

**EFFECT OF STRATEGIC CHANGE IMPLEMENTATION ON REVENUE
COLLECTION BY CUSTOMS SERVICE DEPARTMENT OF KENYA
REVENUE AUTHORITY**

BY

JEMMIMAH NTHENYA MUATHE

**A RESEARCH PROJECT SUBMITTED TO SCHOOL OF BUSINESS AND
ECONOMICS IN PARTIAL FULFILLMENT OF THE REQUIREMENTS
FOR THE AWARD OF MASTERS IN TAX AND CUSTOMS
ADMINISTRATION**

MOI UNIVERSITY

2020

DECLARATION

Declaration by the Candidate

This thesis is my original work and has not been presented for examination for an award of a degree in any other University. No part of this thesis may be reproduced without prior written permission of the author and / or Moi University.

Sign: _____ Date : _____

JEMMIMAH NTHENYA MUATHE

MU/KESRA/0144/2016

Declaration by the Supervisors

This research has been submitted with my approval as the university supervisors.

Sign: _____ Date : _____

DR. ROBERT ODUNGA

School of Business & Economics

Moi University

Sign: _____ Date : _____

DR. BRUCE OGAGA

Kenya School of Revenue Administration

DEDICATION

This work has been dedicated to my parents, siblings and daughter whose encouragement has seen me through.

ABSTRACT

Revenue collection is a management system that measure revenue. The process can be used to identify factors that drive revenue, measure the performance of these factors, and take action to maximize revenue. ICT adoption, customer relationship management, one stop boarder post operations and Staff Training can effectively be used for revenue collection. Despite the fact that KRA has put in place measures in its customs department to improve on Revenue collection, it has continued to post shortfall in revenue collection. The purpose of this study was to establish the effect of strategic change implementation on Revenue collection by Customs Service Department of KRA. The study narrowed its research undertakings into four major specific objectives which are: to establish the effect of ICT adoption on Revenue collection by Customs Service Department of KRA; to establish the effect of CRM on Revenue collection by Customs Service Department of KRA, to establish the effect of one stop border post on Revenue collection by Customs Service Department of KRA and to establish the effect of Staff Training on Revenue collection by Customs Service Department of KRA. The study employed Rational Expectations Theory of Technology Adoption, Optimal Tax Theory, Theory of Equal Sacrifice and Institutional Theory. The study area was Customs Service Department of KRA. The target population was 547 and sample size was 231 respondents. The researcher used stratified random sampling technique to sample staff from customs department Mombasa and senior staff in the organization. The findings indicated that that ICT adoption has a positive and significant influence on revenue performance ($\beta_1=0.125$, $p=0.011$). It was also established that customer relationship management has a positive and significant influence on revenue performance ($\beta_2=0.262$, $p=0.001$). It was further established that one stop boarder post has a positive and significant influence on revenue performance ($\beta_3=0.148$, $p=0.044$). Finally, staff training was found to have a positive and significant influence on revenue performance ($\beta_4=0.166$, $p=0.018$). The results also showed R square of 0.255, which indicated that the independent variables explain 25.5% of variations in the dependent variable (Revenue collection). The study infers that strategic change implementation has influenced Revenue collection by Customs Service Department of KRA. In particular, ICT adoption, CRM and staff training were found to have influence on Revenue collection by Customs Service Department of KRA. CRM had the greatest influence on revenue collection, followed by ICT adoption, then staff training and lastly OSBP operations. The impliation of the findings is that CRM, ICT adoption and staff training are critical in influencing revenue colelction by Customs Service Department of KRA. The study recommends that Kenya Revenue Authority should come up with a clear ICT policy aimed at improving revenue collection. Kenya Revenue Authority should come up with a clear policy on customer service. KRA should come up with a policy to make one stop boarder post operations more effective. KRA should come up with a policy that makes Staff Training more frequent on emerging issues on revenue collection.

TABLE OF CONTENTS

DECLARATION	ii
DEDICATION	iii
ABSTRACT.....	iv
TABLE OF CONTENTS.....	v
LIST OF TABLES	ix
LIST OF FIGURES	x
ACKNOWLEDGEMENT	xi
DEFINITION OF TERMS	xii
LIST OF ABBREVIATIONS.....	xiii
CHAPTER ONE	1
INTRODUCTION.....	1
1.0 Overview	1
1.1 Background of the Study	1
1.2 Statement of the Problem.....	5
1.3 Research Objectives	7
1.3.1 General objective	7
1.3.2 Research objectives.....	7
1.4 Research Hypotheses	7
1.5 Significance of the Study	8
1.6 Scope of the Study	8
CHAPTER TWO	10
LITERATURE REVIEW	10
2.0 Introduction.....	10
2.1 Concept of Study Variables	10
2.1.1 Concept of Revenue Collection	10
2.1.2 Concept of Strategic Change Implementation	12
2.2 Theoretical Review	15
2.2.1 Rational Expectations Theory of Technology Adoption	15
2.2.2 Optimal Tax Theory.....	16
2.2.3 Theory of Equal Sacrifice	16
2.2.4 Institutional Theory.....	17
2.3 Empirical Review.....	19

2.3.1 ICT adoption and Revenue collection	19
2.3.2 Custom Relationship Management and Revenue collection	22
2.3.3 One Stop Border Post and Revenue collection.....	27
2.3.4 Staff training and Revenue collection.....	32
2.4 Summary of Literature and Emerging Issues.....	36
2.5 Conceptual Framework.....	36
CHAPTER THREE.....	38
RESEARCH METHODOLOGY	38
3.1 Introduction.....	38
3.2 Study Area	38
3.3 Research Design.....	39
3.4 Target Population.....	39
3.5 Sampling Technique and Sample Size.....	40
3.5.1 Sample Frame	40
3.5.2 Sample Size.....	40
3.6 Data Collection Instruments and Instruments.....	42
3.7 Pilot Testing	43
3.7.1 Validity Test	44
3.7.2 Reliability Test.....	44
3.8 Data Collection Procedure	45
3.9 Data Processing and Analysis	45
3.9.1 Analytical Model	46
3.9.2 Testing Assumptions of the Multiple Regression Model	46
3.9.2.1 Normality Test	46
3.9.2.2 Linearity Test	47
3.9.2.3 Multicollinearity Test.....	47
3.9.2.4 Autocorrelation Test	48
3.10 Ethical Consideration.....	48
CHAPTER FOUR.....	49
DATA ANALYSIS, PRESENTATIONS AND INTEPRETATIONS.....	49
4.1 Introduction.....	49
4.2 Response Rate	49
4.3 Pilot Study Results.....	50
4.4 Respondents General Information	51

4.4.1 Gender of the Respondents	51
4.4.2 Age bracket	51
4.4.3 Highest level of education	52
4.4.4 Number of years in the organization.....	53
4.5 Descriptive Statistics.....	53
4.5.1 ICT Adoption.....	54
4.5.2 Customer relationship management.....	56
4.5.3 One stop boarder post	57
4.5.4 Staff training	59
4.5.5 Revenue performance	61
4.6 Multiple Regression Model Assumption	63
4.6.1 Normality Assumption Test.....	63
4.6.2 Test for Linearity	64
4.6.3 Multicollinearity Test Assumption	65
4.6.4 Test for Autocorrelation.....	65
4.7 Inferential Statistics	66
4.7.1 Correlation Analysis	66
4.7.2 Multiple Regression Analysis	68
4.7.2.1 Model Summary.....	68
4.7.2.2 Model Fitness.....	69
4.7.2.3 Regression coefficient.....	70
4.8 Hypotheses Testing.....	71
4.9 Discussions of the findings	73
CHAPTER FIVE	78
SUMMARY, CONCLUSION AND RECOMMENDATIONS	78
5.1 Introduction.....	78
5.2 Summary of the Study Findings	78
5.2.1 ICT adoption	78
5.2.2 Customer relationship management.....	79
5.2.3 One stop border post	79
5.2.4 Staff training	80
5.3 Conclusions.....	81
5.4 Recommendations.....	82
5.5 Suggestions for Further Study	83

REFERENCES	84
APPENDICES	92
Appendix I: Questionnaire	92

LIST OF TABLES

Table 3.1 Target Population.....	40
Table 3.2: Sample Size	41
Table 3.3 Variables and Measurements	43
Table 4.1 Response Rate.....	49
Table 4.2: Reliability Test Results.....	50
Table 4.3 Gender of the respondents	51
Table 4.4 Age bracket	52
Table 4.5 Highest level of education	52
Table 4.6 Number of years in the organization.....	53
Table 4.7 ICT Adoption	54
Table 4.8 Customer Relationship Management.....	56
Table 4.9 One stop boarder post	58
Table 4.10 Staff training	60
Table 4.11 Revenue performance	62
Table 4.12 One-Sample Kolmogorov-Smirnov Test.....	63
Table 4.13 ANOVA Test	64
Table 4.14: Multicollinearity Test Assumption.....	65
Table 4.15: Autocorrelation Test	66
Table 4.16 Correlations Analysis Results	67
Table 4.17 Multiple Regression Model Summary.....	68
Table 4.18: ANOVA results	69
Table 4.19 Regression Analysis Coefficients	70
Table 4.20 Summary of Hypotheses Test Results	73

LIST OF FIGURES

Figure 2.1: Conceptual Framework37

ACKNOWLEDGEMENT

I thank the Almighty God for giving life and the capability in seeking knowledge and wisdom through studies. Through his undeserving grace bestowed on me has enabled me to go this far. To my parents, who took interest and sacrificed themselves for my education. You are highly appreciated.

My sincere gratitude goes to my supervisors Dr. Robert Odunga and Dr. Bruce Ogaga who were always there for support. Your professional advice, corrections, guidance and encouragement throughout the time of project writing is appreciated. Thank you May God blesses you abundantly.

DEFINITION OF TERMS

- Integrated Customs Management System** This is a system which Kenya Revenue Authority has implemented with the intention to improve Kenyans Customs processes and procedures to allow less manual transactions and thus fast cargo clearance at all its border control (Elmane-Helmane & Ketners, 2012).
- One stop border post** This is a border facility that combines two stops for national border control processing into one and consolidates border control functions in a shared space for exiting one country and entering another (Muqayi, 2015)
- Revenue collection** This is the process used to identify factors that drive revenue, measures the performance of these factors, and taking action to maximize revenue (Huang, Marquardt & Zhang, 2015).
- Scanner** This is a device that captures images from photographic prints, posters, magazine pages, and similar sources for computer editing and display (Zhou, Mo, Oberpriller, Fitch & Chen, 2015).
- Staff Training** This is teaching, or developing in oneself or others, any skills and knowledge that relate to specific useful competencies Parsons, (Rollyson & Reid, 2012).
- Strategic changes** These are the actions that an organization takes to align itself with the environment (Helfat & Martin, 2015).
- Strategy** This is a firm's game plan for surviving in the changing environment (Rainer, 2011).

LIST OF ABBREVIATIONS

CRM	Customer Relationship Management
EAC	East African Community
EU	European Union
ICT	Information Communication Technology
KRA	Kenya Revenue Authority
OSBP	One Stop Boarder Post
PCA	Post Clearance Audit
TFA	Trade Facilitation Agreement
US	United States

CHAPTER ONE

INTRODUCTION

1.0 Overview

This introduction of the chapter focuses on the Background to the Study, Statement of the Problem, Objectives of the study General objective and Specific objective, formulating hypotheses and Significance of the study.

1.1 Background of the Study

Globally, the impact on total tax revenues is hard to measure, it might be considerable. Estimates for the United States find revenue losses of up to 25 per cent of corporate income tax revenue, while research by the IMF (2014) comprising 51 countries concludes that "the (unweighted) average revenue loss is about 5 % of current CIT revenue – but almost 13 percent in non- Organization for Economic Cooperation and Development countries" (Zucman, 2014).

These observations have led to a more general debate on fairness, equity and efficiency in taxation in the light of fiscal adjustment needs (Eurobarometer, 2012). Base erosion has become even more relevant in the context of rising concerns on fiscal sustainability following the financial crisis: public debt levels have increased substantially in the EU from around 58% of GDP (EA 65%) in 2007 to a value of 88% of GDP (EA 94%) in 2015. As a result of the crisis, many governments cut expenditures while increasing taxes, notably on consumption, to consolidate public budgets (Report Tax Reforms in EU Member States, 2014). The use of several tax planning strategies by multinational corporations has created a debate about their fair contribution to government budgets.

Amongst the measures that the TFA provides, post-clearance-audit is an example of the measures used to recover revenue loss. With post clearance audit (PCA), for example, Japan Customs collected approximately US \$ 300 million in the 2012 fiscal year, the equivalent of approximately 1% of its annual Customs revenue. PCA, referred to as post-release verification in Canada, led to a fiscal injection of US \$ 128 million in the fiscal year 2010 (CBSA, 2011). Taking into account the number of verification officers, each officer in Canada annually collected US \$ 0.35 million on average through PCA (Damilola, 2015).

The European Union Customs Union defines an area where no customs are levied on goods traveling within it. It includes all member states of the European Union. The abolition of internal tariff barriers between EAC member states was achieved in 1968. Andorra and San Marino belong to the EU customs unions with third states. Turkey is linked by the European Union-Turkey Customs Union. The countries in a customs union negotiate as a bloc when discussing trade deals with countries outside the union. A good example is the recently introduced bilateral trade deal between the European Union and Japan (Grottel, 2017).

In Africa, performance measurement has significant influence in supporting the achievement of an organization's goals and the effectiveness and efficiency of its strategic planning process. Thus, in order to assess the level of success or otherwise of a corporate body, its established strategic plans in connection with the performance of the company in all fronts of operations had to be established. Authors Sarason and Tegarden, (2003) asserted to the positive correlation between strategic planning and performance achievements as very beneficial for organizations. In their studies

Dyson, (2000); McAdam and Bailie, (2002) further emphasized the need for organizations to align their strategies with their performance measurement systems.

The Liberia Revenue Authority (LRA) was successfully launched on July 1, 2014, four months after the outbreak of the Ebola virus. Extensive Tax Authority (TA) support was provided remotely to strengthen the administrative and operational framework, in particular activities related to improving the integrity of the information database and defining the institutional structures to facilitate the launch of the Liberia Revenue Authority (LRA). The LRA worked hard to innovate its service delivery to provide outreach to taxpayers to shore-up and stem any further decline in voluntary compliance now in place, work continues to improve core tax administration functions and build capacity in both technical and operational programs (Grethe, 2018). Expanding the revenue sources in Kenya has the advantage of accommodating new growing spending governments in terms of new judicial regulations, political actions and ever-changing economic cycle in a government.

According to Tanzania Revenue Authority report (2008) Tanzania Revenue Authority (TRA) finalized the implementation of the Second Corporate Plan. The Second Corporate Plan has a total of 70 major initiatives out of which 65 initiatives were completed and the remaining 5 were to be implemented by June 2008 making up a 100% performance. Revenue collection increased by 79% from Shs 1.4 trillion during the year 2003/04 to Shs 2.5 trillion in 2006/07 and reached Shs 3.3 trillion in 2008 which was an increase of 136% for the five-year period. The performance has been very good given the fact that Management had to strike a good balance between continuously increasing revenue collections and implementing reforms and the fact

that the estimated target by the fifth year of the Second Corporate Plan was to collect Shs 2.4 trillion

Bonilla (2016) notes that taxation should be in place, so that most tax payers can perform their tax obligations voluntarily in order to reduce running costs and increasing revenue. He notes that it is important that the tax system be set in a way that encourages voluntary tax compliance. It is virtually impossible to talk about revenue collection without linking it to tax compliance. Customs revenue will likely increase as cross-border merchandise trade expands given that tariff rates remain unchanged. Hufbauer and Schott (2013) estimated that the Trade Facilitation Agreement (TFA) could increase global imports by US \$ 1 trillion. This article was also published in the conference. Wilson, et al. (2005) suggested that global trade would grow by US \$ 33 billion if "below-average" countries deliver improvements in the "halfway" to average levels, and to increase trade rates. At any rate, it can be reasonably expected that the TFA implementation will lead to more trade flows (Chimilila, Sabuni & Benjamin, 2014).

According to Gunes and Atilgan (2016), the Customs Services Department (CSD) is the largest of the four revenue departments of KRA in terms of manpower and countywide operational network. The primary function of the Department is to collect and account for import duty and VAT on imports. Apart from its fiscal responsibilities, the CSD is responsible for facilitation of legitimate trade and has the mandate of protecting the society from illegal entry and exit of prohibited and dangerous goods through the land and sea border points. A bulk of CSD's operations is in KRA's administrative Southern Region which covers the coastal region of Kenya where the port of Mombasa is located.

