EFFECT OF WITHHOLDING VALUE ADDED TAX ON TAX COMPLIANCE IN KENYA

BY

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DECLARATION

This research project is my original work and has	s not been submitted for examination
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DEDICATION

I dedicate this proposal to my family for their support during its preparation. I could not have made it without your patience and encouragement. Thank you for your understanding when I stayed away for long, either in class or throughout the weekend.

This is for you!

ABSTRACT

The tax collection bodies across the world have advocated for withholding of taxes due to the benefits that come with it. Withholding has also been found to increase compliance and decreases evasion and underpayment because people don't notice how much tax they are paying in a withholding system hence there is less sense of anger. However, while this is the case, the Kenya Revenue Authority has been missing VAT targets thus raising questions over efficiency of Withholding VAT. Due to this, this study seeks to establish the effect of withholding VAT on tax compliance in Kenya. The study is anchored on the following theories; Ability to Pay Theory, Equal sacrifice Theory, Economic-based Theory and Psychological Theory. The research design that was employed is explanatory study design considering a population comprising taxpayers in Kenya as categorised by KRA that Large Tax Payers (LTO), Medium and Small TaxPayers (MST) in Kenya. Data was compiled for a period spanning 7 years from the year 2011 to 2017 on Withholding VAT Revenue growth and VAT revenue growth as well as economic growth which is a control variable in the study. Data was compiled from the Kenya Revenue Authority and Kenya National Bureau of Statistics. SPSS (V21) was used for data analysis to produce both descriptive and inferential statistics. A regression model was also used for establishing the relationship between the study variables. The one-way Anova was performed on the average figures for all the measures of performance. The results for the three categories of taxpayers revealed that there was a significant difference in the one-way Anova. From the results, the research concludes that there was significance improvement in tax compliance after the enforcement of withholding VAT tax policies in Kenya. The key restraint of this research was the focus of only one constituent of the tax compliance, that is, the withholding VAT revenue. The study identifies areas of further studies including, finding out the impact withholding VAT tax on the country's economic growth, similar study in other countries in East Africa also there is a need for further studies to carry out similar tests for a longer time period.

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LIST OF ABBREVIATIONS AND ACRONYMS

ANOVA - Analysis of Variance

CBK - Central Bank of Kenya

DTD - Domestic Taxes Department

DR - Domestic Revenue

ETR - Electronic Tax Register

GDP - Gross Domestic Product

ICPAK - Institute of Certified Public Accountants of Kenya

IRS - Internal Revenue Service

i-Tax - Web-based tax system in Kenya

KRA - Kenya Revenue Authority

LTO - Large Taxpayers Office

MST - Medium and Small Taxpayers

PAYE - Pay As You Earn

SAS -Self Assessment System

VAT - Value Added Tax

WHT - Withholding Tax

WHVAT - Withholding Value Added Tax

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CHAPTER ONE

INTRODUCTION

1.1 Background of the Study

The level of tax compliance in an economy is a function of many variables especially for Value Added Tax (VAT) since it is not ease for the Government to monitor transactions as they occur at the tax payer's station (Hurst, Li & Pugsley, 2014). Many governments operate on a self-assessment basis when it comes to payment of VAT as the Companies determine on their own the VAT payable through computation of VAT on purchases and VAT on sales. However, one of the challenges noted from previous research indicates that voluntary compliance where the tax payers voluntarily determines their tax liabilities and pays gives room for some form of manipulation (Gangl, Hofmann & Kirchler, 2015). This means that all the taxes due in a particular time period may be delayed or ignored all together leading to loss of revenue to the Government.

In the United States, the Government implemented a number of policies and laws to help improve the level of VAT compliance among tax payers. These measures included requiring withholding of tax at the source of income which means that the organization paying for services or goods withholds VAT there on and forwards it to the Government (Brockmann, Genschel, & Seelkopf, 2016). Another measure included application of deterrent mechanisms like giving the revenue collection agencies some powers to enforce the law by laying out clear penalties to those found disobeying the law.

Kenya Government revenue is majorly generated from taxes such as pay as you earn (P.A.Y.E), excise duty, and value added tax. Tax revenues play a vital role in Kenya's economic development (Kanyi and Kalui, 2014). Sales tax had been in operation in Kenya since 1973 and was replaced by VAT whose inception took place in January 1990. Tax on consumer expenditure has undergone a number of changes with respect to its name and how it is executed since Kenya attained its independence from Britain. For instance, according to KRA (2016) there was huge shortfall in revenue collection by sh. 15.9 billion in Value Added Tax collection from imports. This study, therefore, seeks to study the effect of Withholding Value Added Tax on Value Added Tax Compliance in Kenya.

The VAT Act 2013 was introduced in Kenya on 2 September 2013. Since its introduction, The VAT Act 2013 has gone on to make several changes to the contents of the repealed VAT legislation by doing away with some provisions and presenting several new ones (Njogu, 2015). Of interest is the deletion of VAT remission, elimination of reduced VAT rate of 12%, integration of former subsidiary legislation into the principal legislation, decrease in schedules from eight to two and introducing tax charge that was formerly zero rated and exempt supplies (Ernst & Young, 2014). Vat is a key tax incentive for the business sustainability as it determines the affordability of commodities and the profits made by entrepreneurs (Umeora, 2013).

This study was grounded on the following theories to help explain Withholding Value Added Tax and its effects on Tax compliance: Ability to Pay Theory, Equal sacrifice Theory, Economic-based Theory, and Psychological Theory.

1.1.1 Withholding Value Added Tax

Lee (2015) in their study on Value added tax and consumption noted that numerous studies have looked at the several issues involved during execution of VAT in developing and developed countries. Some of the studies cited by them include, Gale and Harris (2011) who discussed the numerous concerns pertinent to the design of a VAT, together with its execution, administration, costs incurred in effecting compliance, its influence on savings as well as labor supply, its distributional impacts, and several transitional issues if implemented in the U.S.

Miller and Oats (2016) discussed issues related to VAT design and in the same way concluded that the influence of a VAT on consumption is crucial but remains unresolved. WHVAT is a design of VAT; it is a system that encompasses the statement of VAT by both the supplier and his customer (KRA). It is a tax deducted at source on acquisition of taxable goods and services by the withholding VAT Agent. Ability-to-pay theory supports the Withholding Value Added Tax since it reduces the burden on the taxpayer though no reduction of liability on him, the sharing in payment has a psychological effect of not feeling much pinch on payment of VAT due to the government.

Where a person makes a taxable supply and has issued a tax invoice, withholding vat is calculated based on a government's guidelines. For instance, in Kenya, WHVAT rate applicable is 6%. Assuming a taxable value of Ksh. 100,000 has been supplied, the agent with withhold Ksh. 6,000 that is (100,000*6%). The withholding of VAT by a withholding VAT Agent shall NOT relieve the supplier (Taxable person) of the obligation to charge VAT at 16% and file monthly returns in accordance with the relevant provisions of the VAT Act 2013 (KRA). The supplier is expected to pay the balance of 10% to account for the balance of vat charged at 16%.

Withholding Tax is important for it is a tracking system for taxpayers who reduce their actual tax liability or evade on payment of tax due on taxable goods and services. When the income on which WHT is deducted at source the tax authorities are aware of the transaction between the withholding agent and the taxpayer therefore the tax withheld becomes a basis for the tax expected. The taxpayer has therefore an obligation to pay the balance after matching the actual tax liability against the tax withheld. For purposes of this study Withholding Value Added Tax was measured by the amount of revenue collected as Value added tax withheld by agents (Adhikari, 2015).

Ndumia, (2014) said that WHVAT was scrapped owing to among other reasons, the fact that not all VAT amount withheld was remitted to KRA's account at the Central Bank of Kenya (CBK) which adversely affected the overall VAT revenue performance. WHVAT was re-introduced in 2014 in Kenya and the authority argues that it has increased VAT performance attributing such performance on the WHVAT framework.

1.1.2 Tax Compliance

Organization for Economic Cooperation and Development (2015) defines Tax compliance in into two key categories that is Administrative compliance (complying with the administrative rules of lodging and paying on time, what some would include within their definitions of compliance with reporting requirements, procedural compliance or regulatory compliance); and Technical compliance (i.e., taxes calculated in accordance with the technical requirements of the tax laws or taxpayers pay their share of tax in accordance with the provisions of the tax laws). VAT on the other hand refers to an indirect tax levied on consumption of taxable goods as well as services.

Kosgei and Tenai (2016) focused tax compliance as the degree to which taxpayers comply with the tax law. Trandafir (2016) cited that tax compliance is affected by 14 main factors as discussed by various researchers which are age, gender, education, income, occupation or status, peers' or other taxpayers' influence, ethics, legal sanction, complexity, relationship with taxation authority (IRS), income sources, perceived fairness of the tax system, possibility of being audited and tax rate. Non Tax compliance is the difference between revenue collected and that ought to be collected.

In Tax administration revenue collection procedures have to be efficient to minimize on the cost of collection. VAT compliance measures are vital in ensuring that costs are utilized in collection of revenue effectively. Tax compliance was measured as a rate of VAT collected against the Total Revenue collected.

1.1.3 Withholding Value Added Tax and Tax Compliance

Over the last few years, its noted there has been a significant increase in concerns by losses of VAT revenue as a result of evasion and fraud (Ndumia 2014). These notwithstanding many scholars have argued that VAT is the best tax that was ever introduced. The same argument is agreed on by Trandafir (2016) who indicated that value added tax performs better than other forms of revenue.

Saqib, Ali, Riaz, Anwar & Aslam (2015) detected the fact that introduction of a VAT decreases the marginal cost of public funds triggering an optimizing government to increase the tax percentage. They argue that most countries which have adopted VAT system have thereby gained a more effective tax instrument, however is less noticeable in sub-Saharan Africa.

1.1.4 Withholding Value Added Tax in Kenya

Withholding VAT was first introduced in Kenya in the year 2003 then suspended in 2011 but later re-introduced in the year 2014. Withholding VAT is governed by VAT Act 2013 however Section 26 of the Finance Act 2014 amended VAT Act 2013 by inserting a new section 25 A which re-introduced Withholding VAT (WHVAT) system at the rate of 6% which came into effect from 19th Sept. 2014. Bonga (2017) indicated that reforms are also initiated to help modernize the tax policies to take into account the changes in the operating environment.

