42	2.35	15.63	17.05	59,590.35	18.25	49.00	0.04	0.65
Cannon	1.39	1.72	0.93	14.33	15.20	24,618.36	-	38.00	0.08	0.71
Chartis	3.50	1.29	0.53	13.65	15.15	49,353.83	-	42.00	0.08	0.51
CIC General	1.93	1.52	0.99	14.94	16.02	58,240.63	52.14	46.00	0.06	0.81
Corporate	1.12	1.90	0.92	13.45	14.20	22,746.10	-	32.00	0.11	0.77
Direct line	4.73	1.21	0.65	13.14	14.88	15,614.62	-	29.00	0.05	0.98
Fidelity	1.48	1.68	0.72	13.60	14.51	17,960.30	-	74.00	0.10	0.76
Gateway	1.55	1.65	0.55	13.48	14.42	39,213.61	-	32.00	0.13	0.90
Geminia	1.82	1.55	0.73	13.68	14.72	8,584.13	-	33.00	0.05	0.65
GA Insurance	2.70	1.37	0.89	14.06	15.36	18,690.69	-	35.00	0.05	0.55
Heritage	2.27	1.44	0.66	14.36	15.55	38,452.89	-	38.00	0.08	0.64
ICEA Lion	2.43	1.41	0.74	14.54	15.77	30,721.71	-	3.00	0.07	0.46
Jubilee	7.15	1.14	1.72	15.07	17.17	16,772.68	52.25	77.00	0.03	0.63
Kenindia	9.73	1.10	1.80	14.38	16.75	15,906.73	-	36.00	0.01	0.59
Kenya Alliance	1.87	1.53	0.60	13.94	15.00	18,419.17	-	35.00	0.06	0.80
Kenya Orient	1.64	1.61	0.50	12.84	13.81	2,865.67	-	32.00	0.03	0.86
Madison	3.71	1.27	1.79	13.90	15.45	17,455.28	-	26.00	0.06	0.70
Mayfair	2.63	1.66	1.10	12.89	14.36	12,238.12	-	9.00	0.01	0.46
Trident	1.79	1.56	0.92	13.88	14.91	10,339.34	-	32.00	0.02	0.62
UAP	1.31	1.76	0.67	15.12	15.96	23,631.97	28.68	94.00	0.06	0.78