All import and export commodities to and from Kenya, pass through customs control which reflects the critical role of CSD in regulating the movement into and outside the country of items that may be used for terror such as small weapons, materials for making improvised explosive devices and live explosive such as grenades and bombs. It also includes control of items that may be used for biological weapons such as bacteria and viruses. Kenya being a trusted trade partner of US, European and Asian countries may see the port of Mombasa used as a transit portal for export of dangerous goods (Huang & Yoshida, 2013). Hair, Black, Babin and Anderson (2015) argues that to succeed in an industry, an organization must select a mode of strategic behavior that matches the levels of environmental turbulence, and develop a resource capability which complements the chosen mode. Huang & Yoshida (2013) identified three distinct modes of strategic behavior. The first group of strategic behaviors consists of organizations that are reactive and driven by their environment. A second group is pre-emptive and sought to anticipate future events and prepare for them while the third group exhibits the most aggressive stance; not only do they seek to identify future scenarios; they actually work to bring these about.

1.2 Statement of the Problem

In today's competitive, fast-paced business landscape, getting the most out of available resources is not an option but rather a requirement for organizations across the globe. Organizations are taking a highly proactive approach to systems modernization and operations in an effort to increase efficiency and effectiveness in their operations (Kanyi, 2014). There is an increasing need by the governments in Africa to collect much revenue by way of taxes to face the increasing financial expenditures budgeted by the countries. With this in mind they need to constantly reengineer themselves so as to favorably undertake the mandate in line with the

changing environmental parameters such as changes in IT, globalization, legislations and politics, among others for them to effectively remain relevant and sustain their operations as per their goals and mission in the face of increased demand for revenue. ICT adoption, customer relationship management, one stop boarder post operations and Staff Training can effectively be used for revenue collection. Despite the fact that KRA has put in place measures in its customs department to improve on Revenue collection it has continued to post shortfall in revenue collection. For example, the customs revenue target for the Financial year 2016/17 was Kshs 462.0 billion against actual performance of Kshs 443 billion a variance of Kshs 18.5. In 2017/18 the customs revenue target was Kshs 484.97 billion against actual performance of Kshs 469 billion a variance of Kshs 15 billion KRA (2018). Several studies have been conducted globally. These studies include, Kaplanoglou and Rapanos (2013) conducted on the ICT strategy adopted by the banking sector but failed to address the effect of strategic change on Revenue collection in the Kenya Revenue Authority, customs department in Mombasa. Khan and U-Din (2014) who offered a typology of strategic changes that vary in active organizations: from resistance, passive, and conformity to proactive manipulation. However, the study did not address the effects of strategic change on Revenue collection in the Kenya Revenue Authority, customs department in Mombasa. The strategies put in place to improve revenue collection at Kenya Revenue Authority have not been effective. Therefore, the current study sought to establish the effect of strategic change on revenue collection in Kenya Revenue Authority, customs department in Mombasa.

1.3 Research Objectives

1.3.1 General objective

The general objective of this study was to establish the effect of strategic change implementation on Revenue collection by Customs Service Department of KRA.

1.3.2 Research objectives

The research specific objectives guiding this study are:

- i. To establish the effect of ICT adoption on Revenue collection by Customs Service Department of KRA.
- ii. To establish the effect of customer relationship management (CRM) on Revenue collection by Customs Service Department of KRA.
- iii. To establish the effect of one stop border post (OSBP) operations on Revenue collection by Customs Service Department of KRA.
- iv. To establish the effect of staff training on Revenue collection by Customs Service Department of KRA.

1.4 Research Hypotheses

H₀₁: There is no significant effect of ICT adoption on Revenue collection by Customs Service Department of KRA

H₀₂: There is no significant effect of customer relationship management (CRM) on Revenue collection by Customs Service Department of KRA.

H₀₃: There is no significant effect of one stop border post (OSBP) operations on Revenue collection by Customs Service Department of KRA.

H₀₄: There is no significant effect of staff training on Revenue collection by Customs Service Department of KRA.

1.5 Significance of the Study

The study is of importance to the management and staff of the KRA as it gives feedback on achieving intended goals and objectives of collecting and accounting for import duty and VAT on imports. It is also useful to members of other tax authorities, agencies and public organizations intending to implement strategic changes in their organizations.

To policy makers, stakeholders and other members of the public to warrant their continued support and help steers the Kenya Revenue Authority to greater heights with the focus being on customs department. The study findings may also help the government regulators and the policy makers as they can use the finding as reference for policy guidelines on strategic changes in the public institutions and parastatals. They will be able to use the findings of the study to formulate viable policy documents that effectively will in turn boost productivity.

Findings of this study are based on strategic change and revenue collection. The documented report of this study would be easily acquired in libraries and it would equip with more knowledge and skills. The study would make a contribution to the literature.

1.6 Scope of the Study

The study focused on the effect of strategic change implementation on Revenue collection by Customs Service Department of KRA in Kenya. The key strategic change implementation components were: ICT adoption, customer relationship

management, one stop border post operations and staff training. The study concentrated on customs Services Department operating in Southern Region which covers the coastal region of Kenya where the port of Mombasa is located. Data collection targeted 547 officers. Stratified random sampling was adopted by the study. The study sampled 231 officers. The study covered the financial year 2018/2019.

CHAPTER TWO

LITERATURE REVIEW

2.0 Introduction

This chapter presents various sections; they include theoretical review on concepts underpinning the study and the conceptual framework. The other sections that the chapter focused on are empirical literature, critique of literature and summary of knowledge gaps.

2.1 Concept of Study Variables

This section review concepts of revenue collection and strategic change implementation.

2.1.1 Concept of Revenue Collection

Revenue collection refers to ability of the government through necessary agency to collect revenue, which is then channeled to both recurrent and development expenditure for a given country (Corbacho, Cibils & Lora, 2013). Revenue collection generally relates to a government agency's actions to collect outstanding financial obligations from the public. Revenue might come from a variety of sources: taxes, license fees, fines or use of state facilities (Adenugba & Ogechi, 2013). Typically, each government agency is responsible for collecting revenues it might be entitled to receive. Federal and state laws, most of which aim to provide consumer protection, regulate collection procedures. As a result, guidelines developed to boost recovery on outstanding account receivables should comply with applicable regulations. Effective debt collection requires the collecting agency to maintain updated information on debtors including names, addresses, social security numbers, employer identification

numbers and the amount of the debt (Fedaseyeu, 2015). Develop standardized practices that help debtors to keep track of debt.

Revenue collection explains the ability of the government through necessary agency to collect revenue, which is then channeled to both recurrent and development expenditure for a given country. On the other hand, revenue collection refers to the various activities that a government does in order to raise money to fulfill its mandate as per constitution. Among the sources of revenue to government includes: income from rendering services such as education and health, court fines for those who subvert the laws of the land, income from road levy and taxes. Taxes form the basic and the most crucial source of revenue for governments. It is for this reason that tax administration is critical in the running of governments (Nasimiyu, 2013).

In Kenya, KRA is the institution that is mandated to collect revenue on behalf of the government (Maisiba & Atambo, 2016). Performance targets are set with outputs in mind and in terms of revenue collection. Performance targets focus on change in revenue collection and are set in line with customer satisfaction. Clear strategy communication had improved performance; support from senior management had promoted realization of targets at KRA and regular departmental evaluations promoted organizational performance (Wamoto, 2015).

Government of Kenya raises most of its revenue through enhancing elasticity of the existing tax system that is, rationalizing and regulating expenditure through strict fiscal controls (Gor & Omondi, 2014). The tax structure generally consists of the direct and indirect taxes. Regarding direct taxes, the factors that produce the incomes are assumed to pay the taxes, while for the indirect taxes, households, families and firms that consume the taxed items pay the associated taxes (Ehrhart, 2013).

Direct taxes often include corporate tax, personal income tax, withholding tax, rental income tax, tax on interest in banks and presumptive income tax. An example of indirect tax is Value Added Tax (Keen, 2013). Revenue collection, tax administration is crucial in the implementation of a properly designed tax (Afuberoh & Okoye, 2014). Tax administration consists of three interrelated activities: the identification of tax liabilities based on existing tax laws, the assessment of taxes to determine if the taxes actually paid are smaller (or large) than liabilities and, the collection, prosecution and penalty activities that impose sanctions on tax evaders and ensure that taxes and penalties due from tax payers are actually collected (Nyaga & Omwenga, 2016).

2.1.2 Concept of Strategic Change Implementation

Strategic change is the process of managing change in a structured, thoughtful way in order to meet organizational goals, objectives, and missions (Ginter, Duncan & Swayne, 2018). Change is necessary for organizations to continue to thrive and meet and exceed the competition of industry competitors. Senior management provides a strong support fit for strategy implementation, senior management are directly involved in strategy implementation and have direct influence on strategy implementation (Sharabati & Fuqaha, 2013).

According to Saunders, Lewis and Thornhill (2015) automation system helps to improve revenue collection. This is because they are based on systems and technologies that enhance efficiency such as scanners, among other technologies and systems. Also, by automating revenue collection, service providers are able to provide a better audit trail since all transactions are automated. This prevents revenue loss through abuses as all moves are recorded electronically. Automation also provides

huge transactions that need to be handled efficiently. Automating revenue is key collection aspect, which requires fast and efficient output, and there will always be a trade-off between control and operational needs.

Tumbarello and Patrizia (2014) argues that customs administrations are increasingly required to integrate their systems and procedures with the sophisticated global logistics networks used by international trade and transport operators. To cope with these pressures and challenges, the international customs community looks to the applied use of information technology (IT) as a catalyst for improving organizational and operational efficiency and effectiveness. While it is evident that IT is assuming an increasingly important role in modern customs administration, the priorities, expectations, experience, capabilities, and resources of individual customs administrations vary considerably. Beginning in the early 1970s, customs administrations of many developed economies began to recognize the significant advantages of using technology-based solutions to improve their operational efficiency.

They designed and developed their own custom computer systems, tailored to meet national needs. Over the years such systems have been enhanced, simplified, and some standardized in line with international best practices. Capitalized on information and communications technologies. As a result, such countries have computer systems that reflect modern customs management and clearance audit regimes (Wakaya, 2018).

Customer relationship management (CRM) is an approach to manage a company's interaction with current and potential customers. It uses data analysis about customers' history with a company to improve business relationships with customers, specifically

focusing on customer retention and ultimately driving sales growth. One important aspect of the CRM approach is the systems of CRM that compile data from a range of different communication channels, including a company's website, telephone, email, live chat, marketing materials and more recently, social media. Through the CRM approach and the systems used to facilitate it, businesses learn more about their target audiences and how to best cater to their needs (Widdowson, Blegen, Kashubsky & Grainger, 2014).

The one-stop border post is characterized by long-distance border post model. In the traditional border practice, an importer, exporter or a trader needed to obtain exit clearance from one side of the border. These crossing procedures depicted a glaring disconnect among EAC member countries in clearance of cargo. The OSBP concept has bred the situation by improving border competitiveness and reducing barriers to trade and improving business competitiveness. The major reason for establishing OSBPs is to reduce transport costs across national boundaries (Bonilla, 2016).

Staff Training is teaching, or developing skills and knowledge that relate to specific useful competencies. Staff Training has specific goals of improving one's capability, capacity, productivity and performance. It forms the core of apprenticeships and provides the backbone of content at institutes of technology. In the context of customs, Staff Training development is commonly understood as the development or acquisition of skills, competences, tools, processes and resources necessary to improve the administration's ability to perform the assigned functions and achieve its objectives (Chauhan, 2013).

2.2 Theoretical Review

2.2.1 Rational Expectations Theory of Technology Adoption

Rational expectations theory of adoption technology developed by Davis (1989). This theory indicates that there is much of technology in decision making. In this research, the rational expectations theory will be used to test the adoption of ICT, CRM and one stop boarder. This theory indicates that strategic changes through ICT adoption, CRM and one stop boarder post operations depends on how the stakeholder's value it in terms of benefits to the business through increased efficiency and revenue collection.

The basic assumption of the theory of rational expectations is that people use all of the information available to them efficiently. An individual's expectations are said to be rational if she makes efficient use of all available information, allowing for its cost. Since some information can be costly and hard to obtain, rational expectations may be rational but inaccurate. However, at least they will be unbiased. This is the central tenet of the theory: the average of people's subjective expectations is equal to the true values of the economic variables being forecast.

Using the idea of "expectations" in economic theory is not new. In the 1930s, the famous British economist, John Maynard Keynes assigned people's expectations about the future which he called "waves of optimism and pessimism" a central role in determining the business cycle. "Rational Expectations and the Theory of Price Movements," published in 1961 in the journal, *Econometrical*. Muth used to describe numerous scenarios in which an outcome depends partly on what people expect. The theory did not catch on until the 1970s with Robert E. Lucas, Jr. and the neoclassical revolution in economics. This theory will therefore be of value to the researcher in a

theoretical framework to test the effect of strategic changes of ICT, CRM and one stop boarder post operations on Revenue collection.

2.2.2 Optimal Tax Theory

Optimal tax theory is based on the foundational work of Ramsey (1928). The standard theory of optimal taxation is a tax system that should be used to maximize social security. The social planner is posited as a utilitarian: that is, the social welfare function is based on the utilities of individuals in the society. Optimal tax theory is concerned with the ideal level and form of economic redistribution. The optimal tax theory sought to determine how government can maximize social welfare through taxes and transfers, without increasing the sacrifice on the part of tax payers.

Whether conscious or not, optimal tax theory actually embodies a resource egalitarian view of distributive justice to a large extent. However, the reasoning behind the theory's principles emphasizes incentives, efficiency, and the information that choices reveal about individual wellbeing. This theory indicates that optimal taxation is a function of tax charge and how this tax is collected to ensure fair redistribution of welfare. This theory will be relevant to this study since ICT, CRM and one stop boarder post operations were introduced with the aim of improving revenue collection and performance. This indicates that if ICT, CRM and one stop boarder post operations will improve efficiency on Revenue collection it would also contribute to tax being optimal (Damilola, 2015).

2.2.3 Theory of Equal Sacrifice

Equal sacrifice theory based on the works of Seligman (1948). Equal sacrifice theory maintains that all members and sectors of society should make equal sacrifice for the common good. This principle is often used to justify the introduction

of taxes and payment methods. This theory leads to two corollary notions of equity: vertical equity and horizontal equity. Vertical equity states that a person with a greater ability to pay taxes should contribute to a larger amount. Horizontal equity states that pay taxes with the same ability to pay should contribute the same amount in taxes.

Equal sacrifice also posits that tax payers should not be overburdened by taxation and hence taxes and methods of collection should be economical. Taxes have economic effects, and these effects entail social consequences. The choice of the taxes to be laid and rates at which they are to be applied expresses a preference for one set of economic effects, and hence of social consequences, to another. The theory of taxation, progressive or other, and the method of collection should correspond to these facts. This theory will be relevant to the study since it gives the researcher a way to evaluate whether strategic changes through the implementation of ICT, CRM, one stop boarder post operations and Staff Training has brought more sacrifice in utility on part of taxpayers and whether this brought positive contributions in terms of improving Revenue collection through revenue collection (Gerring, 2014).

2.2.4 Institutional Theory

This study adopted institutional theory developed by Powell and DiMaggio in 1991. The theory states that the organizational structures influence the flow of information and it plays an important role in strategic implementation (Scott, 2001). The arrangement of formal principles as far as approaches and strategies created in an association decides how the data streams and the activities to be embraced by staff if there should arise an occurrence of an episode of a specific sort happening (Jepperson, 1991). The theory assumes that these structures in an organization create expectations among different stakeholders in strategic implementation in an organization that

determine how actions are undertaken thereby influencing final product of strategic implementation (Zucker, 1977).

It sought cognitive and cultural explanations of social and organizational phenomena by considering the properties of supra-singular units of investigation that can't be decreased to collections or direct results of people's traits or thought processes. Creative structures that enhance specialized proficiency in early-receiving associations are legitimized in the earth. Now new and existing associations will embrace the auxiliary frame regardless of whether the shape doesn't enhance effectiveness. Meyer and Rowan (1977) observed that institutional theories are merely accepted ceremoniously in order for the organization to gain or maintain legitimacy in the institutional environment. Organizations adopt the vocabularies of structure prevalent in their environment.

The adoption and prominent display of these institutionally-acceptable trappings of legitimacy help preserve an aura of organizational action based on good faith. Legitimacy in the institutional environment helps ensure organizational survival (Greve & Teh, 2018). Scott (1995) commentates that, with a specific end goal to survive, associations must fit in with the standards and conviction frameworks winning in nature (DiMaggio and Powell, 1983) Meyer and Rowan, 1977, on the grounds that institutional isomorphism, both basic and procedural, will gain the association authenticity (Dacin, 1997).

