# THE RELATIONSHIP BETWEEN EXECUTIVE COMPENSATION AND FINANCIAL PERFORMANCE OF INSURANCE COMPANIES IN KENYA

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A Research Project submitted to the Graduate School in partial fulfillment for the requirement of the Degree of master of business administration of Egerton University

**Egerton University September 2014** 

# DECLARATION AND APPROVAL

# **DECLARATION**

This research project is my original	inal work and has not been p	resented for an awa	ard of degree or
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# **DEDICATION**

To my wife and daughter

#### **ABSTRACT**

A manager whose compensation consists entirely of a fixed salary would have no incentive to increase shareholder wealth because the manager does not share in any of the resulting gains. This incentive problem can be reduced by making part of an executive's compensation depend upon the firm's financial performance. The study examined the relationship between executive compensation and financial performance of the insurance companies in Kenya. The specific objectives of the study were to examine the relationship between executive compensation and financial performance of insurance companies in Kenya and to characterize the executive compensation schemes among the insurance companies. The population of the study consisted of all forty eight (48) insurance companies registered with Insurance Regulatory Authority that have been in existence during the five year period to 2010. Secondary data was collected from Insurance Regulatory Authority annual reports. The study considered functional form relationship between the level of executive remuneration and key performance ratios by using a regression model that relates pay and performance. The study found a non-significant positive relationship between executive compensation, Capital adequacy and solvency margin ratios since P>0.05. Further the study found a non-significant relationship between claims and expense ratios since P>0.05. The negative correlation suggests claims and expenses to be prudently managed to maximize shareholders returns. This implies that the performance ratios are not key considerations in determining executive compensation among the insurance companies in Kenya. This study recommends sensitization of executives to align their payment to financial performance measures because they are directly linked to shareholder's wealth maximization. Further, the results showed that, more than 66% of Kenyan insurance companies characterize executive remuneration into basic salary, fringe benefits and bonus plans while less than 42% characterize into stock options, Longterm incentives plan and golden parachutes.

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### LIST OF ABBREVIATIONS

ANOVA -Analysis of Variance

CEO -Chief Executive Officer

COMESA -Common Market for Eastern and Southern Africa.

CRSP -Center for Research in Security Prices

EVA -Economic Value Added

FTSE - Financial Times and the London Stock Exchange

GDP -Gross Domestic Product

IRA -Insurance Regulatory Authority

ISO - Incentive Stock Options.

NOPAT -Net Operating Profit after Tax

NQSO -Nonqualified Stock Option.

NSE -Nairobi Securities Exchange

OECD -Organization for Economic Co-operation and Development

PM -Profit Margin

ROA -Return on Assets

ROE -Return on Equity

S&P -Standard and Poor's

SERP -Supplemental Executive Retirement Plans

SPSS -Statistical Package for the Social Sciences

WACC -Weighted Average Cost of Capital

#### **CHAPTER ONE**

## **INTRODUCTION**

### 1.1 Background of the study

Executives who are improperly compensated may not have the incentive to perform in the best interest of shareholders, which can be costly to the shareholders. The level of executive compensation and its relationship to firm financial performance are central issues in a generally heated debate among legislators, corporate directors, economists, financial journalist and compensation professionals (Lambert and Larcker, 1985).

The common proposition underlying executive compensation is that in order to motivate executives to spend effort and work for the best interest of the shareholders, compensation contracts should include some form of incentive component (Murphy, 1998). Such an incentive component should establish a link between executive compensation and the performance of the firm they manage. Shareholders are mainly interested in maximizing their wealth. Executive compensation can be used as an effective instrument for creating value for shareholders by improving their firm performance (El Akremi et al 2001).

Remuneration to executives serves as an incentive that affects decisions made and strategies adopted by an executive, both of which affect firm performance. It has a motivational effect and is an indicator of value for executives. It is a means for executives to realize rewards for their efforts. In corporate context, executives participate in the firm's profitability. Therefore, when executive makes sound decisions and engages in profitable strategies, the executive and the organization realize financial enrichment (Finkelstein and Boyd, 1998).

Chief Executive Officer (CEO) has responsibilities as a communicator, decision maker, leader, and manager. The officer oversees the company's strategy and operations therefore requiring compensation for the work. It is the responsibility of the compensation committee of the board of directors to design executive compensation contracts (Murphy, 1998). The right compensation should be the minimum amount it takes to attract and retain a qualified individual. The plan should be designed to motivate the executive to perform in accordance with the company's objectives and risk tolerance (Lambert and Larcker, 1985).

The separation of ownership from management creates agency problems in corporation. Agency problems arise in the form of time horizon and risk aversion. Managers may adopt the short term

decision horizon and maximize current period performance. Shareholders wealth maximization is more closely linked to corporate long term profitability, than to short term profitability. Therefore they would prefer that managers take a long term decision horizon (Gupta, 2011).

The risk aversion problem arises when managers are paid only fixed salary and management performance is not tied to firm performance. Fixed salaries may motivate managers to prefer safe projects because they expect no incremental from the success of risky projects but could lose their jobs if such projects fail. Shareholders would prefer managers to be less risk-averse and to accept projects with greater risk, and correspondingly greater expected payoff, to increase shareholder wealth. To better align the interests of owners and managers, corporations adopt a wide variety of executive compensation plans. Performance plans lengthen the managers' decision horizon by rewarding them on the achievement of certain accounting-based measures over a long period performance (Gupta, 2011). Executive compensation packages generally include a mix of short-term and long term incentives. The compensation plans include salary, annual bonus, perquisites, stock options, restricted shares, golden parachutes, gratuity, and pension (Murphy, 1998).

Insurance companies comprise of complex set of contracts among policy holders, stockholders, and managers. Substantive disagreements are likely to exist within these classes of claimholders with respect to time preference and opinions concerning what constitute the best corporate policies for the firm to follow. Agency problems and their attendance cost do arise when both parties to the agency relationship are self-interested and it is costly to write and enforce the contracts (Garven, 1987). In the context of agency theory, management incentive compensation plans are viewed as an important means of reducing the inherent conflicts (Lambert and Larcker, 1985). Firms in insurance industry face the same agency problems just like other firms in other industries. Therefore this study sought to examine the relationship between executive compensation and financial performance of insurance companies in Kenya.

#### 1.2 Statement of the problem

Good compensation schemes motivate managers to make expenditure decisions that maximize shareholders wealth. A manager whose compensation consists entirely of a fixed salary would have no incentive to increase shareholder wealth because he does not share in any of the resulting gains (Murphy, 1998). This incentive problem can be reduced by making part of an executive's compensation depend upon the firm's financial performance. Lambert and Larcker,

(1985) concluded that compensation schemes really do matter in the sense that executives responds predictably to the incentives built in to their compensation contracts. Furthermore they noted that changes in compensation plans affect executive decision making in ways consistent with agency theory. Ozkan (2007) found a positive and significant link between CEO cash compensation and firm performance. He also noted a positive but not significant relationship between total compensation and firm performance. Kajola (2008), found a positive and significant relationship between Profit Margins and chief executive status. Fahd Al-Heizan (2001) found a significant relationship between market value per share and the percentage of stock options granted to the total number of shares outstanding. He also noted less significant relationship between market value per share and stock based compensation. However, (Aduda and Musyoka, 2011) found a statistically negative non-significant relationship between executive compensation and performance of commercial banks in Kenya. Fernandez, (2005), found out that company performance is not significantly related to executive compensation. In view of the above conflicting findings, this study was set out to evaluate the relationship between executive compensation and financial performance of insurance companies in Kenya.

### 1.3 The main objective of the Study

The main objective of the study was to examine the relationship between executive compensation and financial performance of insurance companies in Kenya.

### 1.4 Specific objectives of the study

- 1) To examine the relationship between executive compensation and financial performance of insurance companies in Kenya.
- To characterize executive compensation schemes among the insurance companies in Kenya.

### 1.5 Hypothesis of the study

There is no statistically significant relationship between executive compensation and the firm's financial performance.

### 1.6 Importance of the study

The findings will be of practical relevance to researchers, and investors interested in the industry fundamentals. For academicians and researchers, the study will form part of reference materials for further research on how best to reward chief executive officers in order to maximize

shareholders wealth. Learning institutions will use the findings to conduct their learning courses in executive compensation plans. Compensation levels affect the shareholders perception of the firm and therefore suggesting if the business executive is competent and deserving that pay. This will help investors make informed decisions on how and where to invest their funds. The study will provide important financial information to new policyholders before signing contracts. This study will also contribute to the ongoing debate on the examination of the relationship that exists between CEO compensation structures and firm performance. It is hoped that the evidence would serve as important quantitative information into the cauldron of policy as well as add to the existing body of empirical literature from a developing financial market such as that of Kenya.

### 1.7 Justification of the study

The motivation of the present study stems from the fact that despite various empirical studies on executive compensation, no currently identifiable research that has been done on insurance industry in Kenya. Aduda and Musyoka (2011) evaluated the relationship between executive compensation and firm performance in Kenyan banking industry. Ongore et al (2011) examined the implications of firm ownership identity and managerial discretion on financial performance for listed companies at Nairobi Stock Exchange. The need for a study of this kind is even more important in an environment like Kenya's, which is characterized by growing calls for effective corporate governance in the insurance sector. Therefore this study sought to fill the existing gap by evaluating the relationship between executive compensation and financial performance of insurance companies in Kenya.

### 1.8 Scope of the study

The study focused on executive compensation and financial performance of insurance companies registered with IRA from year 2006 to 2010 in Kenya.

### 1.9 Limitation of the study

The major limitation of the study is that, it considers only firms financial measure of performance and not non-financial measure of performance. Secondly, management remuneration considered to directly fall within boards emoluments were used as a proxy for executive compensation since components are classified information hence the findings may not be generalized.

### 1.10 Operational definitions of terms

A chief executive officer: This is the chief executive officer of the corporation and

holder of the title and so named in the corporation's annual

report.

Firm financial performance: This is a subjective measure of how well a firm can use

assets from its primary mode of business to generate revenues. This has been captured through the use of key

ratios as applied by Insurance Regulatory Authority to

measure performance.

**Insurance:** This is an undertaking by insurer to indemnify insured

person against loss in respect of a certain risk to which the

object of the insurance may be exposed, paying a sum of

money upon the happening of a certain event.

**Executive compensation:** The total pay an executive officer received from a

corporation. Remuneration considered to directly falling

within boards emoluments were used as a proxy for

executive compensation.

**Agency relationship:** This is where principal contracts an agent to perform on his

behalf a service and then delegates decisions making

authority to that agent. Stakeholders (principals) engage the

services of chief executive officers (agents) delegating

decision making to the agents. This eventually gives rise to

agency problems and their attendance costs.

# CHAPTER TWO LITERATURE REVIEW

#### 2.0 Introduction

This chapter covers financial systems in Kenya, history of insurance, the role of insurance in the economy, agency problem, types of conflicts in insurance companies, mitigation against agency problem, corporate governance, components of executive compensation plans, financial performance evaluation, models in evaluating financial soundness and empirical studies.

### 2.1 Financial Systems in Kenya

Financial system in Kenya is segmented and dualistic in structure. It comprises two sectors, namely the banking and non-banking sectors. The banking consists of central bank and commercial banks. The non-banking commercial sector includes other financial institutions, insurance companies, pension funds and other non-monitory institutions. The insurance sector covers re-insurance and insurance companies, insurance brokers, medical insurance providers, insurance agents, loss assessors, insurance investigators, loss adjusters, surveyors and claims settlement agents. Kenya's financial systems are relatively well developed and diversified though major structural impediments prevent it from reaching its full potential (Beck and Fuchs, 2004).

### 2.2 History of Insurance in Kenya

The concept of insurance and particularly the social insurance programmes dealing with socioeconomic problems has been around Africa for a long time. Members of a community pooled together resources to create a social insurance fund. The premiums ranged from material to moral support or other payments in kind. From the fund, drawings were made out to support the few unfortunate members exposed to perils. (Tsoukatos et al 2004).

The substantial investments by British needed some form of protection against various risk exposures. British insurers established agency offices to service the colony's insurance needs. Prosperity in the colony soon justified expansion of these agencies to branch networks with more autonomy, and expertise to service the growing insurance needs. By independence in 1963, most branches had been transformed to fully fledge insurance companies (Tsoukatos et al 2004).

The IRA was established in 2006 as a government agency tasked with the regulation, supervision and development of the insurance industry in Kenya. The body is also mandated to assist in the administration of the insurance Act Cap 487 Laws of Kenya. IRA also provides advice to the

government on insurance policy issues. The authority is in charge of supervision of insurance companies, brokers and agents, assessors and adjusters and health management organizations According to the authority, Kenya's insurance industry has flourished since 1963, and up to now it has forty eight (48) registered insurance companies, 10 transacting composite insurance businesses, 27 transacting general business insurance, 9 transacting life insurances, and 2 reinsurance companies (IRA, 2010).

### 2.3 The Role of Insurance to Growth and Development

The insurance industry serves a number of valuable economic functions that are largely distinct from other types of financial intermediaries. The indemnification and risk pooling properties of insurance facilitate commercial transactions and the provision of credit by mitigating losses. They provide financial coverage of the loss that an individual is expected to suffer due to unforeseen events, and hence reduces the impact of certain event. They reimburse the financial cost of a particular event against the premium they collect from people who purchases the policy from them. They allow people to share their liability by pooling the individual risk and help them reduce the chances of facing financial devastation. The availability of insurance enables risk averse individuals and entrepreneurs to undertake higher risk, higher return activities than they would do in the absence of insurance, promoting higher productivity and growth (Brainard, 2008).

