THE EFFECTS OF FOREIGN EXCHANGE EXPOSURE ON THE PERFORMANCE OF FLORICULTURE FIRMS IN KENYA

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DECLARATION

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

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LIST OF ABBREVIATIONS

CBK   Central Bank of Kenya

FX   Foreign Exchange

GBP   Great Britain Pound

JPY   Japanese Yen

KFC   Kenya Flower Council

NBFIs   Non-Bank Financial Institutions

NFI   Non-Funded Income

ROA   Return on Assets

SPSS   Statistical packaging of Social Sciences

USD   United States Dollar.

ZAR   South African Rand

ABSTRACT

The objectives of this study were to determine the effect of foreign exchange risk management practices on the financial performance of flower firms in Kenya. The research used a descriptive survey research design. The descriptive survey was ideal because it ensured thorough description of the situation ensuring least possible bias in data collection. The study made use of secondary data collected from annual reports submitted to the flower council of Kenya and KNBS for the target population comprised of all the flower firms in Kenya. Summaries of data findings together with their possible interpretations were presented using tables, charts, correlations, standard deviations and regression. The study found out that mean of Forward Contracts is relatively high as compared to other variables while Currency Swaps had the highest standard deviation. Options had the highest positive correlation. Swaps and forward contracts also had high and positive correlation to the return. From the regression equation the study concluded that a unit increase in forward contracts, cross- currency swaps and options would lead to improvement on return on assets. Therefore; the study recommends that; foreign exchange risk management should always be taken in to account to improve the banks return on assets and hence the performance of the banks. Policy makers should also undertake to understand risks affecting the foreign exchange markets in order to maximize returns.

CHAPTER ONE

INTRODUCTION

1.1 Background of the Study

Foreign exchange exposure alludes to the affectability of an organizations money streams, real domestic currency value of assets, liabilities, or working salaries to unexpected changes in return rates. This study builds up a model of outside trade presentation reliant on just two factors: the rate of the company's incomes designated in remote money and its net resources. The study is to see if outside trade presentation is entirely low where firms have possessed the capacity to coordinate their remote coin incomes abandoning them with minimal net introduction. Notwithstanding designating corporate duties, a careful outside trade strategy must determine endorsed systems for supporting exposures (Resnick, 1988).

This framework was supplanted by a coasting rates framework in which case the cost of coinage is dictated by free market activity of cash. Given the successive changes of free market activity affected by various outside components, this new framework is in charge of cash vacillations (Abor, 2005). These changes open organizations to outside trade hazard. In addition, economies are getting increasingly open with universal exchanging steady increment and subsequently, organizations turn out to be more presented to foreign exchange variances.

1.1.1 Foreign Exchange Exposure

For the most part, organizations are presented to three sorts of foreign exchange: bookkeeping (interpretation) presentation, exchange (responsibility) introduction and financial (operational, focused or income) introduction (Eiteman et al., 2006). By and by, monetary introduction is processed as the net affectability of some total measure of firm

esteem to coin vacillations. By concentrating on the net affectability, monetary introduction incorporates the immediate and aberrant impacts of coin changes. By and by, there is little agreement on the utilization of fitting decision of total measure.

Swapping scale developments influence both the costs of imported completed merchandise and the expenses of imported data sources, accordingly affecting in a roundabout way those organizations that contend with such firms (Grambovas and McLeay, 2006).

foreign currency exposures emerge at whatever point an organization has a salary or use or a benefit or risk in a coin other than that of the asset report cash. For sure exposures can emerge notwithstanding for organizations with no salary, use, resource or risk in a money not quite the same as the asset report coin. At the point when there is a condition predominant where the trade rates turn out to be to a great degree unstable the conversion scale developments destabilize the money streams of a business fundamentally. Such destabilization of money streams that influences the productivity of the business is the hazard from outside cash exposures. Trade rates may influence a firm through an assortment of business operation models: a firm may deliver at home for fare deals and additionally residential deals, a firm may create with foreign made and additionally local parts, and a firm may create a similar item or an alternate item at plants abroad. The model of the firm should be sufficiently expansive to catch these channels (Eun and Resnick, 1988).

1.1.2 Performance of Floriculture Industry in Kenya

Gross profit is the distinction amongst income and cost of merchandise sold. Gross Margin refers to gross profit proportion to income. Relies on upon circumstance or choice dissected the two or one of these execution markers can be more appropriate. Net benefits are the cleanest bookkeeping measure of genuine monetary gainfulness. The more distant down the

wage explanation one goes, the more dirtied productivity measures get to be, and the less related they are to true economic profitability. All things being equal, it can undoubtedly have bring down profit than its rivals (Abor, 2005).

The Return on Assets proportion (ROA), additionally called quantifiable profit, is a vital gainfulness proportion since it quantifies the proficiency with which the association is managing its enthusiasm for assets and using them to make profit. It evaluates the measure of advantage earned concerning the organization's level of enthusiasm for hard and fast assets. The landing on assets extent is related to the regale organization class of money related extents. The estimation for the arrival on resources proportion is: gross Income/Total Assets (Brealey et al, 2008).

Estimation of money related execution can be by and large be landed at by the accompanying main considerations; length or time of operation, introduction to outside business sectors or trade and size of the bank or establishment. Different execution measures are accessible which incorporate profit for resources, return on value, return on income, turnover, piece of the pie, number of items among others. In this study, execution will be measured by Return on Assets.