For example, multinational companies (MNCs) working in various nations with differing institutional conditions will confront assorted weights. Some of those weights in host and home institutional conditions are vouched for apply basic influence on aggressive procedure (Martinsons, 1993; Porter, 1990) and human

resource management (HRM) practices (Rosenzweig & Singh, 1991; Zaheer, 1995). Corporations also face institutional pressures from their most important peers: peers in their industry and peers in their local (headquarters) community. Non-governmental organizations (NGOs) and social organizations can also be susceptible to isomorphic pressures. Institutions set out in an organization determine what is acceptable and whatever that is not acceptable in an organizational setting. This therefore determines how employees carry themselves around when doing their duties (Mbithi, 2017). The major criticisms of institutional theory have been its assumptions of organizational passivity and its failure to address strategic behaviour and the exercise of influence in its conceptions of institutionalization.

This theory is relevant to the study because it states that the organizational strategies and structures influence the flow of information and it plays an important role in strategic implementation. Therefore, organizational structure, environment and external pressures can objectively influence an organization to implement strategic changes to promote effectiveness in Revenue collection. The theory guided on how the organization can analyze the strategies so as to improve on ICT, CRM and one stop boarder post operations so as to improve Revenue collection.

2.3 Empirical Review

2.3.1 ICT adoption and Revenue collection

According to Hair, Black, Babin and Anderson (2015) they are banking on new-modern scanners at the port and heightened collaboration with the port of Mombasa. It is a renewed effort to curb tax and increase import duty collections, which has been hampered by miss-declaration and concealment of cargo on imported containerized goods. Huang & Yoshida (2013) in their study of the effect of Information Systems

on Revenue Collection by Local Authorities in Homa Bay County, Kenya the study findings concluded that investment in ICT and more scanners for customs department is very important to Local Authorities. This is because computerized Information Systems has a positive effect on revenue collection. Computerization of council activities such as revenue collection enhancing efficiency as a result of timely revenue collection, enhancing management integrity, provision of clear records among other factors.

Khan and U-Din (2014) argues that the automation of revenue collection has added to the system improvement in Kenya Revenue Authority (KRA), with tax evasion minimized and improved business efficiency recorded. With the introduction of ICMS, the taxman collected Sh534 billion during the 2009/2010 financial year compared to Sh298 billion collected in the 2004/2005 period, a great improvement. This technology shifts to a gross domestic product (GDP), and has seen the government realize at 95 per cent target. "Automation has reduced the cost of revenue collection and interaction between the taxpayer and staff, to fertile area for corruption.

Muthoka and Oduor (2014) examined how organization`s control, information systems and collection of revenue associated with Local Authorities in Kenya. Muthoka & Oduor focus was to determine the quality of services given to Kenyan Local Authorities. Muthoka & Oduor discovered the existence of a clear relation between local authorities and information systems. Also, there was a huge and positive relationship involving the Control Systems and revenue collection.

Nasimiyu (2013) argues that the use of the system has led to a significant improvement in the revenue collection for tax payers. Revenue mobilization is considered one of the key factors for the economic development of nations and links

in the national agenda on social wellbeing, poverty reduction and economic development of countries and their citizens. Kenya Revenue Authority is considered to be a part of a national economy.

A study to assess the impact of automation as a strategy on customs clearing procedures at KRA was done by Sigey (2010). The study had the objectives of establishing whether the automation of the customs department led to efficient service delivery and if it led to improved performance of the department. The study found that the Simba system had improved the efficiency of the department, improved the skills of the staffs, reduced cost of running the department and enhanced accountability in the customs departments. Thus, technology as a tool of strategic management has the benefits of ensuring that the costs are kept at minimum and the performance is consequently improved.

Okafor, (2012) assessed the impact of adoption of electronic tax systems in Nigeria. The study was conducted with the aim of assessing on the impact of electronic tax systems on tax administration amidst the falling of prices of crude oil in the global market. The study concluded that use of computerized system increased internally generated revenue through improved compliance and monitoring. The study further established use of integrated computer system on tax administration was beneficial as it enhanced the implementation of tax laws and regulations in Nigeria. It can therefore be deduced that use of computerized system increased revenue through enhanced monitoring and increased tax compliance. Tax compliance increases the amount of tax revenue collected in a particular year.

According to Muriithi, (2003), electronic tax system forms part of the revenue collection reforms by Kenya Revenue Authority whose main motive is enhancing tax

collections and tax efficiency and thus, tax revenues have been increasing rapidly due to the country's rapid economic development accelerated by the new systems. In this regard, the planning and formulation phase of an elaborate electronic system strategy was done in the KRA Corporate plan of 2003 and was implemented in the fourth corporate plan of 2009. KRA has a centralized Information Communication Technology (ICT) department that provides support services in terms of electronic systems to the entire organization all these to try and achieve its goals for achieving increased revenue collection and facilitating voluntary compliance by taxpayers (Muriithi, 2003).

Another study was done by Gidisu (2012) in Ghana. The study had an aim of assessing the contribution of automation of Ghana Revenue Authority on tax revenue collection enhancement. The study adopted a case study design of the customs department. The study established that there was a positive impact of automation of the tax administration system on revenue collection efficiency. The study further found out that automation of process saved on costs and time of activities thus increasing the amount of tax revenue in a particular fiscal year. The study recommended that the Ghana Revenue Authority should consider a complete integration of tax administration in order to fully benefit from automation.

2.3.2 Custom Relationship Management and Revenue collection

Implementing customer relationship management, Rothaermel (2015) considers the implementation of CRM in the banking sector to be focused on the evaluation of the critical satisfaction dimensions and the determination of customer groups with the distinctive preferences and expectations in the private bank sector. Sharabati and Fuqaha (2013) assert that banks have already began the process of deconstructing

their business through horizontal process of outsourcing, involving two trends; deconstruction i.e. move away from monolithic organizations that undertakes every activities towards networked models where a number of institutions (technology, communications) combine to deliver the overall offer to customers, centralization or work cross all segment, brands and competence.

Singh & Sharma (2007) made an attempt to study the perception of tax professionals with regard to Indian Income Tax System by collecting primary data from 100 tax consultants operating in Punjab and Haryana. They tried to investigate the role of tax consultants played in the revenue collection process by helping their clients in understanding the complex tax system and meeting their legal obligations. Factor Analysis of data showed that seven factors reduction in tax evasion, extension of relief to taxpayers, incentives for dependents and honest taxpayers, broadening the tax base, e-filing of returns, adequacy of deductions and impact of exempt-exempt tax system played an important role in determining the effectiveness of Indian tax system. It was observed that most of the tax consultants were satisfied with tax rates

Kaweesa (2004) studied the challenges of tax payer service in Uganda Revenue Authority (URA). He highlights the various problems faced in tax administrations like compliance, the tax problem (tax paying culture) and tax education. He stresses their need to provide high quality and good services to taxpayers/customers. He looks at the taxpayer as a customer and one who makes your business exist and gainful. Tax education should target to market tax as a product. Some of the tax education components he highlights include tax education programmes, tax information, and customer care and media relations.

The academic literature suggests that CRM offers firm strategic benefits, such as greater customer satisfaction and loyalty Saunders et al., (2015), higher response to cross selling and better word-of-mouth publicity. Overall, there is a strong sense that CRM efforts improve firm performance. CRM has the potential to enhance both firm performance and customer benefits through the dual creation of value. According to this view, CRM enables firms to augment the value they extract from customers, while customers gain greater value because firms meet their specific needs.

Jenkins (2014) also emphasizes that indeed the tax system can never work better than its tax administration, but even the best tax administration would certainly fail to turn a bad tax system into a well-operating one. He also warns that the existence of many ambitious tax reforms did not succeed because of the inefficient tax administration. In the absence of permanent reorganization of the tax administration and almost daily improvements in the methods of its management, it is not possible to expect that tax reforms will be successfully realized. This therefore means that tax reforms has a close correlation between successful tax policy and efficient tax administration. In other words, there is no good tax policy without efficient tax administration (Jenkins, 2014).

Tumbarello and Patrizia (2014) studied CRM in a large sample of Commercial Banks in the United States. Their study showed no concrete correlation that existed between implementing CRM and firm efficiency. This is a clear measure of how to effectively allocate resources to produce outputs. Interestingly, industry analysts predict that at least 70% of spending on CRM in the future will hinge on the potential to increase efficiency. A key requirement of competitiveness is for organizations to quickly

adjust to customer needs. Increasingly, competition enables organizations to build more contacts and sustaining relationships with customers.

Wakaya (2018) conducted a study on Customer Relationship Management strategic application and organizational effectiveness show the result from surveyed skill, while 64% of respondents agreed on poor data quality and inadequate data about their customers, competitors and markets, and 51% of respondents reported on top management support of CRM by different functional managers in the surveyed firm.

Widdowson et al., (2014) studied CRM in a large sample of Commercial Banks in the United States. Their study showed no concrete correlation that existed between implementing CRM and firm efficiency. This is a clear measure of how to effectively allocate resources to produce outputs. Interestingly, industry analysts predict that at least 70% of spending on CRM in the future will hinge on the potential to increase efficiency. A key requirement of competitiveness is for organizations to quickly adjust to customer needs. Increasingly, competition enables organizations to build more contacts and sustaining relationships with customers.

A research by Afande (2013) on effects of strategic management practices on performance of financial institutions in Kenya: A case of Kenya Post Office Savings Bank concluded that adoption of strategic practices by Post Bank in Kenya had resulted into the bank having a competitive advantage over the years. The study established the bank had adopted strategies that ensured costs were kept at minimum, improved customer care, enhanced operational efficiency and ensured that its target market had their expectations. Strategies ensure that the desired organizational goals are achieved with the most efficient means. The study also established that adoption of strategies led to revenue growth and increased the net worth of the bank. According

to Pearce and Robinson (2007) a strategy is a comprehensive and integrated plan that sought to connect the organizations strategic advantages with the challenges in the environment. In other words, strategies ensure that goals are met efficiently. The modern business environment is very turbulent and institutions that survive are those that are proactive in dealing with risks.

Wily (2008) presented South Africa's experience in implementing CRM. According to him, the Southern Africa nation was strongly predicted that it will develop into a "loyalty marketing gem." His research found that South Africa's black middle class population, historically ignored, stood the chance of doubling consumer spending power within a short time. This would drive South Africa's economic growth. This African nation boasts various loyalty programmes. Leisurelink (1996) is one. Another is SAA voyager or South African frequent flyer (1994), yet another is Clicks Club Card (1996). Discovery Health's Vitality (1997) is another programme. MTN call Awards (MTN-1999) is also another programme as is eBucks (First Rand -2000). According to Wily (2008), these loyalty programmes were historically targeted to advantaged communities. These programs have had a huge impact by strongly influencing the people's buying behavior and their retention as customers.

Sagas et al, 2015 did an assessment of the impact of electronic tax register on revenue collection by Kenya Revenue Authority western region, Kenya. Findings from their study indicated that 75% of the respondents were of the opinion that ETR machines have helped to curb cases of tax evasion 86% of the respondents were of the opinion that ETRs have helped increase revenue collection due to their efficient nature. (Wang'ombe, 2009) did a study on the revenue productivity and some administrative factors of the Kenyan tax system for the period 2001–2008. The result of this study

came up with buoyancy estimates of the total tax system as 1.26 while elasticity was 1.27. The study thus concluded that the tax system in general was both elastic and buoyant implying that tax reforms had greatly improved productivity. Discretionary tax measures had a very small effect on tax productivity implying improved efficiency.

Odundo (2007), carried a study on change management practices by the Kenya Revenue Authority. The study had an overall objective of assessing how the management of the state department adapted to changes with an aim of enhancing the performance of the corporation. The study established that the management had a great role in ensuring that changes are implemented effectively in the Authority. The study further notes that due to the strategic changes, departments within the authority were split, others were merged in order to stream line the activities of the authority. Also, KRA had to develop a strategic plan that clearly laid down the objectives and the means of achieving them. Thus, this study provides insights on the strategic management impact on managing changes which is very vital in strategic practices. However, the study does not consider customer efficiency which this instant study will incorporate in its analysis.

2.3.3 One Stop Border Post and Revenue collection

As Zhou and Madhikeni (2013) identified, conflict of interests of different stakeholders may sabotage efforts towards successful implementation of OSBP. Therefore, clear understanding and support for implementation of OSBP from government is vital. Political will and commitment are identified as starting points for effective public reforms. For example, as shown in the example of bilateral agreement between Canada and USA, government commitment played the most important role

in the formation and execution of Action Plan of Smart Borders. Additionally, during the implementation process of OSBP different ministries and agencies are distributing responsibilities and procedures. Mostly, customs administration plays leading role at the border. But motivation and commitment of other agencies are equally important.

According to Kelman (2005) the changing phase comprise the following elements; compliance, when individuals are forced to change either by reward or punishment; internalization which, occurs when individuals encounter new situations that require a new behavior; and identification, which occurs when individuals recognize a model in the environment that is most suitable for their personality. This is equivalent to refreezing phase proposed by Lewin (1951) as cited by Schein, (2010), which entails totally discarding the old ideas and practices and embracing the new ones. For there to be a sustained change in behavior, the new ideas and attitudes needs to be reinforced (Kanter et al, 2005). The executives need to provide resources and leadership in the change process, lest strategy implementation fails resulting in missed opportunity for improvement.

According to Mohammad, (2015), satisfaction in the banking services context is in contrast to products, since the service encounter is key in the evaluation, this being the interaction with the service provider and the customers. Hence customers can only evaluate services once the service actually takes place. Therefore, the customer service experience is defined by the interaction with the organization, the processes involved, and its employees. Various bank service attributes that may be used to measure satisfaction mentioned include accessibility of offices, appearance of the facility, attitude and behavior of staff, decor and atmosphere, business hours, price and relation to quality (interest rates and charges) and execution time (Mohammad,

2015). Other attributes include the bank's reaction to complaints and communication methods with the bank, for example, via telephone, the Internet and so on.

According to the Bonilla (2016) many countries are realizing the benefits of less restriction to cross border trade and thus are pushing for less restrictive borders and adopting a strategy known as the One Stop Border Post (OSBP) as a mechanism to improve the movement of goods and services across shared international borders. Where implemented, this strategy has been found to have both economic and customs law enforcement benefits. However, to succeed its implementation required the support of all border management stakeholders.

Chauhan (2013) researched on "the impact of automation as a structural change strategy on customs clearing procedures at Kenya Revenue Authority". Using the study, He sought to find out and explain the actual "impact of automation on clearance procedures in the customs service department of the KRA. Chauhan findings indicated that automation of clearance procedures using the one stop border post in the local tax department greatly enhanced operational usefulness and productivity, increased employees' professionalism and productivity, reduction of operational costs and improved governance.

According to Chimilila et al., (2014), the Busia border post has been blamed for delays consequently resulting to congestion at the port of Mombasa. These delays have in the past led to strikes and go slows by transporters and clearing agents. Impatient truckers and traders often offer bribes either to jump queues or expedite clearance of their cargo. Border delays and the absence of enforceable means of settling disputes have been blamed for hindering the opening up of trade in East Africa, even after the launch of the EAC Common Market.

According to the World Bank (2016), in Africa 25% of border delays are caused by infrastructure while 75% are caused by poor trade facilitation. These delays and bureaucracy make African transport costs to be on average, three times more expensive than those of South America and five times more expensive than Asian ones: these impacts negatively on the competitiveness of African goods on the international markets, (International Charity for Africa (icafrika), 2010).

In Nigeria ineffective implementation of strategy was a challenge in tax administration (Abiola & Asiweh 2012). In their study on the impact of tax administration on government revenue in the developing countries, the study established that there was a need to enhance capacity in the departments responsible to collect tax on behalf of the state. The study collected primary data by use of questionnaires from 121 respondents. The study indicated that Nigeria lacked the appropriate tools for enhancing the revenue collection. Among the challenges identified were poor information and communication systems and lowly skilled human resources. Thus, it can be noted that items of strategic management had not been looked into with careful consideration. Strategic management practices ensure that the organization is better placed to achieve its objectives amidst the challenges in the industry. Strategic management is a careful analysis of the organization's purposes and aligning their plans and actions to meet those purposes. Coulter (2008), notes that strategic management ensures that the competitive advantages of the firm are sustained. This includes the development of new products, new business processes, innovativeness and adoption of new technology. The formulation and implementation of strategies aligns the organization to its environment and its goals

Traders look for more choices, better service, higher quality, and faster delivery. The relationship with traders has turned a strategic issue for today's companies that is according to (Wilson, 2015). The model suggests that when users are presented with a new technology, a number of factors influence their decision about how and when they will use it. In clearance of goods in Kenya, An IDF must be applied for and obtained from the Kenya Revenue Authority for any Commercial Importation. The Importer is responsible for applying for the IDF but may use an agent to consult or input this into the ORBUS system. Once the IDF is passed, the importer might proceed to arrange inspection of the cargo (Derudder, 2012). The documents required in clearance of goods are as follows, IDF, bill of lading, commercial invoice, and certificate of conformity. Prior to actual vessel arrival date in Mombasa, the shipping line lodges its online manifest with customs (into Simba Tradex system) and the port authorities (port KWATOS system). Against the uploaded manifest, a customs entry is prepared on the Simba Tradex online system by the importers clearing agent. Parallel to this, once the manifest is uploaded by the shipping line, the original Bill of Lading duly endorsed by the consignee is submitted to the shipping line for issuance and release of a delivery order. This is done after settlement of the local shipping line charges which is also uploaded online. Uploaded entries are passed after either payment of duties or confirmation of exemption by means of the exemption letter code in the customs system. In the Simba system, the entries are categorized according to the sensitivity of the cargo. The channels are green, yellow and red. The green channel indicates low risk; yellow channel indicates moderate risk while red channel indicates high risk. High risk goods are subjected to scanning and sometimes 100% verification. After verification of the cargo, a pick up order is generated via the Kwatos website KPA, on line, for all consignments cleared within the port of

Mombasa. The process from lodging of IDF to the release of the cargo has been on routine taken at least seven days. The introduction of new systems is expected to expedite the clearance process to at least three days.

