THE EFFECT OF BEHAVIOURAL FACTORS ON INVESTMENT DECISIONS AT THE NAIROBI SECURITIES EXCHANGE

LOWER

BY:

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OCTOBER, 2012

DECLARATION

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

Signed.....

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D63/68060/2011

This Research project has been submitted for presentation with my approval as University Supervisor.

Date 8,11:2012 Signed....

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DEDICATION

I dedicate this research project to my wife Alice, without whose understanding and caring attitude it would not have been possible. Also to my mother Beatrice who never tired in her quest throughout my pedagogical endeavors until was able to stand on my own.

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To all, I remain forever grateful

ABSTRACT

The main objective of this study was to establish the behavioural factors influencing individual investors' decisions at the Nairobi Stock Exchange. The study was guided by the following specific objectives, that is, to find out the effect of risk aversion on investment decisions in Kenyan stock market, to investigate whether prospecting influences decision making in stock market investments, to establish the effect of anchoring on investment decision in Kenyan stock market.

The target population of this study was 17 investment banks with a sample size of 34 respondents and relied on primary data sources. The study found that the investors in their organizations invest due to herding effect, this has resulted the investment banks to experience emotional biases and congruity. Further the study established that prospecting influences the investment decision making in stock market, however, most of the organizations engage in advising inventors' on the ways to invest. The study finally found that anchoring influences the investment decision in Kenyan stock market. Availability of the information about stock market investment facilitates inventors' to reach investment decision. However, investors tend to buy shares when stock price has fallen.

The study concluded herding effect, risk aversion, prospecting and anchoring influences the investment decision making in stock market. The study recommended that the investment banks should give their investors the relevant information on prevailing market and economic situations and ensure investment in the stock market is well chosen. The investors should be presented with information in unbiased context and should be offered with the right information at the right time.

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ABBREVIATIONS

- AIMS Alternative Investment Markets Segment
- ANOVA Analysis of Variance
- CAPM Capital Asset Pricing Model
- FISMS Fixed Income Securities Market Segment
- MIMS Main Investments Market Segment
- MPT Modern Portfolio Theory
- NSE Nairobi Securities Exchange
- SPSS Statistical Package for Social Sciences

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CHAPTER ONE: INTRODUCTION

1.1 Background of the Study

Behavioural finance, as defined by Sewell (2008), is a theory that associates the psychological variables and their emotional responses with the personal and general economic conditions. It combines both psychology and economics to explain how and why investors act the way they do, and to analyze how that behaviour has an effect on the market (Vias, 2006). Behavioural finance shows what happens when emotional reactions are engaged in investment decisions that shape the stock market and impact the prices of stocks, as well as the allocation of financial resources in both spending and saving habits. This indicates that in order to have a complete overview of the market and its performance, one cannot eliminate the investors' behavioural pattern, as it is as important as the standard financial perspective.

Behavioural Finance is a relatively new field in the economic world, and has become a subject of great interest to economists and financial analysts. The investment environment has become so dynamic and competitive following increased globalization and advances in information technology. To stay competitive in today's financial market, and to take advantage of the risen investment opportunities, a continuous stream of skills, tools and knowledge is needed if the investors are to maximize returns on their investments. Therefore, the investors' behavioural trend is constantly moving and changing, from time to time, within various markets. There are many factors that play a major role in influencing the investor's decision, whether to buy, sell, participate, merge, or buy-out. These factors can either be financial, or psychological. Decision-making is a complex process which includes analysis of several factors and following various steps.

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Until recently, the investors' behaviour and influencing biases have been overlooked when it comes to market and stocks performances. The main focus and interpretation to such performances have always been based on general financial tools and analysis. However, many behaviourists argue that the financial aspect is not the only aspect that has an effect on the economic conditions. For instance, Daniel Kahneman, a psychologist, won the 'Nobel' Prize in Economics in 2002 for having integrated insights from psychological research into economic science, especially concerning human judgment and decision-making under uncertainty. His work, with his psychologist colleague Amos Tversky, has led to understand and appreciate the importance of behavioural finance (Shapira and Venezia, 2000).

It is the process of choosing a particular alternative from a number of alternatives. It is an activity that follows after proper evaluation of all the alternatives. It is believed that decisionmaking is based on primarily two things: personal resources or factors, and technical factors. Similarly, while making decisions in stock market, investors tend to rely on these two factors. Decision making by individual investors is usually based on their personal factors such as age, education, income, and investment portfolio, etc. Simultaneously, their investment decisions are also derived from complex models of finance. These models include those based on expected risk and return associated with an investment, and risk-based asset pricing models like CAPM (Capital Asset Pricing Model).

Within behavioural finance it is assumed that information structure and the characteristics of market participants systematically influence individuals' investment decisions as well as market outcomes (Barberis AND Thaler, 2003). According to behavioural finance, investor market behaviour derives from psychological principles of decision making, to explain why people buy or sell the stocks. Behavioural finance focuses upon how investors interpret and act on

information to make investment decisions. In addition, the behavioural finance places an emphasis upon investor behaviour leading to various market anomalies.

1.1.1 Investment Decisions

Investment is the current commitment of money for a period of time in order to derive future payments that will compensate the investor for the time the funds are committed, the expected rate of inflation, and the uncertainty of the future payments (Levy, Haim, and Thierry Post, 2005). Jensen (2003) thinks investment incentives take a variety of forms which may be treated differently by different organizations and industries.

Investment involves making of a sacrifice in the present with the hope of deriving future benefits. Two most important features of an investment are current sacrifice and future benefit. Investment is the sacrifice of certain present values for the uncertain future reward. It involves commitment of funds in various investment avenues. It involves numerous decisions such as type, mix, amount, timing, grade etc, of investment the decision making has to be continuous (Levy, Haim, and Thierry Post, 2005). Investment is concerned with the management of an investor's wealth which is the sum of current income and the present value of all future incomes.

Investment behaviours are defined as how the investors judge, predict, analyze and review the procedures for decision making, which includes investment psychology, information gathering, defining and understanding, research and analysis (Alfredo and Vicente, 2010). Behavioural Finance argues that behaviours and mood states of humans are determinant factors in shaping their investment preferences. The assumption of traditional finance has been under criticism by people since the first day and the issue of whether or not humans make rational preferences. Behavioural Finance focuses on how investors interpret knowledge in order make investment

decisions based on information and how they act with their investment decisions. Behavioural Finance has developed as a result of increasing interest of psychologists in economics. The key point for selecting investment behaviours, selections of market or strategy regardless is the relation between returns and risks; which is to select investment targets with good credibility. large company size, high dividends, and high returns. However, high returns usually come with high risks; hence, the ultimate target for the investor is to select investments that balance risks and returns (Peng, Yu-Jan, 2003). Behavioural Finance is, in general, the application of psychology to the field of finance.

Decision-making is a process by which an individual responds to the opportunities and threats that confront him/her by analyzing the options and making determinations or decisions about specific goals and course of action (Akintoye, 2006). So, investors in bonds and securities or shares also go through a decision making process. According to Eastlick (1996) while many share investments may involve several participants who play such role as initiator, influencer, buyer and user just as in buying behaviour, the investment decision-maker goes through a decision making of problem recognition, information search, evaluation of alternative purchase decision and post purchase behaviours. This implies that investors in bonds and securities or shares go through a decision making process which is usually influenced by number of factors. There are however, contending theories on the factors that influence investment decisions in shares.

Decision-making under risk is directly associated with the decision maker's (Investors in our case) attitudes towards risk. Investment decisions are made on the basis of investors' appetite for risk and return. The outcome of a decision results in either gain or loss based on a particular combination of strategy and state of nature prevailing at that time (Barberis and Thaler, 2003).

The investor as decision maker has no control over the states of nature that will prevail in future but the future states of nature will certainly affect the outcome of any strategy that an investor may adopt. The particular decision made will depend, therefore, on the decision makers. knowledge or estimation of how a particular future state of nature will affect the outcome of each particular strategy.

Effective decision-making in stock market requires better insight, and understanding of human nature in a global perspective, apart from sharp financial skills and ability to gain best out of investments (Del, Ferrante and Costantini, 2007). Positive vision, foresight, perseverance and drive are must for an investor to be successful in his investment decisions. Investors differ in characteristics due to demographic factors such as socio-economic background, educational level, age, gender, and alike. So, it is difficult for an investor to make an appropriate investment decision on the basis of the decisions made by someone else.

In traditional theories of finance, investment decisions are based on the assumption that investors are rational human beings and hence they can make rational investment decisions. In the center of finance are investment decision models based on expected return and risk associated with an investment, and decisions using risk-based asset pricing model like CAPM and other similar frameworks derived from investor rationality.

1.1.2 Behavioural Factors Influencing Investment Decisions

Generally, decision-making is a process by which an individual responds to the opportunities and threats that confront him/her by analyzing the options and making determinations or decisions about specific goals and course of action (Akintoye, 2006). Investors in bonds, securities and shares also go through a decision making process. According to Eastlick (1996), while many

share investments may involve several participants who play such role as initiator. influencer. buyer and user just as in buying behaviour, the investment decision-maker goes through a decision making process consisting of problem recognition. information search, evaluation of alternative purchase decision and post purchase behaviours. This implies that investors in bonds and securities or shares go through a decision making process which is usually influenced by number of factors. There are however, contending theories on the factors that influence investment decisions in shares.

Flow of information like decisions made by government bodies, media news etc. causes the stock prices to move up or down. Due to this behaviour of stock market and due to new information, stock investors make their investment decisions (Warneryd, 2001). Prior to negative earnings surprises, those investors decrease their holdings that have insider information as compared to those investors who don't have this information. Also the investors who possess private information about future prospects of the firms, trade more actively as compared to the investors without such information (Baik, Kang and Kim, 2010). Information about the firms irrespectively of its sources enables the investors to form opinion about the value of a firm (Nwezeaku and Okpara, 2010).

The openness to experience is the factor, which also effects the investment decision making. It is linked to the way how individuals perceive the world. Many facets relating to this factor have been pointed out, like imagination and depth, ingenuity, intellect, competences, reflection, introspection, quickness, creativity (Goldberg, 1999). The fundamental nature of this factor is related to intellectuality and curiosity.

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1.1.3 Nairobi Securities Exchange

The Nairobi Securities Exchange (NSE) was formed in 1954 as a voluntary organization of stock brokers and is now one of the most active capital markets in Africa. As a capital market institution, the Securities Exchange plays an important role in the process of economic development. It helps mobilize domestic savings thereby bringing about the reallocation of financial resources from dormant to active agents. Long-term investments are made liquid, as the transfer of securities between shareholders is facilitated. The Exchange has also enabled companies to engage local participation in their equity, thereby giving Kenyans a chance to own shares. There are as of July 2012, 60 companies listed at the stock exchange (www.nse.co.ke, 2012).