In Kenya, Finance Act 2015 amended section 25 A to allow the Commissioner appoint any other person as a withholding VAT Agent. Initially, Institutions appointed to act as withholding VAT Agents were restricted to Government institutions, parastatals, banks, financial institutions, Cooperative Societies, Insurance companies and regular exporters (KRA). On 2 September 2013, Kenya's VAT Act 2013 was introduced. The VAT Act 2013 has altered substance of the repealed VAT legislation by removing some requirements and introducing several new requirements (Njogu, 2015).

Of keen interest is the removal of 12% VAT rate, removal of VAT remission, the principal legislation including the previous subsidiary legislation, VAT schedules reduction from previously eight to two and bringing into tax charge previously zero rated and exempt supplies (Ernst & Young, 2014). Vat is a key tax incentive for the business sustainability as it determines the affordability of commodities and the profits made by entrepreneurs.

Tax compliance forms the basis for optimal revenue collections in any government. In Kenya, the Authority is geared to achieve compliance by building on trust through facilitation. This is done through various forms for instance, tax payers education and awareness, use of Automation

for instance, ETR and i-Tax platform, continuous amendments to the administrative laws and policies, use of withholding agents and imposition of additional assessments, penalties and interests. Tax Compliance level is focused on different taxpayer categories which are LTO, MST and the Regions (Bonga, 2017).

1.1.5 Tax Compliance in Kenya

There is a low rate of tax compliance in Kenya as a result of structural as well as taxpayers' attitude towards taxation. A large segment of the informal sector, especially the SMEs in Industrial area in Nairobi exhibit low tax compliance levels. It is estimated that tax compliance was rated at 65% and 66.9% for the fiscal years 2010 and 2013 respectively with VAT being the least complied tax system (KRA, 2015). Significant tax reform strategies aimed at improving overall tax compliance continue to be designed and developed especially over the last ten years. The government has been forced to refocus its refinement of internal financing with the sole aim of targeting loan repayments as well as accrued interest at the same time bridging budget deficit that is ever increasing (Ali, Fjeldstad & Sjursen, 2014).

Low tax revenues especially in the short run as opposed to the long run has been one of the outstanding issues that have continued to halt the Kenyan economy as it attempts to reform its fiscal policy (Ngotho & Kerongo, 2014). The low rate of tax compliance leading to low tax revenue has therefore resulted to heavy borrowing by the government from both the internal financial sector as well as externally. This has resulted to crowding out by private investment impeding continued economic growth.

Kenya is categorized among those countries with low tax compliance that has resulted to low national income. This challenge has been further compounded by the country's difficult task of

ensuring efficient and effective tax administration (RoK, 2016). According to a research conducted in Kenya by African Research review, the problem of tax noncompliance among business entities has hindered the achievement of set revenue collection by Kenya Revenue Authority. The study revealed that VAT noncompliance is high among the middle-income business entities and that there was a slight positive relationship between Inspection of business entities by tax authorities with VAT compliance.

1.2 Research Problem

The Institute of Certified Public Accountant of Kenya (ICPAK) defines withholding tax system as encompassing withholding taxes and other withholding systems of taxation which could take the form of pay as you earn (PAYE), Value added Tax (VAT), and the withholding tax (WHT). The tax collection bodies across the world have advocated for withholding of taxes due to the benefits that come with it. Some of the benefits include: decreased collection costs, faster remittance to the Government hence it can use the money sooner in funding its programs steadily throughout the year, reduces the need to save a gigantic payment in June of every year The institute further notes that withholding has also been found to increase compliance and decreases evasion and underpayment because people don't notice how much tax they are paying in a withholding system hence there is less sense of anger (ICPAK, 2016).

Several studies have been conducted on tax compliance and withholding taxes. For instance, Chege (2014) examined the effects of employing electronic tax register by hotels in Nairobi on value added tax compliance in Kenya. The findings indicated an increase in VAT revenue with the use of Electronic Tax Registers. It was concluded that ETR machines enhance VAT collection resulting from more accurate VAT reporting.

In another study, Atawodi and Ojeka (2012) focused on issues that affect tax compliance among the small and medium enterprises in the Northern part of Nigeria and established that a big tax rate as well as composite recording measures is the majority key factor contributing to lack of compliance of the small medium enterprises. Mukabi (2014) examined factors influencing turnover tax compliance in the Kenya Revenue Authority domestic taxes department in Nairobi County. The Findings revealed that taxpayer's awareness, cost of compliance and complicated systems; perceptions of taxpayers towards the tax system greatly determine the level of compliance for turnover tax. King'oina (2016) studied factors influencing value added tax compliance among the construction firms in Kisumu County, Kenya. It was established that tax understanding and knowledge had a significant effect on tax compliance. Reduced tax compliance cost is associated with high levels of tax compliance.

The above studies have concentrated on other factors affecting tax compliance. Limited research has been carried out on the effect of withholding value added tax on tax compliance which is the focus of the current study. This study therefore sought to establish the effect of Withholding Value Added Tax on Tax Compliance in Kenya. The study sought to answer the question; what is the effect of withholding value added tax on tax compliance in Kenya?

1.3 Research Objective

The general objective of this study was to determine the effect of withholding value added tax on tax compliance in Kenya.

1.3.1 Specific Objectives:

i) To determine the effect of withholding value added tax among Large Taxpayers on tax compliance in Kenya.

 To determine the effect of withholding value added tax among Medium and Small Taxpayers on tax compliance in Kenya.

1.4 Value of the Study

The result of this study was important to several stakeholders including the Government of Kenya, tax payers, scholars, and academicians among other users.

For the Government of Kenya and specifically KRA, the findings informed the future policy formulation and implementation in matters concerning Value Added Tax administration in the Country. The findings also helped avail the Government with statistics on the level of compliance and how it can be improved to increase revenue collection.

To tax payers in Kenya, the study informed them of several measures that the Government has put in place to ensure that optimal revenue is collected for better economic growth. The findings helped them learn on the importance of compliance hence reduce the rates of avoidance and evasion of taxes. To scholars and academicians, the study adds to the existing literature on withholding value added taxes and compliance. This broadens their comprehension of the theories on the subject besides suggesting areas for further research.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

This chapter outlines literature reviewed in an effort to set basis for the study and the concepts. As such, the chapter highlights theories guiding the study, previous empirical studies conducted and new developments related to the study. The chapter ends by providing an overview of major ideas for the study.

2.2 Theoretical Review

The study was grounded on the following theories to help explain WHVAT and its effects on VAT compliance: Ability to Pay Theory, Equal sacrifice Theory, Economic-based Theory and Psychological Theory.

2.1.1 Ability to Pay Theory

This scientific theory of the sixteenth century was proposed by the Swiss philosopher Jean Jacques Rousseau (1712-1778), Jean-Baptiste Say (1767-1832) who was a French political economist and John Stuart Mill (1806-1873), an English economist. The argument that is put forward by the theory is that the income of an individual or their ability to make payment determines how much taxation should be levied on the individual. This is therefore the basis upon which progressive tax is founded and accordingly, as taxable income increases, tax rate also increases (Jones & Rhoades, 2011).

Thus the theory provides that individuals who have greater income or wealth and can actually afford to make tax payments ought to be taxed at a higher rate of taxation than individuals who

earn less income which results to the most equitable tax system. It has been adopted extensively in industrialized economies that have unequal income distributions. The theory however lacks a solid method of measuring equity of sacrifice, since it has been demonstrated that it can be measured through absolute, proportionate and to some extent also captured in marginal terms. The implication of the theory therefore extends to the taxes and tax systems therefore helping in increasing Government revenues. The theory also has social consequences that are intertwined with economic effects. The criteria guiding the choice of taxes that was adopted as well as their rates of application was lead to a situation where one set of economic effects are preferred to another set which leads to different social implications as a result of divergent economic effects. However, it is worthwhile to note that this theory does not vividly capture VAT because despite the fact that individuals earn significantly different amounts of income and therefore have different abilities, they are all subjected to the same amount of VAT on a particular good that they buy. Jones and Rhoades (2011) therefore argue that VAT is regressive since it only captures a smaller proportion of an individual's income even as their income improves.

2.1.2 Equal sacrifice Theory

In an effort to make a tax system satisfy the theory of justice, the sacrifice entailed by the taxpayer should be taken into consideration according to this theory. The equal-distribution theory also known as Equal sacrifice or Proportionate theory as was suggested by J. S. Mill as well as a number of classical economists in their quest to expound on the idea of justice in taxation posits that income, wealth, as well as transactions need to be subjected to a fixed percentage taxation implying individuals with high levels of income should be subjected to a higher tax, only that they should not be subjected to a higher rate of taxation (Musgrave & Musgrave, 1989).

Equal sacrifice was thus extracted from individuals who have been subjected to taxation that is in proportion to their income levels according to the opinions advanced by the classical economists. Thus, equal sacrifice can be construed in three different dimensions. The first measure captures what is submitted by the taxpayer representing a similar absolute degree of utility as that derived from the individual's income. The second equal sacrifice measure entails an individual taxpayer sacrificing a similar proportion of utility as that they derive from their income.

The third and last measure of equal sacrifice in tax implies that each taxpayer surrenders a similar level of utility as that of their last unit of income. However, this is not the view generally held by modern economists who argue that marginal utility of income diminishes as individual's income increases. It is therefore clear that for the achievement of equality of sacrifice, individuals who earn significantly higher income ought to be taxed at higher rates as compared to their low income counterparts who ought to be subjected to lower rates of taxation.

According to Musgrave and Musgrave (1989), modern economists in all modern tax dispensations show preference for progressive system of taxation at the expense of regressive tax systems. VAT is captured in this theory since every individual is subjected to the same amount of VAT on a particular good regardless of their income differences as has been mentioned that VAT represents a smaller proportion of a person's income as their income rises.

2.1.3 Economic-based Theory

Taxpayers' judgments are exclusively based on maximising their individual financial as well as economic welfares according to this theory. The theory has however been subjected to critical scrutiny and severe criticism from psychologist and sociologist models that fault individual

preferences and choices. Extending considerations such as psychological and sociological factors with overarching influence on tax compliance have several limitations and have thus cut the first turf for the creation of economic-psychological models on VAT tax compliance.