Insurance companies also provide life insurance policies to compensate for burial cost, replace lost income and pay off debt for bereaved families. Therefore, insurance companies help reduce the risk to uncertainty of death and secure the family members of the deceased. They also provide health insurance to reduce cost of illness by pooling the risk of illness. Pooling risks with other people is a wise decision because no one knows what their health will be, and how much they will have to spend to get the treatment (Beck and Webb, 2003).

The net result of well-functioning insurance markets should be better pricing of risk, greater efficiency in the overall allocation of capital and mix of economic activities, and higher productivity. Importantly, these unique functions of insurance should be complementary to banking and financial sector deepening more broadly. Insurance facilitates credit transactions such as the purchase of homes and cars and business operations, while depending in turn on well-functioning payment systems and robust investment opportunities (Brainard, 2008).

### 2.4 Agency Problem

Agency theory predicts that the misalignment of interests between shareholders and managers could lead to agency problems, like, managers engaging in activities for their own benefits rather than the benefits of the firm's shareholders (Jensen and Meckling, 1976). Executive compensation plans borrows heavily from agency problem. It aims at resolving the principal-agent conflict since it aligns the interest of chief executive officers to those of shareholders. Agency theory focuses attention on the separation of ownership from control in corporations. The design of executive compensation is viewed not only as an instrument for addressing the agency problem between managers and shareholders but also as part of the agency problem itself (Bebchuk and Fried, 2003).

Management incentive compensation plans are viewed as means of reducing potential conflicts of interest between management and shareholders. An effective compensation program can add value to the firm by improving the alignment of management incentives with stockholder interest. Since the objective of corporation shareholders is to maximize wealth; agency theory predicts that chief executive officers compensation policies will depend on changes in shareholder wealth (Jensen and Murphy, 1990).

Firms are legal fictions which serve as a nexus for a set of contracting relationship among various stakeholders. These contracts define a set of agency relationship under which principal engage agents to perform their service on their behalf, a decision which invariably delegates some decision making authority to the agent (Jensen and Meckling, 1976).

Regardless of whether the firm is organized as a stock or mutual company, it is characterized by three major functions which are allocated across various claimholders; the managerial function, the ownership or risk bearing function, and the customer or policy holder function. The three functions are vested to three distinct claimants; managers, shareholders and policy holders. In the stock company, the mangers are viewed as the agents of shareholders while the shareholders are viewed as the agents of policy holders. In the mutual companies, the ownership or risk bearing and the customer or policyholders function are carried out by policyholders. Therefore the principal or agent relationship that is of interest is that which exist between policyholders and managers (Mayers and Smith, 1986).

### 2.5 Kinds of Agency Conflicts

The most apparent conflict of interest is between stockholder and policyholders. Incentive conflicts between conflicts between policyholders and stockholders should be more severe with long tern than with shirt term policies. Thus in lines of insurance where long term policies are more important, there are more opportunities to change dividend, investment, or financing policy to the detriment of the policyholders. While the stockholders' actions are partially controlled by the policyholders' option to cancel the policy, these are less effective disciplining mechanisms the greater the ex-ante advantage of long term policies. Therefore the costs of this conflict between policyholders and stockholders can be reduced with mutual ownership, and thus mutual should have a comparative advantage in longer-term policies (Garven, 1987).

The second important conflict that arises is between managers and stockholders. Contract structures limit risks undertaken by most agents through contractual specifications of payoffs that are either fixed or vary with specific measures of performance. Conflicts arise between managers and residual claimants when risk bearing is separated from management. This conflict can be reduced by restricting their ownership to one or more of the major decisions agents which ensures that such decision agents bear the wealth effects of their decisions and therefore reduces the agency costs associated with outside ownership of residual claims (Fama and Jensen, 1983).

Agency theory suggests that, in imperfect labor and capital markets, managers will seek to maximize their own utility at the expense of corporate shareholders. The utility maximizing agent has an incentive to expropriate resources from the firm in the form of perquisites and less effort which both lead to destruction of value to shareholders (Jensen and Meckling, 1976). Agents have the ability to operate in their own self-interest rather than in the best interests of the firm because of asymmetric information. Managers know better than shareholders whether they are capable of meeting the shareholders' objectives and uncertainty for example myriad factors contribute to final outcomes, and it may not be evident whether the agent directly caused a given outcome, positive or negative (Garven, 1987).

Managers have undiversified portfolios while shareholders can diversify their portfolios and thus eliminate all unsystematic risk specific to the insurer. Risk-averse managers bypass profitable opportunities most preferred by firm's shareholders. Outside investors recognize that the firm will make decisions contrary to their best interests. Accordingly, will discount the prices they are willing to pay for the firm's securities (Bamberg et al, 1987).

Agency conflicts are potentially quite significant in large corporations because the firm's managers generally own only a small percentage of the common stock. Therefore, shareholder wealth maximization could be subordinated to an assortment of other managerial goals. Managers may have a fundamental objective of maximizing the size of the firm. By creating a large, rapidly growing firm, executives increase their own prestige, esteem and power. They pursue diversification at the expense of the shareholders who can easily diversify their individual portfolios simply by buying shares in other companies (Jensen and Meckling, 1976).

### 2.6 Mitigation against Agency Problem

There are two polar positions for dealing with shareholder-manager agency conflicts. In one extreme the firm's managers are compensated entirely on the basis of stock price changes. Agency costs will be low because managers have great incentives to maximize shareholder wealth. It would be extremely difficult, however, to hire talented managers under these contractual terms because the firm's earnings would be affected by economic events that are not under managerial control. At the other extreme, stockholders could monitor every managerial action, but this would be extremely costly and inefficient. The optimal solution is tying executive compensation to performance with little monitoring (Fama 1980).

Firms employ performance shares, which are shares of stock given to executives on the basis of performances as defined by financial measures such as earnings per share, return on assets, return on equity, and stock price changes. Incentive-based compensation plans, are designed to offer executives incentives to take actions that will enhance shareholder wealth. These plans also help companies attract and retain managers with confidence to risk their financial future on their own abilities, which should lead to better performance (Lambert and Larcker, 1985).

Market participants find ways to mitigate agency problem. In the case of simple tasks, monitoring by the principal may be enough. Unfortunately, many tasks are too complex to be monitored effectively by the principal. Enforcement costs are borne by principal to monitor contract compliance and costs borne by agents to bond their behavior. Both parties write and enforce contracts that minimize the agency cost since one or both can thereby be made better off. However, contracts are unlikely to be perfectly enforced; residual losses arise when contracts are optimally but imperfectly enforced (Jensen and Meckling, 1976).

Fama and Jensen (1983) argued that if contracting is costly, then, the firm's contract structure will have an important effect on its cost function. Therefore the company's structure adopted by any given insurer will be determined endogenously along with its investment, underwriting and dividend policies. Mayers and Smith (1987) suggested that there are incentive conflicts between policyholders and stockholders over investments, underwriting and dividend decisions, and between owners and managers over investment policy. Due to the high monitoring cost, the shareholders are left with the option to construct contracts based on surrogate measures of performance that align executives and shareholders objectives (Fahd Al-Heizan, 2001).

Corporate governance mitigates the agency problem and restrains managers' incentives to further their own interests at the expense of the shareholders. The institutional investors have the clout, to exert considerable influence over a firm's operations. They can meet with a firm's management and offer suggestions regarding the firm's operations. They can also sponsor a proposal to be voted on at the annual stockholders' meeting, even if the proposal is opposed by management (Vishny and Shleifer, 1986).

Agency theory posits an inherent moral hazard in principal-agent relations that gives rise to agency costs. Agents can adopt creative accounting that give favorable accounting results and which may maximize their own wealth under compensation and reward incentive schemes. An effective audit committee reduces this incentive problem as it enhances the quality and credibility of annual audited financial statements, safeguarding and advancing the interests of shareholders (Fama and Jensen 1983).

The introduction of insurance guarantees funds eliminate or reduce the risks that claims will be paid and therefore mitigates the incentive conflicts between policyholders and stockholders. It is therefore in the self-interest of the stockholders to provide policyholders with guarantees against the appropriative behavior if such guarantees are less costly than the agency problems (Garven, 1987). Reinsurance provides an important mechanism for guarantee. Use of equity and contractual limitations of dividends and investment policy and a bonding mechanism provide for guarantees (Mayers and Smith, 1986).

The threat of a hostile takeover when a firm's stock is undervalued, threat of firing due to poor performance, legislation, voluntarily abiding to code of good practice disciplines managerial behavior and induces managers to attempt to maximize shareholder value (Pandey, 2005).

### 2.7 Corporate Governance

Corporate governance is about structures, policies and processes through which an entity is managed and controlled. Through strengthening of these structures, insurers are able to promote corporate fairness, transparency and accountability (Shleifer and Vishny, 1997). Corporate governance recognizes that insurer has to be flexible and responsive to developments affecting its operations in making timely decisions, while at the same time being transparent and having appropriate systems, controls and limits to ensure that powers are not unduly concentrated and are used in the best interest of the insurer and its stakeholders (He and Sommer, 2011).

Corporate governance framework promotes the development, implementation and effective oversight of policies that clearly define and support objectives. It defines the roles and responsibilities of persons accountable for the management and oversight of an insurer by clarifying who possesses legal duties and powers to act on behalf of the insurer. It sets requirements relating to how significant decisions and actions are taken and documented. It also provides for appropriate communication, in matters relating to the management, conduct and oversight of the insurer to stakeholders. Lastly, it provides for corrective actions to be taken for non-compliance to governance systems (Doherty and Smetters, 1993).

Remuneration practices are part of sound corporate governance of an insurer. The remuneration policy is neither intended to unduly restrict nor reduce an insurer's ability to attract and retain skilled talent by prescribing any particular form or level of individual remuneration. Rather, it aim to promote the alignment of remuneration policies with the long term interests of insurers to avoid excessive risk taking, thereby promoting sound governance. The standard and guidance apply to the supervision of remuneration policies and practices, especially where variable remuneration is used, taking into account the nature, scale and complexity of the insurers business (Eckles et al 2011).

Executives can be overpaid and be protected from poor performance diminishing the relationship between executive pay and financial performance. Managerial power and influence play a major role in shaping executive pay, and in ways that end up imposing significant costs on stakeholders (Bebchuk and Fried, 2005). When corporate governance is weak, managers have a greater influence on the amount and composition of their own compensation. Chief executive officers can be overpaid because of their influence over the board of directors (Sigler, 2011).

### 2.8 The main Components of Executive Compensation pay

Despite substantial heterogeneity in pay practices, most executive compensation schemes contain five basic components. These are base salary, annual bonus, payouts from long and short term incentive plans, restricted options grants, and restricted stock grants. Additionally, they often receive contributions to defined-benefit pension plans, various perquisites, and, in case of their departure, severance payments (Murphy, 1998). Rewards are monetary, non-monetary, and psychological payments that an organization provides for its executives. They are designed to attract new employees to the organization, elicit good work performance, and maintain commitment to the organization (Sigler, 2011).

Base salary is the fixed component of the compensation package. It is the value that the organizations attributes to a position and are typically based on competitive levels within the relevant labor market and may vary within a set range based on performance. While job evaluation is typically used to set employee pay in organizations, executive base salaries are influenced by the opinion of the compensation committees. Base salaries for CEOs are typically determined through competitive benchmarking, based on industry-specific surveys or market peers (Jensen and Murphy, 1990a).

Executives devote substantial attention to the salary determination process because base salaries typically guarantee minimum increases in base salaries for the subsequent years. Most components of compensation plans are measured relative to base salary levels. Target bonuses, for example, are typically expressed as a percentage of base salary, while option grants are expressed as a multiple of base salary. Defined pension benefits and severance arrangements also depend on salary levels (Murphy, 1998).

Short term bonuses and or incentives are one of the variable elements of the total compensation package. Annual bonuses/incentives are typically awarded based on the employees' contributions, in conjunction with the organization's financial performance, payable in cash or a combination of cash and stock. Bonuses tend to be discretionary, whereas incentive awards are determine by a formula. Long term incentives are tied to performance periods that may run from three to five years or may be granted to career wealth accumulation. They can also be paid in cash or stock based (Lambert *et al*, 1991).

Perquisites and supplemental benefits are variable components that provide executive with additional benefits. The benefits differ by officer and between companies (Lambert and Larcker, 1985). Golden parachute are composed of lucrative benefits given to top executives in the event that a company is taken over by another firm that results in the loss of their job. Last but not least, fringe benefits are retirement plans, life insurance and health insurance, health-club reimbursements, paid holidays and membership, travel vacations. education reimbursement, childcare and assistance reimbursement, cafeteria plans, employee discounts and personal use of a company owned vehicle. These supplemental executive plans are non-qualified for tax purposes and can take a variety of different forms, including defined benefits based on credited years of service and company performance (Murphy, 1998).

### 2.9 Problems with Pay Components

Pay component entice executives to engage in activities that produce problems for the firm. Cash bonuses tied to accounting numbers may motivate executive to manipulate the timing of revenues and expenses to maximize their compensation. It focuses executives on short term performance which may be detrimental to the long term health of the firm. Rewarding top management with different forms of stock compensation may not tie the executive's efforts to company performance closely enough. The stock price may rise or fall from market forces and not from moves of the company's executives. This is especially true with stock options. The manager can become wealthy by being in the right place at the right time and not by the merits of his performance. This could actually offer a disincentive to work hard if the stock price rises regardless of effort. Problems may also occur if the stock price declines after executive stock options are issued putting the options being way out of the money (Sigler, 2011).