In 2001, NSE was restructured to give rise to three market segments namely; the Main Investments Market Segment (MIMS), the Alternative Investment Markets Segment (AIMS) and the Fixed Income Securities Market Segment (FISMS) (www.nse.co.ke). The MIMS is the main quotation market, the AIMS provide an alternative method of raising capital to small, medium seized and young companies that find it difficult to meet the more stringent listing requirements of the MIMS while the FISMS provides an independent market for fixed income securities such as treasury bonds, corporate bonds, preference shares and debenture stocks, as well as short term financial instruments such as treasury bills and commercial papers (www.nse.co.ke)

In November 2004 the Central Depository System was introduced thus automating settlement of transactions at NSE to achieve T+5. The NSE trading hours increased from 2 to3 hours (10.00 am- 1.00 pm) and subsequently increased to 5 hours (10.00a.m -3.00p.m). The new system offers and has led to greater transparency in the placement of bids and offers improvement in market

surveillance. Transmission is almost real time and trading information relating to index movements, price and volume movements of traded securities is released on a timely basis.

1.2 Research Problem

Volatility in stock exchanges has dominated many financial analysts discussion since the 2008 financial crises. Extreme movements in global indices and stock prices because of fear and anticipation has, as it is supposed to, made life tough for a rational investor. Market sentiments have been observed to sway wildly from positive to negative and back, in the shortest timeframes like weeks, days and hours. In this context, understanding irrational investor behaviour deserves more importance that it has ever had. Behavioural finance studies the effect of psychology on financial decision-making. It studies how investors interpret new information and act on it to make decisions under uncertainty (Kim and Nofsinger, 2008). The science does not try to label traditional financial theories as obsolete, but seeks to supplement the theories by relaxing on its assumptions on rationality and taking into consideration the premise that human behaviour can be understood better if the effects of cognitive and psychological biases could be studied in context where decisions are made.

Subash (2012) studied the role of behavioural finance in portfolio investment decisions using evidence from India. Subash (2012) found out that, with the exception of Cognitive Dissonance Bias, investors suffered from all biases in a significant manner. Kadiyala and Rau (2004) investigated investor reaction to corporate event announcements. They concluded that investors appear to under react to prior information as well as to information conveyed by the event, leading to the different patterns: return continuations and return reveals, both documented in *long-horizon* return. Hodge (2003) analyzed investors' perceptions of earnings quality, auditor independence, and the usefulness of audited financial information. He concluded that lower

perceptions of earnings quality are associated with greater reliance on a firm's audited financial statements and fundamental analysis of those statements when making investment decisions. Malmendier and Shanthikumar (2003) tried to answer the question: Are small investor naïve? They found that large investors generate abnormal volumes of buyer-initiated trades after a positive recommendation only if the analyst is unaffiliated. Small traders exert abnormal buy pressure after all positive recommendations, including those of affiliated analysts.

In Kenya, several studies have been done on stock market, Kibuthu (2005) did a study on capital market on emerging economies with reference to Nairobi Stock Exchange. He established that most of the investors in the developing states have less information than those in developed countries thus making survival of that stock market at a low pace. Odundo (2004) did a study on the overview and evolution of investment instruments in Sub-Saharan Africa with special reference to Kenya. He established that need to invest and financial constrains were the major factors that led to Evolution of Investment. Wagacha and Mbui (2001) also carried out a survey of Enterprise Attitudes on Kenyan capital market. As observed various studies have not yet described the factors that exert a significant influence on investment decision in stock market. This study therefore, will add to the existing literature in these areas by analysing factors influencing investment decision in stock market. This study will seek to answer the following research question: What behavioural factors influence investment decision at the Nairobi Securities Exchange?

1.3 Objectives

i. To identify behavioural factors at the Nairobi Securities Exchange.

ii. To establish the effect of behavioural factors at the Nairobi Securities Exchange.

1.4 Value of the Study

The study will be important to various stakeholders, chief among them being:

The study will contribute to the existing body of knowledge on the behavioural factors influencing investment decisions at the NSE thus serve as a source of reference for further research. The recommendations for future research will also help researchers to carry out more studies to extend the understanding of how behavioural factors influence the investment behaviour at the NSE.

The study will help investors and investment analysts in understanding the behavioural factors that influence the investment decisions at the NSE. Investors and investment analysts will find the study useful as it will guide their investment bahaviour in understanding how to invest in a highly dynamic investment environment.

The study will enable policy makers understand the growing need to formulate policies and guidelines that govern investments at the Securities Exchange to reduce the influence of insider trading and promote corporate governance. The effectiveness of investment guidelines will help promote the deepening of the securities' assets traded.

CHAPTER TWO: LITERATURE REVIEW

2.1 Introduction

This chapter summarizes the information from other researchers who have carried out their research in the same field of study. The specific areas covered here are review of theories, review of empirical studies, general literature review, theoretical framework and conclusion from literature review.

2.2 Review of Theories

2.2.1 Prospect Theory

This theory was developed by Kahneman and Tversky (1979). The theory focuses on subjective decision-making influencing investors' value system (Filbeck and Horvath, 2005). Nonetheless, this theory is criticized for failing to explain why people are attracted to both insurance and gambling. People tend to under-weigh probable outcomes compared with certain ones and people respond differently to the similar situations depending on the context of losses or gains in which they are presented (Kahneman and Perttunen, 2004).

Prospect theory describes some states of mind affecting an individual's decision-making processes including Regret aversion, Loss aversion and Mental accounting (Waweru et al., 2003). Regret is an emotion that occurs after people make mistakes. Investors avoid regret by refusing to sell decreasing shares and willing to sell increasing ones. Moreover, investors tend to be more regretful about holding losing stocks too long than selling winning ones too soon (Forgel and Berry, 2006).

Mental accounting is a term referring to the process by which people think about and evaluate their financial transactions (Barberis & Huang, 2001). Mental accounting allows investors to



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organize their portfolio into separate accounts. Rockenbach (2004) suggests that connection between different investment possibilities is often not made as it is useful for arbitrage free pricing.

2.2.2 Heuristic Theory

Heuristics are defined as the rules of thumb, which makes decision making easier, especially in complex and uncertain environments (Ritter, 2003) by reducing the complexity of assessing probabilities and predicting values to simpler judgments. In general, these heuristics are quite useful, particularly when time is limited, but sometimes they lead to biases (Waweru et al., 2008). The decision process by which the investors find things out for themselves, usually by trial and error, lead to the development of rules of thumb. In other words, it refers to rules of thumb which humans use to made decisions in complex, uncertain environments (Ritter, 2003). The reality, the investors decision making process are not strictly rational one. Though the investors have collected the relevant information and objectively evaluated, in which the mental and emotional factors are involved. It is very difficult to separate. Sometimes it may be good, but many times it may result in poorer decision outcomes.

Kim and Nofsinger (2008) were ones of the first writers studying the factors belonging to heuristics when introducing three factors namely representativeness, availability bias, and anchoring. Waweru et al. (2008) also list two factors named Gambler's fallacy and Overconfidence into heuristic theory. Representativeness refers to the degree of similarity that an event has with its parent population or the degree to which an event resembles its population.

Representativeness may result in some biases such as people put too much weight on recent experience and ignore the average long-term rate (Ritter, 2003). A typical example for this bias

is that investors often infer a company's high long-term growth rate after some quarters of increasing (Waweru et al., 2008). Representativeness also leads to the so-called "sample size neglect" which occurs when people try to infer from too few samples (Barberis and Thaler, 2003). In stock market, when investors seek to buy "hot" stocks instead of poorly performed ones, this means that representativeness is applied. This behaviour is an explanation for investor overreaction. The belief that a small sample can resemble the parent population from which it is drawn is known as the "law of small numbers" which may lead to a Gamblers' fallacy (Barberis and Thaler, 2003).

More specifically, in stock market Gamblers' fallacy arises when people predict inaccurately the reverse points which are considered as the end of good (or poor) market returns (Waweru et al., 2008). In addition, when people subject to status quo bias, they tend to select suboptimal alternative simply because it was chosen previously (Kempf and Ruenzi, 2006). Anchoring is a phenomena used in the situation when people use some initial values to make estimation, which are biased toward the initial ones as different starting points yield different estimates Kim and Nofsinger (2008). In financial market, anchoring arises when a value scale is fixed by recent observations. Investors always refer to the initial purchase price when selling or analyzing. Thus, today prices are often determined by those of the past. Anchoring makes investors to define a range for a share price or company's income based on the historical trends, resulting in underreaction to unexpected changes.

Availability bias happens when people make use of easily available information excessively. In stock trading area, this bias manifest itself through the preference of investing in local companies which investors are familiar with or easily obtain information, despite the fundamental principles so-called diversification of portfolio management for optimization (Waweru et al., 2003).

2.2.3 Modern Portfolio Theory

Modern Portfolio Theory (MPT) also called portfolio theory or portfolio management theory is a sophisticated investment approach/strategy and is the philosophical opposite of traditional stock picking (Shefrin, 2000). It is the creation of economists who try to understand the market as a whole, rather than business analysts who look for what makes each investment opportunity unique. Investments are described statistically in terms of their expected long-term return rate and their expected short-term volatility. The volatility is equated with risk, measuring how much worse than average an investment's bad years are likely to be. The goal is to identify the acceptable level of risk tolerance and then to find a portfolio with the maximum expected return for that level of risk.

The key tenet of Modern portfolio theory therefore is that if one wishes to increase the performance and reduce the risk in an overall investment portfolio, he or she should combine investments that are non-correlated with one another (Thaler and Shefrin, 1981). Simply put a diversified portfolio of non-correlated investments can provide the highest returns with the least amount of volatility given that the risk of loss in futures trading can be substantial and an investor could potentially lose more than the initial investment.

The theory of Behavioural finance is from a broader social science perspective including psychology and sociology (Tony, 2000). It therefore, applies scientific research on human and social, cognitive and emotional factors to better understand economic decisions by consumers, borrowers, investors and how they affect market prices, returns and the allocation of resources. Specifically, behavioural finance has two building blocks: cognitive psychology and the limits to arbitrage. Cognitive refers to how people think. There is a huge psychology literature

documenting that people make systematic errors in the way that they, think, they are overconfident they put too much weight on recent experience.

Their preferences may also create distortions. Behavioural finance uses this body of knowledge, rather than taking the arrogant approach that it should be ignored. Limits to arbitrage refer to predicting in what circumstances arbitrage forces will be effective and when they would not be (Lintner, 1998). Behavioural finance uses models in which some agents are not fully rational, either because of preferences or because of mistaken beliefs.

