THE RELATIONSHIP BETWEEN ECONOMIC GROWTH AND INSURANCE PENETRATION IN KENYA

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NOVEMBER, 2011
DECLARATION

This management Research is my original work and has not been presented in any other University.

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Charles Ndalu D61/72922/2009

This Research Project has been submitted for examination with my approval as University Supervisor.

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DEDICATION

I dedicate this research project to my family. Their encouragement and support propelled me to achieve my goal.
ACKNOWLEDGMENT

This Research Project would not have been possible without the cooperation and support of a number of people, who immensely contributed towards my ultimate goal. I sincerely give my gratitude to my project supervisor, Dr. Josiah Aduda Lecturer, Department of Finance and Accounting for his guidance, selfless dedication and encouragement in steering this project to its conclusion. I also wish to acknowledge the contribution of the rest of university of Nairobi fraternity especially the library staff, MBA coordination office and moderators to the success of this project.

I would wish to thank my family, for their moral support and encouragement particularly for their understanding when I was not there for them during the project period; I would not have made it this far without their cooperation and prayers.

Most important of all I extend my gratitude to the Almighty God for providing me with strength, good health, knowledge and vitality that helped make this project a reality.

To all, I remain forever grateful
ABSTRACT

The study was set out to examine the relationship between economic growth and insurance penetration in Kenya. The study employed a causal study design. Since there is published information on economic growth and insurance penetration by the government agencies, primary data collection methods were not employed. Secondary data was obtained from published reports of Insurance Regulatory Authority (IRA) and Central Bureau of Statistics (CBS) specifically the Annual Insurance Reports and Economic Surveys respectively.

The target population was all the 45 Insurance companies registered for operation in Kenya. The study covered six years from 2003 to 2008. The study used simple regression analysis to examine the association between economic growth and insurance penetration in Kenya. Forecasting model was developed and tested for accuracy in obtaining predictions. From the study it was established that insurance companies in Kenya transact two types of businesses namely Long term and general business. Insurance penetration ratio increased by 0.10% to stand at 2.7% in 2008. The long term business accounted for 0.9% and general business accounted for 1.8%. GDPI under general insurance business amounted to Kshs 35.65 billion in the year 2008 as compared to the previous year's Kshs 30.96 billion representing 15.08% increase.

Enacting a modern legal framework and designating a special judicial authority to handle insurance-related cases are key requirements to enable market development by protecting the rights of policyholders and regulating the activities of market participants. Also fostering a competitive environment drives innovation, competitive pricing, and the adoption of best practices, and is a key enabler for the development and growth of insurance markets.
<table>
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<td>GDP</td>
<td>Gross Domestic Product</td>
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<td>AKI</td>
<td>Association of Kenya Insurers</td>
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<td>CBS</td>
<td>Central Bureau of Statistics</td>
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<td>IRA</td>
<td>Insurance Regulatory Authority</td>
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<td>GDPI</td>
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<td>MFIs</td>
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<td>FD</td>
<td>Financial Depth</td>
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<td>SSA</td>
<td>Sub Saharan Africa</td>
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<td>GOK</td>
<td>Government of Kenya</td>
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<td>IP</td>
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<td>MP</td>
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<td>BIL</td>
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<td>Shs</td>
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CHAPTER ONE

INTRODUCTION

1.1 Background of the Study

Financial deepening simply means an increase in the supply of financial assets in the economy according to Nzotta & Emeka (2009). Financial deepening generally entails an increased ratio of money supply to Gross Domestic product Popiel (1990), Nnanna and Dogo (1999) and Nzotta (2004). Financial deepening is thus measured by relating monetary and financial aggregates such as M1, M2 and M3 to the Gross Domestic Product (GDP). Therefore, the sum value of all the measures of financial assets to the gross domestic product (GDP) gives us the approximate size of financial deepening rate. That means that the widest range of such assets as broad money, liabilities of non-bank financial intermediaries, treasury bills, value of shares in the stock market, money market funds, etcetera, will have to be included in the measure of financial deepening. It is important to note that if the increase in the supply of financial assets is small, it means that financial deepening in the economy is most likely to be shallow; but if the ratio is big, it means that financial deepening is likely to be high. Developed economies are characterized by high financial deepening, meaning that the financial sector in such countries has had significant growth and improvement, which has, in turn, led to the growth and development of the entire economy.
## 1.1.1 Insurance Penetration

A measure of the development of an insurance sector is insurance penetration, defined as gross premium income (GPI) as a percentage of gross domestic product (GDP). According to Mahul et al (2009), insurance penetration rate is expressed as the ratio between insurance premium volume and GDP; non-life insurance penetration is expressed as the ratio between non-life insurance premium volume and GDP. Mahul et al. 2009, the agricultural insurance penetration rate is lower than the non-life insurance penetration in all groups of countries classified by development status. Thus financial penetration is a subset of the financial deepening. The gap decreases with development level. Developing countries economies rely heavily on agriculture however agricultural insurance has taken a long time to take off. Honohan (2004), the United States and many European countries have had some form of crop or livestock insurance for more than a century and are mature markets with high penetration rates. In contrast, in many developing countries, agricultural insurance has been operating for only 5-10 years (even less in countries introducing index-based insurance), and agricultural insurance demand and uptake have yet to take off. Agricultural insurance provision is dominated by high-income countries and China. Almost 90 percent of global agricultural insurance premium volume is underwritten in high-income countries. In 2008 the agricultural insurance premium volume in China was estimated at $1.75 billion, making this middle-income country the second-largest agricultural insurance market after the United States. Agricultural insurance provision is largely dominated by crop insurance. The World Bank agrees that governments have a major role to play in reducing informational asymmetry. The development and maintenance of agricultural and weather databases as public goods can help insurers properly design and price agricultural insurance contracts, thus reducing adverse selection. Public extension services, assisting and
supervising farmers in the management of their production risks before and after the occurrence of a loss can help reduce moral hazard.

1.1.2 Economic Growth

Hardwick et al (1999) define economic growth as an increase in a country's productive capacity, identifiable by a sustained rise in real national income over a period of years. A country's annual rate of economic growth, then, can best be measured by taking the average percentage increase in national income over a long period of time, say five or ten years. The figure obtained will be an estimate of the average annual rate of growth in the country's productive capacity, assuming that the rate of unemployment is roughly the same at the beginning and end of the period. Growth may be stimulated by an increase in the quantity or quality of the factors of production, such as labour and capital. Economic growth results in a number of benefits, such as an increased standard of living and a reduction in poverty levels. On the hand, growth may lead to costs, such as technological unemployment, rapid depletion of non renewable resources and negative externalities.

Economic growth and economic development however related are contrasted here. Philip Hardwick et al (1999) asserts that for economic development to happen a country should experience economic growth, as defined above, and at the same time undergo major structural changes in its economy, such as a shift from agriculture to manufacturing. Samuelson & Nordhaus (2005) underscores the importance of economic growth. Continuing rapid economic growth enables economies to provide more of everything to its citizens - better food and homes, more resources for medical care and pollution control, universal education for children, more resources for military and public pensions for retirees. Because economic growth
is so important for living standards, it is a central objective of policy. Countries that ran fastest in
the economic growth race like Britain in nineteen century and United States in the twentieth
century, serve as role models for other countries seeking the path of affluence. They identified
four wheels of growth as 1) human resources- labour supply, education, discipline and
motivation 2) natural resources - land, minerals, fuels, environment quality 3) capital formation
- machines, factories and roads 4) technology - science, engineering, management, entrepreneur ship. The relationship is expressed as follows:

\[ Q = AF(K, L, R) \]

Where Q represents output, K is productive services of capital, whereas L is labour units, R
represent the natural resources, A is the level of technology and F is the production function.
From the model as the inputs of capital, labour or resources rise, output would increase.
Technology plays the role of augmenting the productivity of inputs.