A significant interest in executive compensation and corporate governance can be observed due to the prevailing collapses of well-known firms and the accusation of reward for failure and a lack of accountability. It can be argued that if used appropriate without excesses or fraudulent actions, it can bond executives to owners' enhancing shareholders wealth. On the other hand, the dysfunction of the corporate mechanism can impoverish managerial entrenchment and moral hazard. The huge amounts of executive pays drive the corporate governance to erosion sending the message that executive spend shareholders money lavishly and without the appropriate supervision (Bebchuk and Fried, 2003).

#### 2.10 Financial Performance Evaluation.

The relative importance of various factors used to measure the performance of agents should be related to how well each measure informs the principal about the agent's actual performance (Lambert and Larcker, 1987). A number of different ratios are often calculated in strategic or financial planning to infer corporate performance. Careful analysis of a combination of these ratios may help distinguish between firms that will eventually fail and those that will continue to survive. Ratios specifically used in analyzing insurers include the combined and operating ratios, underwriting ratios, capital adequacy ratios and solvency ratios (Gupta, 2005).

### 2.10.1 Capital adequacy ratio.

Financial capital is of essence to any viable business but the peculiar nature of insurance business situates capital more in the context of underwriting capacity. This standard is devised in an attempt to measure the strength of insurance companies. Strength means the ability to withstand normal insurance underwriting and investment risks. The premium-surplus ratio measure of strength is a tool for the policyholder and is only a measure of leverage in the eyes of the stockholder. In other words, a stockholder should prefer a higher premium-surplus ratio, while a policyholder might prefer a lower ratio as it indicates a more heavily capitalized and stronger insurer (Onaolapo et al, 2012).

Policyholders' surplus is a function of the total amount of paid-in capital and surplus, the rate of growth of the insurance company, the underwriting profit margin achieved, the adequacy of the loss reserves, and to a large extent, the amount of money invested in stocks and year- end level of the stock market. The rationale for using policyholders' surplus rather than stock-holders' equity is that, equity is locked up. Which is to say that come a catastrophe or an economic upheaval, equity cannot be released without selling the birthright of a company. The premium-surplus ratio measure of strength is a tool for the policy-holder and is only a measure of leverage in the eyes of the stockholder. In other words, a stockholder should prefer a higher premium-surplus ratio, while a policyholder might prefer a lower ratio as it indicates a more heavily capitalized and stronger insurer. (Cummins et al 1995).

## 2.10.2 Underwriting Ratios

The underwriting expense ratio measures operational efficiency in underwriting. The ratios represents the percentage of a company's net premiums earned that went toward underwriting expenses such as commissions / acquisition, claims cost, claims handling. Commission ratio measures how much of the premium is being paid out to obtain the business. Commission payments are usually paid as a percentage of written premiums. Underwriting expense ratio is an important determinant of overall profitability, and insurers attempt to set premium rates at levels adequate to generate profits. The measure tells how much of the premiums being used for the expenses of administration (other than claims), underwriting proposals, marketing, agency support and product design. The underwriting ratios are added to create a combined ratio which measures total underwriting outgoings for each unit of premium income. The ratio will indicate underwriting loss or profit per unit of gross premium charged to policyholders (Cummins et al 1995).

### 2.10.3 Solvency Margins

Solvency corresponds to insurance ability to pay claims. An insurer is insolvent if its assets are not adequate (over indebtedness) or cannot be disposed of in time (illiquidity) to pay the claims arising. The Solvency Margin Ratio (SMR) is calculated by taking Available Solvency Margin (ASM) divided by Required Solvency Margin (RSM) as a percentage. Solvency margin is the amount by which the assets of an insurer exceed its liabilities, and will form part of the insurer's shareholder's funds (Gour and Gupta, 2012).

#### 2.11 The CAMEL rating system

Rating is the intended to determine the relative financial strength of firms in an industry, which could build trust among consumers, promote better corporate governance, competitive advantage, transparency and better company image (Yakob et al 2004). The objective of the CAMEL-S is to help the insurance regulators supervise companies' financial soundness. The model establishes a rating system that is more comprehensive, transparent and reliable for insurance companies that can be accessed by the public (Hsiao 2009). It incorporates analysis of both quantitative (financial ratios) and qualitative values (subjective elements) driving insurers operations (Rehm, 2011).

The model takes into account the managerial, financial operational and compliance aspects of insurers. It identifies those that are troubled as well as those that have deficiencies in certain CAMEL components. The five appraisal components that form the CAMEL rating system are capital adequacy, asset quality, management quality, earnings and liquidity. A sixth component was added in 1997, sensitivity to market risk. Each component is allocated with a value from one to five where one indicates the best. The components cannot be applied singularly as any movement or decision on one element will definitely affect the others. The ratings provide numerical ranking indicating soundness of the institution as assigned by regulator (Hsiao 2009).

Capital adequacy in the model evaluates whether an insurer provides sufficient capital to meet obligation. An insurer who has sufficient capital usually is considered having less chance to default. Regulators require that insurers have to satisfy fixed minimum capital adequacy requirements to operate. The capital strength relative to the risks taken will determine the overall strength of its ability to pay claims in the future (Rehm, 2011). Capital serves as an insurer's cushion in absorbing expected and unexpected losses thus companies with robust capitalization levels are more capable of shouldering losses arising from claims. This implies a strong ability to pay claims (Shiu 2008).

Asset quality represents all the assets of the insurer, current and fixed, loan portfolio, investments and real estate owned as well as off balance sheet transactions (Hsiao and Wang 2009). Assets-liability mismatch in terms of maturities exposes the insurer to reinvestments, refinancing and market value risk (Black and Skipper, 2000). In the standard CAMELS framework, asset quality is assessed according to the level, distribution, and severity of classified assets, the adequacy of valuation reserves and the demonstrated ability to administer and collect premiums (Sarker, 2005). Poor assets quality can lead to institutional failure because assets liability mismatch in terms of maturity exposes the insurer to reinvestments, refinancing and market value risk (Hsiao 2009).

Management is the most qualitative and subjective, and cannot be reflected in the financial statements (Gasbarro *et a*l 2002). It shows how well the company's board of director's functions, including the diversity of its technical expertise, its independence from management, and its ability to make decisions flexibly and effectively. Management control culture and efficient computer personnel and systems are also very crucial (Hsiao, 2005).

Earnings is defined as net gains from operations from which dividends to policyholders must be subtracted since they are normal part of insurance practice. Capital gains or losses on investments funds should also be factored in, since they reflect financial results of the companies in a given year. Supervisors, analysts and investors will through the extent of profitability evaluate the periodic financial success of an insurer and examine an insurer's performance ability to employ assets to generate returns. The more profitable the insurer is, the higher the business continuity and financial strength (Shiu, 2008). A company should adopt a long-range outlook, since the earnings on any block of policies are not known until final contract expires which largely affects ability to settle claims (Wright, 1992).

Insurers' liquidity is considered an ability to respond quickly to operational cash (Yakob et al 2004). Current liquidity ratio is a significant indicator of solvency and the stability of liquidity ratio is an essential assessment of corporate solvency. Hsiao (2009) asserts that insolvent probability is correlated to fewer liquid assets and incase of mass surrenders of policies owing to loss of confidence by policyholders, liquidity risk increases (Kelliher *et al* 2005). This reduces ability of insure to generate sufficient financial resources to meet their payments commitments. Insurers with a high degree of liquidity are expected to have a high business continuity and financial strength (Shiu, 2006).

Sensitivity to market risk is assessed by the degree to which changes in market prices, notably interest rates, exchange rates, commodity prices, and equity prices adversely affect an insurer's earnings and capital (Hsiao 2009). This come in the form of sensitivity of the financial institution's net earnings or the economic value of its capital to changes in interest rates under various scenarios and stress environments. Actual or potential volatility of earnings or capital because of any changes in market valuation of trading portfolios or financial instruments, and lastly, ability of management to identify, measure, monitor and control interest rate risk as well as price and foreign exchange risk where applicable and material to an institution (Sarker, 2005).

# 2.12 Empirical Studies.

El Akremi *et al*, (2001), studied compensation strategies for Chief Executive Officers (CEO) from various economic, political and symbolic perspectives. The results suggest that agency theory offers a priori the most solid explanation of CEO compensation because of the links observed between the control exercised by the Principal, the intensity of short-term incentives and the sensitivity of direct pay to performance. They noted that a balance of power between

board members and top executives seems to be a determining factor in the determination of the structure and management of CEO compensation. Further they reiterated that the political perspective remains coherent with agency theory by supposing that CEOs can be tempted to make use of their privileged position concerning compensation decisions.

Fernandes, (2005) examined the relationship between compensation and firm performance of companies listed in the Portuguese Stock Exchange. He found out that compensation is not related to shareholders wealth, nor do shareholders have any mechanism to influence it. The results suggest that very few companies have what is really considered an independent director that looks after shareholders' interests. The results suggested that company performance is not significantly related to executive compensation.

Bebchuk and Fried (2003) provided an overview of the main theoretical elements and empirical underpinnings of a managerial power approach to executive compensation. They concluded that managerial power and rent extraction play an important role in executive compensation and have significant implications on corporate governance. They noted that, the extent to which managerial influence can move compensation arrangements away from optimal contracting outcomes depends on the extent to which market participants recognize the problems. Boards of listed companies with dispersed ownership cannot bargain at arm's length with managers. As a result, managers wield substantial influence over their own pay arrangements, and they have an interest in reducing the saliency of the amount of their pay and the extent to which that pay is decoupled from managers' performance. This way it is seen that managers have the power to design their pay.

Evans and Evans, (2000) examined the link between Economic Value Added as a measure of firm performance and the form of executive compensation of 209 to try and provide evidence supporting incentive compensation. Based on agency theory, they found out that, equity based pay was positively linked to EVA, supporting the contention that where an executive has significant investment in the company the division between owners and management is minimized and agency costs are reduced. In contrast, they noted that CEO cash pay was not significantly associated with EVA.

Hill and Yablon (2002) discussed a number of scandals and developments relating to executive remuneration in Australia. They argued that segregation of executive remuneration from other areas of corporate law may lead to dangerous tunnel vision. They considered ways in which management's positional conflict of interest, particularly in the area of disclosure, may interact with the goals of contemporary performance-based pay schemes. Their study found that, performance-based pay assumes that markets and appropriately designed remuneration contracts can constrain executives, forcing them to act as if they had the shareholders' interests at heart.

Fahlenbrach and Stulz, (2010) investigated whether bank performance during the credit crisis was related to chief executive officer (CEO) incentives before the crisis. Based on their evidence, lack of alignment of bank CEO incentives with shareholder interests could not be blamed for the credit crisis or for the performance of banks during that crisis. They noted that, there was no evidence that banks with CEOs whose incentives were less well aligned with the interests of their shareholders performed worse during the crisis. Banks where CEOs had better incentives in terms of the dollar value of their stake performed significantly worse than banks where CEOs had poorer incentives. Neither cash bonus nor stock options had an adverse impact on bank performance during the crisis. CEOs with better incentives to maximize shareholder wealth took risks that other CEOs did not. These poor outcomes are not evidence of CEOs acting in their own interest at the expense of shareholder wealth.

Fahd Al-Heizan (2001) employed the agency theory framework to empirically investigate the relationship between executive risk sharing and the firm's stock performance. His study tried to answer the question of whether or not using risk sharing contracts motivate executives to increase shareholder value. Regression analysis showed a significant relationship between market value per share and the percentage of stock options granted to the total number of shares outstanding. Further a less significant relationship was also found between market value per share and stock based compensation.

Gao and Shrieves (2002), studied how the components of compensation influence earnings management behavior. They found strong evidence that compensation contract design influence earnings management, and that the influences of the various compensation components appear to be largely predictable on a presumption that managers behave opportunistically by exploiting timing options embedded in some components of the compensation contracts.

Aduda and Musyoka (2011) examined the relationship between executive compensation and firm performance on commercial banks listed at the Nairobi Stock Exchange. He found out that accounting measures of performance are not key considerations in determining executive compensation among the banks in Kenya and that size is a key criterion in determining executive compensation as it was significantly but negatively related to compensation. The negative correlation suggests the capping of executive compensation to ensure maximization of returns to shareholders.

Pava and Krausz (1996) examined the association between corporate social responsibility and financial performance in Netherlands. They used 53 firms identified by Council on Economic Priorities as being socially responsible and another 53 firms as control sample where they compared their performance over time. In addition they compared the performance of the two groups in two times period, 1985-1987 and 1989-1991. They compared the financial performance based on market based measures, accounting based measures, measure of risk, and other firm specific characteristics. They found that, firms perceived to have met social responsibility criteria generally have financial performance at least on a par if not better than other firms.

Mang'unyi (2011) explored ownership structure and corporate governance and its effects on Kenyan banks performance. He found out that there was no significant difference between type of ownership and financial performance, and between banks ownership structure and corporate governance practices. He further found out that there was significant difference between corporate governance and financial performance of banks. However, foreign-owned banks had slightly better performance than domestically-owned banks.

Coleman (2007) examined the effect of corporate governance on firm performance by using both market and accounting based performance measures. The results provide evidence that, large and independent boards enhance firm value and that combining the positions of CEO and board chair has a negative impact on firm performance. He found out that CEO's tenure in office enhances firm's profitability while board activity intensity affects profitability negatively. The size of audit committees and the frequency of their meetings have positive influence on market based performance measures and that institutional shareholding enhances market value of firms.

Ongore et al (2011) studied interrelationships between ownership identity and managerial discretion, and their impact on financial performance as measured by Return on Assets, Return on Equity and Dividend Yield. The results showed significant positive relationship between managerial discretion and performance. They noted a significant negative relationship between government ownership and firm performance.

Kajola, (2008) found a positive and significant relationship between ROE and board size, a positive and significant relationship between ROE and chief executive status, no significant relationship between ROE, board composition and audit committee, a positive and significant relationship between profit margin and chief executive status, and finally no significant relationship between profit margin and board size, board composition and audit committee.