2.3 Factors Influencing Investor Behaviour

Studies of investor behaviour have discovered that, as individuals, we often make decisions that are not the most logical or rational, despite what we may think. Instead, we are influenced by what are known as investor behavioural biases (Shapira and Itzhak 2001). Theories of human behaviour from psychology, sociology, and anthropology have helped motivate much recent empirical research on the behaviour of financial markets. Behavioural finance attempts to explain human behaviours' in markets, importing theories of human behaviour from the social sciences (Shiller, 1998). Individual investor behaviour is motivated by a variety of psychological heuristics and biases. First, investors make investment decisions based on heuristics; they assume price as decision-anchor and are overconfident in their judgments. Second, their investment behaviour is highly influenced by representativeness and they do lot of mental accounting in the sense of grouping their gains and losses while making decisions. Third, though investors follow fundamentals, they tend to discount complex information at first instance; they prefer those pieces of information which are easily adjustable into their investment decision-making. Finally, there exists an asymmetric pattern of distribution and usage of information among individual investors which affects their investment behaviour to greater extent (Statman. Steve and Keith, 2006).

Market history is a useful guide because inherent volatility of stocks leads investors to placing too much weight on what is going on today and not enough weight on the historical pattern of stocks. For example, most investors are aware that the long-term return from stocks has been around 11% annually. What is far less clear to many is that this record is made up of good years and bad years with few years in between.

2.4 Factors Affecting Investment Decisions

2.4.1 Herding Effect

Herding effect in financial market is identified as tendency of investors' behaviours to follow the others' actions. Practitioner usually consider carefully the existence of herding, due to the fact that investors rely on collective information more than private information can result the price deviation of the securities from fundamental value; therefore, many good chances for investment at the present can be impacted. Academic researchers also pay their attention to herding; because its impacts on stock price changes can influence the attributes of risk and return models and this has impacts on the viewpoints of asset pricing theories (Tan, Chiang, Mason and Nelling, 2008). In the perspective of behaviour, herding can cause some emotional biases, including conformity, congruity and cognitive conflict, the home bias and gossip. Investors may prefer herding if they believe that herding can help them to extract useful and reliable information. Whereas, the performances of financial professionals, for example, fund managers, or financial analysts, are usually evaluated by subjectively periodic assessment on a relative base and the comparison to their peers. In this case, herding can contribute to the evaluation of professional performance

because low-ability ones may mimic the behaviour of their high-ability peers in order to develop their professional reputation (Kallinterakis, Munir and Markovic, 2010).

In the security market, herding investors base their investment decisions on the masses' decisions of buying or selling stocks. In contrast, informed and rational investors usually ignore following the flow of masses, and this makes the market efficient. Herding causes a state of inefficient market, which is usually recognized by speculative bubbles. In general, herding investors act the same ways as prehistoric men who had a little knowledge and information of the surrounding environment and gathered in groups to support each other and get safety (Caparrelli et al., 2004). There are several elements that impact the herding behaviour of an investor, for example: overconfidence, volume of investment, and so on. The more confident the investors are, the more they rely on their private information for the investment decisions. In this case, investors seem to be less interested in herding behaviours. When the investors put a large amount of capital into their investment, they tend to follow the others' actions to reduce the risks, at least in the way they feel. Besides, the preference of herding also depends on types of investors, for example, individual investors have tendency to follow the crowds in making investment decision more than institutional investors (Goodfellow, Bohl and Gebka, 2009).

Waweru et al. (2008) propose that herding can drive stock trading and create the momentum for stock trading. However, the impact of herding can break down when it reaches a certain level because the cost to follow the herd may increase to get the increasing abnormal returns. Waweru et al. (2008) identify stock investment decisions that an investor can be impacted by the others: buying, selling, choice of stock, length of time to hold stock, and volume of stock to trade. (Waweru et al., 2008) conclude that buying and selling decisions of an investor are significantly impacted by others' decisions, and herding behaviour helps investors to have a sense of regret

aversion for their decisions. For other decisions: choice of stock. length of time to hold stock. and volume of stock to trade, investors seem to be less impacted by herding behaviour. However, these conclusions are given to the case of institutional investors: thus, the result can be different in the case of individual investors because, as mentioned above, individuals tend to herd in their investment more than institutional investors.

2.4.2 Risk Aversion

Loss aversion is an important psychological concept which receives increasing attention in economic analysis. The investor is a risk-seeker when faced with the prospect of losses, but is risk-averse when faced with the prospects of enjoying gain. Loss aversion refers to the difference level of mental penalty people have from a similar size loss or gain (Barberis & Huang, 2001). There is evidence showing that people are more distressed at the prospect of losses than they are pleased by equivalent gains (Barberis and Thaler, 2003).

Moreover, a loss coming after prior gain is proved less painful than usual while a loss arriving after a loss seems to be more painful than usual (Barberis & Huang, 2001). In addition, Lehenkari and Perttunen (2004) find that both positive and negative returns in the past can boost the negative relationship between the selling trend and capital losses of investors, suggesting that investors are loss averse. Risk aversion can be understood as a common behaviour of investor, nevertheless it may result in bad decision affecting investor's wealth (Ritter, 2003).

Risk aversion is the reluctance of a person to accept a bargain with an uncertain payoff rather than another bargain with more certain, but possibly lower, expected payoff. For example, a riskaverse investor might choose to put his or her money into a bank account with a low but guaranteed interest rate, rather than into a stock that may have high returns, but also involves a chance of losing value (Barberis and Huang, 2001). Risk aversion investors would tend to postpone stock market investment till they are sure of the returns. Risk aversion can be understood as a common behaviour of investor, nevertheless it may result in bad decision affecting investor's wealth.

2.4.3 Prospecting

Prospecting focuses on subjective decision-making influenced by the investors' value system (Filbeck, Hatfield and Horvath, 2005). Unlike expected utility theory which makes use of rational choice as the dominant the analysis of decision making under risk, prospecting is subjective depending on investors' risk appetite. Nonetheless, prospecting is criticized for failing to explain why people are attracted to both insurance and gambling. People tend to under-weigh probable outcomes compared with certain ones and people respond differently to the similar situations depending on the context of losses or gains in which they are presented. It describes some states of mind affecting an individual's decision-making processes including regret aversion, loss aversion and mental accounting (Waweru et al., 2003).

Regret is an emotion which occurs after people make mistakes. Investors avoid regret by refusing to sell decreasing shares and willing to sell increasing ones. Moreover, investors tend to be more regretful about holding losing stocks too long than selling winning ones too soon (Forgel and Berry, 2006 and Lehenkari and Perttunen, 2004). Loss aversion refers to the difference level of mental penalty people have from a similar size loss or gain (Barberis and Huang, 2001). There is evidence showing that people are more distressed at the prospect of losses than they are pleased by equivalent gains (Barberis and Thaler, 2003). Moreover, a loss coming after prior gain is proved less painful than usual while a loss arriving after a loss seems to be more painful than usual (Barberis and Huang, 2001).

2.4.4 Anchoring

It describes the common human tendency to rely too heavily. or 'anchor' on one trait or piece of information when making decisions. When presented with new information, the investors tend to be slow to change or the value scale is fixed or anchored by recent observations (Del Missier, 2007). They are expecting the trend of earning is to remain with historical trend, which may lead to possible under reactions to trend changes.

The concept of anchoring can be explained by the tendency to attach or "anchor" ones thoughts to a reference point - even though it may have no logical relevance to the decision at hand (Del Missier, 2007). Mental anchoring can have an effect on how people evaluate certain decisions. For example, some investors tend to believe that stocks which have fallen considerably over a short period now can be bought at a discount. This misperception is due to that the investor has mentally anchored a high price for that specific stock, a type of base price acting as a reference point. Disregarding the reason for that stock's evident drop, the anchored higher price is mentally considered its "rightful" price. The stock is therefore believed to bounce back over a certain time (Del Missier, 2007).

Anchoring has some connection with representativeness as it also reflects that people often focus on recent experience and tend to be more optimistic when the market rises and more pessimistic when the market falls (Waweru et al., 2008). When people overestimate the reliability of their knowledge and skills, it is the manifestation of overconfidence (Hvide, 2002). Many studies show that excessive trading is one effect of investors. There is evidence showing that financial analysts revise their assessment of a company slowly, even in case there is a strong indication proving that assessment is no longer correct. Investors and analysts are often overconfident in areas that they have knowledge (Evans, 2006). Overconfidence is believed to improve persistence and determination, mental facility, and risk tolerance. In other words, overconfidence can help to promote professional performance. It is also noted that overconfidence can enhance other's perception of one's abilities, which may help to achieve faster promotion and greater investment duration (Oberlechner and Osler, 2004).

2.5 Empirical Review

Several studies have been conducted on the behavioural factors influencing investment decision. However, these studies have been conducted on different markets from that at the Nairobi Securities Exchange. For example, Subash (2012) studied the role of behavioural finance in portfolio investment decisions using evidence from India. Subash (2012) found out that, with the exception of Cognitive Dissonance Bias, investors suffered from all biases in a significant manner. Weighted Scoring Analysis revealed that Regret Aversion, Gamblers' Fallacy and Hindsight bias were seen to be affecting the younger investors only. Anchoring, Gamblers' Fallacy and Hindsight were the three biases, which were seen to affect the younger investor lot in the most significant manner, compared to experienced investors, as suggested by results from Chi-squared tests. Tests had shown that all the investors were affected by the various biases while making investment decisions but it could not be established that one investor group had suffered more losses under the influence of these biases. Results from discriminant analysis suggested that, even though investors were equally prone to committing erroneous decisions owing to being biased, the degree to which each of the biases were affecting them were different in a significant manner to an extent that younger and experienced investors could be separated as two different groups of human beings exhibiting a different behavioural pattern.

Kadiyala and Rau (2004) investigated investor reaction to corporate event announcements. They concluded that investors appear to under react to prior information as well as to information

conveyed by the event, leading to the different patterns: return continuations and return reveals, both documented in long-horizon return. They found no support for the overreaction hypothesis. Merikas et.al. (2003) adopted a modified questionnaire to analyze factors influencing Greek investor behaviour on the Athens Stock Exchange. The results indicate that individual's base their stock purchase decisions on economic criteria combined with diverse other variables. They do not rely on a single integrated approach, but rather on many categories of factors. The results also revealed that there is a certain degree of correlation between the factors that behavioural finance theory and previous empirical evidence identify as the influencing factors for the average equity investor, and the individual behaviour of active investors in the Athens Stock Exchange(ASE) influencing by the overall trends prevailing at the time of the survey in the ASE.