Border delays represent one of the remaining major non-tariff barriers in Africa for they impede the faster movement of goods and people across the continent. These delays curtail trade facilitation which research to date has identified as a solution to most economic ills bedeviling the Third World countries. In the Southern African Customs Union (SACU), the establishment of one stop border posts was identified as one of the priority issues of trade facilitation (Ogalo, 2010). In Southern Africa, a one stop arrangement was recently introduced at the Chirundu border post between Zambia and Zimbabwe, and Mozambique and South Africa have signed a one stop border post agreement and are working towards implementation (Ogalo, 2010).

2.3.4 Staff training and Revenue collection

Damilola (2015) carried out an empirical study to determine the effect of staff training in monetary collection on service delivery in different cities in the UK. The study used regression analysis among 70 respondents from 10 different cities. The results of the study revealed that tax collection improved with improved staff training. This is because the staff is more motivated. Gerring (2014) analyzed the relationship between tax Staff Training and the tax department. The study was carried out on a random sample of 20 parking attendants in China. The results of a job in the tax collection and the ability to train. He is prominent in employee surveys.

Grethe (2018) conducted in Malaysia on coordinating skills in advanced Information and Communications systems and tax software in tax education to employees. The study`s target population was tax practitioners and its aim was to establish the basic

skills needed by taxpayers to be able to effectively use an online tax system. The study discovered that three special abilities were required for the best interaction between an individual and a computer-based tax system namely, “spread sheet software, word-processing software and e-mail”. These findings from the study have inferences on the present study as in during ascertaining of the effectiveness of ICT support services, the basic skills that system user sought to possess must be considered in employee refresher courses. Ignoring these skills could possibly make the overall goal targeted by the entire system.

Grottel (2017) argues that in Nigeria for example, individual firms and companies have started making various attempts at Staff Training the required skilled manpower. Industries like the Nigerian Port Authority, Nigerian Telecommunication Limited and Banking industries have taken their Staff Training schools. The author further contends that the Government and its various agencies, as well as realizing various Staff Training schools for human resource development. This is buttressed by the Nigerian National Policy on Education, Section 52, Sub-section 4 (2004) which states that; "For all classes of workers, different kinds of in-service Staff Training course, seminars, conferences or workshops should be arranged on a continuing basis.

Gunes and Atilgan (2016) in their research found out there were limited chances of Staff Training in the sugar industries and this was due to shortages of finances, therefore Staff Training was confined to health, safety and management committee workers which were done on legal requirements. However, technical Staff Training does have a considerable influence on company finances as there are several potential Staff Training costs that companies may incur. These costs are related to employees' output and productivity during and upon completion of the Staff Training. In

addition, once Staff Training is completed, employee productivity is expected to increase.

Kassee (2014) examined the effectiveness of strategic changes on organizational performance of IT companies in US. The cross-sectional design was which consisted of a quarterly report. The study concluded that strategy did not necessarily enable firms to respond to their customer needs. A negative correlation between strategic changes and organizational performance was established.

A survey by Kunz, Reiner & Gold (2014) in the Netherlands found that most manufacturing firms used strategic changes Ketchen and Palmer, (2013) investigated the effectiveness of strategic changes and organizational performance in the Textile Industry. The study used a longitudinal research design. 300 managers were interviewed in different states. Textile firms that utilized strategic changes performed better than those firms that were able to adopt strategic changes.

Matsuda (2012) examined the impact of strategic changes on firm performance of service firms in Lagos, Nigeria. The study found that strategic alliance and product innovation influenced firm performance. Product innovation led to increased sales since customers got quality products which were difficult to imitate by competitors. The findings depicted that strategic alliances improve synergy between firms. Widely used to offer products and services to customers.

Ndonga (2013) did an investigation of strategic changes of mobile money transfer services in Barclay banks in Kampala, Uganda. The results found that product innovation, differentiation, strategic alliances and mergers were commonly used strategies by Barclays. Implementation of these strategies enabled the bank to effectively cope with changes in the market and guarantee survival. In so doing, the

bank was able to cater for the growing needs of its customers. This improved customer loyalty, growth sales and increased profitability.

Tesfaye & Walter (2017) studied the strategic changes used by pharmaceutical manufacturing companies in Kenya. The study used a cross-sectional design where data was collected using questionnaires once. Primary data was collected using semi-structured questionnaires. The results found that pricing, marketing and strategic alliances were the most commonly used strategies in pharmaceutical companies to maintain competitive advantage

Tosevska-Trpcevska (2014) investigated the strategies responses used by NIC bank. NIC bank. Five (5) departmental heads were interviewed and data was analyzed using content analysis. The findings revealed that differentiation and diversification were the main strategic changes used by NIC bank. Tumbarello & Patrizia (2014) studied strategic changes adopted by agrochemical firms. The study used to describe the strategic changes and their contribution to organizational performance. Primary data collected using unstructured questionnaires that were administered using a drop and pick later method. The findings indicated that the most popular responses were adopted by agro-chemical companies were differentiation and go-to-market strategy.

Faems, Sels, DeWinne and Maes (2005) list the following as general benefits from employee training: increased job satisfaction and morale, increased motivation, increased efficiencies in processes, resulting in financial gain, increased capacity to adopt new technologies and methods, increased innovation in strategies and products, reduced employee turnover. This is only a partial listing of the many benefits that result from training. Training that is appropriate to the needs of an organization can add great value.

2.4 Summary of Literature and Emerging Issues

This chapter discusses the literature review of the study; theoretical and the empirical review explains the past studies previously performed on the effect of strategic change implementation on Revenue collection by Customs Service Department of KRA. The current study focused on the effect of strategic change implementation on Revenue collection by Customs Service Department of KRA. The theoretical review discusses the major past activities that addressed the variables stated by the study objectives, this makes the study to explore widely on the past efforts that have been stressed on the effect of strategic change implementation on Revenue collection by Customs Service Department of KRA. Critical analysis was made and gaps discuss.

Several academics in recent years have studied performance drivers in organizations and researchers in strategic changes who have also presented similar research. Previous studies explained in the theoretical review have shown an effort to identify the effect of strategic change implementation on Revenue collection by Customs Service Department of KRA. Although this was conducted by several researchers with different points of view, an effective conclusion was not reached, their studies involved hypotheses on which it was not possible to rely on identifying the effect of strategic change implementation on Revenue collection by Customs Service Department of KRA.

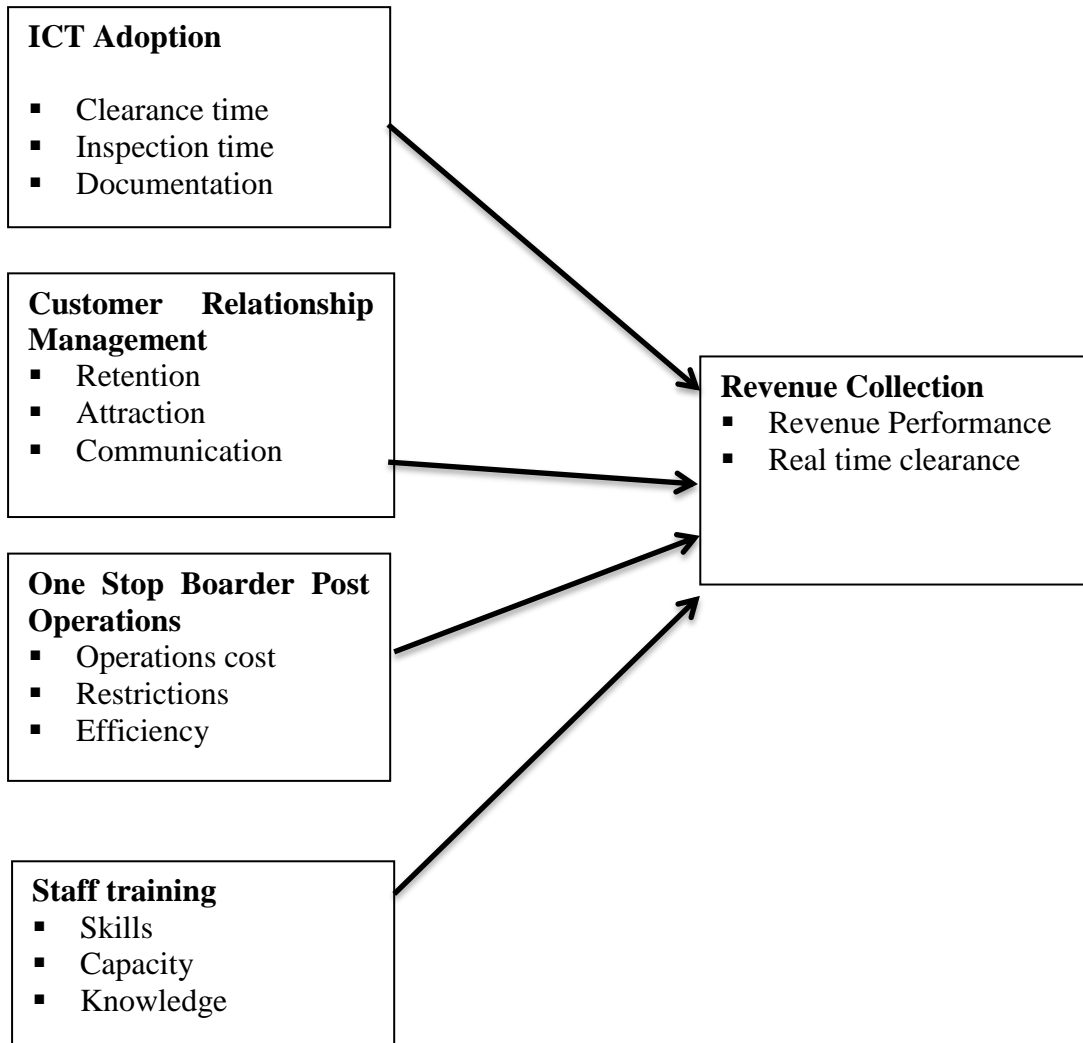
2.5 Conceptual Framework

Ravitch and Riggan, (2012) define a conceptual framework as an analytical tool with several variations and contexts and used to make conceptual distinctions and organize ideas. The independent variables of this study are ICT adoption (clearance time, Inspection time, reduced documentation), Customer Relationship Management

(Retention percentage, Recurring revenue, Closure rates) , one stop border post (Reduced Cost, Reduced documentation, Efficiency), Staff training (Skills, Capacity, Knowledge) whereas the dependent variable is revenue collection.

Independent Variables

Dependent Variable



Source: Researcher (2019)

Figure 2.1: Conceptual Framework

(Source: Author 2020)

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

This chapter highlights sections such as research design, target population and sample frame. The chapter also presents data collection, validity and reliability of research instruments and data analysis.

3.2 Study Area

Area of study is an interdisciplinary research field and scholarship that belong to particular geographic, national regions (Gunes & Atilgan, 2016). The area of the study was the Customs Service Department of Kenya, Mombas. The Customs Services Department (CSD) is the largest of the four revenue departments of KRA in terms of manpower and countywide operational network. The primary function of the Department is to collect and account for import duty and VAT on imports (Kenya Revenue Authority, 2019). Apart from its fiscal responsibilities, the CSD is responsible for facilitation of legitimate trade and has the mandate of protecting the society from illegal entry and exit of prohibited and dangerous goods through the land and sea border points. A bulk of CSD's operations is in KRA's administrative Southern Region which covers the coastal region of Kenya where the port of Mombasa is located.

All import and export commodities to and from Kenya, pass through customs control which reflects the critical role of CSD in regulating the movement into and outside the country of items that may be used for terror such as small weapons, materials for making improvised explosive devices and live explosive devices such as grenades and bombs. It also includes control of items that may be used for biological weapons such

as bacteria and viruses. Kenya being a trusted trade partner of US, European and Asian countries may see the port of Mombasa used as a transit portal for export of dangerous goods.

3.3 Research Design

Research design is a plan for collecting and utilizing data so that desired information can be obtained with sufficient precision (Miles and Huberman, 2004). This study adopted explanatory design were used in the process of choosing the respondents because it involves attempting to determine whether one variable has an impact or the effect on another variable. The aim goal is to detect cause and effect relationships between the variables (Zikmund, 2000). This design was chosen because it is relatively quick and easy to conduct; data on all variables is only collected once. It is also good for descriptive analysis. The adopted design enabled the researcher to collect large amount of data from an ideal population and in a highly economical way. Questionnaires were used and this was to ensure that data collected is standardized, easily understood and easy to compare. A cross-sectional study examines the relationship between automated customs systems and trade facilitation as they exist in a defined population at a single point in time (Levin, 2011). This design was chosen because it is relatively quick and easy to conduct; data on all variables is only collected once. It is also good for descriptive analyses.

3.4 Target Population

The target population refers to the group of people or study subjects who are similar in one or more ways and which forms the subject of the study in a particular survey (Orodho, 2003). Target population defines those units for which the findings of the study are meant to be generalized from (Dempsey, 2003). Any researcher draws a

sample from all items in any field of inquiry constitute a population (Kothari, 2008). The study targeted 547 respondents from the KRA customs service department. The target population is presented in Table 3.1

Table 3.1 Target Population

Category of the Population	Study Population
Chief managers	2
Managers	15
Supervisors	215
Officers	315
Total	547

Source: KRA (2020)

3.5 Sampling Technique and Sample Size

3.5.1 Sample Frame

According to Acharya *et al.*, (2013), a sampling frame is a list of the sampling units that is used in the selection of a sample. The sampling frame was the which were 2 chief managers, 15 managers, 215 supervisors and 315 officers

3.5.2 Sample Size

According to Kothari (2003) sample size refers to the number of observations or replicates to include in a statistical sample. The sample size is an important feature of any empirical study in which the goal is to make inferences about a population from a sample. Sampling technique refers to a procedure of selecting a part of population on which research can be conducted, which ensures that conclusions from the study can be generalized to the entire population Orodho (2003). The researcher obtained sample size using Yamane formulae (1967).

$$n = \frac{N}{1 + N(e)^2}$$

.....equation 3.1

Where:

n = Sample size required

N = Population size

e = Level of precision =0.05

n =547/ (1+547*0.05²)

n =231

Therefore, the sample size for this study was 231 respondents

Table 3.2: Sample Size

Category of the Population	Sample Size
Chief managers	1
Managers	6
Supervisors	91
Officers	133
Total	231

Source: Researcher (2020)

The study used stratified sampling technique where chief managers, managers, supervisors and officers formed the four strata. Proportional sampling was adopted to calculate the independent sample size for each stratum. After getting the number of officials the researcher used simple random sampling to select the required sample size. These methods ensured there is no biasness in selection of sample size.

3.6 Data Collection Instruments and Instruments

The data was collected in this study using structured questionnaires. Questionnaires contained both open and closed-ended structured questions. The structured questionnaire started with an introductory request followed by items which are subdivided into three parts. Part 1 is set to capture personal information of the respondents such as gender, age, education level; part 2 is set to capture items on effect of ICT adoption, customer relationship management (CRM), one stop border post (OSBP) operations and staff training on Revenue collection. Part 3 is set to capture items on Revenue collection by Customs Service Department of KRA. The questionnaires utilized five-point Likert scale (Strongly Agree (SA), Agree (A), Neutral (N), Disagreed (D) and Strongly Disagree (SD)) which was assigned scores of between 1 and 5. This allowed the researcher to draw conclusions based on comparisons made from the responses. The researcher opted to use questionnaires so as to collect a lot of information within a very short period of time. Also, questionnaires compared with other data collection techniques were less costly to administer as supervision or follow up of respondents was not required.