1.1.3 Role of Insurance

Saunders & Cornett (2008) do point out that Insurance serves a number of valuable economic
functions that are largely distinct from other types of financial intermediaries. In order to
highlight specifically the unique attributes of insurance, it is worth focusing on those services
that are not provided by other financial services providers, excluding for instance the contractual
savings features of whole or universal life products. The indemnification and risk pooling
properties of insurance facilitate commercial transactions and the provision of credit by
mitigating losses as well as the measurement and management of non diversifiable risk more
generally. Typically insurance contracts involve small periodic payments in return for protection
against uncertain, but potentially severe losses. Among other things, this income smoothing
effect helps to avoid excessive and costly bankruptcies and facilitates lending to businesses. Most fundamentally, the availability of insurance enables risk adverse individuals and entrepreneurs to undertake higher risk, higher return activities than they would do in the absence of insurance, promoting higher productivity and growth

1.1.4 Insurance in Kenya

Insurance Institute of Kenya guide (1999) gives chronological events of the introduction of insurance in Kenya. Insurance industry in Kenya was introduced by foreign nationals mainly the British and Asians during the colonial era. Initially insurance companies in UK opened agency offices in Nairobi. However, between the world wars, local proprietors started setting up insurance companies. Among these were the Pioneer General Assurance Society Limited, Jubilee Insurance Company Limited and the Pan Africa Insurance Company Limited which commenced business in 1930, 1937 and 1948 respectively. Other major developments in the industry began in the post independence period when the government sought to have more effective localized activities at appropriate intervals. Towards this end, the Insurance Ordinance, Cap 486 which came into force in 1961 provided a major impetus in the growth of the industry. It required insurance companies to be incorporated in Kenya through licensing by the Registrar of Companies and to have share capital of Kshs 1,000,000. The trend of local registration of insurance firms continued after independence, notable companies established at this time included Insurance Company of East Africa which was incorporated in mid 1970's, being 100% Kenyan owned. Kenya Commercial Insurance Company, also 100% Kenyan owned and associated with Minet entered business in 1977. In 1987 the office of the Commissioner of Insurance was established. This followed the coming into force of the Insurance Act of 1984. A
department in the Ministry of Finance, it was charged with the responsibility of supervising the entire Insurance industry. The office has lately been transformed into a Regulatory Authority with enhanced authority and mandate to regulate the insurance industry. The following players were licensed by GOK in 2006: 43 insurance companies, 2 locally incorporated Re-insurers, 200 insurance brokers, 2,633 insurance agents, 200 loss assessors, 30 risk surveyors, 180 medical providers, 26 loss adjusters and 4 risk managers

1.2 Statement of the Problem

Recent regulatory changes have heightened competition within the insurance industry—an area in which competition has always been fierce. Business failures, massive mergers and acquisitions have resulted. The industry has experienced financial innovation whereby a broad range of services and products have been created, ranging from investment products to life insurance. Elsewhere, banks such as Equity Bank of Kenya are slowly gaining market share in the sale of insurance products, particularly annuities and life insurance the concept called Bancansurance.

Whereas access to financial services is a potentially important means of alleviating poverty, especially when combined with other supports for poor households, yet access to insurance products has yet to take off in most segments of Kenyan population, reaching only a small segment of the potential market as indicated by low penetration levels. Although long neglected by mainstream financial firms, it would be a mistake to think that Insurance requires some special alchemy for its functioning.

Arena (2006) contends that insurance and banking system deepening appear to play complementary roles in the growth process. Although insurance and banking separately each
make positive contributions to growth, their individual contributions are greater when both are present. The development of insurance markets also contributes to the health of securities markets. The deepening of insurance markets makes a positive contribution to economic growth. While life insurance is causally linked to growth only in higher income economies, nonlife insurance makes a positive contribution in both developing and higher income economies. Some research suggests that the positive contribution of life insurance to growth is primarily through the channel of financial intermediation and long term investments. The study indicates a positive relationship between insurance deepening and economic growth, however it paints life insurance as insignificant in developing countries and consequently not leading to economic growth.

Odhiambo (2009) concludes that the interest rate liberalization in Kenya has succeeded in increasing economic growth through its influence on financial depth. This applies irrespective of whether the models are estimated in a static long-run formulation (cointegration model) or in the dynamic formulation (error-correction model). Ngugi et al 2006 concluded that financial sector plays a crucial role in economic development. The depth of the financial sector was generally found to promote economic growth. It was observed that well functioning capital markets increases economic efficiency, investment and growth. Kenya's capital market was described as narrow and shallow. The stock market and private bond market were raising less than 1% of growth financing. The vision 2030 development plan which aims to achieve an annual economic growth of 10% with an investment rate of 30% was envisaged to be financed mainly from mobilization of domestic resources. Ndebbio (2004) concluded that lack of or stagnant growth of output of any country is often caused by "shallow - finance". A shallow financial depth (FD) means that the range of financial assets for that country is narrow. He observed that this scenario goes far in explaining why most SSA countries have low or
negative per capita growth rates. These studies generalize the financial sector and place more emphasis on banking subsector of the financial sector.

These studies however fail to conclusively address the insurance industry penetration's contribution to the economic growth given that it's an important sub sector of the financial sector. Studies conducted have evaluated the complimentary roles played by insurance and banking financial sub sectors in influencing the economic growth. More emphasis has been placed on the banking subsector at the expense of other equally important financial sub sector.

1.3 Objectives of the Study

This study has two objectives:

i) To establish the insurance penetration levels in Kenya

ii) To establish the relationship between economic growth and insurance penetration in Kenya.

1.4 Significance of the Study

The study is significant since it provides more insights into Insurance industry in Kenya. It will assist policy makers in the industry to make policies that are in tandem with the realities. On the basis of this evaluation, an understanding will be gained that can help in policy direction aimed at promoting financial development and economic growth in Kenya. The study will be useful for drafting of growth policies.

The academia will benefit a lot from the study given that little has been done in this area other than research on the wider financial deepening of the financial institutions. The insurance plays a very significant role in the stabilization of the financial system. However, the industry growth
has not been significant and less attention has been given to this industry. The relationship to be established between insurance and economic growth will help shed more light on the importance of insurance in any economy.

The foreign investors and international agencies will gain an understanding of the stability of the Kenyan economy. The penetration levels of insurance in any economy provide an incisive insight into the risk management efforts of any country. Since investors are averse to risk and want an assurance of optimum returns on their investments, they would consider for investment an economy with strong risk mitigation mechanisms. With the introduction of agribusiness focus has tended towards commercialization of agriculture which has been subsistence in the rest of developing economies. The World Bank supported programmes like agriculture insurance is gaining prominence as a mitigation mechanism for the farmers in the developing economies.

Generally, this study is important at this level of economic development when efforts are being made to reposition the financial system to enable it play key roles in economic development of Kenya as envisioned in the vision 2030.
CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

The relationship between the development of financial sector functions and economic growth is
dubbed as one of the most important phenomenon. It has been studied widely at the individual
firm level as well as the national level. Questions have been raised as to whether the level of
financial intermediary development exerts a causal influence on economic growth. Secondly,
they ask whether cross-country differences in legal and accounting frameworks explain cross-
country differences in the level of financial intermediary development.