Economic deterrence model, a constituent of economic based models that explains more on economic-based theory of taxation was advanced by Allingham and Sandom (1972). They jointly applied the expected utility model that explains criminal activity put forth by Becker (1968) to the taxation system. Economic deterrence model captures the concept of tax evasion by an economically rational taxpayer who evaluates the differences between tax evasion pay-off and the cost of being caught and decides to evade tax provided the pay-off from evading tax exceeds the expected cost of being caught.

The evading taxpayer's expected utility function was captured in a seminal economic deterrence model proposed by Allingham and Sandmo (1972). The model captures several features of tax evasion. Primarily, the taxpayer who is more risk averse is less likely to engage in tax evasion as compared to one who is less risk averse. Moreover, knowledge on the existing taxation system by the taxpayer is crucial in making an assessment regarding the probability of being detected, as well as the severity of the penalties attached to tax evasion once the taxpayer has been detected.

The model therefore stipulates the decision-making criteria for the taxpayer specifically on how much tax they report to the taxing agency. In the process of making this decision by the taxpayer, they are guided by the need to maximize their individual expected utility construed as the sum of a single outcome utility value weighted against the probability of occurrence of that particular outcome. Allingham and Sandom model therefore depicts a situation whereby greater probabilities of audit lead to increased deterrence on tax underreporting and that lower levels of reported income are realized as a result of higher rate of the proportional tax. The general

derivation of the theory therefore is that tax audit as well as penalty on evasion determines VAT compliance by taxpayers. The theory implies that fear of sanctions confines taxpayers to tax compliance.

2.1.4 Psychological Theory

The behavioural approach to tax compliance as an answer to criticized economic-based models has undergone significant development. Leviner (2008) argues that in order to comprehend tax compliance one needs to examine other factors apart from deterrence factor as well as economic determinants which have been discussed in the economic model. In further enhancing and extending the economic model of tax compliance beyond its primary concepts, it is paramount that researchers explore other areas of significant importance such as psychology, moral and social factors that also affect tax compliance behaviour and incorporate these factors in advancing their models.

Tax compliance can be construed as a psychological tax contract extending beyond the deterrence model that was traditionally drafted and tax morale can be understood as an intricate connection between taxpayers and the government (Feld & Frey 2007). The behavioural approach can thus be viewed as a complementary extension of the mainstream economic analysis. It follows that behavioural theory including other psychological elements such as morale, incentives, and emotion between taxpayers and tax authorities can be explored to provide requisite material for comprehending tax compliance behaviour and how to improve this area.

2.3 Determinants of Tax Compliance

The findings of more recent studies show that not only do supply factors such as tax knowledge and education as well as perceived opportunity for tax evasion matter but that demand factors such as organizational quality, fines and penalties and informal sanctions has a major impact on determination of tax effort and compliance (Keen, 2012). As they conclude, an essential precondition for a more adequate tax collection effort by a legitimate and responsive state is one that secures the rule of law and keeps corruption under control.

2.3.1 Tax Knowledge and Education

Knowledge is a key factor in tax conformity as it is linked to the taxpayers' capability to comprehend taxation rules as well as their readiness to meet the terms (Simionescu & Albu, 2016). The facet of knowledge that links to conformity is the common perceptive with regard to taxation rules and facts regarding the opportunity to elude tax. The effect of knowledge on conformity conducts has been evaluated in numerous studies.

Taxation knowledge helps to raise public understanding with regard with taxation guidelines, the function of tax in state growth and particularly to elucidate how and where the revenue gathered is utilized by the administration (Zhang & Qiu-Sheng, 2017).

Approach towards tax conformity can be enhanced through the improvement of taxation awareness. A taxpayer needs to have an affirmative stance towards tax so as to cut down on their preference towards tax non-conformity. Self-assessment system (SAS) needs taxpayers to comprehend all the rules and set of laws that preside over taxation, (Adegbie, Olajumoke & Danjuma, 2016). It is essential for the taxpayers to work out for themselves the quantity of tax they require to forfeit and do the disbursement. The introduction of a new system was gladly

appreciated by the taxpayers, like the SAS, if they have sufficient understanding to comprehend the system. Therefore, teaching programs prearranged by the tax authority or other public learning institutions are essential to augment taxpayers' capability to comprehend Self-evaluation system and to raise their self-belief in satisfying their tasks as taxpayers.

2.3.2 Fines and Penalties

Penalty and fine tax might stand-in each other because of their numerous intertwining connections provided that neither of them is put to nil (Simionescu & Albu, 2016). If fines are quite high, then it becomes more dangerous and costly for taxpayers to dodge thereby discouraging them to from tax avoidance. The amount of fines greatly influenced VAT conformity than audit probabilities. Many scholarly researches have failed to indicate the support for the discouraging influence of fines as they were frail. Other results indicated that a strategy oriented on prevention is successful just in amalgamation with repeated Audits.

Extreme penalties were scontaining no outcome in VAT tax conformity, if it is general information that audits nearly do not happen. The rising tax evasion and tax confrontation due to rising amounts of fines puts into question how fines should be evaluated to successful. Moreover, penalties should be greatly sufficient to discourage the anticipated value of tax elusion and to guarantee its disincentive cause on taxpayers. Additionally, if penalties are too big, the tax structure would be supposed as unreasonable and unfair thereby forcing the taxpayers to employ any opportunity to lawfully circumvent taxes (Korauš, Simionescu, Bilan & Schönfeld, 2017).

2.3.3 Informal Sanctions (Ethics)

The normative measures for control in societal environments and associations involving persons in a community are called ethics, (Hallsworth, List, Metcalfe & Vlaev, 2017). This social

conduct model is determined by others and received as a custom in the community. For example, in VAT tax conformity, a person is compliant on condition that they consider that conformity is the conventional standard, while non-conformity is regarded as an offence. The common proposition pertaining ethics is that the resolution to fulfill the VAT tax requirement goes further than the perception of the self-rationalisation of egocentric, reasonable, and self-centered actors, as revealed in the criterion neoclassical theory. Conservative VAT tax conformity forms of taxpayer conduct hugely neglect the principled facet of tax fulfillment but scholars have started to realize and highlight personal intrinsic factors (for example ethical factors) in their research, as these issues could influence the findings of conformity.

Experimental studies carried out have indicated that morals have a considerable effect on enhancing VAT tax conformity as taxpayers believe that tax dodging is morally wrong. Steady ethical commitment affects taxpayer conformity activities. Maintaining one's moral conduct steadily influences personal conformity particularly on VAT. The bigger the principles are believed, the bigger the willingness to execute activities in agreement with the stipulated laws and conventions. (Hallsworth, *et al* 2017) further indicated that taxpayers who identify themselves as containing great moral values (tax complimentary moral values) feel guilty if they are caught up in dodging tax or are detained by the law enforcers, as a consequence making them more submissive.

2.3.4 Perceived Opportunity for tax evasion

The major determinant of tax conformity that has been captured frequently is opportunity. opportunities to evade taxes arises specifically if personal earnings are not subject to computerized third-party accounting, or if levies are not suspended at the origin (for example in situations of acceptance of gross earnings or cash disbursement (Ungurean & Dascalu, 2015).

At least two dissimilar facets provide the connection between non-compliance and the opportunity. Initially, in situations where individuals don't intentionally take advantage of opportunities, particular conditions contributing to the avoidance opportunities may still contribute to non conformity. Opportunities often arise when tax recordings are not completely computerized automated. Absence of computerization of tax conformity recording measures can lead to vulnerability and faultiness even un-deliberately to take advantage of the elaborate opportunities. Deliberate or non deliberate conformity therefore may increase due to opportunities (Fooken, Hemmelgarn & Herrmann, 2015).

Also, supposing that individuals are eager to take advantage of opportunities then they are capable to do so simply if the opportunities are documented initially. Nonetheless, opportunities to avoid sometimes are likely to stay unseen. Even though several taxpayers recognize opportunities for avoiding little amounts, just a fraction of them discern opportunities for avoiding bigger sums. While constraining for deliberate avoidance destroy the influence of opportunity on avoidance, at the same time restraining for anticipated elusion and supposed opportunity restored the key result of opportunity on non-conformity. In fact, it has been established that those essentially avoiding recognize rising opportunities to execute so (Akumu, 2015).

2.4 Empirical Review

The section presents an empirical literature review of other studies that have focused on tax compliance. Both the international and local studies have been presented.

2.4.1 International Studies

Batrancea, Nichita and Batracea (2012) conducted a study that sought to assess the factors which shape tax compliance behaviour. They summarised the factors into socio-psychological, political, and economic factor determinants. The socio-psychological factors identified were attitudes, norms, fairness perceptions, and motivational postures. They emphasized tax complexity which they regarded to be the main political factor influencing tax compliance. The economic factors identified as major determinants of tax compliance were audit probabilities, fines, tax rates and income. They concluded that effective economic directions such as fines and other deterrent measures enhance tax revenue.

Fjeldstad and Iversen (2012) found that tax compliance behaviour among South African citizens was influenced by perception about difficulty of evading taxes, satisfaction with public service provision, expenses to non-state participants, perception of an ethnic group being treated unfairly, and tax knowledge. The study did not assess a number of possible determinants of tax compliance and therefore there is need to expand the variables.

Atawodi and Ojeka (2012) conducted a study on issues that affect tax compliance among the small medium enterprises in the Northern part of Nigeria and established that a big tax rate as well as composite recording measures is the majority key factor contributing to lack of compliance of the small medium enterprises. The study also established other factors that significantly influenced tax compliance among SMEs in the region such as compound taxes and shortage of appropriate clarification. The study surveyed a few SMEs in the region that were among those that reported high cases of non-compliance. The study also importantly examined factors that explain non-compliance but not compliance as most other studies have.

Onwuchekwa & Aruwa (2014) conducted a study focusing on the relevance and the problems of Value Added Tax (VAT) in Nigeria. The respondents in the study were tax institutions, the revenue staff and the public. The study employed descriptive analysis techniques and the data used was primary in nature. The findings indicated that there was low tax compliance due to lack of proper records, unqualified FIRS staff and low level of education among the taxpayers and the opinion that the tax revenue was being misused.