Table 3.3 Variables and Measurements

Variable	Indicators	Measurement scale	Method of analysis
Independent	▪ Clearance time	5-Likert Scale	Descriptive statistics
ICT adoption	▪ Inspection time ▪ Documentation		Regression Analysis
Independent	▪ Retention	5-Likert Scale	Descriptive statistics
Customer Relationship Management (CRM)	▪ Attraction ▪ Communication		Regression Analysis
Independent	▪ Operations cost	5-Likert Scale	Descriptive statistics
One stop boarder post operations	▪ Restrictions ▪ Efficiency		Regression Analysis
Independent	▪ Skills	5-Likert Scale	Descriptive statistics
Staff training	▪ Capacity ▪ Knowledge		Regression Analysis
Dependent	▪ Revenue collection	5-Likert Scale	Descriptive statistics
Revenue collection			Regression Analysis

Source: Researcher (2020)

3.7 Pilot Testing

In order to ascertain reliability and validity of the research instruments, the researcher piloted the instruments by distributing 24 questionnaires to respondents in KRA Nairobi, which were not part of the area to be sampled. The pilot respondents represented 10% of the sample size. The results of the piloted research instruments enabled the researcher to determine the consistency of responses made by respondents and adjust the items accordingly by revising the document.

3.7.1 Validity Test

According to Mugenda, and Mugenda (2003) validity is the accuracy and meaningfulness of the inferences which is based on the research results, it is the degree to which the results obtained from the analysis of the data actually represent the phenomena under study. The validity of the instruments was determined through the content validity of the instruments. Content validity is concerned with whether or not a test or measuring instrument is a representative of a full content under study (Shaw & Weir, 2007). Content validity is most often measured by relying on the knowledge of people who are familiar with the construct being measured. The subject-matter experts who are in KRA Nairobi were provided with access to the measurement tool and asked to provide feedback on how well each question measures the construct in question. Their feedback was analyzed, and informed decisions were made about the effectiveness of each question. Thus, the questionnaire included all items on the independent and dependent variable.

3.7.2 Reliability Test

Reliability is the consistency of measurement, or the degree to which an instrument measures the same way each time it is used under the same condition with the same subjects (Cohen *et al*, 2000). To achieve this, the study's instruments were designed in such a way as to ensure that the quality of questions asked was high and unambiguous through pre-testing process. The reliability of the study instruments was established by computing the Cronbach's alpha (α). Data collected from pilot study was used to test for reliability of research instruments. According to Pallant (2011) when using the Cronbach's Alpha coefficient value to test reliability, a value above 0.7 is considered acceptable; however, a value above 0.8 is preferable. This method requires neither the splitting of items into halves nor the multiple administrations of

instruments. The internal consistency method provides a unique estimate of reliability for the given test administration.

3.8 Data Collection Procedure

Upon getting the consent of the University, the consent of the supervisors and obtaining permission from National Council for Science and Technology and Innovation (NACOSTI), the researcher proceeded to get permission from KRA authorities. Before the actual data collection exercise took place, the researcher undertook preliminary survey within the selected study area and made appointments with the identified persons. During the appointment day, the researcher personally administered the questionnaires to the selected respondents in the morning and collected them in the afternoon. Data were collected from the respondents using questionnaires as the main collection tools. A follow up was made to ensure that the questionnaires were according to the research objectives.

3.9 Data Processing and Analysis

Data collected was analysed using descriptive statistical techniques which were frequencies, mean, standard deviation. Data from questionnaires was descriptively analysed to describe the demographic profile of target respondents in frequency and percentage of the sample characteristics in the form of tables and written explanations as well as central tendencies measurement of constructs that include frequencies, mean and standard deviation. The findings were presented by use of frequency distribution tables that gave a record of a number of times a score or a response occurs. The researcher also used inferential statistics Pearson correlation and multiple regression to show the relationships that existed between the variables. The

significance of each independent variable was tested at a confidence level of 95%. The analysis was displayed visually using graphs, frequency tables and graphs.

3.9.1 Analytical Model

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

Where Y = Revenue collection

α = Constant term

β_1 = Beta co-efficient

X_1 = ICT adoption

X_2 = Customer relationship management

X_3 = One Stop Boarder Post

X_4 = Staff training

ε = Error term

The T-test was used to test the significance of the difference in pre and post Revenue collection. These tests were conducted with 95% of confidence ($\alpha=0.05$).

3.9.2 Testing Assumptions of the Multiple Regression Model

3.9.2.1 Normality Test

Multiple regressions assume that variables have normal distributions (Darlington, 1968; Osborne & Waters, 2002). This means that errors are normally distributed, and that a plot of the values of the residuals will approximate a normal curve (Keith, 2006). The assumption is based on the shape of normal distribution and gives the researcher knowledge about what values to expect (Keith, 2006). The normality of collected data was analyzed by the use of Kolmogorov-Smirnov test (K-S). For all the probabilities that are greater than 0.05, the collected data was considered as normally distributed (Zikmund, 2010).

3.9.2.2 Linearity Test

Linearity defines the dependent variable as a linear function of the predictor (independent) variables (Darlington, 1968). Multiple regressions can accurately estimate the relationship between dependent and independent variables when the relationship is linear in nature (Osborne & Waters, 2002). The chance of on-linear relationships is high in the social sciences; therefore, it is essential to examine analyses for linearity (Osborne & Waters, 2002). Linearity assumption accurately estimates the relationship between dependent and independent variables; it tests if the relationships are linear in nature. Non linearity of the regression analysis underestimate the true relationship between the study variables.

3.9.2.3 Multicollinearity Test

Multicollinearity refers to the assumption that the independent variables are uncorrelated (Darlington, 1968; Keith, 2006). The researcher is able to interpret regression coefficients as the effects of the independent variables on the dependent variables when co linearity is low (Keith, 2006; Poole & O'Farrell, 1971). This means that we can make inferences about the causes and effects of variables reliably. Multicollinearity occurs when several independent variables correlate at high levels with one another, or when one independent variable is a near linear combination of other independent variables (Keith, 2006). The more variables overlap (correlate) the less able researchers can separate the effects of variables. In MR the independent variables are allowed to be correlated to some degree (Cohen, 1968; Darlington, 1968; Hoyt et al., 2006; Neale et al., 1994). The regression is designed to allow for this, and provides the proportions of the overlapping variance (Cohen, 1968). Ideally, independent variables are more highly correlated with the dependent variables than with other independent variables. To diagnose multicollinearity the study used

inflation factors (VIF) and tolerance. A VIF greater than 10 or tolerance below 0.10 imply serious multicollinearity problem.

3.9.2.4 Autocorrelation Test

Autocorrelation refers to the assumption that errors are independent of one another, implying that subjects are responding independently. The goal of research is often to accurately model the 'real' relationships in the population (Osborne & Waters, 2002). In educational and social science research it is often difficult to measure variables, which makes measurement error an area of particular concern (Osborne & Waters, 2002). To diagnose violations of this assumption is through Durbin-Watson Statistic test. The statistic D ranges in value from zero to four. When the error terms are independent, we expect D to be close to 2. "Small" values of D suggest that error terms tend to cluster (positive autocorrelation); "large" values of D suggest that error terms tend to alternate (+, -, +, -) (negative autocorrelation).

3.10 Ethical Consideration

The researcher sought informed consent from the University where the letter was introduced to the border posts. The respondents filled the questionnaires voluntary without coercion or intimidation. The researcher should be confidential, not coercive, should not use undue influence, should respect the respondents, be patient with them, courtesy, integrity and is required to be objective. The privacy of respondents was observed through non-disclosure of their identity. The researcher maintained the anonymity of the respondents throughout the study.

CHAPTER FOUR

DATA ANALYSIS, PRESENTATIONS AND INTEPRETATIONS

4.1 Introduction

This chapter presents the study findings then goes a step ahead to interpret and discuss them. It provides the inferential and descriptive statistics that was utilized to present the findings. The main of this study was to establish the effect of strategic change implementation on revenue performance by Customs Service Department of KRA.

4.2 Response Rate

To establish the total number of the respondents who actively participated in the study by answering and submitting the questionnaires for data analysis, an analysis of the response rate was carried out and presented in Table 4.1.

Table 4.1 Response Rate

Response rate	Frequency	Percentage
Response	211	91.30%
Non-Response	20	8.70%
Total	231	100%

Source: Field data (2019)

The table indicates that the total response rate comprised 211 respondents who were 91.3% of the total sample size. The non- response rate comprised 20 respondents who were 8.7% of the total sample size. The response rate of 91.3% gave the study a high degree of representativeness that could be relied upon to generalize the respondents' views on the influence of establish the effect of strategic change implementation on revenue performance by Customs Service Department of KRA. This was in tandem with Cooper & Schindler (2003) who argued that response rate exceeding 30% of the total sample size provides enough data that can be used to generalize the characteristics of a study problem as expressed by the opinions of few respondents in

the target population. This response rate is considered very good to enable the determination of the phenomenon that exist as it is in line with Mugenda and Mugenda (2008) assertion.

4.3 Pilot Study Results

The study conducted pilot study to test reliability and validity of the research instrument. The pilot study used 24 respondents which is 10% of the total sample size. This study collected data from chief managers, managers, supervisors and officers. The target population was drawn from KRA human resource department. Pre testing revealed constructed to both reliability and validity and also gave an opportunity to refinement of the research instrument prior to actual research.

Table 4.2: Reliability Test Results

Constructs	Test Items	Cronbach's Alpha
Revenue performance	4	0.8684
ICT adoption	4	0.7214
Customer relationship management	4	0.7907
One stop boarder post	4	0.7411
Staff training	4	0.7736
Average		0.7790

Source: Field data (2019)

As shown in Table 4.2, the coefficients for revenue performance (0.8684), ICT adoption (0.7214), Customer Relationship Management (0.7907), one stop boarder post (0.7411), and Staff Training (0.7736) were all above 0.7, which was closer to 1 signifying that the instruments were reliable. Further, the overall coefficient was $0.7790 > 0.7$, thus reliable.

4.4 Respondents General Information

This section provides the analysis of demographic information provided data regarding research participants and was necessary for the determination of whether the individuals in a particular study were a representative sample of the target population and testing appropriateness of the respondent in answering the questions for generalization purposes. This include; Gender, age, level of education and years in the organization.

4.4.1 Gender of the Respondents

The gender of the respondents was first sought since the findings would assist the study categorize respondents based on gender and the findings are show in Table 4.3

Table 4.3 Gender of the respondents

Gender	Frequency	Percentage
Male	147	69.9
Female	64	30.1
Total	211	100

Source: Field data (2019)

The findings in Table 4.3 shows that majority of the respondents 147(69.9%) were male while minority 64(30.1%) were female. This implies that majority of the subjects who participate in the study were male compared to their female counterparts.

4.4.2 Age bracket

The age of the respondents was sought since its findings would assist the study categorize respondents based on age. The study findings are presented in Table 4.4

Table 4.4 Age bracket

	Frequency	Percentage
21-35 years	81	38.6
36-45 years	114	53.9
46-55 years	13	6.2
55 years and above	3	1.3
Total	211	100.0

Source: Field data (2019)

The study findings in Table 4.4 shows that 81(38.6%) of the respondents were aged between 21 and 35 years, 114(53.9%) were aged between 36 and 45 years, 13(6.2%) were aged between 46 and 55 years and 3(1.3%) were aged above 55 years. The results are an indication that majority of the respondents have a substantial mature age which means they are in a position to handle the topic under the study.

4.4.3 Highest level of education

Academic qualification of the respondents was sought since its findings would assist the study categorize respondents based on their academic qualifications and findings are shown in Table 4.5.

Table 4.5 Highest level of education

	Frequency	Percentage
Certificate	3	1.3
Diploma	18	8.5
Degree	185	87.9
Masters	5	2.3
Total	211	100.0

Source: Field data (2019)

The findings in Table 4.5 shows that 3(1.3%) of the respondents had certificate level, 18(8.5%) had diploma, 185(87.9%) had degree and 5(2.3%) had masters. This implies that the respondents had sufficient academic qualification to understand the topic being studied. The study also implies that the composition of study population is fairly representative.

4.4.4 Number of years in the organization

Lastly on demographic information, the study sought to determine the years the respondents had been in the organization. The study results are summarized in Table 4.6

Table 4.6 Number of years in the organization

	Frequency	Percentage
Less than one year	59	28.1
1-4 years	74	35.3
5-9 years	45	21.2
9 years and above	32	15.4
Total	211	100.0

Source: Field data (2019)

The study results in Table 4.6 show that 59(28.1%) have been in leadership for less than one year, 74(35.3) for 1-4 years, 45(21.2%) for 5-9 years and 32(15.4%) for 9 years and above. The study finding implies that the respondents have been in the organization long enough to understand the effect of strategic change implementation on revenue performance by Customs Service Department of KRA.

4.5 Descriptive Statistics

The study sought to study the effect of strategic change implementation on revenue performance by Customs Service Department of KRA.

This section represents the descriptive statistics in relation to the study namely; ICT adoption, Customer relationship management, One stop boarder post, staff training and

the dependent variable revenue performance. To achieve this, a five point likert scale was used where; 1=Strongly Disagree, 2=Disagree, 3=Undecided.4=Agree, 5=Strongly Agree.

4.5.1 ICT Adoption

The study first sought to establish the effect of ICT adoption on revenue performance by Customs Service Department of KRA. Table 4.7 presents the study results.

Table 4.7 ICT Adoption

Statements	N	Mean	Std dev	Skewedness	Kurtosis	Min	Max
The adoption of technology has reduced tax clearance time	211	4.18	1.089	-1.52	1.63	1	5
The adoption of technology has reduced revenue loss	211	3.99	1.164	-1.17	0.47	1	5
Adoption of technology has helped to ease the burden of over-staffing	211	4.00	1.234	-1.24	0.44	1	5
Adoption of technology has reduced documentation	211	4.04	1.223	-1.29	0.57	1	5
Valid							
	N 211						

Source: Field data (2019)

Table 4.7 shows that the respondents agreed that the adoption of technology has reduced tax clearance time (Mean=4.18, standard deviation=1.089). Also, the respondents agreed that the adoption of technology has reduced revenue loss (Mean=3.99, standard deviation=1.164). Further, the respondents agreed that the adoption of technology has helped to ease the burden of over-staffing (Mean=4.00, standard deviation=1.234). Finally, the respondents agreed that Adoption of technology has reduced documentation (Mean=4.04, standard deviation=1.223).

The study findings agree with Khan and U-Din (2014) who argues that the automation of revenue collection has added to the system improvement in Kenya Revenue Authority (KRA), with tax evasion minimized and improved business efficiency recorded. With the introduction of ICMS, the taxman collected Sh534 billion during the 2009/2010 financial year compared to Sh298 billion collected in the 2004/2005 period, a great improvement. This technology shifts to a gross domestic product (GDP), and has seen the government realize at 95 per cent target. "Automation has reduced the cost of revenue collection and interaction between the taxpayer and staff, to fertile area for corruption.

The study also coincides with Muthoka and Oduor (2014) who examined how organization`s control, information systems and collection of revenue associated with Local Authorities in Kenya. Muthoka & Oduor focus was to determine the quality of services given to Kenyan Local Authorities. Muthoka & Oduor discovered the existence of a clear relation between local authorities and information systems. Also, there was a huge and positive relationship involving the Control Systems and revenue collection.

4.5.2 Customer relationship management

The study sought to establish the effect of customer relationship management on revenue performance by Customs Service Department of KRA. Table 4.8 presents the study results.

Table 4.8 Customer Relationship Management

Statements	N	Mean	Std dev	Skewedness	Kurtosis	Min	Max
The level of compliance in the organization has increased	211	4.00	1.162	-1.30	0.85	1	5
There is high customer retention by the organization	211	3.98	1.210	-1.20	0.48	1	5
There is effective communication between the organization and other stakeholder	211	3.96	1.18	-1.23	0.76	1	5
The rate of customer attraction has increased over time	211	4.08	1.078	-1.36	1.28	1	5
Valid		4.00					

Source: Field data (2019)

Table 4.8 shows that the respondents agreed the level of compliance in the organization has increased (Mean=4.00, standard deviation=1.162). Also, the respondents agreed that there is high customer retention by the organization (Mean=3.98, standard deviation=1.210). Further, the respondents agreed that there is effective communication between the organization and other stakeholder (Mean=3.96, standard deviation=1.118). Finally, the respondents agreed that the

rate of customer attraction has increased over time (Mean=4.08, standard deviation=1.078).

The study results concur with Jenkins (2014) who emphasized that indeed the tax system can never work better than its tax administration, but even the best tax administration would certainly fail to turn a bad tax system into a well-operating one. He also warns that the existence of many ambitious tax reforms did not succeed because of the inefficient tax administration. In the absence of permanent reorganization of the tax administration and almost daily improvements in the methods of its management, it is not possible to expect that tax reforms will be successfully realized.

The study results also concedes with Wakaya (2018) who conducted a study on Customer Relationship Management strategic application and organizational effectiveness show the result from surveyed skill, while 64% of respondents agreed on poor data quality and inadequate data about their customers, competitors and markets, and 51% of respondents reported on top management support of CRM by different functional managers in the surveyed firm.

4.5.3 One stop boarder post

The study also sought to establish the effect of one stop boarder on revenue performance by Customs Service Department of KRA. Table 4.9 presents the study results.