2.2 Review of Theories

2.2.1 Economic Growth

Hardwick et al (1999) define economic growth as an increase in a country's productive capacity,
identifiable by a sustained rise in real national income over a period of years. A country's annual
rate of economic growth, then, can best be measured by taking the average percentage increase
in national income over a long period of time, say five or ten years. The figure obtained will be
an estimate of the average annual rate of growth in the country's productive capacity, assuming
that the rate of unemployment is roughly the same at the beginning and end of the period.
Growth may be stimulated by an increase in the quantity or quality of the factors of production,
such as labour and capital. Economic growth results in a number of benefits, such as an increased
standard of living and a reduction in poverty levels. On the hand, growth may lead to costs, such
as technological unemployment, rapid depletion of non-renewable resources and negative externalities.

2.2 Insurance Penetration

A measure of the development of an insurance sector is insurance penetration, defined as gross premium income (GPI) as a percentage of gross domestic product (GDP). According to Mahul et al. (2009), insurance penetration rate is expressed as the ratio between insurance premium volume and GDP; non-life insurance penetration is expressed as the ratio between non-life insurance premium volume and GDP. Mahul et al. 2009, the agricultural insurance penetration rate is lower than the non-life insurance penetration in all groups of countries classified by development status. Thus financial penetration is a subset of the financial deepening. The gap decreases with development level. Developing countries economies rely heavily on agriculture however agricultural insurance has taken a long time to take off. Honohan (2004), the United States and many European countries have had some form of crop or livestock insurance for more than a century and are mature markets with high penetration rates.

2.2.3 Informational Asymmetry Models

Andreu (1995), Information asymmetry models assume that at least one party to a transaction has relevant information whereas the other(s) do not. Some asymmetric information models can also be used in situations where at least one party can enforce, or effectively retaliate for breaches of, certain parts of an agreement whereas the other(s) cannot.

The two critical informational problems that any insurance program faces are adverse selection and moral hazard. They are intimately tied to the difficulties associated with measuring risks and
monitoring customer behavior. It may be very difficult for private entities to measure risks, collect relevant data, monitor producer behavior, and establish and enforce underwriting guidelines. These difficulties can result in high, sometimes prohibitive, transactions costs that preclude the development of private insurance markets.

Losses and the events that trigger them can be difficult to define precisely (for example, the extent and nature of a disability). The insured is often able to withhold information important to the assessment of risks (for example, known medical conditions or tendencies). The existence of insurance can alter the insured's behavior (for example, unemployment insurance can create the moral hazard problem whereby the insured is less active in seeking and retaining employment than would be the case without the insurance). For these reasons, governments have long provided social insurance. Social insurance tends to be more prevalent in Western societies where family networks and other support groups have broken down in the process of industrialization. Insurance provided by private insurers (market insurance) is more common in areas such as casualty and property, where the problems listed above are less of a concern.

In adverse selection models, the ignorant party lacks information while negotiating an agreed understanding of or contract to the transaction, whereas in moral hazard the ignorant party lacks information about performance of the agreed-upon transaction or lacks the ability to retaliate for a breach of the agreement. An example of adverse selection is when people who are high risk are more likely to buy insurance, because the insurance company cannot effectively discriminate against them, usually due to lack of information about the particular individual's risk but also sometimes by force of law or other constraints. An example of moral hazard is when people are more likely to behave recklessly after becoming insured, either because the insurer cannot
observe this behavior or cannot effectively retaliate against it, for example by failing to renew the insurance.

2.2.4 Financial Intermediation Theory

Saunders & Million (2008) points out that; financial intermediation is seen as the extent to which financial institutions (banks) bring deficit spending units and surplus spending units together. Such a joining of spending units is likely to result in more deepening of the financial system (Goldsmith, 1969). In other words, there will be more investment in the economy through the financial System. A well-functioning financial system is a sine quo non for the pursuit of economic growth with stability. The core function of a well-developed financial system is to facilitate smooth and efficient allocation of resources from savers to the ultimate users. The two primary roles of financial markets are facilitation of accumulation of capital and management of risk inherent in particular investment projects and industries. Commercial banks are likely to remain the dominant institutions for some time. However, nonbank financial intermediaries such as development finance institutions, insurance companies and pension funds are potentially important sources of long-term finance.

2.2.5 Development Hypothesis Theory and Financial Repression Theory

The development hypothesis theory presupposes that lack of a developed financial infrastructure restricts economic growth making the focus of policy at each point in time being to ensure that the financial system operates efficiently. The theory supports a measure of intervention as being important and in fact necessary for meaningful growth. Various policies should thus be put in place to encourage and promote the activities of financial institutions. The financial repression
theory resulted as a consequence. This theory is usually associated with the work of McKinnon (1973) and Shaw (1973). The implication of their studies is that financial development would contribute significantly to economic growth; authorities did not interfere in the operations of financial institutions.

2.3 Review of Empirical Studies

Odhiambo (2009) studied the impact of interest rate reforms on financial deepening and economic growth in Kenya, using two models: the financial deepening model and the dynamic Granger causality model. The study attempted to answer two critical questions: Does interest rate liberalization in Kenya have any positive influence on financial deepening? Does the financial depth which results from interest rate liberalization lead to economic growth? Using cointegration and error-correction models, the study found strong support for the positive impact of interest rate liberalization on financial deepening in Kenya - although the strength and clarity of its efficacy is sensitive to the level of the dependency ratio. The study also finds financial depth to Granger cause economic growth in Kenya. The study, therefore, concludes that the interest rate liberalization in Kenya has succeeded in increasing economic growth through its influence on financial depth. This applies irrespective of whether the models are estimated in a static long-run formulation (cointegration model) or in the dynamic formulation (error-correction model).

Ngugi et al 2006 conducted a study dubbed Capital market, Financial deepening and Economic growth in Kenya. They attempted in the study to answer the following questions: Does capital market facilitate deepening in the financial sector? How does the capital market interact with other financial system? Is capital market development related to economic growth? This study
therefore aimed at answering the question of whether capital market deepening facilitates economic growth. This is analyzed by studying the contribution of the capital market in financing investment, the relationship between capital market deepening and productivity and finally, the relationship between capital market deepening and economic growth. To analyze the relationship between economic growth and financial deepening, they assumed the following model.

\[ Y = f(A, K, L) \]

They concluded that financial sector plays a crucial role in economic development. The depth of the financial sector was generally found to promote economic growth. It was observed that well functioning capital markets increases economic efficiency, investment and growth. Kenya's capital market was described as narrow and shallow. The stock market and private bond market were raising less than 1% of growth financing. The vision 2030 development plan which aims to achieve an annual economic growth of 10% with an investment rate of 30% was envisaged to be financed mainly from mobilization of domestic resources. They observed that there had been significant focus on the capital market with for example the institutional development of the stock market and introduction of new instruments in the bonds market. It had been assumed that these efforts would facilitate mobilization of adequate resources and allocation of these resources efficiently to achieve growth objectives.