Nilsson (2015) used two approaches to evaluate tax conformity performance in Argentina. This was aimed at improving the mercantile taxpayers and far-reaching campaigns and as well as audits to enhance the chance of exposure amongst the taxpayers. The findings of the study revealed that as the number of audits and the chance of exposure increases, the taxpayers became positive in complying with tax regulations and precisely accounted their revenue which positively influenced the tax proceeds. The initiative was that unintended tax avoidance may result relatively than deliberate tax non compliance. Taxpayers are liable to integrate more intricate tax avoidance plans which are challenging to detect through documentations so that they can remit small amount of tax if they become conscious that there was not be realized due to lack of scrutiny. Results of a study by Bergman agree with the theoretical suggestion that the apprehension of recognition affects the degree of conformity activities, implying that those who avoid adopt protective ways when the apparent danger of exposure is great.

2.4.2 Local Studies

Naibei, Momanyi and Oginda (2012) conducted a study that sought to establish the association between inspection, VAT compliance and the size of income among personal firms in Kenya. The study sampled 233 registered firms and questionnaires were administered to the respondents for purposes of primary data collection. Data was then analysed through correlation analysis. The

results showed that there was a higher VAT compliance level on those firms which had undergone a tax audit by KRA. 58% of the businessmen agreed that tax audits acted as deterrence on tax evasion. This in effect had a positive effect on the VAT revenues collected by KRA.

Osebe (2013) conducted a study that sought to evaluate the issues that influence tax conformity by Real Estate developers in Nakuru town. Results of the study indicated that tax conformity expenditure is a causative factor to tax conformity. From this finding therefore there is enough indication that tax conformity price is closely connected with elevated degree of tax conformity leading to an increase in tax revenues. Taxpayers do a cost-benefit analysis of the cost of being caught through audits and the probability of being penalized, together with the possibility of criminal sanctions. If they find that the magnitude is very high, they end up following tax law and in effect comply. The study therefore provided some preliminary evidence that fines and penalties attached to tax compliance play a crucial role in enhancing tax revenue.

Another study that was conducted by Nyaga (2014) on tax compliance, enforcement, and taxpayer service in Kenya explored the relationship between enforcement policies and taxpayer service on tax compliance in Kenya. The study adopted the use of simple regression analysis of aggregate variables representing enforcement measures against audit, penalties, criminal sanctions and taxpayer service. The study used a sample frame of self-employed individual taxpayers for the period 2003-2012. The findings of the study indicated that audit and penalty had a positive relationship with tax compliance and hence enhanced tax revenue and taxpayer service and criminal sanctions had a negative influence on tax revenue.

Mararia (2014) examined the effect of Integrated Tax Management System (ITMS) on tax conformity by SMEs in Nairobi's CBD. Research study adopted a target population of 200

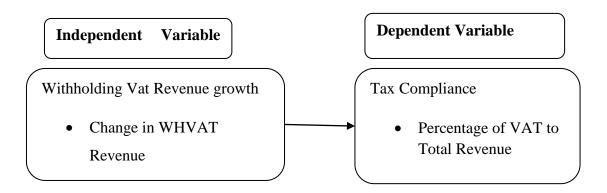
taxpayers from which 100 taxpayers were picked as a representative sample. Data analysis was conducted by the uses of SPSS version 20.0. The findings of her study showed that penalties and fines had a positive and significant association with tax conformity. This resulted to an overall rise in the collections as penalties and fined deterred tax evasion by taxpayers.

Akumu (2015) sought to establish the determinants of tax revenue in Kenya with data spanning 24 years from the year 1990 to the year 2014. The study specifically aimed to establish the relationship between interest rates, exchange rates and imports growth on revenue growth. The study used timeseries data collected on a quarterly basis from the year 1990 to 2014. A descriptive research design was used. Data was collected from sources like Central bank of Kenya, Kenya National Bureau of statistics, International monetary fund and World Bank and analyzed through regression modeling. The study findings revealed that the study variables investigated; interest rates, exchange rates and imports growth significantly affect revenue growth negatively.

2.5 Conceptual Model

The conceptual Model presents a figurative relationship between the variables. Withholding Tax being a tracking system for taxpayers who reduce their actual tax liability or evade on payment of tax, enhances the tax compliance and ensures tax gap is minimized. The expected relationship between the two variables is hence positive. The figurative representations of the variables of the study are as presented in figure 2.1 below

Figure 2.1: Conceptual Model



Source: Author (2017)

2.6 Summary of Literature Review

A closer look at the empirical studies that have been reviewed clearly shows that tax non-compliance has been a major concern for many governments and that tax enforcement through withholding tax may be the only appropriate tool that can be adopted by tax agencies to deter further non-compliance. Enough attention has not been paid to VAT which is an important tax since most of the past studies have focused on personal income tax. There are significant differences in the way that taxpayers in different tax brackets behave regarding taxation matters. From the empirical review, most studies carried out on VAT were concentrated mainly on SMEs and other private firms. It is therefore important to conduct a research focusing on the influence of withholding value added tax on tax compliance in Kenya.

The review of literature has indicated knowledge gaps ranging from the contextual, conceptual and methodological knowledge gaps. Studies for instance Batrancea, Nichita and Batracea (2012) focused on the factors which shape tax compliance behaviour and withholding value

added tax, Fjeldstad and Iversen (2012) found that tax compliance behaviour among South African citizens was influenced by perception about difficulty of evading taxes, satisfaction with public service provision, expenses to non-state participants, perception of an ethnic group being treated unfairly, and tax knowledge. Thus these studies were all conducted in different contexts with a different set of local economic conditions leading to a contextual gap.

On the same note, studies by Atawodi and Ojeka (2012) focused on issues that affect tax compliance among the small medium enterprises in the Northern part of Nigeria and established that a big tax rate as well as composite recording measures is the majority key factor contributing to lack of compliance of the small medium enterprises. On the other hand, the study by Nilsson (2015) used two approaches to evaluate tax conformity performance in Argentina. The two studies thus examined different aspects of tax compliance leading to a conceptual gap.

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

This section presents the study design that was adopted as well as the target population, Data collection methods, pilot test and data analysis method to be adopted by the study.

3.2 Research Design

According to cooper and Schindler (2006), the process through which data is gathered and analyzed so as to achieve the purpose of the study through economical experimental data is called research design. This study adopted an explanatory research design. This was enable the study to answer key "how" questions. Explanatory research designs help in explaining how a variable influences the other. Therefore, the adoption of explanatory design is regarded as suitable whenever there is a need for clarification of a supposed difficulty. Any time a difficulty arises it is imperative to fully comprehend it prior to looking for its solution; therefore, it is advisable to employ an explanatory study to deal with it (Gill and Johnson, 2010). To fully determine the effect of withholding value added tax on tax compliance in Kenya, this study used explanatory research design.

3.3 Population

The population of the study comprised taxpayers in Kenya as categorized by KRA as Large TaxPayers Office (LTO) and Medium and Small Taxpayers (MST) in Kenya. Data was collected for a period spanning 7 years from the year 2011 to 2017 on quarterly basis. Data was collected

on Withholding Vat Revenue and tax compliance with a focus on VAT revenue against Total revenue.

3.4 Data Collection

The research used secondary data collected on a period spanning 7 years from the year 2011 to 2017 on quarterly basis on Withholding Vat Revenue, Vat revenue and Total Revenue Kenya Revenue Authority reports and on GDP growth from Kenya National Bureau of Statistics (KNBS) for the same period. A secondary data collection sheet attached (Appendix I & II) was used to collect the secondary data.

3.5 Data Analysis

This study analyzed the gathered information through inferential statistics by specifically conducting the regression and correlation tests. To analyze the gathered information, the study employed the use of the statistical Package for Social Science (SPSS Version 22). The study findings were detailed in form of figures or tables so as to provide a preview and a more understanding of the study results. The findings of the study were presented using trend analysis so as to detail the changes and variations in the Withholding Vat Revenue growth and Tax compliance over a 7-year study period.

3.5.1 Regression Models

This study applied four univariate regression models to determine the relationship between the independent and the dependent variables. The univariate regression analysis was incorporated as there is one independent variable in each model. In each regression model, economic growth was used as a control variable since it also affects tax compliance. To test for the control effect, each of the four regression models were run with and without economic growth and establish the

changes in the coefficient of determination (R square) of each model as well as the significance of each independent variable in each instance. A huge change in the R square of the models as well as a significant beta coefficient of economic growth may reveal a significant control effect of economic growth on tax compliance in Kenya.

The general model represent DTD which is the combined results from all the categories of taxpayers and was achieved through examining the models for each, that is, LTO, MST and and their totals in Kenya.

The first objective of the study was achieved by the following univariate regression model:

General model (DTD): $Y = \beta_0 + \beta_c X c + \beta z X_z + \xi$

Where:

Y is the dependent Variable (Vat Compliance as a measure of Vat Revenue growth in all categories i.e, combined)

X_c – Withholding Vat Revenue growth in all categories

X_z – Economic Growth (GDP)

 β_c , β_z – parameters to be estimated

 ξ – Is the error term which is assumed to be normally distributed with mean zero and constant variance.

The second objective of the study was achieved by the following univariate regression model:

$$Y_1 = \beta_0 + \beta_1 X_1 + \beta_2 X_2 + \mathcal{E}$$

 Y_1 is the dependent Variable (Vat Compliance as a measure of Vat Revenue growth among LTO)

X₁ – Withholding Vat Revenue growth among LTO

X_z – Economic Growth (GDP)

The third objective of the study was achieved by the following univariate regression model:

$$Y_2 = \beta_0 + \beta_2 X_2 + \beta_z X_z + \mathbf{E}$$

Where:

 Y_2 is the dependent Variable (Vat Compliance as a measure of Vat Revenue growth among MST)

X₂ – Withholding Vat Revenue growth among MST

 ϵ -the error term, it is supposed to be distributed normally with mean of zero and constant variance

 β_1 , β_2 and β_z -Parameters to be estimated

3.5.2 Operationalization and measurement of variables

Variables were measured as follows:

Tax compliance as a measure of Vat Revenue = Actual VAT collected *100

Total Revenue Collected

WHVAT Revenue growth= Actual WHVAT Revenue growth = (Actual WHVAT Revenue (year1) - Actual WHVAT Revenue (year 0)) divided by Actual WHVAT Revenue (year 0)) given as a percentage;

Economic growth (Xz) was measured based on GDP growth rate as a percentage

3.5.3 Test of Significance

The significance of the beta coefficients was tested at 5% (0.05) level of significance to indicate whether the predictor variable has a significant effect on the dependent variable. A comparative analysis was carried out between the period with WHVAT and period without WHVAT; to achieve this Independent t-test was used to check whether there is any statistical difference.