1.1.3 Floriculture Industry in Kenya

Agriculture represents around 24% of Kenya's GDP with an expected 75% of the populace relying upon the area either straightforwardly or in a roundabout way. A great part of the discontinuous quality and general shortcoming in GDP and salary development in Kenya can be credited to changes in agricultural execution. The cultivation sub-division of farming has developed in the most recent decade to end up a noteworthy outside trade worker, manager

and patron to sustenance needs in the nation. As of now the cultivation business is the quickest developing farming sub-area in the nation and is positioned third regarding outside trade profit from fares after tourism and tea. Organic products, vegetable and cut blossom creation are the principle parts of plant generation in Kenya.

Kenya has a long history of developing agricultural harvests for both local and fare markets. Kenya's optimal tropical and mild climatic condition makes it ideal for cultivation generation and advancement. The atmosphere is profoundly changed supporting the development of an extensive variety of agricultural yields. Cultivation in Kenya is predominantly rain bolstered however various ranches, particularly the ones developing green products for fare, likewise utilize water system. The sub-part is described by a colossal differences as far as homestead sizes, assortment of create, and topographical territory of generation. Cultivate sizes go from extensive scale bequests with significant interests in water system and abnormal state utilization of sources of info, enlisted work and gifted administration to little scale ranches, more often than not under one section of land.

Horticulture is a profoundly concentrated industry and capital serious. The foundation required for the generation of floricultural items is extremely costly and the real creation per hectare is high. Exchange cut blossoms has turned into a vital section of global exchange plant items.

1.2 Research Problem

Exchange rate movement in Kenya has been variable with times of quick devaluation of the domestic cash Kenya Shilling, which antagonistically influence the Kenyan economy. Despite the fact that studies have been directed on the conversion scale administrations and

the suggestions for macroeconomic administration and additionally overseeing foreign exchange chance (Abor, 2005), next to no has been done on the investigation of the firm introduction to trade chance in Kenya. It is in this setting this exploration is to assess the impacts (assuming any) that varieties in the conversion scale have in the budgetary execution of horticulture industry in Kenya.

Various studies (Robinson, 1995; Chance and Lane, 1980; Flannery, 1981 and 1983; Houpt and Embertsi, 1991) have inspected the degree of banks" introduction to loan fee chance. A large portion of these studies have utilized information on how bank stock costs respond to financing cost developments. Bank stock returns that react to unforeseen changes in financing costs show that banks are presented to loan fee hazard. Different studies utilize bank bookkeeping information to deduce the normal development structure of advantages and liabilities and to judge the long-run impact on banks" gainfulness from changes in loan fees (Robinson, 1995).

An empirical study conducted in Kenya (Cherutoi, 2006) sought to establish the extent to which commercial banks are exposed to foreign exchange risk. While applying an augmented market model, Cherutoi (2006) regressed the Nairobi Stock Exchange (NSE)-share and banking sector indices against the daily percentage changes in US$/Kshs exchange rate. The study established that there is a high exposure of commercial banks in Kenya to FOREX risk. Given the volume of interest-rate transactions that are conducted daily within the banking sector, there was need therefore to establish the extent of exposure to interest rate risks in order to ensure that that commercial banks returns are commensurate with associated risks.

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Wekesa (2012) led a study on relationship between remote trade hazard administration and benefit of carriers in Kenya and discovered that the aircrafts completely supported utilizing advances, fates and cash contracts however they mostly supported choices and swaps yet neglected to interface outside coin hazard to operational expenses.

Anene (2011) contemplated the conduct of stock costs at the Nairobi Securities trade and inferred that the general instability of the money has a winding impact of stock costs, henceforth making them change with foreign exchange vacillations. Assist thinks about have inferred that financial influence and different components alongside coin interpretation impacts impact stock costs and returns.

1.3 Research Objectives

The objective of this study is to investigate on the effect of foreign exchange exposure on performance of floriculture industry in Kenya.

1.4 Value of the Study

The study is beneficial to a number of parties. First, it will benefit the players in the stocks' market as they address the foreign exchange risk exposures and how it affects their operations, as well as the management strategies they can use to minimize the losses incurred due to the exposure.

Other firms that deal in inter-country trade (other multinational corporations not listed in the Nairobi Stock Exchange) will also benefit through the lessons on the valuation of shares as affected by the operating foreign exchange exposures. These players will also benefit from the recommendations the study will make.

The study will assist who can validate the model in similar firms elsewhere in the world. Further, the study also provides a source of motivation for future studies based on the areas of further study that will be recommended. The purpose of this study is to evaluate the effect of exchange rate exposure through a survey of floriculture industry to show course and showcase how flower firms are exposed by currency movements.

2.1 Introduction

This chapter considers literature relevant to the subject under study. The section includes; the theoretical literature review, determinants of non-funded income, empirical literature review and summary to the literature.

2.2 Theoretical review

This section gives a brief overview of the foreign exchange theories which include the purchasing power parity (PPP) theory; international fisher effect theory; and interest rate parity theory.

2.2.1 The Purchasing Power Parity Theory

According to the Purchasing power parity (PPP) theory under a floating exchange regime, a relative change in gaining power uniformity for any match of coin figured as an esteem extent of traded items would tend to be approximated by a conformity to be determined rate of exchange between these two money related structures (Shapiro and Rutenberg,1996).The relationship between relative financing costs and outside trade rates is elucidated inside the loan cost hypothesis of trade scale wants. Apparent financing cost differentials between two countries tend to reflect transformation standard differences.

It asks how much cash would be expected to buy similar merchandise and enterprises in two nations, and utilizations that to figure an understood outside conversion scale. Utilizing that PPP rate, a measure of cash in this way has a similar acquiring power in various nations (Lawrence, 1992).

