

**FACTORS AFFECTING TRADE FACILITATION IN EAST AFRICA: A CASE OF
MALABA BORDER STATION**

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**A RESEARCH PROJECT SUBMITTED IN PARTIAL FULFILMENT OF THE
REQUIREMENTS FOR AWARD OF A POST GRADUATE DIPLOMA IN CUSTOMS
ADMINISTRATION AT JOMO KENYATTA UNIVERSITY OF AGRICULTURE AND
TECHNOLOGY**

2019

DECLARATION

I, the undersigned, declare that this is my original work and has not been submitted to any other college, institution or university other than Kenya School of Revenue Authority for academic credit.

Signed:

Date:

Reg No. HDB335-C016- 5204/2016

Declaration by the supervisor

This project has been presented for examination with my approval as the appointed course supervisor.

Signed:

Date:

Dr.Marion Nekesa

DEDICATION

This research project is dedicated to my family members who have always believed in my potential and encouraged me to join the Customs Administration at the Kenya School of Revenue Administration, thanks for your prayers.

ACKNOWLEDGEMENT

I wish to offer my sincere appreciation to my supervisor, for his wise counsel, guidance and encouragement that has shaped my academic progress.

ABSTRACT

Trade Facilitation has become increasingly a subject of interest globally due to the need for freedom of movement of goods and services resulting from growth in trade volumes that is directly attributed to worldwide liberalization of trade. There is a tendency of reluctance to take on additional legal obligations that may expose countries within East Africa to Dispute Settlement Mechanisms (DSM). However, this fear has been dispelled by the best endeavor clause in the text and the benefits that trade facilitation brings to the economies of East Africa. Taking into consideration the pace of integration of East African countries and their resolve to deal with outstanding issues towards fully fledged customs union and free market economy, there is no doubt that there exists an underlying problem that requires urgent attention. This study sought to examine the influence of development of infrastructure on trade facilitation, to assess the importance of information on custom regulations and procedure to the traders on trade facilitation and to determine the effect of simplification of customs documentation on trade facilitation. This study used a descriptive research design with the aim of determining and reporting the way things are and it guides in determining the current status of the population under research. The study targeted 150 traders operating across the Kenya Uganda border as well as 10 key informants who included customs officers, clearing agents and immigration personnel. The study used both primary and secondary data. A semi structured questionnaire was used. Descriptive statistics were used to summarize the outcomes for each of the main variables. These included mean and standard deviation. While measures of central tendency showed points of consensus, standard deviation shows the degree of variability of responses on each of the objectives.

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LIST OF ABBREVIATIONS AND ACCRONYMS

DSM	Dispute Settlement Mechanisms
NTB	Non-Tariff Barriers
OECD	Organisation for Economic Co-operation and Development
RADDEX	Revenue Authorities' Digital Data Exchange
SME	Small and Medium Scale Enterprises
UNCTD	United Nations Conference on Trade and Development

DEFINITION OF TERMS

Infrastructure: is the fundamental facilities and systems serving a country, city, or other area including the services and facilities necessary for its economy to function (Holliday & Adrian, 2007).

Customs Procedures: are measures used in controlling the flow of goods, including animals, transports, personal, and hazardous items, into and out of a country (Kagira & Bernard, 2011).

Customs documentation: are documentations issued by a carrier or its agent to the shipper as a contract of goods (Koopman & Laney, 2012).

Trade Facilitation: is the simplification, modernization and harmonization of export and import processes (Nilsson & Evelina, 2014).

CHAPTER ONE

INTRODUCTION

1.1: Background of the Study

Trade Facilitation has become increasingly a subject of interest globally due to the need for freedom of movement of goods and services resulting from growth in trade volumes that is directly attributed to worldwide liberalization of trade. The origin of Trade Facilitation and the prominence the topic received as subject of negotiations at WTO discussions was at the Singapore Ministerial Conference of 1996 and in Doha, where the Doha Development agenda was adopted by the ministers as a framework of the Agreement (Hoek et al (2012) From the outset, it must be pointed out that promotion of trade, removal of restrictions and provision of transport does not primarily lead to trade facilitation as we know it today. Trade facilitation is the tendency to minimize costs of doing business that come into play in the process of enforcing of regulations and policies (Staples, 2002).

1.1.1 Global perspective

According to WCO 'Trade Facilitation is the avoidance of unnecessary trade restrictiveness by applying modern techniques and technologies while improving the quality of controls in an internationally harmonized manner'. Trade facilitation includes Streamlining and harmonizing the activities, practices and formalities required for international trade and associated payments and border logistics while safeguarding legitimate regulatory and policy objectives. Thus, trade facilitation—reducing the transaction and operational costs associated with moving goods and providing services across borders—has moved to the forefront of the global and World Bank Group's trade agenda. Trade facilitation reforms are especially beneficial to poor countries —the

WTO estimated that it can reduce trade costs by 15percent for low- and middle-income countries. Zaki (2017) defines trade facilitation as making trade easier. This calls for Harmonization and simplification of trade rules. Trade facilitation aims at making International trade easier by eliminating administrative delays, simplifying trade procedures, increasing transparency, security and incorporating Technology in trade processes.

In East Africa, the quest for efficiency in port operations, professionalism in customs procedures which allow for faster clearance of goods is now a matter of concern. In the pursuit of a fully-fledged customs union, a common market, single currency and finally a political federation, East African Customs Union has been able to eliminate all tariffs on intra- East African trade and agreed on a Common External Tariff (CET) for goods that do not originate from East Africa. This considerably contributed towards cutting a proportion of costs of up to € 300 million to the taxes foregone by partner states in their Preferential Trade Arrangements. Nevertheless, the costs to trade attributed to non-tariff barriers (NTBs) have more far reaching repercussions than those attributable to tariffs, Hoekman et al, (2013).