Ndebbio (2004) conducted research which was commissioned by African Economic Research Consortium in Nairobi, Kenya. This study evaluated the impact of financial deepening (the widest range of financial assets, including money, were developed to represent financial deepening) and other growth related factors in selected sub-Saharan African (SSA) countries. The study also attempted to relate these factors to the economic growth of these countries.
through an unrestricted/augmented neoclassical growth model using cross-country data. In that context, then, the objectives for the study were: 1) To understand generally what financial deepening (FD) is all about. 2) To determine the appropriate measures of financial deepening by developing some measures of the widest range of financial assets. 3) To evaluate the impact of financial deepening and other growth related factors on growth in selected SSA countries. 4) On the basis of this evaluation, to articulate policy direction aimed at promoting financial development and economic growth in SSA. He concluded that lack of or stagnant growth of output of any country is often caused by "shallow - finance". A shallow financial depth (FD) means that the range of financial assets for that country is narrow. He observed that this scenario goes far in explaining why most SSA countries have low or negative per capita growth rates.

This study identified the range of financial assets that can adequately approximate financial deepening, which simply means an increase in the supply of financial assets in the economy. FD was represented by two variables, the degree of financial intermediation/development (M2/Y) and the growth rate in per capita real money balances (GPRMB). Because of lack of data on other measures of financial assets in most SSA countries, broad money (M2) was used as numerator for both variables. Estimations depended on the two measures of FD and other explanatory variables of interest were done with ordinary least squares (OLS) multiple regression procedure. Three modeled equations, with justifications for each, were estimated and analyzed. A cross-country regression was used for 34 SSA countries. To even out year-to-year fluctuations as well as reflect underlying structural changes, the variables were calculated on a decade average basis. Two policy implications were derived from the study: those SSA countries should strive hard to make real money balances grow, and that these countries should also come up with policies to improve financial development/intermediation. Given such factors as price
stabilization, elimination of fiscal deficit and removal of various restrictions on financial institutions, real money balances could be made to grow. Financial intermediation/development could positively affect output growth if, among other suggested ways, the volume of investment is raised.

Odhiambo (2005) presented a research paper that examined the impact of financial liberalization proxied by interest rate on financial deepening in three sub-Saharan Africa countries - Kenya, South Africa and Tanzania. Using cointegration and vector error-correction model, the study established abundant support for the positive impact of real interest rate on financial deepening in the three study countries. The deposit rate in the financial deepening function is found to be positive and statistically significant in Kenya, South Africa and Tanzania. The results also confirmed that the coefficients of the real GDP and the lagged value of the financial depth in the financial deepening function are positive and statistically significant as expected in all the three study countries. The study therefore concludes that positive real interest rates, which result from financial liberalization, unambiguously lead to financial deepening. The finding of this study lends more support for the positive role of financial liberalization on economic growth in the studied countries.

Nzotta & Okereke (2009) conducted a study on financial deepening and economic development of Nigeria. This empirical study examined financial deepening and economic development in Nigeria between 1986 and 2007. The central focus was that a high level of financial deepening is a necessary condition for accelerating growth in any economy. This was because of the central role of the financial system in mobilizing savings and allocating same for the development process. The study made use of secondary data, sourced for a period of 22 years. They specified
nine explanatory variables for the study based on theoretical underpinnings. They sought to establish a relationship between these variables and financial deepening index. Two stages least squares analytical framework was used in the analysis. A trend analysis was also done in the study. At the end of the study, they found out that financial deepening index is low in Nigeria over the years. They also found that the nine explanatory variables, as a whole were useful and had a statistical relationship with financial deepening. But four of the variables; lending rates, financial savings ratio, cheques/GDP ratio and the deposit money banks/GDP ratio had a significant relationship with financial deepening. They concluded that: the financial system has not sustained an effective financial intermediation, especially credit allocation and a high level of monetization of the economy. Thus the regulatory framework should be restructured to ensure good risk management, corporate governance and stemming systemic crisis in the system.

The works of McKinnon (1973) and Shaw (1973) basically extended formal theoretical analysis of the relationship between growth and financial deepening to developing countries. It was found out that the growth of real money balances augurs well for economic growth and that the growth of an economy depends, in part, on the degree of financial development or financial intermediation. Empirical studies to justify these propositions have been carried out on an international basis by such economists like Shaw (1973). Goldsmith (1969) observes that the financial structure of an economy stimulates economic performance to the extent that it facilitates the movement of funds to the best user. However, Montiel (1995) argues that growth and financial development/intermediation are mutually dependent in that the level of per capita income partially determines the level of financial development, while financial development/intermediation can contribute to economic growth in
the long run. According to Nzotta & Emeka (2009), Finance affects economic growth, stagnation or even decline in any economic system. Saunders & Million (2008) point out that financial resources are mobilized and channeled to economic activities by financial institutions or financial intermediaries who channel these resources from surplus economic units to deficit economic units. In doing this, they evolve appropriate structures necessary for the intermediation functions which they perform.

Various studies have shown that there is a strong and positive relationship between the financial sector and economic development. Goldsmith (1969) contends that financial institution development is of prime importance for real development because the financial superstructure in the form of both primary and secondary securities accelerates economic growth and improves economic performance to the extent that it facilitates the migration of funds to the best user. This refers to the place in the economic system where the funds will yield the highest social return. In his empirical study, as reported by Nzotta (2004) Goldsmith calculated the values of the financial interrelation ratio (FIR), the ratio of all financial instruments at a given time, to the value of the national wealth. He found that the ratios for developing countries were far lower than those of developed countries and concluded that the development of financial institutions affects development; the low level of development of the financial superstructure affects development negatively. McKinnon (1973) and Shaw (1973) contend that various policies should suffice to encourage and promote the activities of financial institutions. The financial repression theory resulted from this. Their studies concurs that financial development contributes significantly to economic growth, if monetary authorities did not interfere in the operations of financial institutions and the financial infrastructure generally.
Popiel (1990) conducted elaborate studies on financial deepening. According to him, financial markets are deep from a qualitative standpoint when: 1) They offer savers and investors a broad range of financial instruments which differ in terms of liquidity, yields, maturities and degree of risk including debt instruments, equity instruments and in between quasi-equity instruments. 2) They encompass a diversity of sub-markets, trading in different financial instruments. 3) Mature, domestic financial markets are integrated into the international financial markets. 4) Are linked together through financial instruments. 5) Finally, the markets are linked together through various financial institutions which function as market makers and financial intermediaries.

Soo (1996), the deepening of insurance markets makes a positive contribution to economic growth. While life insurance is causally linked to growth only in higher income economies, nonlife insurance makes a positive contribution in both developing and higher income economies. The research suggests that the positive contribution of life insurance to growth is primarily through the channel of financial intermediation and long term investments.

Even though economists have accepted effects of financial development on economic growth, they have not had the same idea about the direction of causality, which means whether financial development causes economic growth or economic growth causes financial development. Important to note is that research work has not been conducted to measure the contribution of Insurance to economic growth/development of a developing economy
CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction
This empirical study examined the relationship between economic growth and insurance penetration in Kenya between 2003 and 2008. The study made use of secondary data, sourced for a period of six years. The study focused on the Insurance industry in Kenya and data was collected from published materials of Insurance Regulatory Authority (IRA) and Central Bureau of statistics (CBS) to ensure reliability and data availability.

3.2 Research Design
This is a causal study design seeking to establish the relationship between with the economic growth and insurance penetration in Kenya. The design was deliberately selected because of the accuracy it possesses and the aspect of comparison of data over a period of time. The study focused on whether there had been improved performance of the insurance premiums (GDPI) as a standalone and in terms of its percentage to the GDP that represented the economic growth for the period covered. To serve our purpose, appropriate variables were established and the causal relationships between these variables determined by using regression model.