Table 4.9 One stop boarder post

Statements	N	Mean	Std dev	skewedness	kurtosis	Min	Max
One stop border post operations have reduced the level of operational costs	211	4.18	1.073	-1.62	2.06	1	5
One stop border post operations have increased efficiency in customs service department	211	4.18	1.021	-1.59	2.21	1	5
One stop border post operations have minimized restrictions	211	4.19	1.035	-1.65	2.37	1	5
One stop border post operation have improved quality of service at the customs service department	211	4.19	0.996	-1.70	2.89	1	5
Valid		4.19					

Source: Field data (2019)

Table 4.9 shows that the respondents agreed that one stop border post operations have reduced the level of operational costs (Mean=4.18, standard deviation=1.073). Also, the respondents agreed that One stop border post operations have increased efficiency in customs service department (Mean=4.18, standard deviation=1.021). Further, the respondents agreed that one stop border post operations have minimized restrictions (Mean=4.19, standard deviation=1.035). Finally, the respondents agreed that One stop border post operations have improved quality of service at the customs service department (Mean=4.19, standard deviation=0.996).

The study findings concur with Chauhan (2013) who researched on “the impact of automation as a structural change strategy on customs clearing procedures at Kenya Revenue Authority”. Using the study, He sought to find out and explain the actual “impact of automation on clearance procedures in the customs service department of the KRA. Chauhan findings indicated that automation of clearance procedures using the one stop border post in the local tax department greatly enhanced operational usefulness and productivity, increased employees` professionalism and productivity, reduction of operational costs and improved governance.

The study findings is in agreement with Bonilla (2016) who asserts that many countries are realizing the benefits of less restriction to cross border trade and thus are pushing for less restrictive borders and adopting a strategy known as the One Stop Border Post (OSBP) as a mechanism to improve the movement of goods and services across shared international borders. Where implemented, this strategy has been found to have both economic and customs law enforcement benefits. However, to succeed its implementation required the support of all border management stakeholders.

4.5.4 Staff training

The study first sought to establish the effect of staff training on revenue performance by Customs Service Department of KRA. Table 4.10 presents the study results.

Table 4.10 Staff training

Statements	N	Mean	Std dev	Skewness	Kurtosis	min	Max
The organization staff are equipped with the necessary skills	211	4.15	0.949	-1.42	2.01	1	5
There are programs in the organization aimed at building staff capacity	211	4.23	0.973	-1.59	2.42	1	5
The organization staff have the required knowledge to handle their tasks	211	4.32	0.926	-1.77	3.26	1	5
There is proper orientation of new staff by the organization	211	4.19	1.035	-.157	2.06	1	5
Valid		4.22					

Source: Field data (2019)

Table 4.10 shows that the respondents agreed that the organization staff are equipped with the necessary skills (Mean=4.15, standard deviation=0.949). Also, the respondents agreed that there are programs in the organization aimed at building staff capacity (Mean=4.23, standard deviation=0.973). Further, the respondents agreed that the organization staff have the required knowledge to handle their tasks (Mean=4.32, standard deviation=0.926). Finally, the respondents agreed that there is proper orientation of new staff by the organization (Mean=4.19, standard deviation=1.035).

The study findings agree with Grethe (2018) who conducted in Malaysia on coordinating skills in advanced Information and Communications systems and tax software in tax education to employees. The study discovered that three special abilities were required for the best interaction between an individual and a computer

based tax system namely, “spread sheet software, word-processing software and e-mail”. These findings from the study have inferences on the present study as in during ascertaining of the effectiveness of ICT support services, the basic skills that system user sought to possess must be considered in employee refresher courses. Ignoring these skills could possibly make the overall goal targeted by the entire system.

The study findings also concurs with Grottel (2017) who argues that in Nigeria for example, individual firms and companies have started making various attempts at Staff Training the required skilled manpower. Industries like the Nigerian Port Authority, Nigerian Telecommunication Limited and Banking industries have taken their Staff Training schools. The author further contends that the Government and its various agencies, as well as realizing various Staff Training schools for human resource development. This is buttressed by the Nigerian National Policy on Education, Section 52, Sub-section 4 (2004) which states that; "For all classes of workers, different kinds of in-service Staff Training course, seminars, conferences or workshops should be arranged on a continuing basis.

4.5.5 Revenue performance

The study finally sought to establish the effect of strategic change implementation on revenue performance by Customs Service Department of KRA. Table 4.11 presents the study results.

Table 4.11 Revenue performance

Statements	N	Mean	Std dev	Skeweness	Kurtosis	min	max
The adoption of new technology has enhanced revenue collection in the organization	211	4.07	1.140	-1.53	1.71	1	5
One stop border post operation has increased revenue collection in the organization	211	4.17	1.089	-1.65	2.27	1	5
Training of staff at customs service department has boosted revenue collection in the organization	211	4.08	1.084	-1.53	1.95	1	5
Customer relationship management activities have improved revenue collection in the organization	211	4.18	1.046	-1.66	2.51	1	5
Valid		4.13					

Source: Field data (2019)

Table 4.11 shows that the respondents agreed that the adoption of new technology has enhanced revenue collection in the organization (Mean=4.07, standard deviation=1.140). Also, the respondents agreed that one stop border post operations have increased revenue collection in the organization (Mean=4.17, standard deviation=1.089). Further, the respondents agreed that training of staff at customs service department has boosted revenue collection in the organization (Mean=4.08, standard deviation=1.084). Finally, the respondents agreed that Customer relationship management activities have improved revenue collection in the organization (Mean=4.18, standard deviation=1.046).

The study finding also reveals that strategic change implementation on revenue performance by Customs Service Department of KRA. This implies that the adoption of new technology has enhanced revenue collection in the organization. One stop border post operation have increased revenue collection in the organization. Training of staff at customs service department has boosted revenue collection in the organization. Customer relationship management activities have improved revenue collection in the organization.

4.6 Multiple Regression Model Assumption

The study tested linearity, normality, linearity, multicollinearity and autocorrelation assumptions.

4.6.1 Normality Assumption Test

Kolmogorov-Smirnov were used to find out if residuals follow normal probability distribution.

Table 4.12 One-Sample Kolmogorov-Smirnov Test

Variable	Kolmogorov- Smirnov	Sig
ICT adoption	.338	.289
Customer relationship management	.291	.122
One stop boarder post	.370	.201
Staff training	.358	.112
Revenue collection	.373	.211

Source: Field data (2019)

Table 4.12 present test for normality results, which established that the data was normally distributed since the probability value was greater than 0.05. The study findings revealed that ICT adoption had $p=289>0.05$, customer relationship management had $p=122>0.05$, one stop boarder post had $p=201>0.05$, staff training had $p=112>0.05$. Revenue collection had $p=211>0.05$. The study concurs with

Saunders and Thornhill, (2012) who indicated that if the probability is greater than 0.05, then the data is normally distributed. This is an indication that our data is normally distributed.

4.6.2 Test for Linearity

The study used ANOVA test to test for linearity of the data and to visually show whether there was a linear or curvilinear relationship between two continuous variables before carrying out regression analysis. The regression models can only accurately estimate the relationship between dependent and independent variables if the relationship is linear (Osborne & Waters, 2002).

Table 4.13 ANOVA Test

Items	Linearity	Deviation from Linearity
ICT adoption	.000	.550
Customer relationship management	.000	.462
One stop boarder post	.000	.217
Staff training	.000	.208

Source: Field data (2019)

Results presented in Table 4.13 revealed the linearity values and deviation from linearity for ICT adoption were $0.000 < 0.05$ and $0.550 > 0.05$ respectively. For the customer relationship management linearity values and deviation from linearity for one stop boarder post were $0.000 < 0.05$ and $0.462 > 0.05$ respectively. Lastly the study findings revealed that the linearity values and deviation from linearity for staff training were $0.000 < 0.05$ and $0.208 > 0.05$ respectively. This gives implications that the linearity values for the four study variables were less than 0.05 implying that the linearity assumption was made. The study findings also imply that the deviation from linearity values for the four study values were greater than 0.05 implying the data

were not deviating from linearity. This gave an implication that the data used were linear.

4.6.3 Multicollinearity Test Assumption

Multicollinearity was assessed using the variance inflation factors (VIF). According to Field (2009) VIF values in excess of 10 is an indication of the presence of Multicollinearity.

Table 4.14: Multicollinearity Test Assumption

	Tolerance	VIF
ICT adoption	.764	1.309
Customer relationship management	.758	1.320
One stop boarder post	.905	1.105
Staff training	.941	1.063

Source: Field data (2019)

The results in Table 4.14 present variance inflation factor values and tolerance value for ICT adoption (tolerance=0.764 and VIF=1.309), for Customer relationship management (tolerance=0.758 and VIF=1.320), for One stop boarder post (tolerance=0.905 and VIF=1.105) and for Staff training (tolerance=0.941 and VIF=1.063). The study results imply that all tolerance values for the four variables under study were all above 0.10 and VIF values all less than 10 which were accordance to Field, (2009). This gives an implication that data used had no multicollinearity.

4.6.4 Test for Autocorrelation

To establish whether or not the residual is serially correlated, Durbin-Watson test for autocorrelation was conducted. The Durbin Watson test reports a test statistic, with a value from 0 to 4, where: 2 denotes no autocorrelation; 0 to $2 < 2$ denotes a positive

autocorrelation; while >2 denotes a negative autocorrelation. The decision rule is that test statistic values in the range of 1.5 to 2.5 are relatively normal. Values outside this range could be cause for concern (Field, 2009).

Table 4.15: Autocorrelation Test

R	R Square	Adjusted Square	R Std. Error of the Estimate	Durbin-Watson
.505^a	.255	.240	.374	2.221

Source: Field data (2019)

The results are as indicated in Table 4.17 below and therefore the null hypothesis of no autocorrelation is accepted and that residuals are not auto correlated (Durbin-Watson statistic value=2.221).

4.7 Inferential Statistics

This section presents test of multiple regression assumptions, correlation analysis, regression analysis and hypotheses testing.

4.7.1 Correlation Analysis

Correlation refers to the strength of an association between two variables. A strong or high correlation means that two or more variables have a strong relationship with each other while a weak or low, correlation means that the variables are hardly related. Correlation coefficient can range from -1.00 to +1.00. The value of -1.00 represents a perfect negative correlation while a value of +1.00 represents a perfect positive correlation. A value of 0.00. Means that there is no relationship between variables being tested (Orodho, 2003).

Table 4.16 Correlations Analysis Results

		Revenue performance	ICT adoption	Customer relationship management	One stop boarder post	Staff training
Revenue performance	Pearson Correlation	1				
	Sig. (2-tailed)					
ICT adoption	Pearson Correlation	.358**	1			
	Sig. (2-tailed)	.000				
Customer relationship management	Pearson Correlation	.386**	.384**	1		
	Sig. (2-tailed)	.000	.000			
One stop boarder post	Pearson Correlation	.359**	.356**	.369**	1	
	Sig. (2-tailed)	.000	.002	.001		
Staff training	Pearson Correlation	.332**	.291*	.257*	.434	1
	Sig. (2-tailed)	.000	.013	.015	.155	
	Valid N	211	211	211	211	211

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

*****. Correlation is significant at the 0.05 level (2-tailed).

It showed that ICT adoption was moderately positively and statistically significant correlated to revenue performance ($r=0.358$, $p<0.01$). The study findings further revealed that customer relationship management was positive and moderately correlated with revenue performance ($r=0.386$, $p<0.01$), one stop boarder post ($r=0.359$, $p<0.01$) and staff training was positive and moderately correlated with revenue performance ($r=0.332$, $p<0.01$).

This implies that ICT adoption contribute 35.8% to revenue performance, customer relationship management contributes 38.7% to revenue performance, one stop boarder post contributes 35.9% to revenue performance and staff training contributes 33.2% to revenue performance.

4.7.2 Multiple Regression Analysis

Regression analysis is a statistical tool for the investigation of the relationship between variables. Usually, researcher sought to maintain the causal effect of one variable upon another. Regression analysis allows you to model, examine and explore spatial relationship, and can help explain the factors behind observed spatial patterns. Regression analysis is also used for prediction.

4.7.2.1 Model Summary

Model summary provides the coefficient of determination (R^2) which shows proportion of the variance in the dependent variable that is predictable from the independent variable and correlation coefficient (R) shows the degree of association between the dependent and independent variables. The results presented in Table 4.17 show the fitness of model used of the regression model in explaining the study phenomena.

Table 4.17 Multiple Regression Model Summary

R	R Square	Adjusted R Square	Std. Error of the Estimate
.505^a	.255	.240	.374485

Source: Field data (2019)

ICT adoptions, customer relationship management, one stop boarder post, staff training were found to be satisfactory variables in influencing the revenue

performance. This is supported by coefficient of determination also known as the R square of 25.5%. This means that the independent variables explain 25.5% of the variations in the dependent variable (Revenue performance). The results further imply that the model applied to link the relationship of the variables was satisfactory. Adjusted R^2 is a modified version of R^2 that has been adjusted for the number of predictors in the model by less than chance. The adjusted R^2 of 0.240 which was slightly lower than the R^2 value was exact indicator of the relationship between the independent and the dependent variable because it is sensitive to the addition of insignificant variables. The adjusted R^2 indicates that 24.0% of the changes in revenue performance are explained by the model.

4.7.2.2 Model Fitness

Table 4.18: ANOVA results

	Sum of Squares	Df	Mean Square	F	Sig.
Regression	9.869	4	2.4675	17.595	.000
Residual	28.889	206	0.1402		
Total	38.759	210			

Source: Field data (2019)

Table 4.18 provides the results on the analysis of the variance (ANOVA). The results indicate that the overall model was statistically significant as supported by a p value of 0.000 which is lesser than the critical p value of 0.05. Further, the results imply that the independent variables are good predictors of revenue performance. This was supported by an F statistic of 17.59484 and the reported p value (0.000) which was less than the conventional probability of 0.05 significance level.

4.7.2.3 Regression coefficient

Table 4.19 Regression Analysis Coefficients

	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
(Constant)	2.387	.242		9.873	.000
ICT adoption	.125	.049	.323	2.554	.011
Customer relationship management	.157	.047	.262	3.326	.001
one stop boarder post	.105	.052	.148	2.022	.044
Staff training	.099	.042	.166	2.378	.018

Source: Field data (2019)

Regression of coefficients results in Table 4.19 shows that ICT adoption has a positive and significant influence on revenue performance ($\beta_1=0.125$, $p=0.011$). It was also established that customer relationship management has a positive and significant influence on revenue performance ($\beta_2=0.262$, $p=0.001$). It was further established that one stop boarder post has a positive and significant influence on revenue performance ($\beta_3=0.148$, $p=0.044$). Finally, staff training was found to have a positive and significant influence on revenue performance ($\beta_4=0.166$, $p=0.018$).

The optimal model was;

$$Y = 2.387 + 0.323X_1 + 0.262X_2 + 0.148X_3 + 0.166X_4 \dots \dots \dots \text{Equation 4.1}$$

Where:

Y represents revenue performance, dependent variable

X₁ represents ICT adoption

X₂ represents Customer relationship management

X₃ represents one stop boarder post

X₄ represents staff training

4.8 Hypotheses Testing

From the regression model computed in Table 4.19, the research hypotheses were tested using the significance level of the coefficients. The research aimed to test the hypothesis with an aim of failing to reject or rejecting the relationship between independent and the dependent variables. The research hypothesis for the study included;

H₀₁: There is no significant relationship between ICT adoption and revenue performance. The regression results in Table 4.19 indicate that there is significant relationship between ICT adoption and revenue performance with a beta coefficient of 0.323 and significance of ($p= 0.011$). The study rejected the hypothesis. These results concur with Nasimiyu (2013) who argues that the use of the system has led to a significant improvement in the revenue collection for tax payers. Revenue mobilization is considered one of the key factors for the economic development of nations and links in the national agenda on social wellbeing, poverty reduction and economic development of countries and their citizens. Kenya Revenue Authority is considered to be a part of a national economy.

H₀₂: There is no significant relationship between Customer relationship management and revenue performance. The regression results in Table 4.19 indicate that There is significant relationship between ICT adoption and revenue performance with a beta coefficient of 0.262 and significance of ($p= 0.001$). The

study rejected the hypothesis. These results concur with Widdowson et al., (2014) who studied CRM in a large sample of Commercial Banks in the United States. Their study showed no concrete correlation that existed between implementing CRM and firm efficiency.

H₀₃: There is no significant relationship between one stop boarder post and revenue performance. The regression results in Table 4.19 indicate that There is significant relationship between ICT adoption and revenue performance with a beta coefficient of 0.148 and significance of ($p= 0.044$). The study rejected the hypothesis. These results concur with Chauhan (2013) who researched on “the impact of automation as a structural change strategy on customs clearing procedures at Kenya Revenue Authority”. Using the study, He sought to find out and explain the actual “impact of automation on clearance procedures in the customs service department of the KRA. Chauhan findings indicated that automation of clearance procedures using the one stop border post in the local tax department greatly enhanced operational usefulness and productivity, increased employees` professionalism and productivity, reduction of operational costs and improved governance.