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2.2.2 International Fisher Effect Theory

The International Fisher Effect (IFE) theory recommends that foreign currency standards with generally high loan fees will have a tendency to devalue in light of the fact that the high ostensible financing costs reflect expected rate of expansion (Madura, 2010).

The hypothesis expresses that the cash of a country with a similarly higher interest rate will deteriorate in esteem in contrast with the money of a country with a nearly bring down financing cost (Hill, 2004). The concentrate likewise expresses that the degree of devaluation will be equivalent to the distinction in loan fees in those two countries. It depends on the perception that the level of real financing cost in an economy is firmly connected to the level of local inflation rate and is free of an administration's fiscal approaches. In this way, all in all, the higher the inflation rate, the lower the estimation of cash.

2.2.3 Interest Rate Parity Theory

Interest Rate Parity (IPR) theory is utilized to investigate the relationship between the spot rate and a looking at forward (future) rate of monetary forms. The IPR speculation states loan cost differentials between two one of kind monetary standards will be reflected in the premium or markdown for the forward trade rates on the money if there no arbitrage the development of buying shares or coin in one budgetary market and offering it at an advantage in another (Yuhang, 2007).

The hypothesis states size of the forward premium or markdown on an outside coin ought to be equivalent to the loan cost differentials between the nations in correlation. In the event that IRP hypothesis holds then arbitrage in unrealistic. Regardless of whether a financial specialist puts resources into household nation or outside nation, the rate of return will be the

same as though a speculator put resources into the nation of origin when measured in domestic currency. In the event that domestic interests are not exactly outside financing costs, foreign currency must exchange at forward markdown to counterbalance any profit of higher financing costs in outside nation to avoid arbitrage (Jonathan, 2005). On the off chance that foreign currency does not exchange at a forward markdown or if the forward rebate is not sufficiently huge to counterbalance the loan cost favorable position of foreign nation, arbitrage opportunity would exist for local financial specialists. domestic financial specialists can profit by putting resources into the foreign market. On the off chance that domestic interest are more than foreign financing costs, outside coin must exchange at a forward premium to balance any profit of higher interests in local nation to avert arbitrage. Be that as it may, if foreign exchange does not exchange at a forward premium or if the forward premium is not sufficiently extensive to balance the financing cost preferred standpoint of domestic nation, arbitrage opportunity exists for foreign investor and remote financial specialists can profit by putting resources into the residential market. As per Bruce (2011).In late years the loan cost equality demonstrate has indicated minimal verification of working.

2.2.4 Financial Intermediation Theory

The financial intermediation theory was developed by Gurley and Shaw (1960). It is based on the theory of informational asymmetry and the agency theory. A banks core activity is to go about as a financial intermediary. It pays enthusiasm to contributors, while it gets wage from the borrowers. The premium salary got from borrowers is higher than that paid to contributors, since the bank must be compensated for administrations rendered additionally for the hazard it takes keeping in mind the end goal to loan cash to outsiders. The way that banks have generally extensive quantities of clients implies that they have potential

purchasers of other bank as well as non –bank related administrations like protection ,bank certification ,stock financier ,calculating ,resource administration and different administrations (Karlos, 2009).

Throughout the years and as per distinctive needs and conditions, a few sorts of managing an account foundations have developed, for example, Commercial banks which offer center saving money exercises, which are budgetary intermediation and offering of liquidity. However a few banks offer about any administration on the money related range; they can be arranged as corporate or retail contingent upon demographic. At long last, Merchant banks which initially charged an expense to ensure customers' bills of trade. Thusly they furnished their customers with liquidity in time. These banks have developed and are considered as speculation banks. In the event that a keeping money gathering is sufficiently huge so as to have the capacity to render a more extensive range of monetary administrations it can be thought to be a budgetary combination, these organizations advantage from economies of scale and degree and additionally high number of clients which they can offer a variety of administrations (Karlos, 2009).

2.3 Determinants of Performance

Commercial banks offer a wide range of financial services and the increasing level of information, has led people to invest and to offer funds in money markets. Technological progress has allowed the banks develop new products and services for which they can charge fee income. Deregulation has also widened the field of services that banks can provide hence leading to extra income beyond interest income (Karlos, 2009).

2.3.1 Size of the Flower Firms

The size of the flower firms is clearly liable to impact the greatness of its engagement in acquiring exercises. As indicated by Rogers and Sinkey (1999), the most evident component identified with the level of execution is firm size. They set that cooperation in certain nontraditional exercises for the most part requires some level of specialization for the bank which might be accomplished through the enlistment of staff with exceptional information and the obtaining of cutting edge innovation.

The size of a firm can positively affects performance measured; the size of the organization can positively affect budgetary execution on the grounds that bigger firms can utilize this preferred standpoint to get some monetary advantages in business relations (Mathur and Kenyon, 1997). Extensive organizations have less demanding access to the most imperative elements of generation, including HR. Likewise; vast associations frequently get less expensive financing.

In the established hypothesis, capital structure is unessential for measuring organization execution, considering that in a splendidly aggressive world execution is affected just by genuine variables. Late studies negate this hypothesis, contending that capital structure assume a vital part in deciding corporate execution (Kakani, Biswatosh and Reddy, 2001). Barton and Gordon (1988) propose that substances with higher benefit rates will stay low utilized on account of their capacity to back their own particular sources. Then again, a high level of influence builds the danger of insolvency of organizations. Add up to resources are considered to emphatically impact the organization's money related execution, resources more prominent importance less hazard (Beaver, Ketller and Scholes, 2000). Large firms tend to be more diversified and fail less often, enabling the firms to use more debt, tolerating

high debt ratios. The certainty of easier access to debt and better borrowing conditions reduces the transaction costs and tax rates making large firms more easily to attract a debt.