Malmendier and Shanthikumar (2003) tried to answer the question: Are small investor naïve? They found that large investors generate abnormal volumes of buyer-initiated trades after a positive recommendation only if the analyst is unaffiliated. Small traders exert abnormal buy pressure after all positive recommendations, including those of affiliated analysts. Hodge (2003) analyzed investors' perceptions of earnings quality, auditor independence, and the usefulness of audited financial information. He concluded that lower perceptions of earnings quality are associated with greater reliance on a firm's audited financial statements and fundamental analysis of those statements when making investment decisions. Krishnan and Booker (2002) analyzed the factors influencing the decisions of investor who use analysts' recommendations to arrive at a short-term decision to hold or to sell a stock. The results indicate that a strong form of the analyst summary recommendation report, one with additional information supporting the

analysts' position further, reduces the disposition error for gains and also reduces the disposition error for losses.

Kibuthu (2005) did a study on capital market on emerging economies with reference to Nairobi Stock Exchange. He established that most of the investors in the developing states have less information than those in developed countries thus making survival of that stock market at a low pace. Odundo (2004) did a study on the overview and evolution of investment instruments in Sub-Saharan Africa with special reference to Kenya. He established that need to invest and financial constrains were the major factors that led to Evolution of Investment. Wagacha and Mbui (2001) also carried out a survey of Enterprise Attitudes on Kenyan capital market. As observed various studies have not yet described the factors that exert a significant influence on investment decision in stock market.

2.6 Conclusion

Decision-making is a complex activity. Decisions can never be made in a vacuum by relying on the personal resources and complex models, which do not take into consideration the situation. Analysis of the variables of the problem in which it occurs is mediated by the cognitive psychology of the manager. A situation based on decision making activity encompasses not only the specific problem faced by the individual but also extends to the environment. This needs better insight, and understanding of human nature in the existing global perspective, plus development of fine skills and ability to get best out of investments. In addition, investors' have to develop positive vision, foresight, perseverance and drive. Every investor differ from others in all aspects due to various factors like demographic factors which includes socio-economic background. educational attainment level, age. race and sex. However studies have been done in investment such as Cornell (2009) presents a simple procedure for assessing the relative impact of luck and skill in determining investment performance and shows that the results are performance is due to random noise; Biais and Weber (2010) research "Hindsight Bias, Risk Perception, and Investment Performance" and they find that hindsight bias reduces volatility estimates and more biased agents have lower performance; Lyn and Zychowicz (2010) study "The Impact of Faith-Based Screens on Investment Performance". They find the evidence that faith-based funds mostly outperform the market and get the results that faith-based funds do better than socially responsible investing funds in general. However, no study has focused on the behavioural factors influencing investors' decision making. It is, therefore, necessary to explore behavioural factors that impact on the decision-making process of investors in the current stock market to help the investors as well as security companies raise better predictions and decisions for their business.

CHAPTER THREE: RESEARCH METHODOLOGY

3.1 Introduction

This chapter presents research approach that was used in achieving at the study's objectives. It sets out the method that was used in selecting respondents, collecting data and analyzing the same. The chapter is thus structured into: research design, population, sampling, data collection. data analysis, data validity and reliability and ethical considerations.

3.2 Research Design

Orodho (2003) defines a research design as the scheme, outline or plan that is used to generate answers to research problems. According to Kombo and Tromp (2006), research design can be thought of as the structure of research. This research problem was studied through the use of a descriptive research design. According to Cooper and Schindler (2003), a descriptive study is concerned with finding out the what, where and how of a phenomenon. This study therefore was able to generalize the findings to investment banks in Kenya. The main focus of this study was quantitative. However some qualitative approach was used in order to gain a better understanding and possibly enable a better and more insightful interpretation of the results from the quantitative study. This method concerns the intense investigation of problem solving situations in which problems are relevant to the research problem. The underlining concept is to select several targeted cases where an intensive analysis will identify the possible alternatives for solving the research questions on the basis of the existing solution applied in the selected case study. The researcher attempts to describe and define a subject, often by creating a profile of group of problems (Cooper and Schindler, 2003).
3.3 Population

The population of the study was 17 investment banks while the target population comprised of managers in-charge of taking orders on the purchase and sale of securities. Specifically, the study targeted operations managers and business development managers from each investment bank. These offices were chosen upon because of their key role in the purchase and sale of securities at the Nairobi Securities Exchange. In total, the study targeted 34 respondents comprising of two respondents in the above named positions from each investment Bank. Since the target population of the study was small, the study conducted a census where all target respondents were included in the study. This choice of respondents conforms with Mugenda and Mugenda (2003) explanation that the target population should have observable characteristics to which the researcher intents to generalize the result of the study. This definition assumes that the population is not homogeneous.

3.5 Data Collection

The study employed questionnaire to collect primary data. Questionnaires are appropriate for studies since they collect information that is-not directly observable as they inquire about feelings, motivations, attitudes, accomplishments as well as experiences of individuals, Mellenbergh (2008). The questionnaire comprised of both open (and close-ended questions. Franker, (2006) stated that a questionnaire is useful in obtaining objective data because participants are not manipulated in any way by the researcher. According to Franker. (2006) questionnaires have the added advantage of being less costly and using less time as instruments of data collection.

The data instrument addressed the four research objectives while it was sub-divided into two sections. The first section of the questionnaire enquired general information about the

respondents, while the next section answered the four objectives, that is, (herding effect, risk aversion, prospecting and anchoring). The questionnaires was administered through drop and pick later method. The quantitative section of the instrument to be employed used both a nominal and a Likert type scale format to determine each of the variables. A 5 point Likert scale ranging from 1 to 5 was used as answers to statement like questions. The Likert - type format was selected as the format yields equal - interval data, a fact that allows for the use of more powerful statistical to be used to test hypotheses (Kiess and Bloomquist, 2008).

3.5.1 Validity and Reliability

According to Mugenda and Mugenda, (2003), validity is the accuracy and meaningfulness of inferences, based on the research results. One of the main reasons for conducting the pilot study was to ascertain the validity of the questionnaire. The study used both face and content validity to ascertain the validity of the questionnaires. Face validity is actually validity at face value. As a check on face validity, test/survey items were sent to the pilot group to obtain suggestions for modification, Rousson, Gasser and Seifer (2002). Content validity draws an inference from test scores to a large domain of items similar to those on the test. Content validity is concerned with sample-population representativeness. Gillham, (2008) stated that the knowledge and skills covered by the test items should be representative to the larger domain of knowledge and skills.

The pilot testing was conducted using the questionnaire to 5 investment bank where 1 staff will be targeted. The pilot group was done through random sampling. The purpose of the pilot testing aims to establish the validity and reliability of the research instruments and hence enhance face validity (Joppe, 2000).

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Reliability of the questionnaire was evaluated through administration of the said instrument to the pilot group. A construct composite reliability co-efficient (Cronbach alpha) of 0.6 or above. for all the constructs, was considered adequate for this study. The acceptable reliability coefficient is 0.6 and above, (Rousson, Gasser and Seifer 2002). Cronbach Alpha was used to test the reliability of the research instrument.

3.6 Data Analysis

The study generated both qualitative and quantitative data. Quantitative data was coded and entered into Statistical Packages for Social Scientists (SPSS Version 21.0) and analyzed using descriptive statistics. Qualitative data was analyzed based on the content matter of the responses. Responses with common themes or patterns were grouped together into coherent categories.

Descriptive statistics involved use of absolute and relative (percentages) frequencies, measures of central tendency and dispersion (mean and standard deviation respectively). Quantitative data was presented in tables and graphs and explanation will be presented in prose. In addition, the study conducted a multiple regression analysis. The regression equation was:

$Y = \beta_0 + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + \varepsilon$

Whereby Y = investment Decision in stock market, X_1 = herding effect, X_2 = risk aversion X_3 = prospecting and X_4 = anchoring, while β_1 , β_2 , β_3 and β_4 are coefficients of determination and ε is the error term. This provided the generalization of the findings on behavioural factor influencing investment decision making.

The variables of the study were measured by examining the respondents' extent of agreement with the likert scale questions under each variable on the questionnaire. The questionnaire had been designed in such a way that each variable has a clearly identified section and question. The respondents were required to score their level of agreement with each statement on how behavioural factors affect investment decisions.

To test for the strength of the model, the researcher conducted an Analysis of Variance (ANOVA). On extracting the ANOVA table, the researcher looked at the significance value. The study was tested at 95% confidence level and 5% significant levels. If the significance number found is less than the critical value (α) set 2.4, then the conclusion was that the model was significant in explaining the relationship. Else the model was to be regarded as non significant.

CHAPTER FOUR: DATA ANALYSIS AND INTERPRETATION

4.1 Introduction

The purpose of this research was to investigate the behavioural factors influencing investment decision in stock market where the focus was on the investment banks in Kenya. The study identified the research problem in chapter one, the available literature was reviewed in chapter two, while the chapter three explained the methods that the study used to collect data. This chapter presents analysis and findings of the study as set out in the research methodology. It highlights the findings of the study based on the data collected from respondents on the behavioural factors influencing investment decision in stock market where the focus was on the investment banks in Kenya. The data was gathered using a questionnaire as the research instrument. The questionnaire was designed in line with the objectives of the study.

4.2 Response Rate

From the study, 26 out of 34 sample respondents filled in and returned the questionnaire contributing to 76.50%. This commendable response rate was made a reality after the researcher made personal calls and visits to remind the respondent to fill-in and return the questionnaires as well as explaining the importance of their participation in this study. This commendable response rate can be attributed to the data collection procedure, where the researcher personally administered questionnaires and waited for respondents to fill in, kept reminding the respondents to fill in the questionnaires through frequent phone calls and picked the questionnaires once fully filled. This response rate was good and representative and conforms to Mugenda and Mugenda (2003) stipulation that a response rate of 50% is adequate for analysis and reporting; a rate of 60% is good and a response rate of 70% and over is excellent. The 8 questionnaires that were not returned were due to reasons like, the respondents were not available to fill them in at that time

and with persistence follow-ups there were no positive responses from them. The response rate demonstrates a willingness of the respondents to participate in the study.

Response rate	Frequency	Percentage
No Response	8	23.50
Response	26	76.50
Total	34	100

Table 4.1: Response Rate

4.3 Background Information

Source: Research Findings

The study also analyzed various background information variables regarding the respondents to help ascertain the validity and reliability of the information they provided. The study analyzed the respondents' age, gender, and education level.

4.2.1 Distribution of the Respondents by Gender

The research sought to find out the gender of the respondents. In this study the respondents sampled were expected to comprise both male and female staffs. As such, the study required the respondents to indicate their gender by ticking on the spaces provided in the questionnaire. Figure 4.1 shows the distribution of the respondents by gender. Accordingly, 51.3% of the respondents were male while 48.7% of them were female.