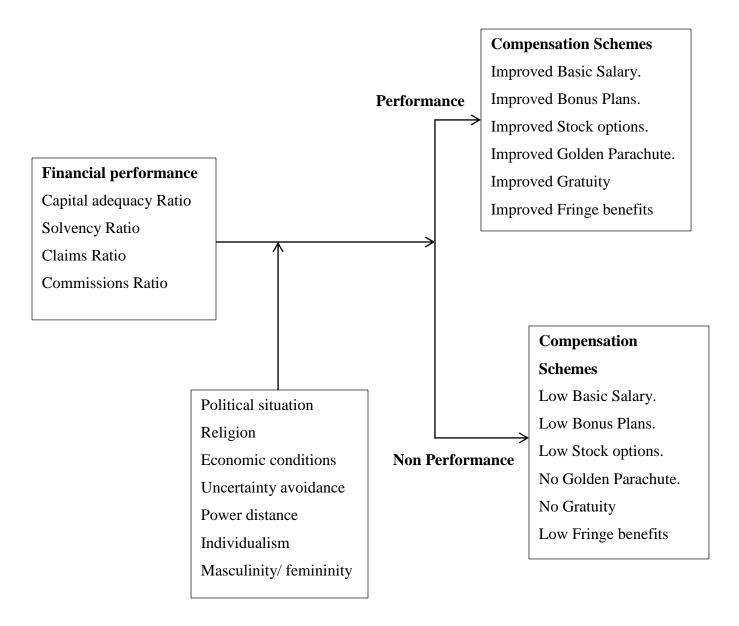
Ozkan (2007) examined the link between cash and equity-based components of CEO compensation and performance. The results indicated a positive and significant link between CEO cash compensation and performance however the link between total compensation and performance was positive but not significant. Their findings also suggest that larger firms pay their CEOs higher compensation, which can be interpreted as reflecting their demand for higher quality CEO talent.

### 2.13 Conceptual framework

The framework for this study examined financial performance as being key factor in improving compensation as illustrated below.

## **Independent Variables**

# **Dependent Variables**



### **Intervening Variables**

**Figure 2.1:** The relationship between executive compensation and financial performance.

(Source: Author, 2014)

According to the framework in figure 2.1, financial performance constitutes the independent variable while compensation schemes are the dependent variables. Financial performance was measured through the key ratios published by the insurance companies. Financial performance is expected to result in improved compensation schemes and vice versa. Intervening variables have an effect on the relationship between the variables.

The conceptual framework statistically link pay and performance in insurance industry. It depicts the relationship between compensation and performance when the firm has a bad year compared to when the firm has a good year. CEOs are entrusted with control of vast resources and assets therefore, it is important to structure compensation contracts such that the CEO has proper incentives to work in the shareholders' interests, which presumably are to maximize firm value.

### **CHAPTER THREE**

### RESEARCH METHODOLOGY

#### 3. 0 Introduction

This chapter covers research design, population and sample, data collection, analysis and presentation.

### 3. 1 Research Design

The study adopted a causal research design by examining the relationship between executive compensation and financial performance among the insurance companies. Causal Research explores the effect of one thing on another and more specifically, the effect of one variable on another (Aduda and Musyoka, 2011).

### 3. 2 Population of the Study

The target population comprised of the insurance companies in Kenya (see appendix one). There are forty eight (48) registered insurance companies in Kenya as at end of 2010. The analysis period of this study covered the years from 2006 to 2010.

### 3. 3 Sample size

Given the small number of insurance companies in Kenya, the study deemed a complete analysis most suitable. Therefore a census study of the forty eight (48) companies was undertaken.

#### 3. 4 Data Collection

The study employed both secondary and primary data. Secondary data was collected from the annual reports of Insurance Regulatory Authority of Kenya. The primary data was collected through use of structured data sheet that capture the components of compensation components.

#### 3. 5 Data Analysis

Key performance ratios and executive compensation were collected from IRA annual reports from year 2006 to 2010 (see appendix two to six). Mean financial performance ratios were calculated to combine all the five year period (see appendix seven). A multiple regression model was used to identify the relationship between executive compensation and financial performance of insurance companies using statistical package for the social sciences (SPSS) version 12.

The analysis begun by examining the basic features of the data using the descriptive statistics as a starting point to describe what's going on in the data (see table 4.1). Analysis was done using Pearson correlation to measure the association and strength (see table 4.2). ANOVA was also used to test for homogeneity of the sum of the variation due to regression and residual (see table 4.3). P-value was used to prove or disprove the null hypothesis based on its significance. Autocorrelation was measured by Durbin Watson statistics (see table 4.4). The study adopted Moore (1994) regression model to examine relationship. In analyzing the relationship, this study applied the method as used by Hsiao (2009) analyzing insolvency prediction using CAMEL-S model (see appendix eight).

$$Y = \alpha + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + \mu$$

Where: Y = Executive compensation,  $\alpha$  = Intercept,  $X_1$  = Capital Adequacy Ratio,  $X_2$  = Solvency Ratio,  $X_3$  = Incurred Claims Ratio,  $X_4$  = Expense Ratio,  $\mu$  = Prediction error. In this case the independent variables are key ratios that are used by IRA in assessing financial performance. Regression model has been used in other studies like Sigler (2011), Ozkan (2007), Murphy (2011), Lambert and Larker (1985) and Aduda and Musyoka (2011) in analysis of payperformance relationships.

## 3. 6 Data presentation

The study presented collected and analyzed data in tables and figures.

## CHAPTER FOUR

### DATA ANALYSIS, RESULTS AND DISCUSSIONS

#### 4. 0 Introduction

This chapter presents the data analysis, findings and discussion of the results with reference to the specific objectives. The first objective of this study was to examine the relationship between executive compensation and financial performance of insurance companies in Kenya. The study also characterizes the compensation packages in order to assess the packages mostly preferred.

## 4. 1 The relationship between executive compensation and financial performance

Table 4.1: Descriptive Statistics of key performance ratios and executive compensation.

	N	Minimum	Maximum	Mean	Std. Deviation
Expense	48	0.01	430.40	23.6958	60.29616
Claims	48	4.40	143.60	57.5000	22.90970
Capital	48	2.20	791.40	255.4792	178.19304
Solvency	48	31.60	698.00	346.2167	165.09977
Rem	48	12,365.60	929,917.80	273,988.2583	238,736.64265

(Source, Research data)

From table above, statistical summaries show that executive remuneration had the highest value because the figures are in terms of Kenyan shillings. The financial ratios showed that, Solvency had the highest minimum value followed by claims and capital while the least minimum values were expenses. Executive remuneration had the highest maximum values followed by capital, solvency, expenses and the least being claims. Executive remuneration has the most widely spread values followed by solvency and capital. This simply means that the values collected for executive remuneration, solvency and capital were heterogeneous that is, and minimum values were way too far from the maximum. On the other hand, expenses and claims have a homogeneous population that is, values recorded were tightly grouped, and their spread was very minimal.

**Table 4.2: Correlations results** 

						Executive
		Capital	Solvency	Claims	Expense	remuneration
Capital	Pearson Correlation	1	-0.277	-0.014	0.437(**)	0.166
	Sig. (2-tailed)	0.000	0.057	0.926	0.002	0.261
	N	48	48	48	48	48
Solvency	Pearson Correlation	-0.277	1	0.279	0.156	-0.114
	Sig. (2-tailed)	0.057		0.055	0.290	0.441
	N	48	48	48	48	48
Claims	Pearson Correlation	-0.014	0.279	1	-0.119	-0.037
	Sig. (2-tailed)	0.926	0.055	0.00	0.420	0.802
	N	48	48	48	48	48
Expense	Pearson Correlation	0.437(**)	0.156	-0.119	1	-0.155
	Sig. (2-tailed)	0.002	0.290	0.420	0.00	0.294
	N	48	48	48	48	48
Executive remuneration	Pearson Correlation	0.166	-0.114	-0.037	-0.155	1
	Sig. (2-tailed)	0.261	0.441	0.802	0.294	
	N	48	48	48	48	48

(Source, Research data)

The relationship between capital and solvency margins is negative, very weak and not significant (P>0.01) therefore we fail to reject the null hypotheses. The relationship between capital and incurred claims is negative, weak and not significant (P $\ge$ 0.05), hence we fail to reject the null hypotheses. The relationship between capital and expense ratio is positive, reasonably strong and highly significant ((P $\le$ 0.01) hence we reject the null hypotheses in favor of the alternative hypotheses. The relationship between capital and executive remuneration is positive, weak and not significant (P>0.05) hence we fail to reject the null hypotheses.

The relationship between solvency and capital adequacy is negative, very weak and not significant (P>0.05) hence we fail to reject the null hypotheses. The relationship between

<sup>\*\*</sup> Correlation is significant at the 0.01 level (2-tailed).

solvency and expense ratio is positive, weak and not significant ( $P \ge 0.05$ ) hence we fail to reject the null hypotheses. The relationship between solvency and executive remuneration is negative, weak and not significant (P > 0.05) hence we fail to reject the null hypotheses and conclude that there is no relationship between solvency and executive remuneration.

The relationship between claims and capital adequacy is negative, very weak and not significant ( $P \ge 0.05$ ) hence we fail to reject the null hypotheses in favor of the alternative. The relationship between claims and solvency margins is positive, weak and not significant ( $P \ge 0.05$ ) hence we fail to reject the null hypotheses in favor of the alternative. The relationship between claims and expense ratio is negative, very weak and not significant ( $P \ge 0.05$ ) therefore we fail to reject the null hypotheses in favor of the alternative. The relationship between claims and executive remuneration is negative, very weak and not significant ( $P \ge 0.05$ ) therefore we fail to reject the null hypotheses and conclude that there is no relationship between claims and executive remuneration.

The relationship between expense and capital adequacy is positive, reasonably strong and highly significant ( $(P \le 0.01)$ ) therefore we reject the null hypotheses. The relationship between expense and solvency margins is positive, weak and not significant ( $P \ge 0.05$ ) therefore we fail to reject the null hypotheses. The relationship between expense and incurred claims is negative, very weak and not significant ( $P \ge 0.05$ ) therefore we fail to reject the null hypothesis. The relationship between expense and executive remuneration is negative, very weak and not significant ( $P \ge 0.05$ ) hence we fail to reject the null hypotheses and conclude that there is no relationship between expense ratio and executive remuneration.

The results of the tests have shown a non-significant relationship between executive remuneration and financial performance. This means the data doesn't provide concrete evidence against the null hypotheses.

## 4. 2 Analysis of Variance

ANOVA model for testing relationship between executive compensation and financial performance of insurance companies in Kenya (N=48)

**Table 4.3**: Results of ANOVA

Model		Sum of Squares	df	Mean Square	F-Ratio	Sig.
1 SSR	Regression	259452966794.755	4	64863241698.689	1.153	0.345(a)
SSE	Residual	2419320706792.363	43	56263272250.985		
SST	Total	2678773673587.117	47			

(Source, Research data)

(a) Predictors: Expense, Claim, Solvency, Capital.

(b) Dependent Variable: Executive remuneration

Examining the ANOVA results and the F test for the existence of a linear relationship between the independent variables and the dependent variable reveals that F= 1.153 (Table 4.3). This value is less than critical value hence falls within the acceptance region for any significance level. This means that there is strong evidence for the null hypotheses. Linear regression demonstrated no significant relationship between executive compensation and financial performance of insurance companies in Kenya since (P>0.05).

## 4. 3 Model Summary

Table 4.4: Model Summary in the insurance industry

			Adjusted R	Std. Error of the	
Model	R	R Square	Square	Estimate	Durbin-Watson
1	.311(a)	.097	.013	237198.80322	2.064

(Source, Research data)

(a) Predictors: Expense, Claims, Solvency, Capital.

(b) Dependent Variable: executive remuneration.

The coefficient of determination ( $R^2 = 0.097$ ) for the straight line regression model is low, which means that 9.7 % of the total variability in the study has been explained by the straight line regression model further confirming that the four key ratios cannot adequately predict executive remuneration. The Durbin-Watson test statistic tests the null hypothesis that the residuals from an ordinary least-squares regression are not auto correlated against the alternative. The Durbin-Watson statistic (2.064) was used to test for autocorrelation between the independent

variables. The results indicate non-autocorrelation. This means that, interpretation of regression coefficient is not affected adversely with multicollinearity.

## 4. 4 Regression coefficients

Table 4.5: Unstandardized and standardized Coefficients (a)

		Unstandardized Coefficients		Standardized Coefficients		
Model		В	Std. Error	Beta	t	Sig.
1	(Constant)	224116.177	128422.194		1.745	0.088
	Capital	415.245	238.245	0.310	1.743	0.088
	Solvency	61.135	245.531	0.042	0.249	0.805
	Claims	-846.153	1623.639	-0.081	-0.521	0.605
	Expense	-1212.312	693.578	-0.306	-1.748	0.088

(Source, Research data)

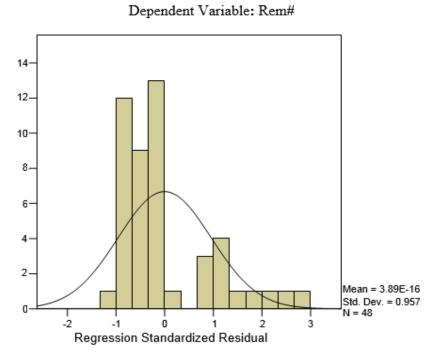
(a) Dependent Variable: Remuneration

Exec Rem = 
$$224,116.177 + 0.31$$
 Capital  $(P=0.088) + 0.042$  Solvency  $(P=0.805) - 0.081$  Claims  $(P=0.605) - 0.306$  Expense  $(P=0.088)$ 

The result of the regression model shows that, an increase in Capital Adequacy by one unit increases executive remuneration by 0.31 units. This increase is not significant since p>0.05. Solvency positively affects the remuneration. A one unit change increases remuneration by 0.042 units which is not significance since P>0.05. Incurred Claims and Expense has a negative impact on remuneration. Increase in one unit of each decreases remuneration by 0.521 and 0.306 respectively though not significant since P>0.05.