2.3.2 Interest Rate

Interest rate is the value a borrower pays for the utilization of cash they obtain from a loan specialist/budgetary foundation or expense paid on acquired resources (Crowley, 2007). Premium can be considered as "lease of cash". Loan costs are principal to an entrepreneur society and are regularly communicated as a rate more than one year. Financing cost as a cost of cash shows advertise data concerning likely change in the buying influence of cash or future expansion (Ngugi, 2001). Money related foundations encourage activation of investment funds, broadening, pooling of dangers and assignment of assets (Collins and Wanjau, 2011). Be that as it may, since the receipts for stores and advances are not orchestrated, go-betweens like banks bring about specific costs (Ngugi, 2001).

They charge a cost for the intermediation administrations offered under vulnerability and setthe financing cost levels for stores and credits. Rhyne (2002) divergence between the gross expenses of acquiring and the net profit for loaning characterizes the middle person costs which incorporate data costs, exchange costs, organization, default costs and operational expenses

2.3.3 Foreign Customers

Cut flowers are advanced blandly through industry affiliations and other deliberate associations. The KFC the biggest willful advertising program for blooms and plants in the Kenya. Botanical wire administrations, for example, Florists' Tran world Delivery (FTD) and Teleflora, are systems of overall flower specialists who have consented to trade away bloom

orders set by phone or over the Internet. These associations likewise lead national publicizing effort. U.S. furthermore, Colombian cultivators advance blooms in the United States advertise through the Flower Promotion Organization, a deliberate course of action they framed to support transient and long haul interest for blossoms.

A required national advertising exertion, comparative in structure to national advancement orders for different products, was created in the mid-1990s, however was ended soon after its organization. The cultivator supported program, in which evaluations of 0.5 percent of gross deals were to create $10-12 million for limited time exercises, was formally sorted out in 1996.

2.3.4 Inflation

This is the rise in the general level of costs cited in units of cash. The extent of expansion or the swelling rate is typically reported as the annualized rate development of some wide list of cash costs (White, 2008). Expansion is essentially adversely related with the exhibitions of business banks. This is likely because of the way that inflation could influence the esteem for cash, obtaining force of individuals and the real interest that banks charge and get.

2.4 Empirical Studies

The expanding significance of non-interest income (NII), especially as of late, has fortified research on the components which have supported its execution. Universal proof has demonstrated that bank qualities and in addition natural components, for example, deregulation, globalization, and interest in innovation and improvements in the money related design have had huge impact in clarifying patterns in NII. Caribbean, Craigwell and Maxwell (2005) demonstrated that ATM innovation and bank-particular qualities in Barbados were the

fundamental components impacting the execution in non-premium salary at these banks over the period 1985 to 2001. All the more particularly, these bank-particular elements incorporated the sythesis of the credit portfolio and also the level of individual administration offered by the managing an account organization.

The expanding dependence on non-premium wage by business banks has additionally been formed by the expanded unmistakable quality of ATM and POS innovation. Besides, an investigation of the information has uncovered that solid speeding up in the pace of development in non-premium wage matched with times of increased macroeconomic unpredictability. The way that monetary conditions is a critical determinant of non-intrigue pay, is bolstered by the De Young and Rice (2004) investigation of U.S. business bank information over the period 1989 to 2001. Non-premium wage is the part of a bank's income that is not created by its enthusiasm bearing business. NII can by and large be partitioned into commission and charge exercises and exchanging exercises. The segments of non-premium wage at Jamaica banks incorporates benefit charges, exchange expenses and commissions, profits and exchanging benefits on securities, outside trade additions and misfortunes and other pay.

DeYoung and Roland (2001) proposed and clarified three reasons why non-premium wage may expand the instability of bank income. In the first place, advances that are held in a bank's portfolio particularly credits to organizations are relationship based. Second, a bank that moves its item blend from conventional resource based enthusiasm creating exercises to nontraditional charge based exercises tends to expand its "level of working influence". Third, most charge based exercises oblige banks to hold next to zero settled resources, so dissimilar to premium based exercises like portfolio loaning, expense based exercises like trust

administrations, common store deals, and money administration require almost no administrative capital.

Lozano-Vivas and Pasiouras (2010) examined the significance of non-conventional exercises in the estimation of bank effectiveness levels and found that, all things considered, cost productivity expanded independent of whether pay from non-premium sources were utilized, despite the fact that the outcomes revenue driven proficiency were blended. This means the importance of bank's non-enthusiasm acquiring exercises in evaluating their productivity.

Mugendi (2002) analyzes the vital role Microfinance institutions play in the economic advancement of numerous developing nations through the arrangement of an extensive variety of money related items and administrations to poor people, low-salary families and smaller scale and little ventures.

The study was modeled on a descriptive design. The population of interest in this study consisted of forty-five commercial banks. Based on the findings, it was concluded that majority of the commercial banks do offer services through the customers' mobile phones. It can also be concluded that commercial banks use mobile services for purposes of accounts request and the maintenance of high quality service is extremely important for the commercial banks in the Kenyan banking industry. Commercial banks management should change their perception on cost leadership, market share leadership and technology leadership in order to take advantage of the mobile banking technology in the growth of the banking industry.

Chen (2009) in his study utilized bank level information to concentrate on the effectiveness of banks in Sub-Saharan African center pay nations and give conceivable clarifications to the distinction in the proficiency levels of banks. It was found that banks, by and large, could spare 20-30 percent of their aggregate expenses on the off chance that they were working effectively, and that outside banks are more proficient than open banks and household private banks. Among the components that could influence the productivity levels are macroeconomic soundness, profundity of monetary improvement, the level of market rivalry, solid lawful rights and contract laws, and better administration, including political strength and government adequacy. Our discoveries indicate the significance of strategies that mean to construct more grounded organizations, advance more rivalry, and enhance administration.