Figure 4.1: Gender of the Respondents



Source: Research Findings

4.2.2 Distribution of Respondents by Age

The study posed a question requesting the respondents to indicate their age brackets. From table 4.2, majority of the respondents were aged between 36-45 years (comprising 35% of the respondents), 27% of them indicated that they were aged between 46-55 years, 27% of the respondents reiterated that they were aged between 26-35 years, another 8% of them were aged between 18-25 years, while 4% of them indicated that they were aged over 55 years. The study findings show that the respondents were well distributed in terms of age and that they are active in technological advancements and productivity and hence can contribute constructively in the investment decision in stock market within the investment banks in Kenya.

Age Bracket		Frequency	Percent
18-25 Years	0	2	8%
26-35 Years		7	27%
36-45 Years		9	35%
46-55 Years		7	27%
Over 55 Years		1	4%
Total		26	100%

Table 4.2: Age Brackets of the Respondents

Source: Research Findings

4.2.3 Highest Formal Qualification

The study targeted respondents employed in different work stations within the investment banks hence different academic qualifications. This might contribute to differences in the responses received. The study therefore sought to establish the highest academic qualifications attained by the respondents. The responses on this question are depicted in Figure 4.2.

The study results reveal that, 42.8% of the respondents had acquired a Bachelor's or undergraduate degrees level of education, 42.7% of the respondents indicated that they had acquired masters degrees, while 14.5% of them indicated that they had acquired post graduate degrees as their highest level of education. These results imply that all the respondents had at least an undergraduate degree and hence understood the information sought by this study. These findings further imply that all the respondents were academically qualified and also familiar with their duties and could dispense them effectively in terms of professional work ability and performance.



Figure 4.2: Level of Education

Source: Research Findings

4.2.4 Working Experience in the Organizations

The length of service/working in an organization determines the extent to which one is aware of the issues sought by the study. This study is about the behavioural factors influencing investment decision in stock market where the focus was on the investment banks in Kenya. The study therefore sought to establish the length of time that the respondents had been working in the banks. The results on this question are presented in Table 4.3.

From the study, 62% of the respondents indicated that they had an experience of 6 to 7 years, 27% of them had worked in the banks for a period of 3 to 5 years, 8% of the respondents indicated that they had an experience of between 1 -2 years, while 4% of them had a working experience of over 7 years in the banks. This shows that majority respondents had enough work experience in the banks to respond effectively. The respondents with the shortest period had worked for a period of 1-2 years and the longest serving had worked for over 7 years. Most of the respondents had worked in the target departments for long period hence they understood the behavioural factors influencing investment decision in stock market within the investment banks in Kenya.

Length in years		Frequency	Percent
Less than 1 Year		0	0%
1 -2 Years	- 20-	2	8%
3 to 5 years		7	27%
6 to 7 years		16	62%
More than 7 years		1	4%
Total		26	100%

 Table 4.3: Working Experience at the Banks

Source: Research Findings

4.2.5 Staff Training on Stock Exchange

The study further sought to establish whether the respondents had attended any course on Stock Exchange. This study whose aim is to investigate the behavioural factors influencing investment decision at the stock market found it worth to identify whether the respondents were conversant with the aspects sought by investigating if they had attended any course in stock exchange. From the study results shown in figure 4.3, an overwhelming majority (97%) of the respondents indicated that they had attended a course of stock exchange, while only 3% of the respondents indicated otherwise. Figure 4.3 presents the results.





Source: Research Findings

4.2.6 Amount of Money Invested in the Banks

The respondents were also required to indicate the total amount of money in Kenya shillings that investors had invested through their organizations over the last month. The results were shown in table 4.4. Majority of the respondents, comprising 41%, indicated that Ksh 40,001 to 60,000 had been invested over the last one month in their banks, 32% of them indicated that the investors had invested between Ksh 20.001 and Ks40,000 within the previous one month, 18% of them indicated that investors had invested Ksh 10,001 to 20,000 within the banks over the previous

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one month, 6% of the respondents reiterated that within the previous one month over Ksh 60,000 had been invested in their banks, while 3% of them indicated that only Ksh 10,000 and below had been invested over the last one month in their banks.

Amount in Kshs.	nount in Kshs. Frequency	
Ksh 10,000 and below	1	4%
Ksh 10,001 to 20,000	4	15%
Ksh 20,001 to 40,000	8	31%
Ksh 40,001 to 60,000	11	42%
Over Ksh 60,000	2	8%
Total	26	100%

Table 4.4: Total Amount of Money Invested at the Organizations over the Last Month

Source: Research Findings

4.3 Herding Effect

4.3.1 Whether Herding Influence Investor to Invest in Stock Market

One of the specific objectives of the study was to determine influence of herding on Investment decisions in Kenyan stock market. As such the respondents were required to indicate their opinion on whether the investors in their organizations invest due to herding effect. According to the results, 93.9% of the respondents were of the opinion that the investors in their organizations invest due to herding effect, while 6.1% of them had a different opinion that the investors in their organizations do not invest due to herding effect.



Figure 4.4: Whether Investors in the Banking Organizations Invest due to Herding Effect

Source: Research Findings

4.3.2 Behaviours Experienced Due to Herding Effect

Majority (92%) of the respondents agreed that their banks had experienced emotional biases and congruity in each case due to herding effect, 81% of the respondents indicated that their banks had experienced conformity due to herding effect, while 73% of them indicated that the banks had experienced home bias and gossip as well as cognitive conflict due to herding effect.

Table 4.5:	Various	Behaviours	Experienced	Due to	Herding	Effect
			1			

Yes		No	
Frequency	Percent	Frequency	Percent
24	92%	2	8%
19	73%	7	27%
21	81%	6	19%
19	73%	7	27%
24	92%	2	8%
	Frequency 24 19 21 19 24 24 24 24	Frequency Percent 24 92% 19 73% 21 81% 19 73% 24 92%	Frequency Percent Frequency 24 92% 2 19 73% 7 21 81% 6 19 73% 7 21 81% 6 19 73% 2 24 92% 2

4.3.3 Respondents' Level of Agreement with Various Statements Relating to Herding

The study further sought to establish the respondents' level of agreement with various statements relating to herding on the individual investors on investment decision making on stock market. As such a scale of 1 to 5 was provided where 1- strongly disagree. 2- disagree. 3- neutral, 4agree and 5- strongly agree. The respondents agreed that herding causes a state of inefficient market, which is usually recognized by speculative bubbles as shown by a mean score of 4.19. Most of the investors seem to be less interested in herding behaviours while making decisions on investing in stock market as shown by a mean score of 4.1 and investors act the same way and rely on little knowledge and information from the surrounding environment and gather in groups to support each other and buy shares as a group as shown by a mean score of 3.69. The respondents however remained neutral on that most of the clients are informed and rational investors and usually ignore following the flow of masses hence makes the market efficient as shown by a mean score of 3.08 and investors base their investment decisions on the masses' decisions of buying or selling stocks as shown by a mean score of 3.06. According to Caparrelli (2004) several elements impacts herding behaviour of an investor in reaching their investment decision such as overconfidence, volume of investment, and so on. The more confident the investors are, the more they rely on their private information for the investment decisions. In this case, investors seem to be less interested in herding behaviours. When the investors put a large amount of capital into their investment, they tend to follow the others' actions to reduce the risks, at least in the way they feel.

Statements	Mean	Standard Deviation
Investors base their investment decisions on the masses' decisions of buying or selling stocks	3.06	0.92
Most of our clients are informed and rational investors and usually ignore following the flow of masses hence makes the market efficient	3.08	0.993
Investors act the same way and rely on little knowledge and information from the surrounding environment and gather in groups to support each other and buy shares as a group	3.69	1.218
Most of the investors seem to be less interested in herding behaviours while making decisions on investing in stock market	4.1	1.083
Following masses causes a state of inefficient market, which is usually recognized by speculative bubbles	4.19	0.992

Table 4.6: Statements on Herding and the Individual Investors on Investment Decisions

Source: Research Findings

4.3.4 Extent to which Herding Influences Individual Investor in Stock Market

The respondents were requested to indicate the extent to which they thought that herding influenced individual investor(s) in stock market. The results are shown in table 4.8. From the study, 53.2% of the respondents indicated that herding influences individual investor(s) in stock market to a great extent, 30.1% of them indicated that herding influences individual investor(s) in stock market to a very great extent, 13.0% of the respondents indicated to a moderate extent, 1.85% of the respondents indicated that herding influences individual investor(s) in stock market to a little extent, as well as 1.85% of them who indicated that herding influences individual investor(s) in stock market to a very little extent. This implies that most of the investors reach to their investment decision as a result of the available information about the market without clear

information about stock market. This finding alluded to Waweru (2008) that herding can drive stock trading and create the momentum for stock trading.





4.4 Risk Aversion

4.4.1 Whether Risk Aversion Influence Investment Decision

The study was also interested in determining the influence of risk aversion on investment decisions in Kenyan stock market. As such the respondents were required to indicate whether the investors in their organizations base their investment on gain they expect from the investment. From the study, an overwhelming majority (92%) of the respondents indicated that the investors in their organizations base their investment on gain they expect from the investment, while 8% of the respondents indicated contrary.

Response	-	Frequency	Percent
Yes		24	92
No		2	8
Total		26	100

Source: Research Findings

Source: Research Findings

4.4.2 Respondents Level of Agreement to Statements Regarding Risk Aversion

The respondents were required to indicate their level of agreement with various statements regarding risk aversion on individual investors. From the study, majority of the respondents agreed that they experienced investors postponing their stock market investment till we assure them of the return as shown by a mean score of 4.3, most of the investors in their organization have confidence in us as they are guaranteed of interest rate by investing in their bank as shown by a mean score of 4.14, past positive returns boosts the selling trend and capital investment of the investors in their organization as shown by a mean score of 4.11 and their clients regard the benefit that the investment add to their investment values when investing to our organization as shown by a mean score of 3.97. A risk-averse investor might choose to put his or her money into a bank account with a low but guaranteed interest rate, rather than into a stock that may have high returns, but also involves a chance of losing value (Barberis & Huang, 2001).

Table 4.8: Agreement with	Statements	Regarding	Risk	Aversion on	Individual	Investors
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Statement	Mean	STD
Our clients regard the benefit that the investment will add to their investment values when investing to our organization	3.97	0.878
Past positive returns boosts the selling trend and capital investment of the investors in our organization	4.11	0.865
Most of the investors in our organization have confidence in us as they are guaranteed of interest rate by investing in our bank	4.14	0.848
We experienced investors postponing their stock market investment till we assure them of the return	4.3	0.811
Source: Research Findings		

4.4.3 Extent that Risk Aversion Influences Investment Decision

The study also sought to find out the extent to which the respondents thought that risk aversion influences investment decision of the individual in stock market. From the study, 46% of the respondents indicated that risk aversion influences investment decision of the individual in stock market to a great extent, 38% of them indicated to a very great extent, another 12% of the respondents reiterated that risk aversion influences investment decision of the individual in stock market to a moderate extent, while only 4% of the respondents indicated to a little extent.