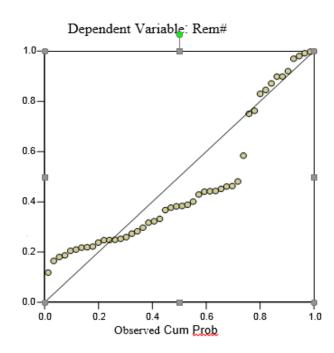
The figure 4.1 below shows that residuals are skewed to the right. The regression standardize residuals are not normally skewed. This is consistent with the hypothesis test that the model is not fit enough to explain the link between pay and performance.

Figure 4. 1: Histogram of regression standardized residuals



(Source, Research data)

Figure 4. 2: Normal P-P plot for Regression standardized residual



(Source, Research data)

Figure 4.2, shows that only small portion is almost to the line. This linear model is not fit enough to explain the existing variability. There are other factors that are outside the model. That's why the adjusted R square (0.013) is very small. The model only explains 1.3% of the variability.

## 4. 5 Executive Compensation Schemes

The second objective of the study was to characterize the executive compensation schemes. The aim was to find out the most preferred to the least preferred components. The results are presented in tables 4.6, 4.7 and figures 4.2 and 4.3. Data collection sheet was used to collect primary data.

**Table 4.6: Position of respondent** 

	No. of respondents	Percent (%)
CEO	8	24.20
Human Resources Manager	25	75.80
Total	33	100.00

(Source, Research data)

Table 4.6 showed that, respondents were Human Resources Managers (75.8%) compared to CEO (24.2%). This can be attributed to the fact that CEOs handles strategic issues hence delegating such works to heads of departments. Out of the forty eight (48) companies, thirty three (33) completed and returned the questionnaires representing a response rate of 68%.

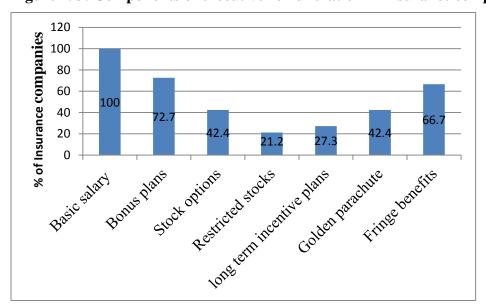


Figure 4. 3: Components of executive remuneration in insurance companies in Kenya

(Source, Research data).

Figure 4.3 above shows that, all companies pay their CEO basic salaries, 72.7 pays bonus plans, 66.7% pays fringe benefits, 42.4% pays stock options and golden parchutes, 27.3% pays long term incentives plans, and 21.2 pays through restricted options.

**Table 4.7: Components of executive remuneration schemes** 

	Remunera	tion scales '	000 KES N	=33	
Components of executive					
remuneration	50-150	150-300	300-450	450 +	Missing
	4	10	9	10	
Basic salary	(12.10%)	(30.30%)	(27.30%)	(30.30%)	0 (0%)
	4	13	5	7	4
Bonus plans	(12.10%)	(39.40%)	(15.20%)	(21.20%)	(12.10%)
	8	7	1	5	12
Stock options	(24.20%)	(21.20%)	(3.00%)	(15.20%)	(36.40%)
		6	2	1	22
Restricted stocks	2 (6.10%)	(18.20%)	(6.10%)	(3.00%)	(66.70%)
	4	3	4	5	17
long term incentive plans	(12.10%)	(9.10%)	(12.10%)	(15.20%)	(51.50%)
	9	3	3	4	14
Golden parachute	(27.30%)	(9.10%)	(9.10%)	(12.1%)	(42.40%)
	16	9	1	1	6
Fringe benefits	(48.50%)	(27.30%)	(3.00%)	(3.00%)	(18.20%)

(Source, Research data).

Table 4.7 above shows that, 12% of the insurance companies pay their CEO a basic salary of between Kshs. 50,000 and Kshs 150,000 shillings compared to 88% who pay a basic salary more than Kshs 150,000. Most insurance companies (76%) allocate their CEOs with a fringe benefits ranging from Ksh 50,000 to Kshs. 300,000.

#### CHAPTER FIVE

## SUMMARY, CONCLUSION AND RECOMMENDATION

#### 5.1 Introduction

This chapter covers detailed explanation of the findings of each objective as well as the conclusions of the study. Recommendations for practice and for further research are also presented here.

## 5.2 Summary of findings

The study's main objective was to examine the relationship between executive compensation and financial performance. This study employs the agency theory framework to empirically investigate the relationship between executive compensation and the financial performance. It tries to answer the question of whether or not using compensation schemes contracts motivate executives to increase shareholder value.

The study found a non-significant but positive relationship between capital adequacy ratio and executive remuneration. Therefore in order to attract and enjoy the potential opportunities offered by the provision of adequate capital in the insurance industry, attention should be paid to overall size of capital requirements as a basis for creating a supportive and enabling business support system that foster financial performance.

The study found a positive relationship between solvency and executive remuneration though not significant. Solvency means ability to meet financial obligation on time. This implies that assets and liabilities should not be treated as independent aspects and much more attention needs to be focused on the uncertainties and on the company's resilience in the face of such uncertainties. The study also found out that, claims ratio and expense ratio had a negative relationship with executive remuneration. The negative correlation suggests claims and expenses should be prudently managed to maximize shareholders returns.

The study's second objective was to characterize the executive compensation schemes from the most preferred to the least preferred components. The study found out that, more than 66% of Kenyan insurance companies characterize executive remuneration into basic salary, fringe benefits and bonus plans while less than 42% characterize into stock options, Longterm incentives plan and golden parachutes.

### **5.3** Conclusion of the study

The study finds non-significant relationship between executive compensation and financial performance. This provides support for the hypothesis of the study that there is no statistically significant relationship between executive remuneration and financial performance of insurance companies. Since p-value is greater than 0.05, we therefore fail to reject the null hypothesis and conclude that there is no significant relationship between executive compensation and financial performance. Insurance companies should incorporate their compensation structure with the use of incentives plans that motivate the CEO to take actions that increase shareholders wealth. The plans ties executive compensation to performance with little monitoring reducing agency problem. It attracts and retains managers with confidence to risk their financial future on their own abilities leading to maximization of shareholders wealth. Further in order to maintain the social order and prepare for future market liberalization, apart from strengthening management abilities, more attention will be given to capital structure and capital management as well as adopting risk based management practices. In considering the investment function, emphasize should be put on relevance of asset- liability management as well as adopting solvency modernization initiatives including policyholder protection and loss absorbency.

#### 5.4 Recommendation for further research

Further research can be done to test how the concept of complexity influences compensation contracts despite strong theoretical ground and compensation consultants' inclusion of complexity in job evaluation work. Further, a study can be done on the relationship between executive remuneration and firm value of listed companies. The current research examined the relationship of executive remuneration and financial performance. Other research might extend the analysis to effect of firm size on executive remuneration. Other line of future research might try to examine the relationship between executive remuneration and return on equity and return on assets as measures of firm performance.

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APPENDICES

Appendix One: Registered Insurance Companies with respective years of Incorporation.

A	<b>Composite Insurance Companies</b>	Year			Year
1	British American Insurance Co Ltd.	1965	25	Fidelity Shield Insurance Co Ltd	1980
2	Cannon Assurance (Kenya) Ltd	1964	26	First Assurance Co Ltd	1980
3	Co-operative Insurance Co Ltd	1978	27	Gateway Insurance Co Ltd	1982
4	Corporate Insurance Co Ltd	1982	28	General Accident Insurance Ltd	1979
5	Geminia Insurance Co Ltd	1981	29	Intra Africa Assurance Co Ltd	1977
6	Heritage AII Insurance Co Ltd	1924	30	Invesco Assurance Co Ltd	1985
7	Insurance Co of East Africa Ltd	1980	31	Kenya Orient Insurance Co Ltd	1982
8	Jubilee Insurance Co Ltd	1937	32	Kenindia Assurance Co Ltd	1978
9	Kenya Alliance Insurance Co Ltd	1979	33	Lion of Kenya Insurance Co Ltd	1978
10	Mercantile Insurance Co Ltd	1993	34	Mayfair Insurance Co Ltd	1986
В	<b>Long term Insurance Companies</b>		35	Madison Insurance Co Kenya Ltd	1988
11	Apollo Life Assurance Co Ltd	1977	36	Monarch Insurance Company Ltd.	1980
12	Capex Life Assurance Company Ltd.	1978	37	Occidental Insurance Co Ltd	1984
13	CFC Life Assurance Ltd	1964	38	Pacis Insurance Company Ltd	2004
14	Metropolitan Life Insurance Ltd.	2006	39	Phoenix of E. Africa Co. Ltd	1912
15	Old Mutual Life Assurance Co. Ltd	1930	40	Real Insurance Company Ltd	1978
16	Pan Africa Life Assurance Ltd.	1947	41	Trident Insurance Co. Ltd.	2008
17	Pioneer Life Assurance Co Ltd	1930	42	Tausi Assurance Co. Ltd.	1992
18	Shield Assurance Co. Ltd	1982	43	Trident Insurance Co. Ltd.	1982
19	U A P Life Assurance Co Ltd	1994	44	American Investment Group	
C	<b>General Insurance Companies</b>		45	Standard Assurance Co. Ltd	
20	Africa Merchant Assurance Co Ltd	2000	46	KNAC (2001)	1984
21	APA Insurance Company	2003	D	Re-Insurers Companies	
22	Chartis Kenya Insurance Ltd.	1972	47	East Africa Re Insurance	1993
23	Concord Insurance Company	1928	48	Kenya Re-Insurance Corporation	1998
24	Directline Assurance Co Ltd	1983			

(Source: IRA Annual report 2010).

Appendix Two: Key Ratios for the year 2006.

	Name of	Capital	Solvency	Incurred	Expense	
No.	Insurer	Adequacy	Margin	Claims	Ratio	Exec Rem
1	APA	101	712	69	16	291,544.00
2	AIG (K)	291	256	48	36	318,979.00
3	AMACO	248	354	32	11	124,626.00
4	Apollo	13	131	45	16	66,927.00
5	Blue Shield	591	122	42	7	597,665.00
6	British American	252	214	42	24	518,153.00
7	Cannon	44	857	68	19	151,992.00
8	Capex	0	0	0	0	-
9	CfC Life	300	171	70	8	404,188.00
10	Chartis( K)	0	0	0	0	-
11	Concord	543	114	66	16	139,558.00
12	Cooperative	578	119	61	18	445,629.00
13	Corporate	341	229	60	20	112,512.00
14	Directline	440	661	36	11	147,309.00
15	East Africa Re	153	281	70	0	121,845.00
16	Fidelity Shield	229	303	73	19	144,773.00
17	First Assurance	200	371	67	26	125,178.00
18	Gateway	310	200	58	8	144,589.00
19	Geminia	124	642	88	13	22,061.00
20	General Accident	121	495	64	21	88,794.00
21	ICEA	74	124	88	44	448,435.00
22	Intra Africa	514	127	64	7	95,279.00
23	Invesco	543	48	32	9	309,969.00
24	Kenindia	185	281	67	18	483,010.00
25	Kenya Orient	120	174	20	0	56,976.00
26	Kenya Re	44	153	45	0	453,139.00
27	KNAC (2001)	93	197	53	13	194,019.00
28	Lion of Kenya	87	813	78	24	147,892.00
29	Madison	358	200	60	11	412,947.00
30	Mayfair	22	1273	67	75	45,159.00
31	Mercantile	69	706	46	18	106,262.00
32	Metropolitan Life	1	828	23	51	74,155.00
33	Occidental	340	241	64	14	109,124.00
34	Old Mutual	89	613	17	26	321,709.00
35	Pacis	69	727	30	17	28,711.00
36	Pan Africa Life	326	228	25	18	347,970.00
37	Phoenix	27	266	62	29	127,431.00
38	Pioneer	498	172	48	20	77,612.00
39	REAL	582	130	59	22	119,583.00

40	Standard	539	101	42	8	202,814.00
41	Tausi	371	173	78	27	103,194.00
42	The Heritage AII	130	438	53	18	374,116.00
43	The Jubilee	183	278	61	8	580,155.00
44	The Kenyan Alliance	137	435	69	13	111,023.00
45	The Monarch	62	664	37	24	57,612.00
46	Trident	354	205	86	16	52,501.00
47	Trinity Life	41	820	35	0	1,533.00
48	UAP Provincial	74	930	45	16	445,023.00

(Source, IRA annual report 2006)