3.3 Population
The population was the all 45 Insurance companies in Kenya. On insurance the coverage period chosen was the six years between 2003 and 2008. These secondary data was obtained from the published information from IRA and CBS.
3.4 Sample Selection

The study was based on the whole population for secondary source. The study was conducted over a one month period of time.

3.5 Data Collection Method.

Data was collected from secondary sources. These secondary data was obtained from the published industry information from central Bureau of Statistics, Insurance Regulatory and Central Bank.

3.6 Data Analysis and Presentation

The regression analysis model was used. The model represented as follows:

\[ Y = 3 + px + \varepsilon \]

Where \( Y \) represented the economic growth. GDP at market prices for the six years was taken to represent economic growth which is the total sum of the value of services and product produced in a given country, \( b \) is the regression co-efficient while \( X \) is the Insurance penetration measured by gross premium income (GPI). Insurance penetration as a ratio is measured by relating the value of GDPI to GDP.

The presentation of the data will be through graphs, trend analysis and summary statistics. Regression analysis will be done using statistical package for social sciences version (SPSS 17).

3.7 Data Validity and Reliability

The reliability and validity of data was assured since data was collected from the published information. Insurance players are required by the regulator, IRA to furnish it with information.
Another source of secondary data source will be the Central Bureau of Statistic that compiles information economy wise.
CHAPTER FOUR:
DATA ANALYSIS, INTERPRETATION AND PRESENTATION

4.1 Introduction

This chapter presents analysis and findings of the study as set out in the research methodology.

The results are presented on the relationship between economic growth and insurance penetration Kenya for the period covering six years from 2003 to 2008. The study targeted a total of 45 insurance companies for secondary data collection obtained from CBS and IRA.

4.2 Demographic Information

4.2.1 Economic and Insurance Indicators

The table below provides the economic and insurance indicators for the years 2003 to 2008.

Table 4.1: Economic and Insurance Indicators

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>GDP at MP (BIL Kshs)</td>
<td></td>
<td>1,131.8</td>
<td>1,274</td>
<td>1,418.1</td>
<td>1,620.7</td>
<td>1,814.2</td>
<td>2,099.7</td>
<td>15.7%</td>
</tr>
<tr>
<td>GDPI (in THN Kshs)</td>
<td></td>
<td>29,215,744</td>
<td>32,489,552</td>
<td>36,306,265</td>
<td>41,475,358</td>
<td>48,012,987</td>
<td>56,365,580</td>
<td>17.4%</td>
</tr>
<tr>
<td>GDP (% growth)</td>
<td></td>
<td>2.9</td>
<td>5.1</td>
<td>5.8</td>
<td>6.4</td>
<td>7</td>
<td>1.7</td>
<td>-75.8%</td>
</tr>
<tr>
<td>I P ratio (%)</td>
<td></td>
<td>2.6</td>
<td>2.5</td>
<td>2.5</td>
<td>2.5</td>
<td>2.6</td>
<td>2.7</td>
<td>3.8%</td>
</tr>
<tr>
<td>ID (Kshs.)</td>
<td></td>
<td>884.8</td>
<td>955.9</td>
<td>1,037.1</td>
<td>1,152.8</td>
<td>1,290.6</td>
<td>1,611</td>
<td>24.8%</td>
</tr>
</tbody>
</table>

Source: GOK Annual Economic Survey and IRA Annual Insurance Reports
Insurance penetration ratio increased by 0.10% to stand at 2.7% in 2008. The long term business accounted for 0.9% and general business accounted for 1.8%.

The real premium growth decreased from 5.9% in 2007 to -10.1% in 2008. On per capita basis the insurance density grew from an average of Kshs 1,290.60 in 2007 to an average of Kshs 1,611.00 in 2008. This reflected a growth of 24.8% that was spent on insurance.

**Figure 4.1**

**Comparative trends of Real GDPI, GDP and Insurance Penetration Ratio**

```
   3.0
   6.0     \   
  4.0 . . . . . . \
  2.9>. . . . . . \   GDP
   ————
   2003  2004  2005  2006  2007  2008  Insurance Penetration
   • (2.0)
   • (4.0)  GDPI
   • (6.0)
   • (8.0)
   • (10.0)
   • (12.0)
```

**4.3 Type of business Transacted**

The study sought to establish the type of business transacted by Insurance companies in Kenya. From the findings, two classification of business were mentioned namely General business and Fong term Insurance business.
4.3.1 General Business

The table below shows the distribution of gross direct premium incomes per class over the six years period.

Table 4.2

<table>
<thead>
<tr>
<th>Class of Business</th>
<th>Years</th>
<th>2003</th>
<th>2004</th>
<th>2005</th>
<th>2006</th>
<th>2007</th>
<th>2008</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aviation</td>
<td></td>
<td>294,404</td>
<td>252,002</td>
<td>158,007</td>
<td>171,313</td>
<td>257,046</td>
<td>324,968</td>
</tr>
<tr>
<td>Engineering</td>
<td></td>
<td>516,227</td>
<td>636,958</td>
<td>748,251</td>
<td>933,137</td>
<td>914,586</td>
<td>1,101,655</td>
</tr>
<tr>
<td>Fire Domestic</td>
<td></td>
<td>520,640</td>
<td>537,047</td>
<td>553,847</td>
<td>595,454</td>
<td>620,193</td>
<td>671,182</td>
</tr>
<tr>
<td>Liability</td>
<td></td>
<td>634,085</td>
<td>654,103</td>
<td>619,672</td>
<td>704,104</td>
<td>731,882</td>
<td>896,002</td>
</tr>
<tr>
<td>Marine</td>
<td></td>
<td>1,035,418</td>
<td>1,174,384</td>
<td>1,205,723</td>
<td>1,268,284</td>
<td>1,494,747</td>
<td>1,577,317</td>
</tr>
<tr>
<td>Motor Private</td>
<td></td>
<td>3,153,812</td>
<td>3,708,869</td>
<td>4,162,757</td>
<td>4,692,590</td>
<td>5,162,054</td>
<td>6,033,472</td>
</tr>
<tr>
<td>Motor Commercial</td>
<td></td>
<td>5,549,879</td>
<td>6,135,711</td>
<td>6,833,071</td>
<td>7,725,967</td>
<td>8,229,243</td>
<td>9,241,837</td>
</tr>
<tr>
<td>Personal Accident</td>
<td></td>
<td>3,152,526</td>
<td>3,613,278</td>
<td>4,374,507</td>
<td>5,117,374</td>
<td>6,038,785</td>
<td>6,487,303</td>
</tr>
<tr>
<td>Theft</td>
<td></td>
<td>1,103,365</td>
<td>1,288,251</td>
<td>1,387,030</td>
<td>1,572,882</td>
<td>1,582,514</td>
<td>1,723,028</td>
</tr>
<tr>
<td>Workmen's Compensation</td>
<td>982,676</td>
<td>1,090,047</td>
<td>1,292,875</td>
<td>1,494,695</td>
<td>1,565,778</td>
<td>2,152,166</td>
<td></td>
</tr>
<tr>
<td>Miscellaneous</td>
<td></td>
<td>351,936</td>
<td>490,786</td>
<td>620,850</td>
<td>703,121</td>
<td>928,670</td>
<td>1,130,913</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td></td>
<td><strong>20,138,090</strong></td>
<td><strong>22,467,845</strong></td>
<td><strong>25,013,455</strong></td>
<td><strong>28,318,759</strong></td>
<td><strong>30,955,444</strong></td>
<td><strong>35,653,633</strong></td>
</tr>
</tbody>
</table>

Source: IRA Annual Insurance Report
GDPI under general insurance business amounted to Kshs 35.65 billion in the year 2008 as compared to the previous year's Kshs 30.96 billion representing 15.08% increase.