H₀₄: There is no significant relationship between staff training and revenue performance. The regression results in Table 4.19 indicate that There is significant relationship between ICT adoption and revenue performance with a beta coefficient of 0.166 and significance of ($p= 0.018$). The study rejected the hypothesis. These results concur with Gunes and Atilgan (2016) who researched and found out there were limited chances of Staff Training in the sugar industries and this was due to shortages of finances, therefore Staff Training was confined to health, safety and management committee workers which were done on legal requirements. However, technical Staff

Training does have a considerable influence on company finances as there are several potential Staff Training costs that companies may incur. These costs are related to employees' output and productivity during and upon completion of the Staff Training. In addition, once Staff Training is completed, employee productivity is expected to increase.

Table 4.20 Summary of Hypotheses Test Results

No.	Variable	P and β value	Deduction
H ₀₁	There is no significant relationship between ICT adoption and revenue performance	$\beta_1=0$. $p=0.011<0.05$	323, Rejected the null hypothesis
H ₀₂	There is no significant relationship between Customer relationship management (CRM) and revenue performance	$\beta_2=0$. $p=0.044<0.05$	262, Rejected the null hypothesis
H ₀₃	There is no significant relationship between One stop border post operations and revenue performance	$\beta_3=0$. $p=0.00<0.05$	148, Rejected the null hypothesis
H ₀₄	There is no significant relationship between Staff training has no significant influence and revenue performance	$\beta_4=0$. $p=0.018<0.05$	166, Rejected the null hypothesis

Source: Field data (2019)

4.9 Discussions of the findings

The first objective sought to establish the effect of ICT adoption on revenue performance by Customs Service Department of KRA. The study found out that the respondents agreed on all aspects of ICT adoption. They agreed that adoption of technology has reduced tax clearance time, the adoption of technology has reduced

revenue loss, adoption of technology has helped to ease the burden of over-staffing and that adoption of technology has reduced documentation.

The study findings agree with Khan and U-Din (2014) who argues that the automation of revenue collection has added to the system improvement in Kenya Revenue Authority (KRA), with tax evasion minimized and improved business efficiency recorded. With the introduction of ICMS, the taxman collected Sh534 billion during the 2009/2010 financial year compared to Sh298 billion collected in the 2004/2005 period, a great improvement. This technology shifts to a gross domestic product (GDP), and has seen the government realize at 95 per cent target. "Automation has reduced the cost of revenue collection and interaction between the taxpayer and staff, to fertile area for corruption.

The study also coincides with Muthoka and Oduor (2014) who examined how organization`s control, information systems and collection of revenue associated with Local Authorities in Kenya. Muthoka & Oduor focus was to determine the quality of services given to Kenyan Local Authorities. Muthoka & Oduor discovered the existence of a clear relation between local authorities and information systems. Also, there was a huge and positive relationship involving the Control Systems and revenue collection.

The second objective sought to establish the effect of customer relationship management on revenue performance by Customs Service Department of KRA. The study found out that the respondents agreed on all aspects of customer relationship management. They agreed that the level of compliance in the organization has increased, there is high customer retention by the organization and that there is

effective communication between the organization and other stakeholder the rate of customer attraction has increased over time.

The study results concurs with Jenkins (2014) who emphasized that indeed the tax system can never work better than its tax administration, but even the best tax administration would certainly fail to turn a bad tax system into a well-operating one. He also warns that the existence of many ambitious tax reforms did not succeed because of the inefficient tax administration. In the absence of permanent reorganization of the tax administration and almost daily improvements in the methods of its management, it is not possible to expect that tax reforms will be successfully realized.

The study results also concedes with Wakaya (2018) who conducted a study on Customer Relationship Management strategic application and organizational effectiveness show the result from surveyed skill, while 64% of respondents agreed on poor data quality and inadequate data about their customers, competitors and markets, and 51% of respondents reported on top management support of CRM by different functional managers in the surveyed firm.

The third objective sought to establish the effect of one stop boarder post on revenue performance by Customs Service Department of KRA. The study found out that the respondents agreed on all aspects of one stop boarder post. They agreed that One stop border post operation have increased efficiency in customs service department, one stop border post operations have minimized restrictions and One stop border post operations have improved quality of service at the customs service department.

The study findings concur with Chauhan (2013) who researched on “the impact of automation as a structural change strategy on customs clearing procedures at Kenya Revenue Authority”. Using the study, He sought to find out and explain the actual “impact of automation on clearance procedures in the customs service department of the KRA. Chauhan findings indicated that automation of clearance procedures using the one stop border post in the local tax department greatly enhanced operational usefulness and productivity, increased employees` professionalism and productivity, reduction of operational costs and improved governance.

The study findings are in agreement with Bonilla (2016) who asserts that many countries are realizing the benefits of less restriction to cross border trade and thus are pushing for less restrictive borders and adopting a strategy known as the One Stop Border Post (OSBP) as a mechanism to improve the movement of goods and services across shared international borders. Where implemented, this strategy has been found to have both economic and customs law enforcement benefits. However, to succeed its implementation required the support of all border management stakeholders.

The last objective sought to establish the effect of staff training on revenue performance by Customs Service Department of KRA. The study found out that the respondents agreed on all aspects of staff training. They agreed that the organization staff are equipped with the necessary skills, there are programs in the organization aimed at building staff capacity, the organization staff have the required knowledge to handle their tasks and there is proper orientation of new staff by the organization.

The study findings agree with Grethe (2018) who conducted in Malaysia on coordinating skills in advanced Information and Communications systems and tax software in tax education to employees. The study discovered that three special

abilities were required for the best interaction between an individual and a computer-based tax system namely, “spread sheet software, word-processing software and e-mail”. These findings from the study have inferences on the present study as in during ascertaining of the effectiveness of ICT support services, the basic skills that system user sought to possess must be considered in employee refresher courses. Ignoring these skills could possibly make the overall goal targeted by the entire system.

The study findings also concur with Grottel (2017) who argues that in Nigeria for example, individual firms and companies have started making various attempts at Staff Training the required skilled manpower. Industries like the Nigerian Port Authority, Nigerian Telecommunication Limited and Banking industries have taken their Staff Training schools. The author further contends that the Government and its various agencies, as well as realizing various Staff Training schools for human resource development. This is buttressed by the Nigerian National Policy on Education, Section 52, Sub-section 4 (2004) which states that; "For all classes of workers, different kinds of in-service Staff Training course, seminars, conferences or workshops should be arranged on a continuing basis.

CHAPTER FIVE

SUMMARY, CONCLUSION AND RECOMMENDATIONS

5.1 Introduction

This chapter summarizes the findings of the study reported in chapter four upon the data analysis. More specifically, the chapter covers summary of the findings, conclusion, recommendations and suggestions for further study.

5.2 Summary of the Study Findings

The study findings are summarized in the section below as per the study objectives.

5.2.1 ICT adoption

The first objective sought to establish the effect of ICT adoption on revenue performance by Customs Service Department of KRA. The study found out that the respondents agreed on all aspects of ICT adoption. They agreed that adoption of technology has reduced tax clearance time, the adoption of technology has reduced revenue loss, adoption of technology has helped to ease the burden of over-staffing and that adoption of technology has reduced documentation.

The study findings also showed that ICT adoption was statistically significant and has a positive influence on revenue performance. The study rejected the null hypothesis that there is no statistically significant influence of ICT adoption on revenue performance. The study findings also revealed that ICT adoption has a positive influence on revenue performance by Customs Service Department of KRA. This implies that the adoption of technology has reduced tax clearance time, revenue loss, eases the burden of over-staffing and reduced documentation.

5.2.2 Customer relationship management

The second objective sought to establish the effect of customer relationship management on revenue performance by Customs Service Department of KRA. The study found out that the respondents agreed on all aspects of customer relationship management. They agreed that the level of compliance in the organization has increased, there is high customer retention by the organization and that there is effective communication between the organization and other stakeholder the rate of customer attraction has increased over time.

The study findings also showed that customer relationship management was statistically significant and has a positive influence on revenue performance. The study rejected the null hypothesis that there is no statistically significant influence of customer relationship management on revenue performance. The study findings also revealed that customer relationship management (CRM) on revenue performance by Customs Service Department of KRA. This implies that the level of compliance in the organization has increased. Also, there is high customer retention by the organization. Furthermore, there is effective communication between the organization and other stakeholder. Finally, the rate of customer attraction has increased over time.

5.2.3 One stop border post

The third objective sought to establish the effect of one stop boarder post on revenue performance by Customs Service Department of KRA. The study found out that the respondents agreed on all aspects of one stop boarder post. They agreed that One stop border post operation have increased efficiency in customs service department, one stop border post operations have minimized restrictions and One stop border post operations have improved quality of service at the customs service department.

The study findings also showed that one stop boarder post was statistically significant and has a positive influence on revenue performance. The study rejected the null hypothesis that there is no statistically significant influence of one stop boarder post on revenue performance. The study findings also revealed that one stop border post (OSBP) operations have a positive influence on revenue performance by Customs Service Department of KRA. This implies that One stop border post operations have reduced the level of operational costs, increased efficiency in customs service department, minimized restrictions and improved quality of service at the customs service department.

5.2.4 Staff training

The last objective sought to establish the effect of staff training on revenue performance by Customs Service Department of KRA. The study found out that the respondents agreed on all aspects of staff training. They agreed that the organization staff are equipped with the necessary skills, there are programs in the organization aimed at building staff capacity, the organization staff have the required knowledge to handle their tasks and there is proper orientation of new staff by the organization.

The study findings also showed that staff training was statistically significant and has a positive influence on revenue performance. The study rejected the null hypothesis that there is no statistically significant influence of staff training on revenue performance. The study findings also revealed that staff training on revenue performance by Customs Service Department of KRA. This implies that the organization staff are equipped with the necessary skills. Also, there are programs in the organization aimed at building staff capacity. Further, the organization staffs have

the required knowledge to handle their tasks. Finally, there is proper orientation of new staff by the organization.

5.3 Conclusions

The study concluded that the adoption of technology has reduced tax clearance time, revenue loss, eases the burden of over-staffing and reduced documentation.

The study also concluded that the level of compliance in the organization has increased. Also, there is high customer retention by the organization. Furthermore, there is effective communication between the organization and other stakeholder. Finally, the rate of customer attraction has increased over time.

The study further concluded that one stop border post operations have reduced the level of operational costs, increased efficiency in customs service department, minimized restrictions and improved quality of service at the customs service department.

The study finally concluded that the organization staffs are equipped with the necessary skills. Also, there are programs in the organization aimed at building staff capacity. Further, the organization staffs have the required knowledge to handle their tasks. Finally, there is proper orientation of new staff by the organization.

The study finding is in agreement with optimal tax theory which is based on the foundational work of Ramsey (1928). The standard theory of optimal taxation is a tax system that should be used to maximize social security. The social planner is posited as a utilitarian: that is, the social welfare function is based on the utilities of individuals in the society. Optimal tax theory is concerned with the ideal level and form of economic redistribution. The optimal tax theory sought to determine how

government can maximize social welfare through taxes and transfers, without increasing the sacrifice on the part of tax payers.

5.4 Recommendations

Kenya Revenue Authority should come up with a clear ICT policy aimed at improving revenue collection. The ICT policy should eliminate all areas of revenue losses. The ICT policy should eliminate delays in clearance as all areas of revenue collection should be digitized. ICT policy should improve efficiency; reduce the cost associated with overstaffing. ICT policy should minimize the documentations involved in revenue collection.

Kenya Revenue Authority should come up with a clear policy on customer service. The customer service policy should incorporate the aspect of customer relationship management. Customer service policy should aim at ensuring compliance in paying taxes and reduced cost of administration of taxes. KRA should continuously review CRM to ensure it caters for changing customer needs.

KRA should come up with a policy to make one stop boarder post operations more effective. One stop boarder post operation should ensure ministries and agencies distribute responsibilities and procedures more effectively. The policy on one stop boarder post operations should ensure realization of benefits reduce restrictions to cross border trade. The policy on one stop boarder post operations should ensure reduction in operational costs and improve governance. Policy on one stop boarder post operations should ensure improvement on employee's professionalism and productivity.

KRA should come up with a policy that makes Staff Training more frequent on emerging issues on revenue collection. Staff Training programmes should be

introduced with the aim of improving productivity. Staff Training should aim at improving proficiency on employees' work. Staff Training programmes should enhance coordinating skills in advanced information and communications systems.

5.5 Suggestions for Further Study

The study was to identify the effects of strategic change implementation on revenue performance by Customs Service Department of KRA. The study findings narrowed into four strategic changes. Suggestion for further study is recommended to identify strategies which can make revenue collection more efficient. Further study is necessary to identify the effect of strategic change implementation on revenue performance by Customs Service Department of KRA.

REFERENCES

- Abiola, J., & Asiweh, M. (2012). Impact of tax administration on government revenue in a developing economy-a case study of Nigeria. *International Journal of business and social science*, 3(8).
- Afande, O. F. (2013). Effects of strategic management practices on performance of financial institutions in Kenya: A case of Kenya Post Office Savings Bank. *International Journal of Business Management and Administration*, 2(6), 122-141.
- Authority, K. R. (2015). *Kenya Revenue Authority Corporate Plan 2015* (Vol. 19). 16-2018.
- Beverelli, C., Neumueller, S., & Teh, R. (2015). Export diversification effects of the WTO trade facilitation agreement. *World Development*, 76, 293-310.
- Bonga, W. G. (2017). Empirical Examination of the Link between Value Added Tax and Total Tax Revenues in Zimbabwe.
- Bonilla ,A. (2016). A Step Further in the Theory of Regional Integration: A Look At the Unasur's Integration Strategy. *SSRN Electronic Journal*. 22(1), 1-4.
- Bonilla-Chacín, M. E., Iglesias, R., Suaya, A., Trezza, C., & Macías, C. (2016). *Learning from the Mexican Experience with Taxes on Sugar-Sweetened Beverages and Energy-dense Foods of Low Nutritional Value: Poverty and Social Impact Analysis*. World Bank.
- Brown, T. J., & Dacin, P. A. (1997). The company and the product: Corporate associations and consumer product responses. *Journal of marketing*, 61(1), 68-84.
- Cabezon, E., Hunter, M. L., Tumbarello, M. P., Washimi, K., & Wu, M. Y. (2015). *Enhancing Macroeconomic Resilience to Natural Disasters and Climate Change in the Small States of the Pacific* (No. 15-125). International Monetary Fund.
- Chauhan, A.K. (2013). An Empirical Analysis of (OOC) English Language Learning. *Interdisciplinary Journal of Contemporary Research in Business*, 5(7), 393-405
- Chimilila, C., Sabuni, C., Benjamin, A. (2014). Trade Facilitation in EAC Customs Union: Its Achievement and Implementation in Tanzania. *Journal of Economics and Sustainable Development*, 5(25), 1-15.
- Damilola, W. (2015). Impact Of Strategic Management On Competitive Advantage And Organizational Performance Evidence From Nigerian Bottling Company. *Journal of Policy and Development Studies* Vol. 9, No. 2.
- Davis, F. D.(1989). "Perceived Usefulness, Perceived Ease of Use, and User Acceptance of Information Technology," *MIS uarterly* (13:3), 1989, pp. 319-339

- DiMaggio, P. J., & Powell, W. W. (1983). The iron cage revisited: Institutional isomorphism and collective rationality in organizational fields. *American sociological review*, 147-160.
- Din, I. U., Hassan, S., Khan, M. K., Guizani, M., Ghazali, O., & Habbal, A. (2017). Caching in information-centric networking: Strategies, challenges, and future research directions. *IEEE Communications Surveys & Tutorials*, 20(2), 1443-1474.
- Duru, O., Bulut, E., Huang, S., & Yoshida, S. (2013). Shipping Performance Assessment and the Role of Key Performance Indicators (KPIs):'Quality Function Deployment'for Transforming Shipowner's Expectation. Available at SSRN 2195984.
- Faems, D., Sels, L., De Winne, S., & Maes, J. (2005). The effect of individual HR domains on financial performance: evidence from Belgian small businesses. *The International Journal of Human Resource Management*, 16(5), 676-700.
- Fligstein, N. (1997). Social skill and institutional theory. *American behavioral scientist*, 40(4), 397-405.
- Gerring S.K (2014) *Research methods*: 1st edition, ACTS publishers. Kenya. Nairobi.
- Gidisu, T. E. (2012). Automation System Procedure of the Ghana Revenue Authority on the Effectiveness of Revenue Collection: A Case Study of Customs Division. *Unpublished MBA Thesis, Kwame Nkrumah University of Science and Technology*.
- González, A., Goikolea, E., Barrena, J. A., & Mysyk, R. (2016). Review on supercapacitors: technologies and materials. *Renewable and Sustainable Energy Reviews*, 58, 1189-1206.
- González.V (2016). "Towards energy efficiency smart buildings models based on intelligent data analytics". *Procedia Computer Science*. 83: 994–999
- Grethe, H. (2018). Effects of Including Agricultural Products in the Customs Union Between Turkey and the EU. *World Customs Journal*, 2 (1), 41 – 54.
- Greve, H. R., & Teh, D. (2018). Goal selection internally and externally: A behavioral theory of institutionalization. *International Journal of Management Reviews*, 20, S19-S38.
- Grottel, M. (2017). Improving the functioning of the EU customs union in the context of the Union Customs Code regulations. *International Business and Global Economy*, 36(1).
- Guenther, M., Saunders, C. M., Dalziel, P. C., Rutherford, P., & Driver, T. (2015). *Maximising export returns: Consumer attitudes towards attributes of food and beverages in export markets relevant to New Zealand*. Lincoln University.