# **Appendix Three: Key Ratios for the year 2007**

		Capital	Solvency	Incurred	Expense	
No.	Name of Insurer	Adequacy	Margin	Claims	Ratio	Exec Rem
1	APA	265	271	73	14	363,634.00
2	AIG (K)	312	226	47	33	320,146.00
3	AMACO	376	277	40	11	199,673.00
4	Apollo	18	184	48	10	40,032.00
5	Blue Shield	643	119	42	11	766,323.00
6	British American	56	109	42	29	560,310.00
7	Cannon	60	994	66	24	157,027.00
8	Capex	0	0	0	0	-
9	CfC Life	339	145	71	8	491,062.00
10	Chartis( K)	0	0	0	0	-
11	Concord	599	110	62	19	139,007.00
12	Cooperative	464	233	55	10	495,756.00
13	Corporate	327	231	50	17	118,720.00
14	Directline	505	103	32	14	122,557.00
15	East Africa Re	20	268	65	0	111,673.00
16	Fidelity Shield	184	383	63	19	146,683.00
17	First Assurance	217	357	68	22	151,294.00
18	Gateway	225	356	54	6	174,331.00
19	Geminia	128	468	67	22	102,154.00
20	General Accident	74	960	53	16	158,485.00
21	ICEA	322	177	52	7	505,613.00
22	Intra Africa	220	321	61	7	125,512.00
23	Invesco	0	0	0	0	-
24	Kenindia	262	200	91	18	667,815.00
25	Kenya Orient	25	309	365	15	80,707.00

26	Kenya Re	9	1370	28	0	673,338.00
27	KNAC (2001)	353	93	54	12	194,301.00
28	Lion of Kenya	96	732	81	20	140,331.00
29	Madison	378	269	58	10	348,771.00
30	Mayfair	61	156	56	43	45,958.00
31	Mercantile	95	543	59	13	112,631.00
32	Metropolitan Life	86	630	3	20	91,401.00
33	Occidental	295	290	58	9	142,264.00
34	Old Mutual	49	397	24	29	2,050,308.00
35	Pacis Insurance	124	790	44	16	44,414.00
36	Pan Africa Life	384	238	24	21	424,299.00
37	Phoenix	605	144	64	23	169,725.00
38	Pioneer	574	225	39	17	88,236.00
39	REAL	327	194	55	20	166,855.00
40	Standard	677	106	42	10	216,982.00
41	Tausi	315	182	71	22	114,880.00
42	The Heritage AII	253	279	58	16	439,091.00
43	The Jubilee	477	114	59	8	611,092.00
44	The Kenyan Alliance	134	456	64	13	121,252.00
45	The Monarch	181	413	40	14	90,677.00
46	Trident	250	263	79	11	60,629.00
47	Trinity Life	48	589	67	15	27,229.00
48	UAP Provincial	90	902	48	18	528,923.00

(Source, IRA annual report 2007)

# **Appendix Four: Key Ratios for the year 2008**

	Name of Insurer	Capital	Solvency	Incurred	Expense	Exec Rem
No.	Name of filsurer	Adequacy Margin		Claims	Ratio	Exec Kelli
1	APA	399	191	70	16	438,924.00
2	AIG (K)	348	213	64	34	318,791.00
3	AMACO	617	159	48	42	275,932.00
4	Apollo	261	165	34	6	40,447.00
5	Blue Shield	545	133	45	12	935,327.00
6	British American	230	80	20	20	702,882.00
7	Cannon	86	649	61	17	164,148.00
8	Capex	0	0	0	0	-
9	CfC Life	222	139	50	15	492,336.00
10	Chartis( K)	0	0	0	0	-

11	Concord	604	117	63	19	572,731.00
12	Cooperative	332	310	55	10	157,586.00
13	Corporate	276	243	55	16	117,467.00
14	Directline	262	150	55	11	207,037.00
15	East Africa Re	115	775	50	27	116,861.00
16	Fidelity Shield	164	234	76	24	154,040.00
17	First Assurance	220	336	63	22	174,783.00
18	Gateway	160	589	39	9	307,036.00
19	Geminia	143	411	66	22	106,203.00
20	General Accident	108	260	61	19	275,543.00
21	ICEA	474	76	72	8	597,580.00
22	Intra Africa	226	328	62	17	173,764.00
23	Invesco	0	0	0	0	-
24	Kenindia	155	338	58	17	532,341.00
25	Kenya Orient	104	276	44	13	152,639.00
26	Kenya Re	61	1043	50	27	661,127.00
27	KNAC (2001)	0	0	49	11	-
28	Lion of Kenya	88	808	81	19	169,720.00
29	Madison	499	155	58	9	338,628.00
30	Mayfair	92	105	72	10	45,259.00
31	Mercantile	94	619	51	12	119,782.00
32	Metropolitan Life	141	54	13	7	144,637.00
33	Occidental	260	285	58	9	157,510.00
34	Old Mutual	413	146	35	6	463,125.00
35	Pacis Insurance	234	365	54	12	78,506.00
36	Pan Africa Life	374	289	42	15	473,433.00
37	Phoenix	116	673	60	24	195,925.00
38	Pioneer	739	198	24	23	102,423.00
39	REAL	392	196	57	22	206,858.00
40	Standard	0	0	0	0	-
41	Tausi	486	141	63	26	115,157.00
42	The Heritage AII	143	460	58	14	487,176.00
43	The Jubilee	768	77	41	8	704,092.00
44	Kenyan Alliance	184	202	62	13	172,706.00
45	The Monarch	78	545	32	19	90,677.00
46	Trident	241	281	80	15	13,566.00
47	Trinity Life	3847	711	44	8	45,042.00
48	UAP Provincial	157	373	52	23	802,506.00

(Source, Author, 2008)

# **Appendix Five: Key Ratios for the year 2009**

	Name of Insurer	Capital	Solvency	Incurred	Expense	Exec Rem
No.	Name of Hisurei	Adequacy	Margin	Claims	Ratio	Exec Kelli
1	APA	317	250	64	14	603,023.00
2	AIG (K)	0	250	0	0	-
3	AMACO	198	459	56	13	347,638.00
4	Apollo	0	425	0	0	41,869.00
5	Blue Shield	450	134	65	12	364,657.00
6	British American	466	195	29	18	920,098.00
7	Cannon	87	596	70	18	193,748.00
8	Capex	0	0	0	0	-
9	CfC Life	445	122	49	10	749,467.00
10	Chartis( K)	0	364	52	30	435,859.00
11	Concord	766	255	82	16	169,638.00
12	Cooperative	297	101	53	8	740,378.00
13	Corporate	275	62	54	12	127,418.00
14	Directline	1601	852	55	12	324,606.00
15	East Africa Re	87	474	54	0	127,547.00
16	Fidelity Shield	155	307	68	17	167,220.00
17	First Assurance	223	621	69	20	229,613.00
18	Gateway	212	963	49	9	213,212.00
19	Geminia	69	174	58	22	120,613.00
20	General Accident	118	345	66	19	216,345.00
21	ICEA	232	119	90	10	315,331.00
22	Intra Africa	589	0	52	8	165,672.00
23	Invesco	0	293	0	0	-
24	Kenindia	166	116	53	16	547,572.00
25	Kenya Orient	11	561	289	0	207,740.00
26	Kenya Re	58	728	47	30	662,221.00
27	KNAC (2001)	355	1213	47	9	72,633.00
28	Lion of Kenya	84	115	83	19	132,562.00
29	Madison	692	661	54	8	351,586.00
30	Mayfair	108	758	74	30	78,172.00
31	Mercantile	77	-188	44	12	135,156.00
32	Metropolitan	300	334	28	7	116,563.00
33	Occidental	216	250	61	8	165,488.00
34	Old Mutual	148	231	58	5	892,369.00
35	Pacis	331	134	98	15	94,141.00
36	Pan Africa Life	744	249	31	20	440,912.00

37	Phoenix	214	491	67	15	181,548.00
38	Pioneer	300	76	45	17	86,152.00
39	REAL	769	0	56	20	272,295.00
40	Standard	0	510	0	0	-
41	Tausi	129	78	41	29	94,893.00
42	The Heritage AII	865	56	56	13	510,952.00
43	The Jubilee	983	938	54	9	780,022.00
44	The Kenyan Alliance	43	610	47	14	186,155.00
45	The Monarch	83	953	36	10	38,210.00
46	Trident	78	815	75	15	64,211.00
47	Trinity Life	21	289	25	2129	27,939.00
48	UAP Provincial	261	250	61	14	927,230.00

(Source, Annual report 2009)

# Appendix Six: Key Ratios for the year 2010

	Name of	Capital	Solvency	Incurred	Expense	Exec
No.	Insurer	Adequacy	Margin	Claims	Ratio	Rem
1	APA	277	275	100	15	814,771
2	AIG (K)	0	0	0	0	0
3	AMACO	329	260	100	13	484,190
4	Apollo	67	726	10	4	43,325
5	Blue Shield	0	0	0	0	0
	British					
6	American	327	222	51	17	959,697
7	Cannon	61	121	94	18	226,533
8	Capex	11	158	22		61,828
9	CfC Life	174	286	58	8	849,347
10	Chartis (K)	292	270	100	29	467,110
11	Concord	623	702	100	17	141,464
12	Cooperative	197	622	77	8	1,027,965
13	Corporate	88	882	82	15	133,188
14	Directline	353	632	100	11	387,907
15	East Africa Re	107	870	58	37	131,308
16	Fidelity Shield	2	444	100	16	181,038
	First					
17	Assurance	238	326	100	18	241,605
18	Gateway	247	260	100	9	199,310
19	Geminia	75	889	98	22	145,875

	General					
20	Accident	104	723	100	18	255,631
21	ICEA	176	219	98	34	708,489
22	Intra Africa	357	200	100	9	141,940
23	Invesco	216	203	100	11	213,819
24	Kenindia	161	303	85	17	616,141
25	Kenya Orient	667	125	0	12	228,326
26	Kenya Re	60	139	47	27	1,524,761
27	KNAC (2001)	1	125	100		66,875
28	Lion of Kenya	55	195	100	21	210,869
29	Madison	746	109	75	10	431,139
30	Mayfair	154	484	100	28	88,506
31	Mercantile	63	976	82	15	136,745
32	Metropolitan	74	102	36	9	97,364
33	Occidental	268	266	100	10	169,902
34	Old Mutual	98	328	64	3	922,078
35	Pacis	140	605	100	12	136,949
36	Pan Africa	633	140	24	22	537,403
37	Phoenix	55	120	100	16	192,873
38	Pioneer	260	621	44	24	136,753
39	REAL	537	142	100	17	271,059
40	Standard	0	0	0	0	0
41	Tausi	93	768	100	29	104,261
	The Heritage					
42	AII	440	154	92	13	644,381
43	The Jubilee	239	221	70	12	859,807
	The Kenyan					
44	Alliance	95	792	90	13	195,663
45	The Monarch	64	915	92	11	110,798
46	Trident	88	817	100	14	98,315
47	Trinity Life	0	0	0	0	0
	UAP					
48	Provincial	609	115	84	16	1161171

(Source, IRA annual report 2010)