Table 4.9: Extent to which Risk Aversion influences In	nvestment Decision in S	Stock Market
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Extent	Frequency	Percentage
To a very great extent	10	38%
To a great extent	12	46%
To a moderate extent	3	12%
To a little extent	1	4%
Total	26	100%

Source: Research Findings

4.5 Prospecting

4.5.1 Whether Prospecting Influence Investment Decision

This study further sought to establish whether prospecting influence investment decision making in stock market. On this the respondents were requested to indicate their opinion on whether investors invest on stock market with specific prospects. From the study, 69.7% of the respondents opined that their investors invest on stock market with specific prospects, as compared to 30.3% of those who indicated that the investors do not invest on stock market with specific prospects.







4.5.2. Offering of Investment Decision to Investors

The study aimed to investigate whether investment bank offer investment advice to the investors. From the study, an overwhelming majority (82%) of the respondents indicated that their organizations offer advice to the investors as compared to 18% of those who indicated otherwise.

Table 4.10: whether the Organizations offer advice to the invest	rganizations offer advice to the I	nvestors
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Response	Frequency	Percent
Yes	21	82%
No	5	18%
Total	26	100%

Source: Research Findings

4.5.3 Respondents Level to Influence of Prospecting on Investor Decision

The study sought to establish the respondents' level of agreement with various statements relating to prospect and individual investment decision. According to the results depicted in table 4.15, majority of the respondents agreed that investors are used to selling their shares once they note they are not profit earning at early stage as shown by a mean score of 4.50, some of the

investors have regretted investing in stock market due to past mistakes as shown by a mean score of 4.16, more investors' lose hope of investing in stock market if they experienced loss during their initial investment as shown by a mean score of 4.15, investors invest in our organization basing their decision on a successful investment in our organization as shown by a mean score of 3.97 and investors who have incurred loss after gain persists to invest again as they assume the loss occurred due to economic situation of the country as shown by a mean score of 3.38. People tend to under-weigh probable outcomes compared with certain ones and people response differently to the similar situations depending on the context of losses or gains in which they are presented. It describes some states of mind affecting an individual's decision-making processes including regret aversion, loss aversion and mental accounting (Waweru et al., 2004).

Statements	Mean	STD
Investors invest in our organization basing their decision on a successful investment in our organization	3.9699	1.30813
Some of the investors have regretted investing in stock market due to past mistakes	4.1579	0.92803
Investors are used to selling their shares once they note they are not profit earning at early stage	4.4962	0.70307
More investors' lose hope of investing in stock market if they experienced loss during their initial investment	4.1504	1.27622
Investors who have incurred loss after gain persists to invest again as they assume the loss occurred due to economic situation of the country	3.3750	1.2041

Table 4.11: Agreement with statements on Prospect and Individual Investment Decision

Source: Research Findings

4.5.4 Extent that Prospecting Influences Individual Behaviour in Investment

The respondents were also required to indicate the extent to which they thought that prospecting influences individual behaviour in investment. From the study, 50% of the respondents indicated that they thought that prospecting influences individual behaviour in investment to a little extent, 31 % of them indicated that prospecting influences individual behaviour in investment to a moderate extent, 12% of the respondents indicated to a very great extent, 4% of the respondents indicated that they thought that prospecting influences individual behaviour in investment to a great extent, while 4% of them indicated that prospecting influences individual behaviour in investment to a investment to a very little extent.

Extent	Frequency	Percent
To a very great extent	3	12%
To a great extent	1	4%
To a moderate extent	8	31%
To a little extent	- 13	50%
To a very little extent	1	4%
Total	26	100%

Table 4.12: The extent to which Prospecting influences Individual Behaviour in Investment

Source: Research Findings

4.6 Anchoring

4.6.1 Making Investment Decision Relying on any Information

The other focus of the study was to examine influence of anchoring on investment decision in Kenyan stock market. As such the respondents were requested to indicate their opinion on whether investors in stock market rely on some information as they make decision on investment. According to the study, all the respondents unanimously agreed that the investors in stock market rely on some information as they make decision on investment. The respondents indicated that some of the information that investors enquire includes that of the history for the organization they invest in, the latest performance of the organization and the target market for the investment in question.

4.6.2 Time at which the Investors Buy Shares Mostly

The study sought to establish the respondents view on when investors buy shares mostly. The results are shown in table 4.16. Majority of the respondents, shown by 79%, indicated that the investors mostly buy shares when stock price has fallen, 71% of the respondents indicated that the investors mostly buy shares when the share price is announced, 53% of them indicated that the investors mostly buy shares when the price is constant, while 47% of them thought that the investors mostly buy shares at any time.

Time of Duning Chause	Yes	;	No		
Time of Buying Shares	Frequency	Percent	Frequency	Percent	
When stock price has fallen	27	79%	7	21%	
When the price is constant	18	53%	16	47%	
When the share price is announced	24	71%	10	29%	
Any time	16	47%	18	53%	

Table 4.13: Time at which the Investors Buy Shares Mostly

Source: Research Findings

4.6.3 Extent that Investors' Overconfidence Accelerate their rate of Buying Shares

The respondents were requested to indicate the extent to which overconfidence of the investors accelerate their rate of buying shares. Table 4.17 shows the results. From the study, 44% of the respondents indicated that overconfidence of the investors accelerate their rate of buying shares

to a great extent. 38% of the respondents indicated that overconfidence of the investors accelerate their rate of buying shares to a very great extent. 14% indicated that overconfidence of the investors accelerate their rate of buying shares to a moderate extent, while 4% of them indicated that overconfidence of the investors accelerate their rate of buying shares to a little extent. Overconfidence is believed to improve persistence and determination, mental facility, and risk tolerance.



Figure 4.7: Extent to which Overconfidence of Investors Accelerate Rate of Buying Shares

Source: Research Findings

4.6.4 Extent to which Anchoring Influences Investors Decision Making

The study also sought to establish the extent to which anchoring influences investors decision making in stock market. The results are depicted in table 4.18. From the study, 58% of the respondents indicated that anchoring influences investors decision making in stock market to a great extent, 23% of the respondents indicated that anchoring influences investors decision making in stock market to a little extent, 15% of the respondents indicated to a moderate extent, while 4% of the respondents indicated that anchoring influences investors decision making in stock market to a very great extent. Overconfidence is believed to improve persistence and determination, mental facility, and risk tolerance.

Extent	Frequency	Percent
To a very great extent	1	4%
To a great extent	15	58%
To a moderate extent	4	15%
To a little extent	6	23%
Total	26	100%

Table 4.14: Extent to which Anchoring Influences Investors Decision Making

Source: Research Findings

4.7 Multiple Regression Analysis

To establish the relationship between the independent variables and the dependent variable of the study the study conducted inferential analysis which involved a coefficient of correlation, coefficient of determination and a multiple regression analysis.

4.7.1 Coefficient of Correlation

To compute the correlation (strength) between the study variables and their findings the researcher used the Karl Pearson's coefficient of correlation (r). From the findings, it was clear that there was a positive correlation between investment decision in stocks market and risk aversion as shown by a correlation figure of 0.518, it was also clear that there was a positive correlation between investment decision in stocks market and prospecting with a correlation figure of 0.542, there was also a positive correlation between Investment decision in stocks market and anchoring with a correlation value of 0.614 and a positive correlation between investment decision between investment decision between investment decision between investment decision in stocks market and herding with a correlation between investment decision in stocks market and herding with a correlation value of 0.746. This shows that there was a positive correlation between investment decision in stocks market and risk aversion, prospecting, anchoring and herding.

		Investment Decision in Stocks Market	Risk aversion	Prospecting	Anchoring	Herding
Investment Decision in Stocks Market	Pearson Correlation	1				
	Sig. (2-tailed)					
Risk aversion	Pearson Correlation	0.518	1			
	Sig. (2-tailed)	0.0032				
Prospecting	Pearson Correlation	0.542	0.3421	1		
	Sig. (2-tailed)	0.0021	0.0014			
Anchoring	Pearson Correlation	0.614	0.124	0.0621	1	
	Sig. (2-tailed)	0.0043	0.012	0.0043		
Herding	Pearson Correlation	0.746	0.342	0.1240	0.166	1
	Sig. (2-tailed)	0.0172	0.0031	0.0215	0.0031	
Source: Research F	indings	*				

Table 4.15: Coefficient of Correlation

4.7.2 Coefficient of Determination

The coefficient of determination was carried out to measure how well the statistical model was likely to predict future outcomes. The coefficient of determination, r^2 is the square of the sample correlation coefficient between outcomes and predicted values. As such it explains the extent to which changes in the dependent variable can be explained by the change in the independent variables or the percentage of variation in the dependent variable (investment decision in stocks market) that is explained by all the four independent variables (risk aversion, prospecting, anchoring and herding). The four independent variables that were studied (risk aversion,

prospecting, anchoring and herding) explain only 66.5% of the investment decision in stocks market as represented by the R². This therefore means the four independent variables only contribute about 66.5% to the investment decision in stocks market while other factors not studied in this research contribute 33.5% of investment decision in stocks market.

Table 4.16: Coefficient of Determination Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.816(a)	.665	.626	.48203

Source: Research Findings

Predictors: (Constant), risk aversion, prospecting, anchoring and herding.

4.7.3 Multiple Regression Analysis

The researcher further conducted a multiple regression analysis so as to identify the behavioural factors influencing investment decision in stock market in Kenya. Multiple regression is a statistical technique that allows the study to predict a score of one variable on the basis of their scores on several other variables. The main purpose of multiple regressions is to learn more about the relationship between several independent or predictor variables and a dependent or criterion variable. The researcher applied the statistical package for social sciences (SPSS) to code, enter and compute the measurements of the multiple regressions for the study.

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		В	Std. Error	Beta		
1	(Constant)	1.225	.223		2.349	.025
	Risk aversion	.504	.094	.006	.039	.036
	Prospecting	.523	.098	.425	2.846	.007
	Anchoring	.571	.070	.062	.449	.026
	Herding	.678	.082	.566	4.983	.000

Table 4.17: Multiple Regression Analysis

Source: Research Findings

Dependent Variable: Investment decision in stock market

The regression equation,

 $Y = \beta 0 + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + \alpha$ becomes:

 $Y = 1.225 + .504X_1 + .523X_2 + .571X_3 + .678X_4$

Where Y is the dependent variable (investment decision in stock market), X1 is the risk aversion independent variable, X2 is the prospecting independent variable, X3 is anchoring independent variable and X4 is herding.