CHAPTER FOUR

DATA ANALYSIS, RESULTS, AND DISCUSSION

4.1 Introduction

This chapter provides descriptive and analytical results and discussion from the study. It describes the performance of VAT collections over the past seven years since VAT dominates the total collection of revenues. KRA was established as agent to account and collect for taxes in Kenya. The chapter discusses the trend of VAT collections and further evaluates the effect of withholding VAT on tax compliance in Kenya. Finally, findings are drawn from the results to summarize the empirical effect of withholding VAT on tax compliance in Kenya.

4.2 Descriptive Statistics

The study to determine the annual VAT yielded among LTO and MST/DR in the last seven years. Measures of central tendency (mean) and measure of dispersion (standard deviation) have been used to describe the data as shown in the table below;

Table 4.1: Descriptive Statistics

N	Minimu	Maximu	Mean	Std.	Skewnes	Kurtosi
	m	m		Deviatio	s	s
				n		
Statisti	Statistic	Statistic	Statisti	Statistic	Statistic	Statisti
С			С			С

LTO_ VATQs _billion	25	10.2978	32.9441	19.3134	7.72145	.446	-1.387
MSTDRVATQs_	25	9.8228	21.8838	12.7817	3.719754	.839	.167
billion				6	9		
TOTALVATQs_	25	17.9999	50.4227	32.0951	11.10924	.422	-1.426
billion							
TAXCOMPLIANCEQ	25	13.60	23.97	19.1546	2.77904	319	770
s_ billion							
GDP Qs GROWTH	26	3.50	7.60	5.5269	.97798	.178	.081
Valid N (listwise)	25						

The study reveals that the lowest recorded amount of VAT remitted by the LTO was 10.2978 billion while the highest amount of tax remitted was 32.9441 billion. The results further reveal that the LTO tax payer category had remitted an annual average VAT amounting to 19.3134 over the last 7 years. The data of the LTO VAT quarterly remission for the last seven years is positively skewed and it has a much longer right tail than the left tail. The data also reveals that it has a negative kurtosis value which indicates that the distribution has lighter tails and a flatter peak than the normal distribution. The lack of symmetry can be attributed to changes regarding remission of VAT such as the introduction of Withholding VAT.

In addition, the study shows that the lowest recorded amount of VAT remitted by the MST/DR was 9.28228 billion while the highest amount of tax remitted was 21.8838 billion. The results further reveal that the MST/DR tax payer category had remitted an annual average VAT amounting to 12.781768 over the last 7 years. The table 4.1 shows that the distribution of the MST/DR VAT quarterly remission is positively skewed meaning that it has a much longer right tail than the left tail. In addition, the data has a positive kurtosis value which indicates that the

distribution has heavier tails and a sharper peak than the normal distribution. A consistent increase in the amount collected is an indication of institutional capability of the tax collection agency to take an approach towards tax conformity that enhances improvement of taxation awareness. Taxation knowledge has helped in raising the MST/DR tax payers understanding about taxation guidelines, the function of tax in state growth and particularly to elucidate how and where the revenue gathered is utilized by the administration.

Moreover, descriptive about total VAT from the findings indicate that the lowest recorded amount of Total VAT remitted by MST/DR and LTO was 17.9999 billion while the highest amount of tax remitted was 50.4227 billion. The results also show that there was an average of 32.0951 billion of total VAT remitted by MST/DR and LTO tax payers. We can infer that the distribution of the data had a negative kurtosis and was also positively skewed. The presence of skewness and Kurtosis imply the data was not perfectly symmetrical. The asymmetry can be attributed to factors such as changes in regulations and tax laws such as enactment of the new Income Tax Act which have broadened the tax base and enhanced tax collection mechanism.

Further, the degree of tax compliance recorded was at its lowest recorded percentage at 13.60% at its highest percentage at 23.97%. The table 4.1 also reveals that the average percentage of tax compliance stood at 19.15%. We can deduce from the table that the data collected with regards to tax compliance was asymmetrical since it was negatively skewed and had a negative kurtosis. The asymmetry can be signified by large segment of the informal sector, especially the SMEs in who exhibit low tax compliance levels. However, the gradual increase in tax compliance levels can be attributed to the significant tax reform strategies aimed at improving overall tax compliance which continue to be designed and developed.

Table 4.1 also gives the descriptive statistics regarding GDP. The findings show that the lowest ever recorded GDP in the 7 years was 3.50 while the highest GDP to be recorded was 7.60. On average, the country has recorded an average of 5.53 GDP. Further, the descriptive generated also reveal that the distribution the GDP data was positively skewed and had a positive Kurtosis. We can understand from the skewness and kurtosis that the data was not symmetrical. The fluctuation in the GDP can be partly attributed to economic and political stability in the country as it is important in reassuring entities that it is a good idea to invest in an increasing capacity. A significant a increase in uncertainty lowers an entity's confidence to invest hence impacting the amount revenue collected.

4.3 Trend Analysis

Trend analysis was done to compare the data of GDP, MST/DR, LTO and Total VAT over time to identify any consistent results or trends. The study ought to determine the trend followed by the variables. The subject of investigation was to establish if withholding VAT tax had a significant influence in influencing tax compliance.

4.3.1 Gross Domestic Product Trend

A trend analysis of Gross Domestic Product which is an indicator of economic growth was analyzed for year 2010 to 2017. The trend of GDP is as shown in the figure below;

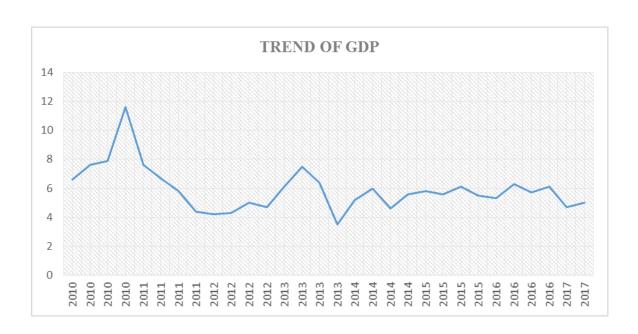


Figure 4.1: Trend of GDP

KEY	
Y-AXIS	Annual GDP
X-AXIS	Year

The figure reveals that since 2010, the GDP has been oscillating from performing best at 8.4% in 2010 and it worst value of 3.8% in 2013. The political transition in 2002 appears to have stabilized the economic growth of the Kenya by introducing Economic and other reforms by participatory democracy as well as political pluralism. However, uncountable factors such as global recession, weakening of the shilling and other variables can be attributed to lower GDP recorded in the period of interest for this study. The favorable environment in Kenya is generally investment friendly that is favorable regulatory reforms to both foreign and local investors, creation of export processing zone among others. There is expectation of rapid growth of export

processing zone through input of foreign direct investment. Non-resident Kenyans who work in the US, Middle East, Europe and Asia have contributed increasingly to Kenya's foreign inflows. Kenya has well-developed social and physical infrastructure compared to its neighbors, therefore attracting foreign investments.

4.3.2 MST/DR, LTO and Total VAT Trend

The study sought to determine the trend followed by the MST/DR, LTO and Total VAT. The trend was drawn in one line graph to ascertain whether the trend was similar among the various levels of VAT tax payer categories. The results are shown in the figure below;

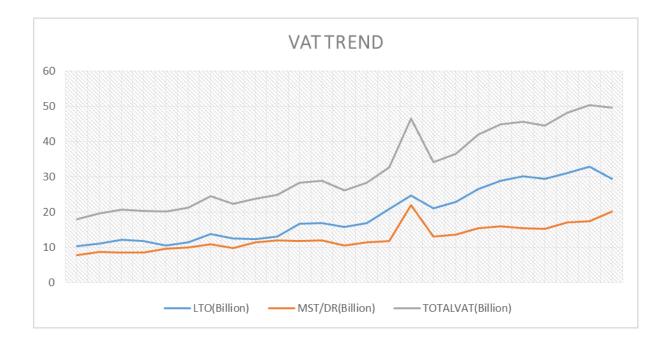


Figure 4.2: VAT Trend

Source: Author	(2017)	
KEY		

Y-AXIS	Amount of VAT in Billion
X-AXIS	Year

The gradual progression in the trend of total VAT can be attributed to many variables including the introduction of withholding VAT tax and use of i-Tax platform which enhances accuracy and highlights inconsistencies in submission of taxes. In addition, KRA has also devised a tax structure that distributes income equitably and promotes rural-urban balance which makes the industry more competitive. The designed tax structure has been made buoyant and elastic to keep revenue from VAT remission by large taxpayers, medium, small taxpayers and from domestic revenue sources expanding at the same speed with income growth without affecting annual changes in rates.

The mean VAT remitted by medium and small taxpayers and from domestic revenue has considerably improved over the 7 years of interest in the study. In the first year of interest (2011) the mean VAT remitted by medium and small taxpayers and from domestic revenue was 2.72 billion with a standard deviation 269.79 million while the VAT remitted by medium and small taxpayers and from domestic revenue the last year of interest (2017) was 60.79 billion with a standard deviation 873.84 million.

In addition, the mean revenue remitted by medium and small taxpayers and from domestic revenue has also considerably improved over the 7 years of interest in the study. In the first year of interest (2011) the mean revenue remitted by medium and small taxpayers and from domestic revenue was 11.03 billion with a standard deviation 1.64 billion while the revenue remitted by medium and small taxpayers and from domestic revenue in the last year of interest (2017) was 27.31 billion with a standard deviation 5.88 billion. The performance of tax compliance was

initially disadvantaged by high costs of compliance which resulted to tax avoidance and tax evasion among medium and small taxpayers and from domestic revenue sources. However certain reforms have seen the remission of VAT and other type of taxes has significantly increased.