4.3.2 Long term Business

The table below shows the Gross Direct Premium of the Insurance industry under long term business over the six years period.

**Table 4.3**

<table>
<thead>
<tr>
<th>Class of business</th>
<th>Years</th>
<th>2003</th>
<th>2004</th>
<th>2005</th>
<th>2006</th>
<th>2007</th>
<th>2008</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bond Investment</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Industrial Life</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ordinary Life</td>
<td></td>
<td>3,708,064</td>
<td>4,367,501</td>
<td>4,875,222</td>
<td>6,070,610</td>
<td>6,188,155</td>
<td>7,776,473</td>
</tr>
<tr>
<td>Superannuation</td>
<td></td>
<td>4,811,951</td>
<td>5,654,206</td>
<td>6,417,588</td>
<td>7,084,989</td>
<td>10,869,388</td>
<td>11,815,292</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td></td>
<td><strong>8,520,015</strong></td>
<td><strong>10,021,707</strong></td>
<td><strong>11,292,810</strong></td>
<td><strong>13,156,599</strong></td>
<td><strong>17,057,543</strong></td>
<td><strong>19,591,765</strong></td>
</tr>
</tbody>
</table>

Source: IRA Annual Insurance Report
Gross Direct Premium under long term insurance amounted to Kshs 19.60 billion in the year 2008 compared to Kshs 17.06 billion in the year 2007 representing a 14.89% increase.

4.4 Regression Analysis

In addition a simple regression analysis was conducted so as to test the relationship among variables. The analysis applied the statistical package for social sciences (SPSS) to enter and compute the measurements of the simple regressions for the study. The findings were as shown in the table 4.9 below.

Table 4.4 : Model Summary

<table>
<thead>
<tr>
<th>Model</th>
<th>R</th>
<th>R Square</th>
<th>Adjusted R Square</th>
<th>Std. Error of the Estimate</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>998*</td>
<td>.997</td>
<td>.996</td>
<td>22.20115</td>
</tr>
</tbody>
</table>

Source: Research Data, 2011
Coefficient of determination is meant to explain the extent to which changes in the dependent variable (economic growth) can be explained by the change in the independent variable (insurance penetration) or the percentage of variation in the dependent variable that is explained by all the independent variable (insurance penetration).

The correlation and coefficient of determination of the dependent variable with the independent variable was measured and tested. From the findings the relationship between GDP and GDPI was at 99.7%.

**Table 4.5: Coefficients Of Determination**

<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
</tr>
<tr>
<td>1 (Constant)</td>
<td>128.810</td>
<td>40.645</td>
</tr>
<tr>
<td>VAR00002</td>
<td>35.199</td>
<td>.975</td>
</tr>
</tbody>
</table>

Source: Research Data, 2011

A single regression analysis helped to determine the relationship economic growth and insurance penetration a single variable. As per the SPSS generated table 4.8, the equation

\( Y = p + pX + s \) becomes:

\[
Y = 128.810 + 35.199X + E
\]

Where \( Y \) is the dependent variable- economic growth (GDP)

\( X \) is the insurance penetration (GDPI)

According to the regression equation established, taking all one factor into account (insurance penetration) constant at zero, economic growth (GDP) will be 128.810. The data findings analyzed also shows that taking all other independent variables at zero, a unit increase in
insurance penetration (GDPI) will lead to a 35.199 increase in economic growth (GDP) in Kenya. This infers that insurance penetration contributes significantly to the economic growth.

At 5% level of significance and 95% level of confidence, insurance penetration had a 0 level of significance. The t critical at 5% level of significance at k = 4 degrees of freedom is 2.245. Since t for the calculated value was above 2.245 then the variable was significant in explaining the economic growth in Kenya.

**Table 4.6: Descriptive Statistics**

<table>
<thead>
<tr>
<th></th>
<th>Mean</th>
<th>Std. Deviation</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>VAR00001</td>
<td>1559.7500</td>
<td>359.12803</td>
<td>6</td>
</tr>
<tr>
<td>VAR00002</td>
<td>40.6527</td>
<td>10.18714</td>
<td>6</td>
</tr>
</tbody>
</table>

Source: Research Data, 2011

**Table 4.7: Correlations**

<table>
<thead>
<tr>
<th></th>
<th>VAR00001</th>
<th>VAR00002</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pearson Correlation VAR00001</td>
<td>1.000</td>
<td>.998</td>
</tr>
<tr>
<td></td>
<td>VAR00002</td>
<td>1.000</td>
</tr>
<tr>
<td></td>
<td>.998</td>
<td></td>
</tr>
<tr>
<td>Sig. (1-tailed)</td>
<td>VAR00001</td>
<td>.000</td>
</tr>
<tr>
<td></td>
<td>VAR00002</td>
<td></td>
</tr>
<tr>
<td></td>
<td>.000</td>
<td></td>
</tr>
<tr>
<td>N</td>
<td>VAR00001</td>
<td>6</td>
</tr>
<tr>
<td></td>
<td>VAR00002</td>
<td>6</td>
</tr>
</tbody>
</table>

Source: Research Data, 2011
Table 4.8: Economic growth rate and Insurance Penetration ratio (%)

<table>
<thead>
<tr>
<th>Item</th>
<th>Years</th>
<th>2003</th>
<th>2004</th>
<th>2005</th>
<th>2006</th>
<th>2007</th>
<th>2008</th>
</tr>
</thead>
<tbody>
<tr>
<td>GDP growth rate (at constant 2001 prices)</td>
<td>2.9</td>
<td>5.1</td>
<td>5.8</td>
<td>6.4</td>
<td>7.0</td>
<td>1.7</td>
<td></td>
</tr>
<tr>
<td>Insurance penetration ratio (%)</td>
<td>2.6</td>
<td>2.5</td>
<td>2.5</td>
<td>2.6</td>
<td>2.7</td>
<td>2.7</td>
<td></td>
</tr>
</tbody>
</table>

Source: Research Data, 2011

4.5 Summary and interpretations of findings

The study sought to establish the relationship between economic growth and insurance penetration in Kenya. The studies of other researcher were taken into consideration and there was a general consensus that economic growth and financial deepening as a whole are related.

The population of interest comprised 45 insurance companies operating in Kenya as December 2010. Secondary data was collected from published information of IRA and CBS both government agencies. The coverage of the study was for six years running from 2003 to 2008.

From the study it was established that insurance companies in Kenya transact two types of businesses namely long term and general business.

Insurance penetration ratio increased by 0.10% to stand at 2.7% in 2008. The long term business accounted for 0.9% and general business accounted for 1.8%. GDPI under general insurance business amounted to Kshs 35.65 billion in the year 2008 as compared to the previous year's
Kshs 30.96 billion representing 15.08% increase. Gross Direct Premium under long term insurance amounted to Kshs 19.60 billion in the year 2008 compared to Kshs 17.06 billion in the year 2007 representing a 14.89% increase.

The real premium growth decreased from 5.9% in 2007 to -10.1% in 2008. On per capita basis the insurance density grew from an average of Kshs 1,290.60 in 2007 to an average of Kshs 1,611.00 in 2008. This reflected a growth of 24.8% that was spent on insurance.