From the regression equation established, taking all the factors (risk aversion, prospecting, anchoring and herding) constant at zero, the investment decision in stocks market would be 1.225. Further, if all the other variables are kept constant, a unit increase in herding will lead to a 0.678 success in investment decision in stocks market. A unit increase in anchoring will lead to a 0.572 success in investment decision in stock market, a unit increase in prospecting will lead to a 0.523 success in investment decision in stock market, while a unit increase in risk aversion will lead to a 0.504 success in investment decision in stock market. These results imply that herding contribute more to the investment decision in stock market followed by prospecting then prospecting, while risk aversion contributes the least to investment decision in stocks market.

4.8 Interpretation of the findings

The respondents were of the opinion that the investors in their organizations invest due to herding effect. The study findings conformed to Kallinterakis. Munir and Markovic (2010) who pointed that investors base their investment decisions on the masses' decisions of buying or selling stocks. The respondents agreed that their banks had experienced emotional biases and congruity in each case due to herding effect. Herding investors act the same ways as prehistoric men who had a little knowledge and information of the surrounding environment and gathered in groups to support each other and get safety (Caparrelli et al., 2004). The respondents agreed that herding causes a state of inefficient market, which is usually recognized by speculative bubbles. According to Caparrelli (2004) several elements impacts herding behaviour of an investor in reaching their investment decision such as overconfidence, volume of investment, and so on. The more confident the investors are, the more they rely on their private information for the

investment decisions. In this case, investors seem to be less interested in herding behaviours. When the investors put a large amount of capital into their investment, they tend to follow the others' actions to reduce the risks, at least in the way they feel. Most of the investors reach to their investment decision as a result of the available information about the market without clear information about stock market. This finding alluded to Waweru (2008) that herding can drive stock trading and create the momentum for stock trading. The respondents indicated that the investors in their organizations base their investment on gain they expect from the investment. Lehenkari and Perttunen (2004) pointed that both positive and negative returns in the past can boost the negative relationship between the investment trend and capital losses of investors, suggesting that investors are loss averse.

The respondents agreed that they experienced investors postponing their stock market investment till we assure them of the return. Positive returns boosts the selling trend and capital investment of the investors in their organization and their clients regard the benefit that the investment add to their investment values when investing to our organization. A risk-averse investor might choose to put his or her money into a bank account with a low but guaranteed interest rate, rather than into a stock that may have high returns, but also involves a chance of losing value (Barberis & Huang, 2001). Risk aversion influences investment decision of the individual in stock market. Risk aversion influences investment decision of the individual in stock market to a moderate extent. The stud finding reveals that investor considers risk aversion before making their investment decision. This finding backed Ritter, (2003) suggestion that if risk aversion is understood as a common behaviour of investor, nevertheless it may result in bad decision affecting investor's wealth. The respondents indicated that their organizations offer advice to the investors.

Investors avoid regret by seeking advice from their investment partners. Moreover, investors tend to be more regretful about holding losing stocks too long than selling winning ones too soon (Forgel & Berry, 2006). According to the results the respondents agreed that investors are used to selling their shares once they note they are not profit earning at early stage. People tend to under-weigh probable outcomes compared with certain ones and people response differently to the similar situations depending on the context of losses or gains in which they are presented. It describes some states of mind affecting an individual's decision-making processes including regret aversion, loss aversion and mental accounting (Waweru et al., 2004). The respondents indicated that they thought that prospecting influences individual behaviour in investment. The

CHAPTER FIVE: SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

5.1 Introduction

This chapter provides the summary of the findings from chapter four; it also gives the conclusions and recommendations of the study based on the objectives of the study.

5.2 Summary

From the study, majority of the respondents had attended a course of stock exchange. Most of the investment bank, investors had invested on a different values ranging from Ksh 40,001 to 60,000 for the last one month while few had invested only Ksh 10,000 and below.

On herding effect the study found that the investors in their organizations invest due to herding effect, this has resulted the bank to experience emotional biases and congruity. Herding causes a state of inefficient market, which is usually recognized by speculative bubbles, most of the investors seem to be less interested in herding behaviours while making decisions on investing in stock market and investors act the same way and rely on little knowledge and information from the surrounding environment and gather in groups to support each other and buy shares as a group hence influencing individual investor(s) to invest in stock market to a great extent. In regression equation, a unit increase in herding will lead to a 0.678 success in investment decision in stocks market. From the correlation analysis, it was clear that there was a positive correlation between investment decision in stocks market and herding with a correlation value of 0.746.

On risk aversion, the study established that the investors in the organizations base their investment on gain they expect from the investment, though there is frequent postponing in investing on stock market among investors till investment bank assure them of the return.

However, most of the investors have confidence in with investment bank as they are guaranteed of interest rate by investing in their investment partners. Past positive returns boosts the selling trend and capital investment of the investors within bank and the clients regard the benefit that the investment will add to their investment values when investing to the organization to a great extent. In regression equation, a unit increase in risk aversion will lead to a 0.504 success in investment decision in stock market. From the correlation analysis, it was clear that there was a positive correlation between investment decision in stocks market and risk aversion as shown by a correlation figure of 0.518.

Further the study established that prospecting influences the investment decision making in stock market, however, most of the organizations engage in advising inventors' on the ways to invest. The study also found that investors are used to selling their shares once they note they are not profit earning at early stage while others regretted investing in stock market due to past mistakes, more investors' lose hope due to experienced loss during their initial investment. Additionally, the survey noted that investors invest in the stock market basing their decision on a successful investment in the investment and mentoring investors who have incurred loss after gain persists to invest again as they assume the loss occurred due to economic situation of the country. The study also noted that prospecting influence investment decision to a great extent. In regression equation, a unit increase in prospecting will lead to a 0.523 success in investment decision in stock market. From the correlation analysis, it was clear that there was a positive correlation between investment decision in stocks market and prospecting with a correlation figure of 0.542.

The study finally found that anchoring influences the investment decision in Kenyan stock market. Availability of the information about stock market investment facilitates inventors' to reach investment decision. However, investors tend to buy shares when stock price has fallen as they gain overconfidence of increase in of the rate of buying shares to a great extent. In regression equation, unit increase in anchoring will lead to a 0.572 success in investment decision in stock market. From the correlation analysis, it was clear that there was a positive correlation between Investment decision in stocks market and anchoring with a correlation value of 0.614.

5.3 Conclusions

The study concludes that herding effect has an influence on the investment decision making in stock market amongst the investment banks in Kenya. Accordingly, the investors usually invest on stock market with specific prospects whereas the organizations offer advice to the investors. It is also clear from the study results that investors are used to selling their shares once they note they are not profit earning at early stage, some of the investors have regretted investing in stock market due to past mistakes, more investors' lose hope of investing in stock market if they experienced loss during their initial investment, investors invest in our organization basing their decision on a successful investment in the organization and investors who have incurred loss after gain persists to invest again as they assume the loss occurred due to economic situation of the country.

The study deduces that risk aversion influences investment decision of the individual in stock market and the investors in the organizations base their investment on gain they expect from the investment. The organizations experience investors postponing their stock market investment till they are assured of the return, most of the investors in the organization have confidence in the organizations as they are guaranteed of interest rate by investing in the banks, past positive returns boosts the selling trend and capital investment of the investors in our organization and the clients regard the benefit that the investment will add to their investment values when investing to the organization.

The study further concludes that prospecting influences the investment decision making in stock market. The investors invest on stock market with specific prospects and investments banks offer advice to the investors. The investors are used to selling their shares once they note they are not profit earning at early stage, some of the investors have regretted investing in stock market due to past mistakes, more investors' lose hope of investing in stock market if they experienced loss during their initial investment, investors invest through an investment bank basing their decision on a successful investment in through the said bank and investors who have incurred loss after gain persists to invest again as they assume the loss occurred due to economic situation of the country.

The study also established that anchoring has an influence on the investment decision in Kenyan stock market. The results also show that the investors in stock market rely on some information as they make decision on investment, majority of the investors mostly buy shares when stock price has fallen and overconfidence of the investors accelerate their rate of buying shares.

5.4 Recommendations for Policy

Based on the objectives of the study, the following recommendations were reached. The individual investors may simultaneously possess complex rational and irrational thinking logics in their investment behaviour. Individual investors follow the decision-making process to select financial products. As such before investing in stock markets, individual investors initially identify their investment demand, such as recognizing that investing in financial products may retain or increase their value, even able to achieve their financial goals and, then, start searching

for external and internal information and, finally, evaluating the alternatives or establishing the critical criteria for investment.

The study therefore recommends that since herding effect or behaviour is relevant to the individuals, market environment and atmosphere, the investment banks should give their investors the relevant information to ensure that they are well versed with the prevailing market and economic situations. Such an approach would ensure that the investment decisions that the investors make are feasible to realize the full benefits of investing in the stock market.

The study also recommends that since risk aversion influences investment decision of the individuals in stock market, there is need for the relevant investment banks to ensure that their investment in the stock market are well chosen to ensure the interests of the investors are well taken care of. This is mainly because some investors wait in anticipation that the stock price would return to their purchase price before they decide to sell it without rationally evaluating the situation or postponing their stock market investment till they are assured of the return. This would save the investors from incurring losses due to lower investor confidence or negative returns on their investments.

The study further recommends that since prospecting influences the investment decision making in stock market the investors respond differently to equivalent situations depending on whether it is presented in the context of a loss or a gain. With this view in mind the investment banks should ensure that their investments in the stock market are convincing the investors since the optimistic or pessimistic judgment about the future prospects from the business direction are widespread. Further stock prices of the organizations trading in the stock market should be predictably higher at times when most investors are in good moods than times they are in neutral or bad moods.

The study finally recommends that since anchoring has an influence on the investment decision in the stock market and mainly investors assume current prices are about right then the investors should be offered with the right information in the right time since it plays a role when investors form expectations about future returns. As such the relevant firms should cultivate the influence of this information by incorporating investors who are advanced in terms of experience, education level and gross annual income of a person. The financial economists in such organizations also need to advance solutions to reduce the incidence of these anchoring investment mistakes.

5.5 Limitations of the Study

A limitation for the purpose of this research was regarded as a factor that was present and contributed to the researcher getting either inadequate information or if otherwise the response given would have been totally different from what the researcher expected. The main limitations of this study were: Some target respondents refused to fill in the questionnaires citing that the information was of a sensitive nature and could be used for other purposes other than the intended one.

The study was also limited in terms of resources. The resource available to go to the field and ascertain whether the information being provided was the reality of whatever happens in real sense was limited. This forced the researcher to wholesomely rely on the information provided by the respondents.

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5.6 Suggestions for Further Research

The study has assessed the behavioural factors influencing investment decision in stock market in Kenya where the investment banks were involved and established that risk aversion. prospecting, anchoring and herding are the main behavioural factors influencing investment decision in stock market in Kenya. The investments in the stock market in Kenya however done by various individuals as well as different companies who differ in their way of management and have different settings all together. This warrants the need for another study which would ensure generalization of the study findings for all the behavioural factors influencing investment decision in stock market in Kenya and hence pave way for new policies. The study therefore recommends another study be done with an aim to investigate the behavioural factors influencing investment decision in stock market in Kenya where the focus will be on the individual and corporate investors in the stock market in Kenya.