4.4 Comparison of VAT before and after WHT

The study further sought to establish whether the enforcement of withholding VAT tax had a significant impact on the amount of VAT among LTO, MST/DR and Total VAT remitted. An independent t-test, was used to compare the mean of VAT revenue earned before and after the enforcement of withholding VAT tax. The results are displayed below;

Table 4.2: Comparison using T-test

			Indep	endent Sa	mples Test					
		Levene's ⁻ Equalit Varian	ty of			t-te	est for Equality o	f Means		
		F	Sig.	t	df	Sig. (2- tailed)	Mean Difference	Std. Error Difference	95% Col Interva Differ Lower	I of the
CompMSTDRValue_ billions	Equal variances assumed	2.828	.106	.145	23	.886	1.007	6.960	-13.390	15.405
	Equal variances not assumed			.151	12.449	.883	1.007	6.685	-13.501	15.515
CompLTOvalue_billions	Equal variances assumed	10.258	.004	-8.738	23	.000	-13.207	1.511	-16.333	-10.080
	Equal variances not assumed			-8.496	14.886	.000	-13.207	1.554	-16.522	-9.8914
CompTOTALVATvalue_ billions	Equal variances assumed	8.135	.009	-8.462	23	.000	-18.954	2.2398	-23.588	-14.321
	Equal variances not assumed			-8.239	15.325	.000	-18.954	2.3006	-23.849	-14.060

The table 4.2 represents a comparative study before and after the enforcement of withholding VAT tax in the country. The first row of table is a t-test testing whether there is a significant difference in the MST/DR VAT before and after enforcement of withholding VAT tax in the country. The parametric tests sought to test the null hypothesis that the two periods had the same mean of VAT remitted. Assuming equality of variance the p-value (0.886>0.05) hence we fail reject the null hypothesis and imply that the VAT remitted by the MST/DR was not significantly different before and after enforcement of withholding VAT tax in the country. From the SPSS output it's clearly seen that there is a no significant difference in VAT remitted among MST/DR VAT before and after enforcement of withholding VAT tax in the country. This has been statistically proven since we failed to reject our null hypothesis.

The study also sought to establish whether the enforcement of withholding VAT tax had a significant impact on the amount of VAT among LTO. The third row of table is a t-test testing whether there is a significant difference in the LTO VAT before and after enforcement of withholding VAT tax in the country. The parametric tests sought to test the null hypothesis that the two periods had the same mean of VAT remitted. Assuming equality of variance the p-value (0.000< 0.05) hence we reject the null hypothesis and imply that the VAT remitted by the LTO was significantly different before and after enforcement of withholding VAT tax in the country. From the SPSS output it's clearly seen that there is a significant difference in VAT remitted among LTO before and after enforcement of withholding VAT tax in the country. This has been statistically proven since we failed to reject our null hypothesis.

Further, the study sought to determine if there was a significant change in the mean total VAT remitted. The fifth row of table is a t-test testing whether there is a significant difference in the Total VAT before and after enforcement of withholding VAT tax in the country. The parametric tests sought to test the null hypothesis that the two periods had the same mean of Total VAT remitted. Assuming equality of variance the p-value (0.000< 0.05) hence we reject the null hypothesis and imply that the Total VAT remitted was significantly different before and after enforcement of withholding VAT tax in the country. From the SPSS output it's clearly seen that there is a significant difference in Total VAT remitted before and after enforcement of withholding VAT tax in the country. This has been statistically proven since we failed to reject our null hypothesis.

4.5 Regression

4.5.1 Regression for All Tax Payer Category

This study sought to develop univariate regression model to determine the significance Vat Compliance as a measure of Vat Revenue growth in all categories of tax payers. Another model is developed with economic growth used as a control variable since it also affects tax compliance. The two models are displayed in the following tables;

The model summary provides information about the regression line's ability to account for the total variation in the dependent variable (tax compliance). The table below demonstrates how observed y-values are dispersed around the regression line.

Table 4.3: Model All Tax Payer

Wodel Sullillary	Model	Summary
------------------	-------	---------

Model	R	R Square	Adjusted R Square	Std. Error of the
				Estimate
1	.588 ^a	.346	.318	2.29545
	(0) =0=111			

a. Predictors: (Constant), TOTALVATQs

Source: Author (2017)

The findings show that the independent variables (withholding VAT revenue among all categories of tax payers) significantly influenced the dependent variable as shown by an R=0.588. The output indicates that the strength of association between the variables is very high (R= 0.346). The independent variable (total VAT by all categories of tax payers) studied, explained only 34.6% of the of tax compliance among all taxpayer categories. This therefore means that other factors not studied in this research contribute 66.4% of the tax compliance among all taxpayer categories.

Analysis of Variance (ANOVA) results provide information about levels of variability within a regression model and further forming a basis for tests of significance of the model.

Table 4.4: ANOVA All Tax Payer

			ANOVA			
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	64.165	1	64.165	12.178	.002 ^b
	Residual	121.189	23	5.269		
	Total	185.354	24			

a. Dependent Variable: TAXCOMPLIANCEQs

b. Predictors: (Constant), TOTALVATQs

Source: Author (2017)

In view of the results in table above the significance value is 0.002 (which is less that 0.05) indicates that the overall model is statistically significance in predicting how withholding VAT tax among all the categories of tax payers influence VAT compliance.

A P-value< 0.05 shows that the overall model was a good fit.

A regression coefficient is interpreted as the proportion of the variance in the dependent variable which is predictable from the independent variable. It is a key output of a regression analysis. The table below shows the results;

Table 4.5: Regression Coefficient of All TaxPayers

			Coefficients ^a			
Model		Unstandardized	d Coefficients	Standardized	t	Sig.
				Coefficients		
		В	Std. Error	Beta		
1	(Constant)	14.431	1.429		10.096	.000
	TOTALVATQs	1.473E-010	.000	.588	3.490	.002

Source: Author (2017)

Regression function extracted using the unstandardized betas are as follows (Y = β_0 + $\beta_c X_c + \epsilon$):

$$Y = 14.431 + 1.473E - 010X_c$$

According to the regression function, holding all factors constant at zero, the coefficient for tax compliance was 14.431. The study further sought to establish the model fitness after the control variable was added to the model. The results are as displayed in the tables below.

Table 4.6: Model All Tax Payer with Control Variable

Model Summary								
Model	R	R Square	Adjusted R Square	Std. Error of the				
				Estimate				
1	.608 ^a	.369	.312	2.30480				

Table 4.7: ANOVA All Tax Payer with Control Variable

			ANOVA			
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	68.487	2	34.244	6.446	.006 ^b
	Residual	116.867	22	5.312		
	Total	185.354	24			

a. Dependent Variable: TAXCOMPLIANCEQs

Source: Author (2017)

Table 4.8: Regression Coefficient All Tax Payer with Control Variable

		(Coefficients ^a			
Model		Unstandardized	d Coefficients	Standardized	t	Sig.
				Coefficients		
		В	Std. Error	Beta		
1	(Constant)	12.074	2.981		4.050	.00
	TOTALVATQs	1.468E-010	.000	.586	3.463	.00
	GDPQsGROWTH	.428	.474	.153	.902	.37

a. Dependent Variable: TAXCOMPLIANCEQs

Source: Author (2017)

b. Predictors: (Constant), GDPQsGROWTH, TOTALVATQs

The results on table 4.6 indicates that the R square value is 0.369 implying that 36.9% of the total variation in the dependent variable (tax compliance) is explained by the independent variables (economic growth and withholding VAT revenue for All Tax Payer) while 63.1% of the variation is explained by other factors not considered by the model and the error term. The results also show that the correlation coefficient value is 0.608 which indicates that there is a strong correlation between the dependent and the independent variables.

The results on table 4.7 shows that the F statistics value of 6.446 is statistically significant at 5% level of significance since the P value of 0.006<0.05. These results indicate that the regression model is a good and reliable predictor of the relationship between dependent variable (tax compliance) and independent variables (economic growth and withholding VAT revenue among All Tax Payer).

The following regression model was established:

$$Y=12.074+1.468E-010X_c+0.428X_z$$

The results on table 4.8 show that economic growth and withholding VAT revenue for MST/DR have a positive relationship with tax compliance. However, only withholding VAT revenue for MST/DR had a statistically significant relationship with tax compliance since p value 0.002<0.05 while the relationship of economic growth was positive but not statistically significant as p value 0.377>0.05.

4.5.2 Regression for MST/DR

This study sought to develop univariate regression model to determine the significance Vat Compliance as a measure of Vat Revenue growth among the MST/DR category of tax payers. Another model is developed with economic growth used as a control variable since it also affects tax compliance. The two models are displayed in the following tables; The model summary below provides information about the regression line's ability to account for the total variation in the dependent variable (tax compliance). The table below demonstrates how observed y-values are dispersed around the regression line.

Table 4.9: Model MST/DR

Model Summary								
Model	R	R Square	Adjusted R Square	Std. Error of the				
				Estimate				
1	.543 ^a	.295	.264	2.38438				

Source: Author (2017)

The findings show that the Withholding Vat Revenue growth MST/DR category of tax payers significantly influenced the tax compliance as shown by an R=0.543. The output indicates that the strength of association between the variables is very high (R= 0.295). The independent variable (total VAT among MST/DR) collectively that were studied, explain only 29.5% of the of tax compliance among MST/DR. This therefore means that other factors not studied in this research contribute 71.5% of the tax compliance among MST/DR.

Analysis of Variance (ANOVA) results provide information about levels of variability within a regression model and further forming a basis for tests of significance of the model.

Table 4.10: ANOVA MST/DR

ANOVA ^a									
Model		Sum of Squares	df	Mean Square	F	Sig.			
1	Regression	54.592	1	54.592	9.602	.005 ^b			
	Residual	130.762	23	5.685					
	Total	185.354	24						

a. Dependent Variable: TAXCOMPLIANCEQs

In view of the results in table above the significance value is 0.005 (which is less that 0.05) indicates that the overall model is statistically significance in predicting how withholding VAT tax among LTO influence tax compliance. A P-value< 0.05 shows that the overall model was a good fit.