# Appendix seven: Mean financial performance ratios

No.         Insurance Co.         Adequacy         Margin         Ratios         Exec Rem           1         A P A         271.8         339.8         75.2         15.0         502,379.20           2         AIG (K)         190.2         189.0         31.8         20.6         191,583.20           3         AMACO         353.6         301.8         55.2         18.0         286,411.80           4         Apollo         71.8         326.2         27.4         7.2         46,520.00           5         Blue Shield         445.8         101.6         38.8         8.4         532,794.40           6         British American         266.2         164.0         36.8         21.6         732,228.00           7         Cannon         67.6         643.4         71.8         19.2         178,689.60           9         CfC Life         296.0         172.6         59.6         9.8         597,280.00           10         Chartis (K)         58.4         126.8         30.4         11.8         180,593.80           11         Concord         627.0         259.6         74.6         17.4         232,479.60           12         Cooperative <th></th> <th></th> <th>Capital</th> <th>Solvency</th> <th>Claims</th> <th>Expense</th> <th></th>			Capital	Solvency	Claims	Expense	
2         AIG (K)         190.2         189.0         31.8         20.6         191,583.20           3         AMACO         353.6         301.8         55.2         18.0         286,411.80           4         Apollo         71.8         326.2         27.4         7.2         46,520.00           5         Blue Shield         445.8         101.6         38.8         8.4         532,794.40           6         British American         266.2         164.0         36.8         21.6         732,228.00           7         Cannon         67.6         643.4         71.8         19.2         178,689.60           8         Capex         2.2         31.6         4.4         -         12,365.60           9         CfC Life         296.0         172.6         59.6         9.8         597,280.00           10         Chartis (K)         58.4         126.8         30.4         11.8         180,593.80           11         Concord         627.0         259.6         74.6         17.4         232,479.60           12         Cooperative         373.6         277.0         60.2         10.8         573,462.00           13         Corporat	No.	Insurance Co.	Adequacy	Margin	Ratios	Ratio	Exec Rem
3         AMACO         353.6         301.8         55.2         18.0         286,411.80           4         Apollo         71.8         326.2         27.4         7.2         46,520.00           5         Blue Shield         445.8         101.6         38.8         8.4         532,794.40           6         British American         266.2         164.0         36.8         21.6         732,228.00           7         Cannon         67.6         643.4         71.8         19.2         178,689.60           8         Capex         2.2         31.6         4.4         -         12,365.60           9         CfC Life         296.0         172.6         59.6         9.8         597,280.00           10         Chartis (K)         58.4         126.8         30.4         11.8         180,593.80           11         Concord         627.0         259.6         74.6         17.4         232,479.60           12         Cooperative         373.6         277.0         60.2         10.8         573,462.80           13         Corporate         261.4         329.4         60.2         16.0         121,861.00           14         Direc	1	APA	271.8	339.8	75.2	15.0	502,379.20
4         Apollo         71.8         326.2         27.4         7.2         46,520.00           5         Blue Shield         445.8         101.6         38.8         8.4         532,794.40           6         British American         266.2         164.0         36.8         21.6         732,228.00           7         Cannon         67.6         643.4         71.8         19.2         178,689.60           8         Capex         2.2         31.6         4.4         -         12,656.60           9         CfC Life         296.0         172.6         59.6         9.8         597,280.00           10         Chartis (K)         58.4         126.8         30.4         11.8         180,593.80           11         Concord         627.0         259.6         74.6         17.4         232,479.60           12         Cooperative         373.6         277.0         60.2         10.8         573,462.80           13         Corporate         261.4         329.4         60.2         16.0         121,861.00           14         Directline         632.2         479.6         55.6         11.8         237,883.20           15 <td< td=""><td>2</td><td>AIG (K)</td><td>190.2</td><td>189.0</td><td>31.8</td><td>20.6</td><td>191,583.20</td></td<>	2	AIG (K)	190.2	189.0	31.8	20.6	191,583.20
5         Blue Shield         445.8         101.6         38.8         8.4         532,794.40           6         British American         266.2         164.0         36.8         21.6         732,228.00           7         Cannon         67.6         643.4         71.8         19.2         178,689.60           8         Capex         2.2         31.6         4.4         -         12,365.60           9         CfC Life         296.0         172.6         59.6         9.8         597,280.00           10         Chartis (K)         58.4         126.8         30.4         11.8         180,593.80           11         Concord         627.0         259.6         74.6         17.4         232,479.60           12         Cooperative         373.6         277.0         60.2         10.8         573,462.80           13         Corporate         261.4         329.4         60.2         16.0         121,861.00           14         Directline         632.2         479.6         55.6         11.8         237,863.20           15         East Africa Re         96.4         533.6         59.4         12.8         121,846.80           16	3	AMACO	353.6	301.8	55.2	18.0	286,411.80
6         British American         266.2         164.0         36.8         21.6         732,228.00           7         Cannon         67.6         643.4         71.8         19.2         178,689.60           8         Capex         2.2         31.6         4.4         -         12,365.60           9         CfC Life         296.0         172.6         59.6         9.8         597,280.00           10         Chartis (K)         58.4         126.8         30.4         11.8         180,593.80           11         Concord         627.0         259.6         74.6         17.4         232,479.60           12         Cooperative         373.6         277.0         60.2         10.8         573,462.80           12         Cooperative         373.6         277.0         60.2         110.8         573,462.80           12         Cooperative         373.6         277.0         60.2         110.8         573,462.80           14         Directline         632.2         479.6         55.6         11.8         237,883.20           15         East Africa Re         96.4         533.6         59.4         12.8         121,846.80           16	4	Apollo	71.8	326.2	27.4	7.2	46,520.00
7         Cannon         67.6         643.4         71.8         19.2         178,689.60           8         Capex         2.2         31.6         4.4         -         12,365.60           9         CfC Life         296.0         172.6         59.6         9.8         597,280.00           10         Chartis (K)         58.4         126.8         30.4         11.8         180,593.80           11         Concord         627.0         259.6         74.6         17.4         232,479.60           12         Cooperative         373.6         277.0         60.2         10.8         573,462.80           13         Corporate         261.4         329.4         60.2         16.0         121,861.00           14         Directline         632.2         479.6         55.6         11.8         237,883.20           15         East Africa Re         96.4         533.6         59.4         12.8         121,846.80           16         Fidelity Shield         146.8         334.2         76.0         19.0         158,750.80           17         First Assurance         219.6         402.2         73.4         21.6         184,494.60           18	5	Blue Shield	445.8	101.6	38.8	8.4	532,794.40
8         Capex         2.2         31.6         4.4         -         12,365.60           9         CfC Life         296.0         172.6         59.6         9.8         597,280.00           10         Chartis (K)         58.4         126.8         30.4         11.8         180,593.80           11         Concord         627.0         259.6         74.6         17.4         232,479.60           12         Cooperative         373.6         277.0         60.2         10.8         573,462.80           13         Corporate         261.4         329.4         60.2         16.0         121,861.00           14         Directline         632.2         479.6         55.6         11.8         237,883.20           15         East Africa Re         96.4         533.6         59.4         12.8         121,846.80           16         Fidelity Shield         146.8         334.2         76.0         19.0         158,750.80           17         First Assurance         219.6         402.2         73.4         21.6         184,494.60           18         Gateway         230.8         473.6         60.0         8.2         207,695.60	6	British American	266.2	164.0	36.8	21.6	732,228.00
9         CfC Life         296.0         172.6         59.6         9.8         597,280.00           10         Chartis (K)         58.4         126.8         30.4         11.8         180,593.80           11         Concord         627.0         259.6         74.6         17.4         232,479.60           12         Cooperative         373.6         277.0         60.2         10.8         573,462.80           13         Corporate         261.4         329.4         60.2         16.0         121,861.00           14         Directline         632.2         479.6         55.6         11.8         237,883.20           15         East Africa Re         96.4         533.6         59.4         12.8         121,846.80           16         Fidelity Shield         146.8         334.2         76.0         19.0         158,750.80           17         First Assurance         219.6         402.2         73.4         21.6         184,494.60           18         Gateway         230.8         473.6         60.0         8.2         207,695.60           19         Geminia         107.8         516.8         75.4         20.2         99,381.20	7	Cannon	67.6	643.4	71.8	19.2	178,689.60
10         Chartis (K)         58.4         126.8         30.4         11.8         180,593.80           11         Concord         627.0         259.6         74.6         17.4         232,479.60           12         Cooperative         373.6         277.0         60.2         10.8         573,462.80           13         Corporate         261.4         329.4         60.2         16.0         121,861.00           14         Directline         632.2         479.6         55.6         11.8         237,883.20           15         East Africa Re         96.4         533.6         59.4         12.8         121,846.80           16         Fidelity Shield         146.8         334.2         76.0         19.0         158,750.80           17         First Assurance         219.6         402.2         73.4         21.6         184,494.60           18         Gateway         230.8         473.6         60.0         8.2         207,695.60           19         Geminia         107.8         516.8         75.4         20.2         99,381.20           20         General Accident         105.0         556.6         68.8         18.6         198,959.60	8	Capex	2.2	31.6	4.4	-	12,365.60
11         Concord         627.0         259.6         74.6         17.4         232,479.60           12         Cooperative         373.6         277.0         60.2         10.8         573,462.80           13         Corporate         261.4         329.4         60.2         16.0         121,861.00           14         Directline         632.2         479.6         55.6         11.8         237,883.20           15         East Africa Re         96.4         533.6         59.4         12.8         121,846.80           16         Fidelity Shield         146.8         334.2         76.0         19.0         158,750.80           17         First Assurance         219.6         402.2         73.4         21.6         184,494.60           18         Gateway         230.8         473.6         60.0         8.2         207,695.60           19         Geminia         107.8         516.8         75.4         20.2         99,381.20           20         General Accident         105.0         556.6         68.8         18.6         198,595.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60 <tr< td=""><td>9</td><td>CfC Life</td><td>296.0</td><td>172.6</td><td>59.6</td><td>9.8</td><td>597,280.00</td></tr<>	9	CfC Life	296.0	172.6	59.6	9.8	597,280.00
12         Cooperative         373.6         277.0         60.2         10.8         573,462.80           13         Corporate         261.4         329.4         60.2         16.0         121,861.00           14         Directline         632.2         479.6         55.6         11.8         237,883.20           15         East Africa Re         96.4         533.6         59.4         12.8         121,846.80           16         Fidelity Shield         146.8         334.2         76.0         19.0         158,750.80           17         First Assurance         219.6         402.2         73.4         21.6         184,494.60           18         Gateway         230.8         473.6         60.0         8.2         207,695.60           19         Geminia         107.8         516.8         75.4         20.2         99,381.20           20         General Accident         105.0         556.6         68.8         18.6         198,959.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60	10	Chartis (K)	58.4	126.8	30.4	11.8	180,593.80
13         Corporate         261.4         329.4         60.2         16.0         121,861.00           14         Directline         632.2         479.6         55.6         11.8         237,883.20           15         East Africa Re         96.4         533.6         59.4         12.8         121,846.80           16         Fidelity Shield         146.8         334.2         76.0         19.0         158,750.80           17         First Assurance         219.6         402.2         73.4         21.6         184,494.60           18         Gateway         230.8         473.6         60.0         8.2         207,695.60           19         Geminia         107.8         516.8         75.4         20.2         99,381.20           20         General Accident         105.0         556.6         68.8         18.6         198,959.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60           22         Intra Africa         381.2         195.2         67.8         9.6         140,433.40	11	Concord	627.0	259.6	74.6	17.4	232,479.60
14         Directline         632.2         479.6         55.6         11.8         237,883.20           15         East Africa Re         96.4         533.6         59.4         12.8         121,846.80           16         Fidelity Shield         146.8         334.2         76.0         19.0         158,750.80           17         First Assurance         219.6         402.2         73.4         21.6         184,494.60           18         Gateway         230.8         473.6         60.0         8.2         207,695.60           19         Geminia         107.8         516.8         75.4         20.2         99,381.20           20         General Accident         105.0         556.6         68.8         18.6         198,959.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60           21         Intra Africa         381.2         195.2         67.8         9.6         140,433.40           23         Invesco         151.8         108.8         26.4         4.0         104,757.60	12	Cooperative	373.6	277.0	60.2	10.8	573,462.80
15         East Africa Re         96.4         533.6         59.4         12.8         121,846.80           16         Fidelity Shield         146.8         334.2         76.0         19.0         158,750.80           17         First Assurance         219.6         402.2         73.4         21.6         184,494.60           18         Gateway         230.8         473.6         60.0         8.2         207,695.60           19         Geminia         107.8         516.8         75.4         20.2         99,381.20           20         General Accident         105.0         556.6         68.8         18.6         198,959.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60           22         Intra Africa         381.2         195.2         67.8         9.6         140,433.40           23         Invesco         151.8         108.8         26.4         4.0         104,757.60           24         Kenindia         185.8         247.6         70.8         17.2         569,375.80           25         Kenya Orient         185.4         289.0         143.6         8.0         145,277.60 <tr< td=""><td>13</td><td>Corporate</td><td>261.4</td><td>329.4</td><td>60.2</td><td>16.0</td><td>121,861.00</td></tr<>	13	Corporate	261.4	329.4	60.2	16.0	121,861.00
16         Fidelity Shield         146.8         334.2         76.0         19.0         158,750.80           17         First Assurance         219.6         402.2         73.4         21.6         184,494.60           18         Gateway         230.8         473.6         60.0         8.2         207,695.60           19         Geminia         107.8         516.8         75.4         20.2         99,381.20           20         General Accident         105.0         556.6         68.8         18.6         198,959.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60           22         Intra Africa         381.2         195.2         67.8         9.6         140,433.40           23         Invesco         151.8         108.8         26.4         4.0         104,757.60           24         Kenindia         185.8         247.6         70.8         17.2         569,375.80           25         Kenya Orient         185.4         289.0         143.6         8.0         145,277.60           26         Kenya Re         46.4         686.6         43.4         16.8         794,917.20	14	Directline	632.2	479.6	55.6	11.8	237,883.20
17         First Assurance         219.6         402.2         73.4         21.6         184,494.60           18         Gateway         230.8         473.6         60.0         8.2         207,695.60           19         Geminia         107.8         516.8         75.4         20.2         99,381.20           20         General Accident         105.0         556.6         68.8         18.6         198,959.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60           22         Intra Africa         381.2         195.2         67.8         9.6         140,433.40           23         Invesco         151.8         108.8         26.4         4.0         104,757.60           24         Kenindia         185.8         247.6         70.8         17.2         569,375.80           25         Kenya Orient         185.4         289.0         143.6         8.0         145,277.60           26         Kenya Re         46.4         686.6         43.4         16.8         794,917.20           27         KNAC (2001)         160.4         325.6         60.6         9.0         105,565.60           <	15	East Africa Re	96.4	533.6	59.4	12.8	121,846.80
18         Gateway         230.8         473.6         60.0         8.2         207,695.60           19         Geminia         107.8         516.8         75.4         20.2         99,381.20           20         General Accident         105.0         556.6         68.8         18.6         198,959.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60           22         Intra Africa         381.2         195.2         67.8         9.6         140,433.40           23         Invesco         151.8         108.8         26.4         4.0         104,757.60           24         Kenindia         185.8         247.6         70.8         17.2         569,375.80           25         Kenya Orient         185.4         289.0         143.6         8.0         145,277.60           26         Kenya Re         46.4         686.6         43.4         16.8         794,917.20           27         KNAC (2001)         160.4         325.6         60.6         9.0         105,565.60           28         Lion of Kenya         82.0         532.6         84.6         20.6         160,274.80	16	Fidelity Shield	146.8	334.2	76.0	19.0	158,750.80
19         Geminia         107.8         516.8         75.4         20.2         99,381.20           20         General Accident         105.0         556.6         68.8         18.6         198,959.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60           22         Intra Africa         381.2         195.2         67.8         9.6         140,433.40           23         Invesco         151.8         108.8         26.4         4.0         104,757.60           24         Kenindia         185.8         247.6         70.8         17.2         569,375.80           25         Kenya Orient         185.4         289.0         143.6         8.0         145,277.60           26         Kenya Re         46.4         686.6         43.4         16.8         794,917.20           27         KNAC (2001)         160.4         325.6         60.6         9.0         105,565.60           28         Lion of Kenya         82.0         532.6         84.6         20.6         160,274.80           29         Madison         534.6         278.8         61.0         9.6         376,614.20	17	First Assurance	219.6	402.2	73.4	21.6	184,494.60
20         General Accident         105.0         556.6         68.8         18.6         198,959.60           21         ICEA         255.6         143.0         80.0         20.6         515,089.60           22         Intra Africa         381.2         195.2         67.8         9.6         140,433.40           23         Invesco         151.8         108.8         26.4         4.0         104,757.60           24         Kenindia         185.8         247.6         70.8         17.2         569,375.80           25         Kenya Orient         185.4         289.0         143.6         8.0         145,277.60           26         Kenya Re         46.4         686.6         43.4         16.8         794,917.20           27         KNAC (2001)         160.4         325.6         60.6         9.0         105,565.60           28         Lion of Kenya         82.0         532.6         84.6         20.6         160,274.80           29         Madison         534.6         278.8         61.0         9.6         376,614.20           30         Mayfair         87.4         555.2         73.8         37.2         60,610.80           3	18	Gateway	230.8	473.6	60.0	8.2	207,695.60
21         ICEA         255.6         143.0         80.0         20.6         515,089.60           22         Intra Africa         381.2         195.2         67.8         9.6         140,433.40           23         Invesco         151.8         108.8         26.4         4.0         104,757.60           24         Kenindia         185.8         247.6         70.8         17.2         569,375.80           25         Kenya Orient         185.4         289.0         143.6         8.0         145,277.60           26         Kenya Re         46.4         686.6         43.4         16.8         794,917.20           27         KNAC (2001)         160.4         325.6         60.6         9.0         105,565.60           28         Lion of Kenya         82.0         532.6         84.6         20.6         160,274.80           29         Madison         534.6         278.8         61.0         9.6         376,614.20           30         Mayfair         87.4         555.2         73.8         37.2         60,610.80           31         Mercantile         79.6         531.2         56.4         14.0         122,115.20           32	19	Geminia	107.8	516.8	75.4	20.2	99,381.20
22         Intra Africa         381.2         195.2         67.8         9.6         140,433.40           23         Invesco         151.8         108.8         26.4         4.0         104,757.60           24         Kenindia         185.8         247.6         70.8         17.2         569,375.80           25         Kenya Orient         185.4         289.0         143.6         8.0         145,277.60           26         Kenya Re         46.4         686.6         43.4         16.8         794,917.20           27         KNAC (2001)         160.4         325.6         60.6         9.0         105,565.60           28         Lion of Kenya         82.0         532.6         84.6         20.6         160,274.80           29         Madison         534.6         278.8         61.0         9.6         376,614.20           30         Mayfair         87.4         555.2         73.8         37.2         60,610.80           31         Mercantile         79.6         531.2         56.4         14.0         122,115.20           32         Metropolitan Life         120.4         389.6         20.6         18.8         104,824.00	20	General Accident	105.0	556.6	68.8	18.6	198,959.60
23         Invesco         151.8         108.8         26.4         4.0         104,757.60           24         Kenindia         185.8         247.6         70.8         17.2         569,375.80           25         Kenya Orient         185.4         289.0         143.6         8.0         145,277.60           26         Kenya Re         46.4         686.6         43.4         16.8         794,917.20           27         KNAC (2001)         160.4         325.6         60.6         9.0         105,565.60           28         Lion of Kenya         82.0         532.6         84.6         20.6         160,274.80           29         Madison         534.6         278.8         61.0         9.6         376,614.20           30         Mayfair         87.4         555.2         73.8         37.2         60,610.80           31         Mercantile         79.6         531.2         56.4         14.0         122,115.20           32         Metropolitan Life         120.4         389.6         20.6         18.8         104,824.00           33         Occidental         275.8         266.4         68.2         10.0         148,857.60	21	ICEA	255.6	143.0	80.0	20.6	515,089.60
24         Kenindia         185.8         247.6         70.8         17.2         569,375.80           25         Kenya Orient         185.4         289.0         143.6         8.0         145,277.60           26         Kenya Re         46.4         686.6         43.4         16.8         794,917.20           27         KNAC (2001)         160.4         325.6         60.6         9.0         105,565.60           28         Lion of Kenya         82.0         532.6         84.6         20.6         160,274.80           29         Madison         534.6         278.8         61.0         9.6         376,614.20           30         Mayfair         87.4         555.2         73.8         37.2         60,610.80           31         Mercantile         79.6         531.2         56.4         14.0         122,115.20           32         Metropolitan Life         120.4         389.6         20.6         18.8         104,824.00           33         Occidental         275.8         266.4         68.2         10.0         148,857.60           34         Old Mutual         159.4         343.0         39.6         13.8         929,917.80	22	Intra Africa	381.2	195.2	67.8	9.6	140,433.40
25         Kenya Orient         185.4         289.0         143.6         8.0         145,277.60           26         Kenya Re         46.4         686.6         43.4         16.8         794,917.20           27         KNAC (2001)         160.4         325.6         60.6         9.0         105,565.60           28         Lion of Kenya         82.0         532.6         84.6         20.6         160,274.80           29         Madison         534.6         278.8         61.0         9.6         376,614.20           30         Mayfair         87.4         555.2         73.8         37.2         60,610.80           31         Mercantile         79.6         531.2         56.4         14.0         122,115.20           32         Metropolitan Life         120.4         389.6         20.6         18.8         104,824.00           33         Occidental         275.8         266.4         68.2         10.0         148,857.60           34         Old Mutual         159.4         343.0         39.6         13.8         929,917.80           35         Pacis         179.6         524.2         65.2         14.4         76,544.20	23	Invesco	151.8	108.8	26.4	4.0	104,757.60
26         Kenya Re         46.4         686.6         43.4         16.8         794,917.20           27         KNAC (2001)         160.4         325.6         60.6         9.0         105,565.60           28         Lion of Kenya         82.0         532.6         84.6         20.6         160,274.80           29         Madison         534.6         278.8         61.0         9.6         376,614.20           30         Mayfair         87.4         555.2         73.8         37.2         60,610.80           31         Mercantile         79.6         531.2         56.4         14.0         122,115.20           32         Metropolitan Life         120.4         389.6         20.6         18.8         104,824.00           33         Occidental         275.8         266.4         68.2         10.0         148,857.60           34         Old Mutual         159.4         343.0         39.6         13.8         929,917.80           35         Pacis         179.6         524.2         65.2         14.4         76,544.20	24	Kenindia	185.8	247.6	70.8	17.2	569,375.80
27         KNAC (2001)         160.4         325.6         60.6         9.0         105,565.60           28         Lion of Kenya         82.0         532.6         84.6         20.6         160,274.80           29         Madison         534.6         278.8         61.0         9.6         376,614.20           30         Mayfair         87.4         555.2         73.8         37.2         60,610.80           31         Mercantile         79.6         531.2         56.4         14.0         122,115.20           32         Metropolitan Life         120.4         389.6         20.6         18.8         104,824.00           33         Occidental         275.8         266.4         68.2         10.0         148,857.60           34         Old Mutual         159.4         343.0         39.6         13.8         929,917.80           35         Pacis         179.6         524.2         65.2         14.4         76,544.20	25	Kenya Orient	185.4	289.0	143.6	8.0	145,277.60
28         Lion of Kenya         82.0         532.6         84.6         20.6         160,274.80           29         Madison         534.6         278.8         61.0         9.6         376,614.20           30         Mayfair         87.4         555.2         73.8         37.2         60,610.80           31         Mercantile         79.6         531.2         56.4         14.0         122,115.20           32         Metropolitan Life         120.4         389.6         20.6         18.8         104,824.00           33         Occidental         275.8         266.4         68.2         10.0         148,857.60           34         Old Mutual         159.4         343.0         39.6         13.8         929,917.80           35         Pacis         179.6         524.2         65.2         14.4         76,544.20	26	Kenya Re	46.4	686.6	43.4	16.8	794,917.20
29       Madison       534.6       278.8       61.0       9.6       376,614.20         30       Mayfair       87.4       555.2       73.8       37.2       60,610.80         31       Mercantile       79.6       531.2       56.4       14.0       122,115.20         32       Metropolitan Life       120.4       389.6       20.6       18.8       104,824.00         33       Occidental       275.8       266.4       68.2       10.0       148,857.60         34       Old Mutual       159.4       343.0       39.6       13.8       929,917.80         35       Pacis       179.6       524.2       65.2       14.4       76,544.20	27	KNAC (2001)	160.4	325.6	60.6	9.0	105,565.60
30       Mayfair       87.4       555.2       73.8       37.2       60,610.80         31       Mercantile       79.6       531.2       56.4       14.0       122,115.20         32       Metropolitan Life       120.4       389.6       20.6       18.8       104,824.00         33       Occidental       275.8       266.4       68.2       10.0       148,857.60         34       Old Mutual       159.4       343.0       39.6       13.8       929,917.80         35       Pacis       179.6       524.2       65.2       14.4       76,544.20	28	Lion of Kenya	82.0	532.6	84.6	20.6	160,274.80
31       Mercantile       79.6       531.2       56.4       14.0       122,115.20         32       Metropolitan Life       120.4       389.6       20.6       18.8       104,824.00         33       Occidental       275.8       266.4       68.2       10.0       148,857.60         34       Old Mutual       159.4       343.0       39.6       13.8       929,917.80         35       Pacis       179.6       524.2       65.2       14.4       76,544.20	29	Madison	534.6	278.8	61.0	9.6	376,614.20
32       Metropolitan Life       120.4       389.6       20.6       18.8       104,824.00         33       Occidental       275.8       266.4       68.2       10.0       148,857.60         34       Old Mutual       159.4       343.0       39.6       13.8       929,917.80         35       Pacis       179.6       524.2       65.2       14.4       76,544.20	30	Mayfair	87.4	555.2	73.8	37.2	60,610.80
33       Occidental       275.8       266.4       68.2       10.0       148,857.60         34       Old Mutual       159.4       343.0       39.6       13.8       929,917.80         35       Pacis       179.6       524.2       65.2       14.4       76,544.20	31	Mercantile	79.6	531.2	56.4	14.0	122,115.20
34     Old Mutual     159.4     343.0     39.6     13.8     929,917.80       35     Pacis     179.6     524.2     65.2     14.4     76,544.20	32	Metropolitan Life	120.4	389.6	20.6	18.8	104,824.00
35 Pacis 179.6 524.2 65.2 14.4 76,544.20	33	Occidental	275.8	266.4	68.2	10.0	148,857.60
	34	Old Mutual	159.4	343.0	39.6	13.8	929,917.80
36         Pan Africa Life         492.2         228.8         29.2         19.2         444,803.40	35	Pacis	179.6	524.2	65.2	14.4	76,544.20
	36	Pan Africa Life	492.2	228.8	29.2	19.2	444,803.40