- Gunes N, Atilgan, M.(2016). Comparison of the effectiveness of the audit committees in United Kingdom and in Turkish banks. *International Journal of Financial Research*, 27 2(2), 218.
- Güneş, N., & Atilgan, M. S. (2016). Comparison of the Effectiveness of Audit Committees in the UK and Turkish Banks. *International Journal of Financial Research*, 7(2).
- Güneş, N., & Atilgan, M. S. (2016). Comparison of the Effectiveness of Audit Committees in the UK and Turkish Banks. *International Journal of Financial Research*, 7(2).
- Hair, J. F., Black, W. C., Babin, B. J., & Anderson, R. E. (2015). *Multivariate Data Analysis*. ed'India.
- Hair, J.F., Black, W.C., Babin, B.J. & Anderson, R.E. (2015) *Multivariate Data Analysis* (7th ed.) New Delhi: Pearson
- Huang, S. T., & Yoshida, S. (2013, January). Analysis of key factors for formation of strategic alliances in liner shipping company: service quality perspective on Asia/Europe route after global economic crisis. In *Proceedings of World Academy of Science, Engineering and Technology* (No. 78, p. 501). World Academy of Science, Engineering and Technology (WASET).
- Huang, S.T., & Yoshida, S. (2013). Analysis of Key Factors for Formation of Strategic Alliances in Liner Shipping Company: Service Quality Perspective on Asia/Europe Route after Global Economic Crisis. *International Journal of Social, Behavioral, Educational, Economic, Business and Industrial Engineering*, 7(6), 1414-1418.
- Jenkins, R. (2014). *Social identity*. Routledge.
- Kairu, M. M., & Rugami, M. M. (2017). Effect of ICT deployment on the operational performance of Kenya Revenue Authority. *Journal of Strategic Management*, 2(1), 19-35.
- Kanter, J. W., Cautilli, J. D., Busch, A. M., & Baruch, D. E. (2005). Toward a comprehensive functional analysis of depressive behavior: Five environmental factors and a possible sixth and seventh. *The Behavior Analyst Today*, 6(1), 65.
- Kanyi, P. (2014). The effects of tax policy reforms on tax revenue in Kenya. *The strategic Journal of Business & Change Management*, 2(31), 601-620.
- Kaplanoglou, G., & Rapanos, V. (2013). Fiscal Collections and the Role of Fiscal Governance: *The Case of Greece*. *Economic Analysis & Policy*, 43(1)
- Kaplanoglou, G., & Rapanos, V. T. (2015). Why do people evade taxes? New experimental evidence from Greece. *Journal of Behavioral and Experimental Economics*, 56, 21-32.

- Kassee, D. (2014). The WTO agreement on trade facilitation: status of play in Southern African customs. *World Customs Journal*, 8(1), 101-112.
- Kassee, D.K (2014). The WTO Agreement on Trade Facilitation: Status of Play in Southern African Customs. *World Customs Journal* 8 (1): 101-112.
- Kaweesa, K. C. (2004). Taxation and Investment in Uganda: Structure and Trend. In *A paper presented to the business forum in London, UK, for investment opportunities in Uganda. Uganda Revenue Authority, Kampala, Uganda.*
- Kelman, S. (2005). *Unleashing change: A study of organizational renewal in government.* Brookings Institution Press.
- Khan, H. U., Fournier-Bonilla, S. D., Jinugu, A., & Madhavi Lalitha, V. V. (2016, March). Possible challenges of the successful implementation of CRM in the service sector: a case study of Saudi Arabia. In *Northeast Decision Sciences Institute Conference* (Vol. 31).
- Khan, M., Din, U., & Naseer, M. (2014). Students' Conceptual Thinking and Teachers' Perceptions about their Classroom Performance in Physics. *Journal of Research & Reflections in Education (JRRE)*, 8(1).
- Khan, S.A. , U-Din, A. (2014). The Strategic Alliance of Marketing Competitors and its Impact on Customer Satisfaction. *International Journal of Management and Commerce Innovations*, 1(1), 1-5.
- KRA - 7TH CORPORATE PLAN (2018-2021) REVENUE MOBILIZATION THROUGH TRANSFORMATION
- Kunz, N., Reiner, G., & Gold, S. (2014). Investing in disaster management capabilities versus pre-positioning inventory: A new approach to disaster preparedness. *International Journal of Production Economics*, 157, 261-272.
- Kunz, N.M Reiner, G.S, Gold, S.P (2014) 'Investing in disaster management capabilities versus pre-Positioning inventory: a new approach to disaster preparedness', *International Journal of Production Economics*, 157 (9) 261–72.
- Lawrence, T. B., & Shadnam, M. (2008). Institutional theory. *The international encyclopedia of communication.*
- Lewin, K. (1951). *Field theory in social science: selected theoretical papers* (edited by dorwin cartwright.).
- Livoi, G. M. (2017). *The Effect Of Tax Reforms On Corporate Tax Compliance To Kenya Revenue Authority* (Doctoral dissertation, KCA University).
- Martinsons, M. G. (1993). Outsourcing information systems: a strategic partnership with risks. *Long Range Planning*, 26(3), 18-25.

- Matsuda, S (2012), 'The time release study as a performance measurement tool for a supply chain and an international corridor', *World Customs Journal*, 6 (1) 79–92.
- Mbithi, M. B. (2017). *Effects of Strategy Choice and Performance on Sugar Companies in Kenya* (Doctoral dissertation, COHRED, JKUAT).
- Mohammad, H. I. (2015). 7PS marketing mix and retail bank customer satisfaction in northeast Nigeria. *British journal of marketing studies*, 3(3), 71-88.
- Mugenda O , Mugenda O, (2003). *Research Methods*: Nairobi, Kenya. Published by ACTS,
- Mugenda, O. M., & Mugenda, A. G. (2012). *Research methods dictionary*.
- Mugenda, O. M., & Mugenda, A. G. (2003). *Research methods*.
- Mugenda, O.M. Mugenda A.G. (2012). *Quantitative and Qualitative Approaches (2nd ed.)*. Nairobi: Acts Press
- Muriithi, M.K. (2003). Tax reforms and financial mobilization in Kenya
- Muthoka, M., & Oduor, P. (2014). Effects of strategic alliances on organizational performance: supermarkets and their alliances in Kenya. *European Journal of Business and Management*, 6(34), 75-89.
- Nasimiyu E. (2013). Influence of Change Management on Organizational performance in Public Organisations, *International Journal of Social Sciences and Entrepreneurship*. Vol.1, Issue 2, 2013, 1 (2), 453-462
- Nasimiyu, E. (2013). Influence of Change Management on Organizational performance in Public Organisations. *International Journal of Social Sciences and Entrepreneurship*, 1(2), 1.
- Ndonga, D.K (2013). Managing the Risk of Corruption in Customs through Single Window Systems. *World Customs Journal*, 7 (2), 23 – 38.
- Ogalo, V. (2010). Informal Cross Border Trade in East Africa: Issues for EAC Regional Integration and Economic Growth. BIEAC-II Regional Workshop presentation, Nairobi, Kenya
- Okafor, G. (2012). Revenue generation in Nigeria through e-taxation (a study of selected states). *European Journal of Economics, Finance and Administrative Sciences*, 49, 126-132.
- Olalekan, E. I., Abimbola, L. H. M., Saheed, M., & Damilola, O. A. (2014). Wetland Resources of Nigeria: Case Study of the Hadejia-Nguru Wetlands. *Poultry, Fisheries & Wildlife Sciences*, 1-6.
- Pallant, J., & Manual, S. S. (2010). A step by step guide to data analysis using SPSS. *Berkshire UK: McGraw-Hill Education*.

- Peil, S.K (2005). *Research Methodology and Design*. , U.S.A, New York, Macmillan. Publishers
- Porter, M. (1980). *Competitive strategy: techniques for analyzing industries and competitors*. New York, NY: Free Press.
- Porter, M. E. (1990). *The competitive advantage of nations: with a new introduction*. Free Pr.
- Rainer, R. K., Cegielski, C. G., Splettstoesser-Hogeterp, I., & Sanchez-Rodriguez, C. (2013). *Introduction to information systems: Supporting and transforming business*. John Wiley & Sons.
- Ramsey F (1928) A mathematical theory of saving. *Econ J* 38:543–559
- Ravitch, S. M., & Riggan, M. (2012). Conceptual frameworks and the analysis of data. *Reason & rigor: How conceptual frameworks guide research*, 81-106.
- Rosenzweig, P. M., & Singh, J. V. (1991). Organizational environments and the multinational enterprise. *Academy of Management review*, 16(2), 340-361.
- Rothaermel, F. (2015). *Strategic Management* New York: McGraw-Hill Irwin.
- Rothaermel, F. T. (2015). *Strategic Management*. Second.
- Sagas, C. C., Nelimalyani, M., & Kosgeikimaiyo, E. (2015). An assesment of the impact of electronic tax register on revenue collection by Kenya Revenue Authority Western Region, Kenya. *ZENITH International Journal of Business Economics & Management Research*, 5(4), 111-118.
- Saji, K. B., Chauhan, K., & Pillai, A. (2013). Role of content strategy in social media brand communities: a case of higher education institutes in India. *Journal of Product & Brand Management*.
- Saunders, M. N., Gray, D. E., & Goregaokar, H. (2014). SME innovation and learning: the role of networks and crisis events. *European Journal of Training and Development*, 38(1/2), 136-149.
- Saunders, M.N.K., Lewis, P. , Thornhill, A. (2015). *Research Methods for Business Students*. United Kingdom: Prentice Hall
- Schein, E. H. (2010). *Organizational culture and leadership* (Vol. 2). John Wiley & Sons.
- Scott, W. R. (2005). Institutional theory: Contributing to a theoretical research program. *Great minds in management: The process of theory development*, 37(2005), 460-484.
- Seifert, C., Aamir, A., Balagopalan, A., Jain, D., Sharma, A., Grottel, S., & Gumhold, S. (2017). Visualizations of deep neural networks in computer vision: A survey. In *Transparent Data Mining for Big and Small Data* (pp. 123-144). Springer, Cham.

- Seligman, M.E.P. (1948). *Helplessness: On Depression, Development, and Death*. San Francisco, United States, W.H. Freeman.
- Sharabati, A. A. A., & Fuqaha, S. J. (2014). The Impact of Strategic Management on the Jordanian Pharmaceutical Manufacturing Organizations' Business Performance. *International Review of Management and Business Research*, 3(2), 668.
- Sharabati, A.A , Fuqaha, S.J (2013). Impact of Strategic Management on the Jordanian Pharmaceuticals Manufacturing Organisation Business Performance *International Review of Management and Business Research Vol. 3 Issue.2*
- Sigey, J. K. (2010). *The impact of automation as a structural change strategy on customs clearing procedures at Kenya Revenue Authority* (Doctoral dissertation, University of Nairobi, Kenya).
- Singh, J., & Sharma, P. (2007). Tax Professionals' Perception of the Income Tax System of India: An Empirical Evidence. *The IUP Journal of Public Finance*, (1), 45-56.
- Streiner, D. L. (1994). Figuring out factors: the use and misuse of factor analysis. *The Canadian Journal of Psychiatry*, 39(3), 135-140.
- Tesfaye, DN, Walter, K.J (2017) *Africa's Regional Integration Arrangements*; New York, New York: McGraw-Hill.
- Toševska-Trpčevska, K., & Tevdovski, D. (2014). Measuring the Effects of Customs and Administrative Procedures on Trade: Gravity Model for South-Eastern Europe. *Croatian Economic Survey*, 16(1), 109-127.
- Tumbarello F, Patrizia N, (2014) "Regional Trade Integration and WTO accession in the CIS: Which is the right Sequencing," IMF Working Paper Customs Procedures in the Republic of Macedonia. *World Customs Journal*, 8 (1), 51-62.
- Wakaya, J. (2018). *Tanzania captures Kenya's chicks again* » Capital News. Retrieved From <https://www.capitalfm.co.ke/news/2018/02/tanzania-captures-kenyas-chicks/>
- Widdowson, D., Blegen, B., Kashubsky, M., & Grainger, A. (2014). Review of accredited operator schemes: an Australian study. *World Customs Journal*, 8(1), 17-34.
- Widdowson, M. (2015). *Transactional Analysis for depression: A step-by-step treatment manual*. Routledge.
- Wilson, J. S., Mann, C. L., & Otsuki, T. (2005). Assessing the benefits of trade facilitation: A global perspective. *World Economy*, 28(6), 841-871.
- Wily, L. A. (2008). Custom and commonage in Africa rethinking the orthodoxies. *Land use policy*, 25(1), 43-52.

- Wimalaratne, S. M., Juty, N., Kunze, J., Janée, G., McMurry, J. A., Beard, N., ... & Clark, T. (2018). Uniform resolution of compact identifiers for biomedical data. *Scientific data*, 5, 180029.
- Zaheer, S. (1995). Overcoming the liability of foreignness. *Academy of Management journal*, 38(2), 341-363.
- Zhou, G., Madhikeni, A.(2013). Systems, Processes and Challenges of Public Revenue Collection in Zimbabwe, *American International Journal of Contemporary Research*, 3: 49-60
- Zikmund, W., (2010). *Business Research Methods* 8th Edition. McGraw-Hill Publishers. U.S.A. New York.
- Zucker, L. G. (1987). Institutional theories of organization. *Annual review of sociology*, 13(1), 443-464.

APPENDICES**Appendix I: Questionnaire****SECTION A: DEMOGRAPHIC PROFILE OF RESPONDENTS**

Please fill in the information below by ticking appropriately.

1. Please indicate your gender.

Male

Female

2. What is your age bracket?

21-35 years

36-45 years

46-55 years

55-above year

3. What is your highest level of education?

Bachelor's degree

Masters

PhD

Other (specify

4. Number of years in your role in the organization (tick)

Less than one year

1 – 4 years

5 – 9 years

10 – 14 years

Above 15 years

SECTION B: EFFECT OF STRATEGIC CHANGE IMPLEMENTATION ON REVENUE COLLECTION

The following statements relate to the effect of strategic change on Revenue collection. Kindly indicate the extent to which each of the statement match strategic change traits in your organization

a) The following statements relate strategic change and revenue collection characteristics of organizations. Kindly indicate the extent to which each of the statement match strategic change and Revenue collection traits in your organization where 1-strongly disagree, 2-disagree, 3-neither agree nor disagree, 4-agree and 5-strongly agree. Please (√) as appropriate.

	Statement	1	2	3	4	5
SECTION C: REVENUE PERFORMANCE						
a	The adoption of new technology has enhanced revenue collection in the organization					
b	One stop border post operations have increased revenue collection in the					

	organization					
c	Training of staff at customs service department has boosted revenue collection in the organization					
d	Customer relationship management activities have improved revenue collection in the organization					
SECTION D: ICT ADOPTION						
a	The adoption of technology has reduced tax clearance time					
b	The adoption of technology has reduced revenue loss					
c	Adoption of technology has helped to ease the burden of over-staffing					
d	Adoption of technology has reduced documentation					
SECTION E: CUSTOMER RELATIONSHIP MANAGEMENT						
a	The level of compliance in the organization has increased					
b	There is high customer retention by the organization					
c	There is effective communication between the organization and other stakeholder					
d	The rate of customer attraction has increased over time					
SECTION F: ONE STOP BORDER POST						
a	One stop border post operations have					

	reduced the level of operational costs					
b	One stop border post operations have increased efficiency in customs service department					
c	One stop border post operations have minimized restrictions					
d	One stop border post operations have improved quality of service at the customs service department					
SECTION G: STAFF TRAINING						
a	The organization staff are equipped with the necessary skills					
b	There are programs in the organization aimed at building staff capacity					
c	The organization's staff have the required knowledge to handle their tasks					
d	There is proper orientation of new staff by the organization					