Busch and Kick (2009) investigated the determinants of non-premium wage and its effect on budgetary execution and the hazard profile of German banks somewhere around 1995 and 2007. They discovered that exact proof for all German all inclusive bans chance balanced profits for value and aggregate resources are decidedly influenced by higher expense pay exercises. Furthermore, for business banks they demonstrate that a solid engagement in expense producing exercises obliges higher hazard. With a specific end goal to dissect conceivable cross-sponsorship impacts amongst premium and expense business they likewise inspected how banks' extension in charge based administrations has influenced their advantage edge. For investment funds and business banks they found that organizations with a solid concentrate on expense business charge bring down premium edges when credit hazard is controlled.

Williams and Rajaguru (2010) concentrated on the time arrangement relationship between bank non-premium pay and bank net premium edges in Australia utilizing board vector auto

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relapses. It is found that increments in bank non-premium salary are being utilized to supplement diminishes in net premium edges, however that the size of the expansion innon-premium wage is littler than the abatement in net premium edges. It is likewise found that increments in non-premium pay pre-date decreases in edge wage, recommending that Australian banks were genius dynamic during the time spent disintermediation. The office dangers of expanded bank non-premium pay are investigated from the viewpoints of controllers, customers, bank shareholders, borrowers and bank administration.

2.5 Summary of Literature Review

The diversity of flower firms operations in recent times has become a subject of interest to the management of these companies, regulators, customers and other stakeholders. Most studies reviewed established some factors common in flower firms and in the agricultural sector as a whole engagement in foreign exchange operations. They found that income, exposure to risk and liquidity are the main driving factors of flower firms operations. Reviews of literature studies have identified several knowledge gaps in the effect of foreign exchange exposure on the financial performance of flower firms and other financial institutions.

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

This chapter provides a discussion of the methodology that was used in the study. It outlines the overall methodology that was used to carry out the research. It encompasses the research design, the research population, data collection methods and analysis of data which aided in achieving the study objectives.

3.2 Research Design

A research design is the arrangement of conditions for information accumulation and examination of information in a way that mean to consolidate pertinence to research reason with economy in research system and choices in regards to an exploration think about.

Research design may also be viewed as the framework that indicates the type of information that is needed for the research, the source of such information and method of its collection. The descriptive research design was used in the study.

3.3 Population

A population refers to all components (people, items and occasions) that meet the specimen criteria for incorporation in a study. The objective populace in measurements is the particular populace about which data is wanted. As per Ngechu (2004), a populace is an all around portrayed arrangement of people, organizations, segments, and events, social event of things or families that are being investigated. The target population for the proposed study is 36

flower firms registered and operating in Kenya. The study was carried out using a census survey of all the 36 flower firms. A schedule of these flower firms is attached (Appendix I).

3.5 Data Collection

The data used in this study was quantitative in nature. The secondary data for five years (2011-2015) will be obtained from annual publications by Kenya flower council (KFC). This includes statement of financial position and directors reports. Secondary data from CBK was used to supplement data issued by Kenya National Bureau of Statistics (KNBS).

3.6 Data Validity and Reliability

Validity indicates how much the instrument measures the works under investigation (Mugenda and Mugenda, 2003). There are three sorts of authenticity tests which fuse substance, display and related form authenticity. The study used substance authenticity since it evaluates how much the case of the things addresses the substance that the test is planned to measure.

Piloting was carried out to test the validity and reliability of the instruments. The pilot study involved the researcher taking some questionnaires to a few respondents (picked randomly) in commercial State Corporations. After these questionnaires had been filled, the researcher reviewed the responses with a view of identifying questions that needed editing and those that were ambiguous. The final questionnaire was then printed and used to collect data for analysis.

3.7 Data Analysis

The analyst utilized quantitative strategies as a part of investigating the information. Subsequent to getting polls from the respondents, the reactions were altered, characterized,

coded and arranged to encourage quantitative examination utilizing Statistical Package for Social Science (SPSS adaptation 21). Tables and graphs were utilized for presentation of the examination yield. The gathered information was inspected and checked for culmination and conceivability. The information was then compressed, coded and arranged.

3.8 Analytical Model

Data was analyzed using Statistical Package for Social Sciences (SPSS Version 21.0) program. Being that the study was descriptive in nature, both quantitative analysis and inferential analysis was used as data analysis technique. The data collected was run through a regression model so as to clearly bring out the effects of foreign exchange exposure on the performance of floriculture firms in Kenya. The results obtained from the models will be presented in tables to aid in the analysis and ease with which the inferential statistics were drawn

The relationship equation was presented in the linear equation below.

$Y = \beta_0 + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \text{ę}$

Y= Performance (Net Income / Total Assets) of the dependent variable.

β_0 - Constant/Y intercept

X1 - Currency swaps, this was measured by the percentage change in value of currency due to exchange in currency

X2 – Options, this was measured by the change in premium which is paid upfront to avoid foreign exchange exposure.

X3 – Forward contracts was measured using the amounts paid upfront to avoid to avoid foreign exchange exposure

ε - Error term

3.8.1 Test of Significance

T-tests can be utilized to figure out if there is a huge contrast between two arrangements of means. Along these lines t-tests utilizing SPSS measurable program would be utilized in this study. Directing the t-tests requires that the typicality of the information is not abused. The P-values of results of the multiple regression analysis shall be used to test for significance of the relationship between variables. The significance level to be used shall be 0.05 (5%) to test for significance where any P-value of less than 0.05 shall indicate a significant relationship.