A regression coefficient is interpreted as the proportion of the variance in the dependent variable which is predictable from the independent variable. It is a key output of a regression analysis. The table below shows the results;

Table 4.11: Regression Coefficients of MST/DR

			Coefficients ^a			
Model		Unstandardized	Unstandardized Coefficients Standardized		t	Sig.
				Coefficients		
		В	Std. Error	Beta		
1	(Constant)	13.972	1.739		8.034	.000
	MSTDR_VATQs	4.056E-010	.000	.543	3.099	.005

b. Predictors: (Constant), MSTDR_VATQs

a. Dependent Variable: TAXCOMPLIANCEQs

Source: Author (2017)

The regression function extracted using the unstandardized betas are as follows ($Y_2 = \beta_0 + \beta_2 X_2 + \epsilon$):

$$Y_2 = 13.972 + 4.056E - 010X_2$$

According to the regression function, holding all factors constant at zero, the coefficient for tax compliance was 13.972. The study further sought to establish the model fitness after the control variable (economic growth) was added to the model. The results are as displayed in the tables below.

Table 4.12: Model MST/DR with Control Variable

		Model Summary								
R	R Square	Adjusted R Square	Std. Error of the							
			Estimate							
.567 ^a	.322	.260	2.39078							
_	.567 ^a	.567 ^a .322								

Source: Author (2017)

Table 4.13: ANOVA MST/DR with Control Variable

			ANOVA			
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	59.605	2	29.803	5.214	.014 ^b
	Residual	125.749	22	5.716		
	Total	185.354	24			

a. Dependent Variable: TAXCOMPLIANCEQs

b. Predictors: (Constant), GDPQsGROWTH, MSTDR_VATQs

Table 4.14: Regression Coefficient MST/DR with Control Variable

		(Coefficients ^a			
Model		Unstandardized	d Coefficients	Standardized	t	Sig.
				Coefficients		
		В	Std. Error	Beta		
1	(Constant)	11.405	3.249		3.511	.002
	MSTDR_VATQs	4.064E-010	.000	.544	3.097	.005
	GDPQsGROWTH	.461	.492	.164	.936	.359

a. Dopondone variable. 17000000 El70000

Source: Author (2017)

The results on table 4.12 indicates that the R square value is 0.322 implying that 32.2% of the total variation in the dependent variable (tax compliance) is explained by the independent variables (economic growth and withholding VAT revenue for MST/DR) while 69.8% of the variation is explained by other factors not considered by the model and the error term. The results also show that the correlation coefficient value is 0.567 which indicates that there is a strong correlation between the dependent and the independent variables.

The results on table 4.13 shows that the F statistics value of 5.214 is statistically significant at 5% level of significance since the P value of 0.014<0.05. These results indicate that the regression model is a good and reliable predictor of the relationship between dependent variable (tax compliance) and independent variables (economic growth and withholding VAT revenue among MST/DR).

The following regression model was established:

 $Y_2=11.405+4.064E-010X_2+0.461X_z$

The results on table 4.14 show that economic growth and withholding VAT revenue for MST/DR have a positive relationship with tax compliance. However, only withholding VAT revenue for MST/DR had a statistically significant relationship with tax compliance since p value 0.005<0.05 while the relationship of economic growth was positive but not statistically significant as p value 0.359>0.05.

4.5.3 Regression for LTO

This study sought to develop univariate regression model to determine the significance Vat Compliance as a measure of Vat Revenue growth among the LTO category of tax payers. Another model is developed with economic growth used as a control variable since it also affects tax compliance. The two models are displayed in the following tables; The model summary below provides information about the regression line's ability to account for the total variation in the dependent variable (tax compliance). The table below demonstrates how observed y-values are dispersed around the regression line.

Table 4.15: Model LTO

		Model S	ummary	
Model	R	R Square	Adjusted R Square	Std. Error of the
				Estimate
1	.585ª	.342	.314	2.30224

a. Predictors: (Constant), LTO_VATQs

Source: Author (2017)

The findings show that the Withholding Vat Revenue growth among LTO significantly influenced the tax compliance as shown by an R=0.585. The output indicates that the

strength of association between the variables is very high (R= 0.295). The independent variable (total VAT among MST/DR) collectively that were studied, explain only 29.5% of the of tax compliance among MST/DR. This therefore means that other factors not studied in this research contribute 71.5% of the tax compliance among MST/DR.

Analysis of Variance (ANOVA) results provide information about levels of variability within a regression model and further forming a basis for tests of significance of the model.

Table 4.16: ANOVA LTO

			ANOVA			
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	63.447	1	63.447	11.970	.002 ^b
	Residual	121.907	23	5.300		
	Total	185.354	24			

a. Dependent Variable: TAXCOMPLIANCEQs

b. Predictors: (Constant), LTO_VATQs

Source: Author (2017)

In view of the results in table above the significance value is 0.005 (which is less that 0.05) indicates that the overall model is statistically significance in predicting how withholding VAT tax among LTO influence tax compliance. A P-value< 0.05 shows that the overall model was a good fit. A regression coefficient is interpreted as the proportion of the variance in the dependent variable which is predictable from the independent variable. It is a key output of a regression analysis. The table below shows the results;

Table 4.17: Regression Coefficients of LTO

			Coefficients ^a			
Model		Unstandardize	d Coefficients	Standardized	t	Sig.
				Coefficients		
		В	Std. Error	Beta		
1	(Constant)	15.088	1.262		11.951	.000
	LTO_VATQs	2.107E-010	.000	.585	3.460	.002

Regression function extracted using the unstandardized betas are as follows (Y_1 = β_0 + $\beta_1 X_1 + \epsilon$):

$$Y_1 = 13.972 + 4.056E - 010X_1$$

The results on table show that the VAT among LTO a positive and statistically significant relationship with tax compliance. According to the regression function, holding all factors constant at zero, the coefficient for tax compliance was 13.972. The study further sought to establish the model fitness after the control variable (economic growth) was added to the model. The results are as displayed in the tables below.

Table 4. 18: Model LTO with Control Variable

Model Summary								
Model	R	R Square	Adjusted R Square	Std. Error of the				
				Estimate				
1	.603 ^a	.364	.306	2.31481				
a. Predictors:	(Constant), GDPQs	GROWTH, LTO_VA	TQs					

Source: Author (2017)

Table 4.19: ANOVA with Control Variable

			ANOVA			
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	67.471	2	33.735	6.296	.007 ^b
	Residual	117.883	22	5.358		
	Total	185.354	24			

a. Dependent Variable: TAXCOMPLIANCEQs

Table 4.20: Regression Coefficients LTO with Control Variable

Coefficients ^a									
Model		Unstandardized	d Coefficients	Standardized	t	Sig.			
		В	Std. Error	Beta					
1	(Constant)	12.821	2.908		4.409	.000			
	LTO_VATQs	2.095E-010	.000	.582	3.420	.002			
	GDPQsGROWTH	.413	.476	.147	.867	.396			

a. Dependent Variable: TAXCOMPLIANCEQs

Source: Author (2017)

The results on table 4.18 indicates that the R square value is 0.364 implying that 36.4% of the total variation in the dependent variable (tax compliance) is explained by the independent variables (economic growth and withholding VAT revenue remitted LTO) while 63.6% of the variation is explained by other factors not considered by the model

b. Predictors: (Constant), GDPQsGROWTH, LTO_VATQs

and the error term. The results also show that the correlation coefficient value is 0.603 which indicates that there is a strong correlation between the dependent and the independent variables.

The results on table 4.19 shows that the F statistics value of 6.296 is statistically significant at 5% level of significance since the P value of 0.007<0.05. These results indicate that the regression model is a good and reliable predictor of the relationship between dependent variable (tax compliance) and independent variables (economic growth and withholding VAT revenue among LTO).

The following regression model was established:

$$Y_1 = 12.821 + 2.095E - 010X_1 + 0.413X_z$$

The results on table 4.20 show that economic growth and withholding VAT revenue for LTO have a positive relationship with tax compliance. However, only withholding VAT revenue for LTO had a statistically significant relationship with tax compliance since p value 0.02<0.05 while the relationship of economic growth was positive but not statistically significant as p value 0.339>0.05.

4.6 Discussion of Findings

The findings show that over the seven years the proportion of revenue contributed by VAT has continuously increased. The mean revenue remitted by medium and small taxpayers and from domestic revenue increased considerably over the last 7 years of interest in the study. The findings show that in year of interest (2011) the mean revenue remitted by medium and small taxpayers and from domestic revenue was 11.03 billion while the revenue remitted by medium and small taxpayers and from domestic revenue in

the last year of interest (2017) was 27.31 billion. The findings also reveal that there was an inconsistent in the proportion of revenue contributed by VAT as the values are oscillating from the highs of 26.22% to the lows of 22.26%.

The findings also revealed that there was a gradual progression in the trend of total VAT which can be attributed to many variables including the introduction of withholding VAT tax and promotion of saving and investment by placing a greater burden on taxation of consumption and removing any disincentives to investment. The findings reveal total tax revenues have significantly increased. The observed incremental changes in tax revenues are attributed to a growth in tax bases within the economy because changes in the tax laws which have broaden the tax bases, increase in tax rates, better enforcement of an existing tax structure and the introduction and strict enforcement of withholding tax. The findings also reveal that since 2011, the GDP has been wavering from performing best at 8.4% in 2010 and it worst value of 3.8% in 2013.

The findings revealed that there is a significant difference in VAT remitted among LTO before and after enforcement of withholding VAT tax in the country. In addition, the results showed that there is a significant difference in VAT remitted among MST/DR before and after enforcement of withholding VAT tax in the country and that there is a significant difference in total VAT remitted before and after enforcement of withholding VAT tax in the country. The findings show that the independent variables (withholding VAT revenue among all categories of tax payers) significantly influenced the dependent variable as shown by an R=0.588. The independent variable (total VAT by all categories of tax payers) studied, explained only 34.6% of the of tax compliance among all taxpayer categories. The findings show that the Withholding Vat Revenue growth MST/DR

category of tax payers significantly influenced the tax compliance as shown by an R=0.543. In addition, the independent variable (total VAT among MST/DR) explained only 29.5% of the of tax compliance among MST/DR. This therefore means that other factors not studied in this research contribute 71.5% of the tax compliance among MST/DR.