37	Phoenix	203.4	338.8	70.6	21.4	173,500.40
38	Pioneer	474.2	258.4	40.0	20.2	98,235.20
39	REAL	521.4	132.4	65.4	20.2	207,330.00
40	Standard	243.2	143.4	16.8	3.6	83,959.20
41	Tausi	278.8	268.4	70.6	26.6	106,477.00
42	The Heritage AII	366.2	277.4	63.4	14.8	491,143.20
43	The Jubilee	530.0	325.6	57.0	9.0	707,033.60
44	The Kenyan Alliance	118.6	499.0	66.4	13.2	157,359.80
45	The Monarch	93.6	698.0	47.4	15.6	77,594.80
46	Trident	202.2	476.2	84.0	14.2	57,844.40
47	Trinity Life	791.4	481.8	34.2	430.4	20,348.60
48	UAP Provincial	238.2	514.0	58.0	17.4	772,970.60

(Source, IRA annual report 2010)

# Appendix eight: CAMEL-S Model as adopted in the study

Components	Variables	Financial Ratios
Capital adequacy	$X_1$	Net Earned Premiums to Policyholders Surplus
		Policyholder surplus = net worth = Available Margin
Assets Quality	$X_2$	Available Margin to Required Margin
		Available Margin = Admitted Assets-Admitted Liabilities
		Required Margin is a statutory set level
Management	X <sub>3</sub>	Percentage change of total premium receipts
		Percentage change of first year premium receipts
		Percentage change of operating revenues
		Percentage change of renewal ordinary premium
Earning	X <sub>3</sub>	Net Incurred Claims to Net Earned Premiums
		Claims = Claims by death + Claims by Maturity + Claims by
		Surrenders
Liquidity	$X_4$	Expenses to Net Earned Premiums
		Expenses are commissions to agents and brokers
Sensitivity of market	X <sub>5</sub>	Volatility due to differences between market values of assets
		and liabilities.

Source Hsiao (2009)

## Appendix eight: Research data collection sheet.

You have been identified for participation in the study on characterization of CEO compensation in insurance companies in Kenya. The information you give is considered confidential and will be used for research purposes only. Thank you for your cooperation.

1.	Positio	on of respondent in insurance company (tick applicable)
	1.	□ CEO
	2.	□ Human Resources Management
2.	Select	the components of CEO remuneration in your insurance company ( tick where
	applica	able)
	1.	□ Basic salary
	2.	□ Bonus plans
	3.	□ Stock options
	4.	□ Restricted stocks
	5.	□ Long-term incentive plans
	6.	□ Golden parachute
	7.	□ Fringe benefits
		Please specify the type of fringe benefit

3. Please tick the appropriate remuneration range in the table below

	Component range in Kenya Shillings (KSh)						
CEO compensation component	50,000 to 150,000	150,000 to 300,000	300,000 to 450,000	450,000 and above			
1.Basic salary							
2.Bonus plans							
3.Stock options							
4.Restricted stocks							
5.Golden parachutes							
6.Fringe benefit							
Other, specify							

## Appendix ten: Research project work plan

Period	Sept	Jan-	Mar -	Aug-	Nov -	Mar-	Aug –	Nov-
	2012 -	Feb	July	Oct	Feb	July	Oct	Dec
Task	Feb 2013	2013	2013	2013	2014	2014	2014	2014
Proposal writing								
Proposal defense								
Correction and Submission								
Data collection and analysis								
Project writing								
Project Defense and correction								
Submission of thesis to graduate school								
Graduation								