CHAPTER FOUR

DATA ANALYSIS AND PRESENTATION OF FINDINGS

4.1 Introduction

This section presents examination and discoveries of the study as set out in the exploration goal and research system. The general goal of the study was to research the impact of outside trade hazard administration hones on the money related execution of bloom firms in Kenya for a time of 6 years from the year 2010 to 2015. The information was assembled only from the auxiliary source records at KFC, Central Bank of Kenya and KNBS reviewed money related report.

4.2 Descriptive Statistics

In section 4.2 the study present the research finding on the descriptive statistic in the data collected.

Table 4.1: Descriptive Statistics

	N	Minimum	Maximum	Mean	Std. Deviation
ROA	36	-9.420	6.84	2.6814	2.8207
Forward Contracts	36	.02524	.1547	.6702	.0236
Currency Swaps	36	.0010	.5680	.0633	.08674
Options	36	.00566	.1547	.0113	.0339

Forward Contracts, Cross Currency Swaps, Options and the financial performance measure Return on Assets (ROA) were used. Their mean, maximum, minimum and standard deviation was taken in to account. From the findings, the study found that there was mean of 2.6814 for Return on Assets, 0.6702 for the forward contracts, 0.0633 for cross-currency swaps and 0.0113 for options.

4.3 Correlation

Table 4.2: Correlation

Correlations		ROA	Forwards	Cross-Currency Swaps	Options
ROA	Pearson Correlation	1			
	Sig. (2-tailed)				
	N	36			
Forwards	Pearson Correlation	.523**	1		
	Sig. (2-tailed)	.000			
	N	36			
Cross- Currency Swaps	Pearson Correlation	.555**	-.049	1	
	Sig. (2-tailed)	.000	.756		
	N	36	36		
Options	Pearson Correlation	.623**	.670**	.038	1
	Sig. (2-tailed)	.000	.000	.808	
	N	36	36	36	

** Correlation is significant at the 0.01 level (2-tailed).

On the relationship of the study factors, the scientist led a Pearson correlation. From the discoveries on the correlation examination between Return on Assets and different subsidiaries, the study found that there was a solid positive relationship coefficient between Return on Assets and forward contracts as appeared by relationship variable of 0.523. The concentrate additionally found a positive connection amongst ROA and cross coin swaps as appeared by relationship coefficient of 0.555. The concentrate additionally found a positive relationship amongst ROA and alternatives as appeared by correlation coefficient of 0.623. Thus every one of the subsidiaries had a position association with profit for resources as a measure of money related execution.

4.4 Regression Analysis

In this section the study presents the research findings on the relationship between various independent variables on the regression model and financial performance.

Table 4.3: Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.881[a]	0.776	0.759	2.704

a. Predictors: (Constant), Options, Cross- Currency Swaps, Forwards

From the table above, R is the correlation coefficient which demonstrates the relationship between the study factors, from the discoveries appeared in the table above there was a solid positive relationship between the study factors as appeared by R 0.881 at 5% essentialness level. The Adjusted R squared is coefficient of assurance which lets us know the variety in the needy variable because of changes in the free factor, from the discoveries in the table over the estimation of balanced R squared was 0.759 a sign that there was variety of 76% on profit for resources because of changes in forward contracts, cross coin swaps and choices at 95% certainty interim. This means 76% of the adjustments consequently on resources could be represented by the free factors.

Table 4.4: ANOVA

ANOVA[a]

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	261.692	3	87.231	13.733	.026[b]
	Residual	1575.264	248	6.352		
	Total	1836.956	251			

b. Predictors: (Constant), Options, Cross- Currency Swaps, Forwards

From the table above, the prepared information, which is the populace parameters, had an essentialness level of 2.6% which demonstrates that the information is perfect for making a conclusion on the populace's parameter as the estimation of noteworthiness (p-esteem) is under 5%. The F basic at 5% level of importance, 3 d.f, 248 d.f was 2.6049, while F figured was 13.733, since F computed is more prominent than the F basic (esteem = 2.6049), this demonstrates the general model was huge.

Table 4.5: Regression Model

<div align="center">Coefficients</div>

	Unstandardized		Standardized	t	Sig.
	B	Std. Error	Beta		
(Constant)	2.951	.213		3.123	.000
Forward Contracts	4.513	.248	4.254	1.367	.027
Cross- currency swaps	4.728	.347	4.531	2.132	.037
Options	11.154	.462	10.672	2.971	.043

$Y = 2.951 + 4.513\ X_1 + 4.728\ X_2 + 11.154\ X_3$

From the regression equation above it was found that holding forward contracts, cross currency swaps and options to a constant zero, return on assets would be 2.951. A unit increase in forward contracts would lead to improvement on return on assets by 4.513 units. A unit increase in cross- currency swaps would lead to improvement of return on assets by 4.728 units and a unit increase in options would lead to improvement on return on assets by 11.154 units. Overall options had the greatest effect on return on assets, followed by cross currency swaps then forward contracts.

At 5% level of significance and 95% level of confidence, forward contracts had a 0.027 level of significance; cross – currency swaps had a 0.037 level of significance while options had a 0.043 level of significance. All the variables were significant ($p < 0.05$).

4.5 Discussions of Findings

The study found that unit increase in Forward Contracts, while holding other factors constant, will lead to an increase in ROA by 4.513 (p = 0.027). This is in line with Bodnar and Richard (1998) who indicated that the most every now and again utilized strategy is forward trade contract. With advances, the firm can be completely supported. In any case, a few dangers including settlement chance that conversion scale moves the other way as either conjecture, or counter gathering risk which the other party can't perform on the agreement, the high cost of forward contracts will now and then forestall firms to practice this device to completely support their exposures.