Under the general business the motor commercial class brings in the most GDPIs and the year 2008 premium income from this particular class was contributed 25.9% to the total GDP1. Aviation class remains the least contributor in this particular.

Long term business category had only two classes of business namely ordinary life and superannuation that were active. Bond investment and industrial life even though mentioned remained inactive. The contribution of the latter was zero. Superannuation class was the highest contributor in this category contributing 60%.

The study used regression analysis to find the relationship between financial performance and financial management practices of insurance companies in Kenya. The finding of the study indicated that the model was significant. According to the regression equation established, taking insurance penetration factor into account constant at zero, economic growth will still be experienced at 8.395. The data findings analyzed also shows that taking all other independent variables at zero, a unit increase in insurance penetration ratio will lead to 35.199 increases in economic growth.
The independent variable was linearly related with the dependent variable thus a model of one predictor variable (insurance penetration) could be used to forecast the economic growth rate in Kenya.

At 5% level of significance and 95% level of confidence, insurance penetration had a 0.0001 level of significance. The t critical at 5% level of significance at k = 4 degrees of freedom is 2.245. Since the t calculated value was above 2.245 then the variable was significant in explaining the economic growth in Kenya.

From the study we can also observe that the economic growth rate and insurance penetration ratios have been growing for the past five years, from 2.9% to 7.0% and 2.6% to 2.7% respectively. The economic growth declined drastically in year 2008 by 75.7%. The insurance penetration ratio has been almost constant making a dismal increase for the period under study. According to the regression equation established, taking all one factor into account (insurance penetration) constant at zero, economic growth (GDP) will be 128.810. The data findings analyzed also shows that taking all other independent variables at zero, a unit increase in insurance penetration (GDPI) will lead to a 35.199 increase in economic growth (GDP) in Kenya. This infers that insurance penetration contributes significantly to the economic growth.

An analysis of the mean and standard deviations revealed that the mean and standard deviation for the GDP for the six years under study was 1,559.75 billions and 359.13 respectively. For the GDPI the mean and standard were 40.65 billions and 10.19 respectively. The standard deviations indicate that variations in the GDP were more pronounced as compared to the GDPI.
The study used regression analysis to find the relationship between economic growth and insurance penetration in Kenya. Forecasting model was developed and tested for accuracy in obtaining predictions. The finding of the study indicated that model was significant. This is demonstrated in the part of the analysis where $R^2$ for the relationship between economic growth and insurance penetration was 99.7%. The independent variable was also linearly related with the dependent variable thus a model of one predictor could be used to forecast economic growth in Kenya.

The findings agree with Soo (1996) postulation that deepening of insurance markets makes a positive contribution to economic growth. He further asserted that while life insurance is causally linked to growth only in higher income economies, nonlife insurance makes a positive contribution in both developing and higher income economies. The research suggests that the positive contribution of life insurance to growth is primarily through the channel of financial intermediation and long term investments.

Other researchers like Ndebbio (2004) and Odhiambo (2005) did consider wider coverage of their study. They researched on the economic growth and financial deepening of all financial institutions. Their findings indicated strongly that economic growth and financial deepening have a strong relationship. They found out that the two had a linear positive relationship displaying high correlation which agrees with findings.
CHAPTER FIVE
SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

5.1 Summary

The objective of this study was to examine the relationship between the economic growth and insurance penetration in Kenya. The period of study coverage was six years running from 2003 to 2008. The population included the 45 registered insurance companies in Kenya.

As a background insurance penetration ratio is measured by taking the gross direct premium income (GDPI) as a percentage of the gross domestic product (GDP) of any given country according to Mahul et al (2009). Financial deepening is simply explained as the supply of financial assets in the economy making insurance penetration a subset of financial deepening. On the other hand economic growth is an increase in a country's productive capacity, identifiable by a sustained rise in real national income over a period of years. Is measured using GDP and economic growth rate taken as the rate of increase in the GDP. GDP is taken as the sum total of all the products and services produced in a given country according to Hardwick et al (1999)

The choice of insurance companies was preferred because they represented the main sectors of the Kenyan economy. In addition, since they are supervised by Insurance Regulatory Authority (IRA), are required to file their annual financial reports with the Authority, information on the insurance penetration, GDP and GDPI were readily available, unlike those of unregulated companies. The insurance industry plays such an important role that is largely distinct from other financial intermediaries (Saunders & Cornett 2008). Insurance industry in Kenya has undergone
major transformations with most important being the strengthening of regulatory regime. The industry players have increased from three in 1930s and 1940s to fort five in the year 2010.

Whereas access to financial services is a potentially important means of alleviating poverty, especially when combined with other supports for poor households, yet access to insurance products has yet to take off in most segments of Kenyan population, reaching only a small segment of the potential market as indicated by low penetration levels. Although long neglected by mainstream financial firms, it would be a mistake to think that Insurance requires some special alchemy for its functioning. According to Arena (2006), Insurance and banking system deepening appear to play complementary roles in the growth process. Although insurance and banking separately each make positive contributions to growth, their individual contributions are greater when both are present. The development of insurance markets also contributes to the health of securities markets. There are many reasons why this complementary relationship might hold, including the likelihood that the presence of property casualty insurance avoids inefficiently high levels of bankruptcy and helps to facilitate credit transactions for houses, consumer durables, and small- and medium-sized businesses that banks typically finance. Separate evidence that a growing presence of life insurance providers and pension funds is associated with more efficient banks suggests that they promote some capital market discipline on the investment side that is also complementary. This particularly highlights the significance of the study. The objectives of the study are to establish the insurance penetration levels in Kenya and secondly to examine the relationship of economic growth and insurance penetration.

From the study it was established that insurance companies in Kenya transact two types of businesses namely Long term and general business. Insurance penetration ratio increased by 0.10% to stand at 2.7% in 2008. The long term business accounted for 0.9% and general business
accounted for 1.8%. GDPI under general insurance business amounted to Kshs 35.65 billion in the year 2008 as compared to the previous year's Kshs 30.96 billion representing 15.08% increase. Gross Direct Premium under long term insurance amounted to Kshs 19.60 billion in the year 2008 compared to Kshs 17.06 billion in the year 2007 representing a 14.89% increase.

According to the regression equation established, taking all factors into account (insurance penetration) constant at zero, economic growth (GDP) will be 128.810. The data findings analyzed also shows that taking all other independent variables at zero, a unit increase in insurance penetration (GDPI) will lead to a 35.199 increase in economic growth (GDP) in Kenya. This infers that insurance penetration contributes significantly to the economic growth.

5.2 Conclusion

The main purpose of this study was to examine the relationship between economic growth and insurance penetration in Kenya. In order to achieve this objective, a thorough literature review was done. Based on the literature it was found that financial deepening of financial sector broadly influences the economic growth of any country. The results of the study show that there exist a relationship between economic growth and insurance penetration.

Soo (1996), contended that the deepening of insurance markets makes a positive contribution to economic growth. While life insurance is causally linked to growth only in higher income economies, nonlife insurance makes a positive contribution in both developing and higher income economies. The research suggests that the positive contribution of life insurance to growth is primarily through the channel of financial intermediation and long term investments.
Montiel (1995) argues that growth and financial development/intermediation are mutually dependent in that the level of per capita income partially determines the level of financial development, while financial development/intermediation can contribute to economic growth in the long run. According to Nzotta & Emeka (2009), Finance affects economic growth, stagnation or even decline in any economic system.