This study also recommends that another study be done on the investing behaviour of to be adopted by different clients at the NSE in terms of growth and value stocks so that it established the classifications of the stocks and the type of clients purchasing and selling the shares. This will help inform the development of policies and guidelines on the governance of listed companies.

This study also recommends that another study be done on the relationship between NSE performance and economic development in Kenya. This will help establish the relevance of the NSE in the arena of economic development and inform of the ways in which this may be improved to ensure higher economic growth.

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APPENDIXES

1. Questionnaire

SECTION A: PERSONAL INFORMATION

1.	Indicate name of your ba	ink (opt	ional)		• • • •			•••••
2.	What is your gender?							
	Male	[]	F	emale	[]		
3.	What is your age?							
	18 to 25 years	[]	20	6 to 35 years	[]	36 - 45 years	[]
	46 to 55 years	[]	0	ver 55 years	[]		
4.	Please indicate your edu	cation le	evel?					
	High school and lower	[]	U	nder-graduate	[]	Graduate	[]
	Master	[]	Р	hD degree	[]	Others	
5.	For how long have you	been wo	rking in th	is bank?				
	Less than 1 Year	[]	1	-2 Years	[]	3 to 5 years	[]
	6 to 7 years	[]	Ν	fore than 7 years	[]		
6.	Have you attended any o	course o	f Stock Ex	change?				
	Yes	[]	N	lot yet	[]		
7.	Kindly indicate the total	amount	t of money	in Kenya shillings	tha	t invo	estors have inv	vested at
	your organization over the last month? (average)							
	Ksh 10,000 and belo	W	[]	Ksh 10,001 te	o 20	0,000) []	
	Ksh 20,001 to 40,00	0	[]	Ksh 40,001 te	0 6	0,000) []	
	Over Ksh 60.000		[]					

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SECTION B: INVESTOR INFORMATION

8. Do you think investor in your organization make investment decisions based on the masses' decisions of buying or selling stocks?

Yes [] No []

- 9. Has your organization experienced the following behaviour from the investors? (tick all that apply)
 - Believe investment will bear positive returns even where there is evidence to the contrary
 - Reluctance to accept hard facts that are unpleasant []
 - Making investment decision that seems influenced by others []
 - Unable to make investment decision due exhibiting conflicting positions []

10. To what extent do you agree with the following statement relating to individual investors on

investment decision making on stock market?

Where 1- Strongly Disagree, 2 - Disagree, 3- Neutral, 4 - Agree, 5- Strongly Agree

-6	1	2	3	4	5
Investors base their investment decisions on the masses' decisions of buying or selling stocks					
Most of our clients are informed and rational investors					
Investors act the same ways and rely on information gathered in groups to support each other and buys shares					
Most of the investors seem to be less interested in following masses on investing at stock market					

Following masses causes a state of inefficient market, which is usually recognized by speculative bubbles	
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11. To what extent do you think the masses influence individual investor in stock market?

- To a very little extent
 []
 To a great extent
 []

 To a little extent
 []
 To a very great extent
 []
- To moderate extent []
- 12. Do investors in your organization base their investment on gain they expect from the investment?

Yes [] No []

13. To what extent do you agree with the following statements regarding individual investors?

Where, 1- Strongly Disagree, 2 – Disagree, 3- Neutral, 4 – Agree, 5- Strongly Agree

	1	2	3	4	5
Our clients regard the benefit that the investment will add to their investment values when investing to our organization					
Past positive returns boosts the selling trend and capital investment of the investors in our organization					
Most of the investors in our organization have confidence in us as they are guaranteed of interest rate by investing in our bank					
We experienced investors postponing their stock market investment till we assure them of the return					

14. To what extent do you think uncertainty influences investment decision of the individual in stock market?

To a very little extent	[]	To a great extent	[]
To a little extent	[]	To a very great extent	[]
To moderate extent	[]		
15. Do you think investors	invest on sto	ock market with specific expecta	ations?
Yes	[]	No	[]
16. Does your organization	offer advice	e to the investor?	
Yes	[]	No	[]

17. Kindly indicate your level of agreement with the statements below relating to individual investment decision.

Where 1- Strongly Disagree, 2 – Disagree 3- Neutral, 4-Agree, 5- Strongly Agree

	1	2	3	4	5
Investor invests in our organization basing their decision on a successful investor in our organization					
Some of the investors have regretted of investing in stock market due to mistake that they did					
Investors are used to sell their shares once they note they are not profit earning at \early stage.					
More investors' lose hope to invest in stock market if they experienced loss during their initial investment					
Investors who have incurred loss after gain persists to invest again as they assume the loss occurred due to economic situation of the country					,

	18.	To what extent	do you thi	nk subjective	decision	making	influences	individual	investors?
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	To a very little extent	[]	To a great extent	[]
	To a little extent	[]	To a very great extent	[]
	To moderate extent	[]		
19.	Do you think investors in sto	ock market r	ely heavily on one piece of inf	ormation and ignore
	others while making decision	on investme	ent?	
	Yes	[]	No	[]
	If yes in 19 above, highlight s	some of the	information that investors enqu	ire?
20.	When do investors buy share r	nostly?		
	When stock price has falle	n	[]	
	When the price is constant		[]	

When the share price is announced Any time []

21. To what extent do investors apply subjective judgment over objective judgment in buying shares? -

[]

To a very little extent	[]	To a great extent	[]
To a little extent	[]	To a very great extent	[]
To moderate extent	[]		

22. To what extent does relying one piece of information influence investors decision making in stock market?

	To a very little extent	[]	To a great extent	[]
	To a little extent	[]	To a very great extent	[]
	To moderate extent	[]		
23.	In your own opinion what show	uld it be done to	o ensure public know how of t	he shares stock?

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THANK YOU FOR YOUR TIME

2. List of Investment Banks

- 1. African Alliance Kenya Investment Bank limited
- 2. Afrika Investment Bank Limited
- 3. Apex Africa Investment Bank Limited
- 4. Barclays Financial Services Limited
- 5. CBA Capital Limited
- 6. CFC Stanbic Financial Services Limited
- 7. Drummond Investment Bank Limited
- 8. Dyer and Blair Investment Bank Limited
- 9. Equatorial Capital Services Limited
- 10. Faida Investment Bank Limited
- 11. Juanco Investments Limited
- 12. Kestrel Capital (East Africa) Limited
- 13. NIC Capital Limited
- 14. Renaissance Capital (Kenya) Limited
- 15. Standard Investment Bank Limited
- 16. Sterling Investment Bank Limited
- 17. Suntra Investment Bank Limited

3. Companies Listed at NSE

AGRICULTURAL

- 1 Eaagads Ltd Ord 1.25
- 2 Kapchorua Tea Co. Ltd Ord Ord 5.00

d.

- 3 Kakuzi Ord.5.00
- 4 Limuru Tea Co. Ltd Ord 20.00
- 5 Rea Vipingo Plantations Ltd Ord 5.00
- 6 Sasini Ltd Ord 1.00
- 7 Williamson Tea Kenya Ltd Ord 5.00

COMMERCIAL AND SERVICES

- 8 Express Ltd Ord 5.00
- 9 Kenya Airways Ltd Ord 5.00
- 10 Nation Media Group Ord. 2.50
- 11 Standard Group Ltd Ord 5.00
- 12 TPS Eastern Africa (Serena) Ltd-Ord 1.00
- 13 Scangroup Ltd Ord 1.00
- 14 Uchumi Supermarket Ltd Ord 5.00
- 15 Hutchings Biemer Ltd Ord 5.00
- 16 Longhorn Kenya Ltd

TELECOMMUNICATION AND TECHNOLOGY

- 17 AccessKenya Group Ltd Ord. 1.00
- 18 Safaricom Ltd Ord 0.05

AUTOMOBILES AND ACCESSORIES

- 19 Car and General (K) Ltd Ord 5.00
- 20 CMC Holdings Ltd Ord 0.50
- 21 Sameer Africa Ltd Ord 5.00
- 22 Marshalls (E.A.) Ltd Ord 5.00

BANKING

- 23 Barclays Bank Ltd Ord 2.00
- 24 CFC Stanbic Holdings Ltd ord.5.00
- 25 Diamond Trust Bank Kenya Ltd Ord 4.00
- 26 Housing Finance Co Ltd Ord 5.00
- 27 Kenya Commercial Bank Ltd Ord 1.00
- 28 National Bank of Kenya Ltd Ord 5.00
- 29 NIC Bank Ltd 0rd 5.00
- 30 Standard Chartered Bank Ltd Ord 5.00
- 31 Equity Bank Ltd Ord 0.50
- 32 The Co-operative Bank of Kenya Ltd Ord 1.00

INSURANCE

- 33 Jubilee Holdings Ltd Ord 5.00
- 34 Pan Africa Insurance Holdings Ltd 0rd 5.00
- 35 Kenya Re-Insurance Corporation Ltd Ord 2.50
- 36 CFC Insurance Holdings
- 37 British-American Investments Company (Kenya) Ltd Ord 0.10
- 38 CIC Insurance Group Ltd Ord 1.00

INVESTMENT

- 39 City Trust Ltd Ord 5.00
- 40 Olympia Capital Holdings ltd Ord 5.00
- 41 Centum Investment Co Ltd Ord 0.50
- 42 Trans-Century Ltd

MANUFACTURING AND ALLIED

- 43 B.O.C Kenya Ltd Ord 5.00
- 44 British American Tobacco Kenya Ltd Ord 10.00
- 45 Carbacid Investments Ltd Ord 5.00
- 46 East African Breweries Ltd Ord 2.00
- 47 Mumias Sugar Co. Ltd Ord 2.00
- 48 Unga Group Ltd Ord 5.00
- 49 Eveready East Africa Ltd Ord.1.00
- 50 Kenya Orchards Ltd Ord 5.00

MANUFACTURING AND ALLIED

51 A.Baumann CO Ltd Ord 5.00

CONSTRUCTION AND ALLIED

- 52 Athi River Mining Ord 5.00
- 53 Bamburi Cement Ltd Ord 5.00
- 54 Crown Berger Ltd 0rd 5.00
- 55 E.A.Cables Ltd Ord 0.50
- 56 E.A.Portland Cement Ltd Ord 5.00

ENERGY AND PETROLEUM

57 KenolKobil Ltd Ord 0.05

- 58 Total Kenya Ltd Ord 5.00
- 59 KenGen Ltd Ord. 2.50
- 60 Kenya Power & Lighting Co Ltd