A unit increase in Cross Currency Swaps, while holding other factors constant, will lead to an increase in ROA by 4.728 (p = .037). This is in line with Sun (1993) who posits currency swap where counterparties trade meet beginning chief of two distinct monetary standards by spot rate and near favorable position. In spite of the fact that an exorbitant outsider balances default chance. The typical mean to supplant trade streams booked out an undesired money with streams in a coveted coin to bring capital up in monetary standards of no critical incomes.

The concentrate additionally found a unit increment in Options, while holding different elements consistent, will prompt to an expansion in ROA by 11.154 (p<.0.043). This agree with Bodnar and Richard (1998) who demonstrate that alternatives on spot coinage are ordinarily accessible in the interbank over-the-counter markets, while those on money fates are exchanged on trades. Cash alternative is a subsidiary instrument where the proprietor has the privilege yet not the commitment to trade cash designated in one money into another coin at a pre-concurred conversion scale on a predefined date. It hence keeps away from potential

introduction as counterparties have free and open decision to exchange cash sum at determined rate before expiry date.

CHAPTER FIVE

SUMMARY, CONCLUSION AND RECOMMENDATIONS

5.1 Introduction

From the examination and information gathered, the discussions, conclusion and recommendations were made. The reactions depended on the destinations of the study. he researcher had intended to determine the effect of foreign exchange risk management practices on the financial performance of flower firms in Kenya.

5.2 Summary

The objective of this study was to determine the effect of foreign exchange risk management practices on the financial performance of flower firms in Kenya. On the relationship of the study factors, the analyst led a Pearson correlation. From the discoveries on the relationship examination between Return on Assets and different subordinates, the study found that there was a solid positive connection coefficient between Return on Assets and forward contracts as appeared by connection variable of 0.523. The concentrate additionally found a positive relationship amongst ROA and cross cash swaps as appeared by connection coefficient of 0.555. The concentrate likewise found a positive connection amongst ROA and alternatives as appeared by relationship coefficient of 0.623.Hence all the derivatives had a strong position relationship with return on assets as a measure of financial performance.

There was a solid positive relationship between the study factors spoke to by R 0.881 at 5% criticalness level. The balanced R squared was 0.759 a sign that there was variety of 76% on profit for resources because of changes in forward contracts, cross money swaps and

alternatives at 95% certainty interim. This means 76% of the adjustments consequently on resources could be represented by the free factors.The F critical at 5% level of significance, 3 d.f, 251 d.f was 2.6049, while F computed was 13.733, since F calculated is greater than the F critical (value = 2.6049), this shows that the overall model was significant. Hence forward contracts, currency swaps and option have an effect on financial performance of flower firms in Kenya.

From the regression equation above it was found that holding forward contracts, cross currency swaps and options to a constant zero, return on assets would be 2.951. A unit increase in forward contracts would lead to improvement on return on assets by 4.513 units. A unit increase in cross- currency swaps would lead to improvement of return on assets by 4.728 units and a unit increase in options would lead to improvement on return on assets by 11.154 units. Overall options had the greatest effect on return on assets, followed by cross currency swaps then forward contracts.

5.3 Conclusions

The findings showed that the mean of Forward Contracts is relatively high as compared to other variables while Cross – Currency Swaps had the highest standard deviation. This shows that cross – currency swaps shows had the highest variability or high volatility (Risk) in the financial performance. Options had the highest correlation and were positively correlated with Rate of return. Cross Currency Swaps and forward contracts are also highly and positively correlated with Rate of return. This implies that the foreign trading variables currency options, Forward Contracts, and Options are very crucial in determining financial performance of flower firms in Kenya. From the regression equation the study concludes that a unit increase in forward contracts, cross- currency swaps and

options would lead to improvement on return on assets. Overall options had the greatest effect on return on assets, followed by cross currency swaps then forward contracts.

5.4 Policy Recommendations

The study sought to determine the relationship between foreign exchange risk management practices on the financial performance of flower firms in Kenya. The study recommends that; foreign exchange risk management should always be taken in to account to improve the banks return on assets and hence overall performance of the banks.

Policy makers should undertake to understand risk affecting the foreign exchange markets among commercial banks to improve capital investments to maximize returns of the banks hence overall performance.

5.5 Limitations of the Study

This study was not without constraints. In accomplishing its target the study was constrained to 6 years time frame beginning from year 2009 to year 2015.The study was limited to secondary data collected from the financial reports, KFC and KNBS. While the data was verifiable, it nonetheless could still be prone to shortcomings such as earnings management.

The study was limited to the effect of foreign exchange risk management practices on the financial performance of flower firms in Kenya. The study depended on a six year ponder period from the year 2010 to 2015. A more drawn out term of the study will have caught times of different monetary significances, for example, blasts and retreats. This may have most likely given a more drawn out time concentrate subsequently given a more extensive measurement to the issue.

5.6 Suggestions for Further Study

This study sought to determine the effect of foreign exchange risk management practices on the financial performance of flower firms in Kenya. A study can be done on the implications of risk management practices on financial performance of other companies in Kenya apart from those in the flower firms. The current study targeted all the flower firms in Kenya; a study can be done on the effect of foreign exchange risk management practices on the financial performance of agricultural companies in Kenya, with specific reference to the listed companies in Kenya.