The indemnification and risk pooling properties of insurance facilitate commercial transactions and the provision of credit by mitigating losses as well as the measurement and management of non diversifiable risk more generally. The insurance by performing these functions do stabilize the financial sector and their savings mobilization do greatly contribute to economic growth. The financial depth of any financial subsector do determines the economic growth of any given country.

5.3 Policy Recommendations

Enacting a modern legal framework and designating a special judicial authority to handle insurance-related cases are key requirements to enable market development by protecting the rights of policyholders and regulating the activities of market participants. There is wide variability in the maturity of legal environments, and a number of underdeveloped legal frameworks. Insurance regulator should seek to upgrade its legal frameworks and ensure that they reflect international best practices. In addition, policymakers should seek to establish a specialized insurance judicial authority to resolve insurance disputes. A modern legal framework should regulate all insurance market participants, including insurance companies, intermediaries, and professionals. In parallel with upgrading legal frameworks, policymakers in Kenya should seek to empower their insurance regulatory bodies. An empowered insurance regulator with
well-developed capabilities enables market development by ensuring appropriate market oversight and enforcement of enacted laws and regulations. The empowerment of the regulatory body should be constituted in the legal framework, which should address the body's legal form, ensure its independence, vest appropriate authorities, and clarify any overlapping responsibilities with other governmental entities.

Fostering a competitive environment drives innovation, competitive pricing, and the adoption of best practices, and is a key enabler for the development and growth of insurance markets. The ultimate objective from the standpoint of market growth should be to have a profitable sector adequately serving market demand, with local insurers equipped to withstand the competitive pressures of increasingly liberalized markets. Although the insurance markets in the Kenya are generally competitive, regulators should seek to raise the competitive bar further through enforcement of higher capital requirements and the introduction of governance and risk-management requirements. This in turn would result in larger local companies with the resources to invest in capabilities, and would also reduce the level of fronting. On the governance side, regulators should introduce minimum governance requirements such as the establishment of internal functions (for example, an internal audit), the definition of fit and proper criteria for board members and senior management, the development of policies and procedures manuals, and the formation of an investment policy subject to review and approval by the board.

Cultivating the growth of a pool of skilled local insurance professionals is paramount to the development of the insurance sector in Kenya, given the existing acute shortage of skills. Policymakers and regulators should act as catalysts in the development of professional knowledge in four ways: 1) Organize specialized training programs. In a country where the
demand for takaful products is growing rapidly, regulators need to ensure the availability of training programs to educate the market on these relatively new products. 2) Encourage companies to build up the knowledge of their staff. Regulators should require companies to take a more active role in developing the expertise of their employees by mandating training budgets and staff training programs. These programs would be subject to audits by the regulator to ensure companies' compliance. 3) As an incentive, regulators can consider subsidizing part of the training budget through a reduction of annual regulatory fees. 4) To provide more awareness and develop more capacity, the policymakers should make it mandatory that at elementary levels of schooling the students are taught insurance to inculcate an enabling culture that will foster more consumption of insurance products. This will improve future accessibility to insurance products and consequently increase its depth.

Promoting the involvement of industry wide bodies, whether at a local or regional level, is a valuable enabler for the development of the market. The regulator should aim at providing forums for the harmonization of standards and activities, and for the sharing of best practices across the region. By definition, market-led initiatives lie outside the boundaries of regulators' direct control. Nevertheless, insurance regulators can play a key role in bridging market gaps while stimulating the emergence of more-effective industry-led market development initiatives. In particular, policymakers and regulators can play a valuable role in promoting more active involvement from industry associations, encouraging the adoption of market standards, fostering the availability of granular market statistics, generating consumer awareness of insurance, and raising the profile of the industry to attract new talent. Policymakers and regulators should encourage the formation of industry wide associations as a way to harmonize the representation
of market participants. Regulators should emphasize the role of the industry wide association by channeling regulatory consultation efforts through these bodies or adopting industry standards endorsed by associations

5.4 Limitations of the Study

A limitation for the purpose of this research was regarded as a factor that was present and contributed to the researcher getting either sufficient information or if otherwise the information gathered would have been totally different from what the researcher expected. The main limitations of this study were: the CBS kept on revising the social and economic indicators provided in their subsequent reports and not providing clarity as to which figures to apply. This was important especially in furnishing the researcher with the economic growth rates.

Another limitation included the fact that most of the officers in the government agencies were busy throughout and had to continuously be reminded and even persuaded to provide the required information. This reduced the probability of reaching a more conclusive study.

The study covered six years due to limitation of resources. If the study would have covered more years may be the findings would have been different. The obtaining of information required for more years especially on insurance penetration was constrained by inaccessibility to more downloads from the IRA website. However, conclusions were made with the available information presented.
5.5 Suggestions for Further Studies

The study suggests that further research be conducted on the relationship between economic growth and financial deepening of other financial service sectors for examples cooperative societies to assess the relationship and compare it with the findings in the insurance industry. This is because the Savings and Credit Cooperative Societies (SACCOs) have experienced enormous growth and they are accessed by a big segment of the population.

The study further recommends that another study be conducted in Kenya on the relationship between economic growth and Micro financial Institutions (MFIs) deepening. Kenya has witnessed immense growth in this sector and weak regulatory framework calls for more policy recommendations.

Further studies are needed to test the relationship between financial deepening of various financial service sectors and their relationship with economic growth. Some scholars do aver that relationship can be studied from another perspective. They contend that when the economy of any country grows the financial sector depth increases, theorizing that the reverse is true.
References


APPENDIX

LIST OF REGISTERED INSURANCE COMPANIES.

1. Africa Merchant Assurance Company Ltd.

2. Chartis Kenya Insurance Kenya Ltd.

3. APA Insurance Company Ltd.

4. Apollo Life Insurance Company Ltd.

5. Blue Shield Insurance Company Ltd.


7. Cannon Assurance (K) Ltd.

8. Concord Insurance Company Ltd.

9. CFC Life Assurance Company (K) Ltd.

10. Co-operative Insurance Ltd.

11. Corporate Insurance Company Ltd.

12. Directline Assurance Company Ltd.

13. Fidelity Shield Insurance Company Ltd.

14. First Assurance Company Ltd.

15. Gateway Insurance Company Ltd.

16. Geminia Insurance Company Ltd.

17. General Accident Insurance Company Ltd.


19. Insurance Company of East Africa Ltd.

20. Intra Africa Assurance Company Ltd.
21. Invesco Assurance Company Ltd.
22. Jubilee Insurance Company Ltd.
23. Kenindia Assurance Company Ltd.
27. Lion of Kenya Insurance Company Ltd.
29. Mayfair Insurance Company Ltd.
30. Mercantile Insurance Co. Ltd.
31. Metropolitan Life Insurance (K) Co. Ltd.
32. Occidental Insurance Company Ltd.
33. Old Mutual Insurance Company Ltd.
34. Pacis Insurance Company Ltd.
35. Pan Africa Life Assurance Ltd.
36. Phoenix of East Africa Insurance Co. Ltd.
37. Pioneer Assurance Company Ltd.
38. Real Insurance Company of East Africa.
40. Tausi Insurance Company Ltd.
41. The Monarch Insurance Company Ltd.
42. Trident Insurance Company Ltd.
43. Trinity Life Assurance Company Ltd.
44. UAP Insurance Company Ltd.

45. Xplico Insurance Company Ltd.

Source: Insurance Regulatory Authority Annual Report 2009