The findings are in line with those of Kanyi and Kalui (2014) on the effects of tax policy reforms on tax revenue in Kenya. The study concluded that there was evidence that the various tax reforms including the enforcement of withholding VAT revenue in Kenya resulted in significant increase in total tax revenue. The study suggested that in order that the country maintained the culture of viable tax revenue growth, there was urgent need for appraisal and streamlining of the nation's tax policy and administrative structure. The results are also in conformity with those of Adegbie, Olajumoke and Danjuma, (2016), who determined that an approach towards tax conformity can be enhanced through the improvement of taxation awareness. A taxpayer needs to have an affirmative stance towards tax so as to cut down on their preference towards tax non-conformity. Self-assessment system (SAS) needs taxpayers to comprehend all the rules and set of laws that preside over taxation.

The findings were further aligned to those of Simionescu and Albu, (2016), who posited that if fines are quite high, then it becomes more dangerous and costly for taxpayers to dodge thereby discouraging them from tax avoidance. The amount of fines greatly influenced VAT conformity than audit probabilities. Moreover, penalties need to be greatly sufficient to discourage the anticipated value of tax elusion and to guarantee its disincentive cause on taxpayers. Additionally, if penalties are too big, the tax structure

would be seen as unreasonable and unfair thereby forcing the taxpayers to employ any opportunity to lawfully circumvent taxes.

CHAPTER FIVE

SUMMARY, CONCLUSION AND RECOMMENDATIONS

5.1 Introduction

The objective of the study was to establish the effect of withholding VAT tax on tax compliance. This chapter provides a summary of the research findings, conclusions, limitations of the study and recommendation for further research.

5.2 Summary of Research Findings

The findings show that over the seven years the proportion of revenue contributed by VAT has continuously increased. The mean revenue remitted by medium and small taxpayers and large tax payers increased considerably over the last 7 years of interest in the study. The findings also reveal that there was an inconsistent progression in the proportion of revenue contributed by VAT to total revenue. The findings reveal that an increase in VAT declared which is indicative of the fact that measures such as use electronic tax register and withholding VAT tax have enhanced VAT collection resulting from more accurate VAT reporting.

The findings also revealed that there was a gradual progression in the trend of total VAT which was attributed to many variables including the introduction of withholding VAT and use of i-Tax platform which enhances accuracy and highlights inconsistencies in submission of taxes. The findings reveal total tax revenues have significantly increased. A comparative analysis before and after the enforcement of withholding tax reveals that VAT remitted among large taxpayers and medium/small taxpayers was significantly

different. The parametric tests sought to test the null hypothesis that the two periods had the same mean of VAT remitted. The study found that the VAT remitted by the MST/DR was not significantly different before and after enforcement of withholding VAT tax in the country. However, the findings show that VAT remitted by the LTO was significantly different before and after enforcement of withholding VAT tax in the country. In addition, the findings of the study reveal that Total VAT remitted was significantly different before and after enforcement of withholding VAT tax in the country.

The regression analysis reveals that withholding VAT by MST, LTO and all categories of tax payers studied, explained less than half of the percentage in the factors contributing to tax compliance. The study also found that total VAT by MST, LTO and all categories of tax payers had a strong positive relationship. In addition, the models developed are statistically significant in predicting how withholding VAT among all the categories of tax payers influence VAT compliance.

5.3 Conclusions

The general objective of this study was to determine the effect of withholding value added tax on tax compliance in Kenya. In line with the objectives data from tax collection reports was compared after and before the enforcement of withholding VAT tax policies. The study compared the results for medium/small, large and all the two combined category of tax payers. The average data for a number of years before implementation of reform policies and a number of years after implementation was computed and analyzed. The one-way Anova was performed on the average figures for all the measures of performance. The results for the three categories of taxpayers revealed that there was a significant difference in the one-way Anova. From the above results, the research

concludes that there was significance improvement in tax compliance after the enforcement of withholding VAT tax policies in Kenya.

5.4 Recommendations

The government needs to embark on public awareness campaign, efficient tax revenues utilization on public goods to encourage tax compliance and discourage tax evasion, tax avoidance and also the reduction in tax rate. These acts will certainly enhance and increase revenue creation in the state as is being pursued with vigor so as to survive in the current environment faced with economic meltdown, and inflationary impediment. The Government ought to take a look at the factors responsible for increasing compliance in remission of taxes so as to meet up with its revenue targets especially now that the services of tax consultants have been encouraged.

The study established that withholding VAT tax had an effect on the tax revenue. Future forecasts should take into account money supply and GDP per capita in particular as having the greatest influence on the tax revenue in Kenya. Exchange rate can also be looked at as it had a negative impact on tax revenue in Kenya. The government can increase tax revenue if taxable capacity is substantially expanded by increasing the number of VAT taxable economic activities. The targeted economic activities should be compelled to withhold VAT tax on these transactions and this would go a long way to increase compliance.

5.4 Limitations of the Study

The key restraint of this research was the focus of only one constituent of the tax compliance, that is, the withholding VAT revenue. Other dimensions of tax compliance

include consumption, the overall economic growth rate, and the level of employment among others. The other major constriction was time constraint, which was overcome by relying on the readily available secondary data as opposed to collecting primary data. The data collection did not affect the validity and reliability of the research findings. In addition, KRA is the main body mandated with the tax collection role, however there are other agencies which collect taxes among them the local authorities, the data from this agencies could not be accessed to give the whole picture of the effect of reform policies on tax collection.

5.5 Recommendations for Further Research

A study can be designed to find out the impact withholding VAT tax on the country's economic growth. This will give an indication on the effects of withholding VAT tax on the country's economic growth. Another study should be conducted in other countries in East Africa since this study focused on Kenya's situation to determine how withholding VAT tax affects tax compliance. This will offer a basis for comparison on the effects of withholding VAT tax on tax compliance in those countries. This study examined the effects of withholding VAT tax on tax compliance over a period of 7 years. It is therefore necessary to carry out further studies with similar tests for a reasonably longer time period.

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APPENDIX I: VAT AND TOTAL REVENUES (KRA)

	YEAR	LTO		MST/DR		TOTAL VAT	TOTAL REVENUE
NO WHVAT		ACTUAL NET VAT	TOTAL REVENUE	ACTUAL NET VAT	TOTAL REVENUE	LTO + DR	LTO + DR
2011	Q3	10,297,814,264	71,495,802,014	7,702,092,596	32,687,207,211	17,999,906,861	104,183,009,225
	Q4	10,961,257,436	81,633,130,398	8,621,509,340	33,483,745,455	19,582,766,776	115,116,875,853
2012	Q1	12,154,195,095	69,364,828,328	8,489,234,341	30,845,505,232	20,643,429,436	100,210,333,560
	Q2	11,848,588,334	102,859,141,028	8,524,566,418	42,295,234,619	20,373,154,752	145,154,375,647
	Q3	10,581,973,375	78,445,034,791	9,606,442,048	37,214,118,769	20,188,415,423	115,659,153,560
	Q4	11,413,345,804	92,070,105,936	9,883,278,229	40,551,536,919	21,296,624,033	132,621,642,855
2013	Q1	13,685,963,795	79,168,789,505	10,906,990,483	37,071,511,014	24,592,954,278	116,240,300,519
	Q2	12,589,423,783	124,019,205,772	9,822,809,784	50,173,978,722	22,412,233,567	174,193,184,494
	Q3	12,363,849,911	80,933,626,765	11,328,420,729	40,160,583,031	23,692,270,640	121,094,209,796
	Q4	12,964,786,422	123,259,107,250	11,898,414,971	50,567,273,726	24,863,201,392	173,826,380,975
2014	Q1	16,598,225,525	89,735,773,677	11,687,782,045	42,659,014,184	28,286,007,570	132,394,787,861
	Q2	16,848,451,709	135,541,852,603	11,978,132,077	61,267,728,647	28,826,583,785	196,809,581,250
	Q3	15,703,585,373	103,578,122,802	10,498,509,865	47,105,831,456	26,202,095,238	150,683,954,258
WITH WHVAT	Q4	16,944,887,080	126,789,854,121	11,365,456,716	50,175,335,270	28,310,343,797	176,965,189,391
2015	Q1	20,907,029,076	101,234,500,781	11,825,183,239	48,537,142,007	32,732,212,315	149,771,642,788
	Q2	24,656,282,266	149,779,327,637	21,883,822,653	69,030,085,033	46,540,104,919	218,809,412,670
	Q3	20,981,466,209	121,153,830,873	13,077,025,321	55,579,962,142	34,058,491,530	176,733,793,014
	Q4	22,876,370,768	134,563,898,591	13,662,074,728	57,332,710,992	36,538,445,496	191,896,609,583
2016	Q1	26,547,429,401	124,556,840,145	15,473,572,926	59,620,842,734	42,021,002,328	184,177,682,879
	Q2	28,899,749,420	173,637,325,994	15,956,778,443	79,283,190,119	44,856,527,863	252,920,516,113
	Q3	30,223,225,755	150,617,395,572	15,416,997,359	62,558,595,744	45,640,223,114	213,175,991,315
	Q4	29,347,526,239	150,774,224,548	15,221,537,166	64,891,748,727	44,569,063,406	215,665,973,275
2017	Q1	31,033,235,568	138,173,365,296	17,086,202,436	63,087,372,616	48,119,438,003	201,260,737,912
	Q2	32,944,090,651	200,222,477,862	17,478,637,714	87,121,612,184	50,422,728,365	287,344,090,046
	Q3	29,462,962,187	148,714,989,944	20,148,729,426	95,609,192,851	49,611,691,613	244,324,182,795

MST=Medium and Small Tapayers

DR=Domestic Revenue

LTO=Large Taxpayers Office

APPENDIX II: ECONOMIC GROWTH/GDP (KNBS)

YEAR	QUARTER 1	QUARTER 2	QUARTER 3	QUARTER 4	ANNUAL
2017	4.7	5			
2016	5.3	6.3	5.7	6.1	5.8
2015	5.8	5.6	6.1	5.5	5.7
2014	5.2	6	4.6	5.6	5.4
2013	6.1	7.5	6.4	3.5	5.9
2012	4.2	4.3	5	4.7	4.5
2011	7.6	6.7	5.8	4.4	6.1
2010	6.6	7.6	7.9	11.6	8.4