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APPENDIX I: LIST OF CUT FLOWER FIIMS IN KENYA

1 Alora Flowers Ltd Nairobi

2 Aquilla Development Co. Ltd Naivasha

3 Bawan Roses Ltd Nairobi

4 Beverly Flowers Ltd Nairobi

5 Carzan Cultures Ltd Naivasha

6 Charm Flowers Ltd Nairobi

7 Enkasiti Flowers Ltd Nairobi

 8 Finlay Flowers Ltd Kericho

9 Homegrown Ltd Naivasha

10 Kenya Highlands Nurseries Nakuru

11 Kijabe Ltd Naivasha

12 Kisima Ltd Nanyuki

13 Locland Ltd AthiRiver

14 Longonot Farm Naivasha

15 Longonot Horticulture Farm Nairobi

16 Magana Flowers Nairobi

17 Mosi Ltd Nairobi

18 Mt. Elgon Flowers Ltd Kitale

19 Nini Ltd Naivasha

20 Ol-Njorowa Ltd Nairobi

21 Oserian Ltd Naivasha

22 P.J.Dave Flower Ltd Nairobi

23 Pollen Ltd Ruiru

24 Primarose Flower Ltd Nairobi

 25 Redhill Flowers Ltd Nairobi

26 Redlands Roses Ruiru

 27 Sander (K) Ltd Nairobi

28 Shalimar Flowers (K) Ltd Naivasha

29 Simbi Roses Ltd Thika

30 Sophia Roses Ltd Thika

31 Subati Ltd Nairobi

32 Suera Flowers Ltd Nairobi

33 Tambuzi Ltd Nanyuki

34 Terra Fleur Thika

35 Terrasol Ltd Nairobi

36 The Plant Factory (K) Naivasha

 Source: Kenya Flower Council, 2015.

Appendix II: Raw Data

Return on Assets

		2015	2014	2013	2012	2011	2010
	Bank	**%**	**%**	**%**	**%**	**%**	**%**
1	Alora Flowers Ltd Nairobi	1.49	2.90	2.90	4.11	4.6	2.87
2	Aquilla Development Co. Ltd Naivasha	0.33	2.00	1.30	1.29	1.59	1.47
3	Bawan Roses Ltd Nairobi	2.57	3.60	4.00	3.52	3.83	2.93
4	Beverly Flowers Ltd Nairobi	5.93	5.50	5.20	4.98	5.17	3.57
5	Carzan Cultures Ltd Naivasha	7.26	7.70	7.40	6.75	6.26	5.66
6	Charm Flowers Ltd Nairobi	5.63	6.20	6.50	4.62	4.34	4.22
7	Enkasiti Flowers Ltd Nairobi	5.29	4.30	4.20	2.91	3.05	3.9
8	Finlay Flowers Ltd Kericho	0.21	0.50	-1.20	0.9	0.02	0.54
9	Homegrown Ltd Naivasha	5.44	5.80	7.00	7.18	6.25	5.46
10	Kenya Highlands Nurseries Nakuru	4.43	4.70	4.80	3.66	3.65	3.37
11	Kijabe Ltd Naivasha	6.42	6.00	5.90	5.03	5.38	5.44
12	Kisima Ltd Nanyuki	3.74	4.10	2.40	4.18	5.02	3.96
13	Locland Ltd AthiRiver	3.08	2.90	2.70	2.33	2.45	2.45
14	Longonot Farm Naivasha	-1.02	1.00	1.30	-0.8	3.53	0.83
15	Longonot Horticulture Farm Nairobi	1.80	2.50	0.90	2.79	6.26	0.93
16	Magana Flowers Nairobi	4.35	4.80	3.60	4.57	5.65	3.31
17	Mosi Ltd Nairobi	4.31	4.10	3.50	2.23	1.96	1.37
18	Mt. Elgon Flowers Ltd Kitale	4.44	4.60	4.20	4.57	4.42	3.21
19	Nini Ltd Naivasha	5.22	7.00	10.40	6.43	4.64	5.95
20	Ol-Njorowa Ltd Nairobi	0.00	0.00	0.00	0.00	0.00	0.00
21	Oserian Ltd Naivasha	-1.82	-0.80	1.00	1.61	2.46	1.78

22	P.J.Dave Flower Ltd Nairobi	4.47	4.90	4.90	4.17	4.14	3.01
23	Pollen Ltd Ruiru	1.88	1.80	0.80	1.28	2.14	1.15
24	Primarose Flower Ltd Nairobi	-1.09	-3.30	-4.80	0.45	0.7	-8.25
25	Redhill Flowers Ltd Nairobi	4.24	4.00	2.70	2.01	2.48	2.57
26	Redlands Roses Ruiru	2.08	1.60	2.00	2.12	1.74	0.87
27	Sander (K) Ltd Nairobi	0.67	1.80	2.90	1.28	-2.5	-3.42
28	Shalimar Flowers (K) Ltd Naivasha	3.13	2.80	1.70	2.78	6.2	2.67
29	Simbi Roses Ltd Thika	2.59	3.00	1.90	1.92	1.39	1.69
30	Sophia Roses Ltd Thika	3.11	2.70	2.80	1.2	-0.6	-2.1
31	Subati Ltd Nairobi	4.75	5.80	5.50	6.37	6.33	5.22
32	Suera Flowers Ltd Nairobi	0.73	1.30	1.50	-3.7	-4.8	-1.33
33	Tambuzi Ltd Nanyuki	4.61	4.20	3.20	2.75	1.44	-4.05
34	Terra Fleur Thika	1.28	1.40	0.79	1.99	5.11	1.39
35	Terrasol Ltd Nairobi	1.90	1.90	1.70	3.56	4.49	4.2
36	The Plant Factory (K) Naivasha	1.07	2.50	1.80	3.8	4.01	1.08
	TOTAL	4.46	4.70	4.70	4.40	4.43	3.52