East Africa's trade would have recorded higher level of growth than it has now had several factors that heavily impact on Trade Facilitation been looked into and addressed. These are, insufficient and bad roads, technology and bad governance. According to Lima, (2014). The degree of infrastructural challenges rise to approximately 40% of transport costs and to a high of 60% for landlocked countries. Costs attributable to border inefficiencies are, low resource compatibilities where document processing systems are not perfectly compatible. For instance, Kenya has the Simba System 2004, while Uganda has the ASYCUDA World. Such challenges limit the extend one can explore the market that has widened as a result of the East African Community trade in the region, Yang & Gupta, (2017) an attempt has been made to have

Revenue Authorities' Digital Data Exchange (RADDEX) as a platform for exchange of data from the two systems but this has not fully been exploited.

High costs of doing business constitute a major barrier to East Africa's competitiveness and attainment of millennium goals. Transport costs have been attributed to prevalence of uncoordinated multiplicity of institutions at borders, repetitive processes and documentation in the cargo clearance, right from the port of Mombasa in Kenya to the landlocked countries of Uganda, Rwanda, Burundi, Democratic Republic of Congo (DRC) and South Sudan. The presence of numerous uncoordinated government agencies forms a fertile breeding ground for integrity issues due to redundancy of processes .(USAID /COMPETE,2012)

Bureaucracy and red tape has been said to cost traders in the East Africa Region a whopping US\$7 million annually, PADECO Company Study, (2009). The study blames delay on axle load and gross vehicle load limits and their lack of harmonization in the five East African countries. Rwanda and Burundi moving towards a limit of 48 tons down from Rwanda's initial 53 tons, whilst Tanzania and Uganda have 56 tons as their maximum load .The challenge emanates from the fact that weigh bridges are primarily managed by government authorities with occasional intervention by police forces. The uncoordinated system of management results in creation of loopholes. Additionally, numerous presences of weigh bridges along the northern corridor and at short intervals excruciate the problem. It is noted that between Rwanda and Dar-es-Salaam there are weigh bridges and between Mombasa and Malaba border. Stoppages at these weigh bridges result in delay. The lack of verification sheds at borders also results in delays especially when the weather is unfavorable.

The reluctance of transporters to embrace technological enforcement tools such as the use of complementary tracking devices such as the Electronic Cargo tracking system (ECTS) increases

the time to physically monitor the movement of goods. Container Freight Stations' demurrages add to costs being transferred to the consumer encouraging inflationary trends. In order to attain desired positive impacts of Trade Facilitation. There is need for a more integrated and holistic approach when addressing these challenges. Kenya Customs for instance has undertaken considerable reforms in clearance processes. However, more needs to be done in addressing trade restrictive non-tariff barriers (NTBs) that impinge on the benefits that can accrue from trade facilitation.

While several of the above challenges cut across the border posts of East Africa there has been little effort and enthusiasm made to substantively make Trade facilitation a priority subject of debate in the Multilateral Trade Negotiations and especially the issue of commitment for technical Assistance and support for capacity building in this area as agreed by Ministers in the Doha Development Agenda to significantly allow for the positive impact of Trade Facilitation to be felt in promotion of East African Trade.

East Africa has been characterized by poor institutional, communication, and transport related infrastructure. These attributes impact negatively on the movement and growth of trade in East Africa, and thus limiting the full benefits of interregional trade. The World Country study (2005), Action plan indicates that entrepreneurs face more business obstacles in East Africa than any other Regions, United Nations Conference on Trade and Development, (2004). The study indicates further that a combination of 'high regulatory costs, policy uncertainty, corruption, unfair competition and ineffective judiciary system account for 20-40% above other developing regions'.

This study examines challenges which impact negatively on Trade Facilitation and recommended reforms that enhance trade Facilitation such as increased port efficiency, improved

Customs regulatory environment, upgrading service infrastructure and administrative measures which will result in benefits to East African countries. The project also considered how regional trade agreements influence trade flows in East Africa. Using secondary data available the project has shown that regional trade agreements influence and impact positively on trade flows.

In East Africa, the quest for efficiency in port operations, professionalism in customs procedures which allow for faster clearance of goods is now a matter of concern. In the pursuit of a fully-fledged customs union, a common market, single currency and finally a political federation, East African Customs Union has been able to eliminate all tariffs on intra- East African trade and agreed on a Common External Tariff (CET) for goods that do not originate from East Africa. This considerably contributed towards cutting a proportion of costs of up to € 300 million to the taxes foregone by partner states in their Preferential Trade Arrangements. Nevertheless, the costs to trade attributed to non-tariff barriers (NTBs) have more far reaching repercussions than those attributable to tariffs, Hoekman et al, (2013).

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Trade facilitation necessarily includes a multitude of private and public actors forming different parts of the trading chain or network because it impinges on the operational interface between these players (WTO 2015). Private stakeholders include traders, logistics and insurance providers, and customs brokers. These agents may be operating in different national territories and responsibilities of each party also shift depending on the agreed Incoterms (Grainger 2011b). Public actors involve not just agencies with border operations such as customs, but also ministries of agriculture, environment, and health, that usually have the mandates for public health and safety; and public works that may be responsible for port facilities. In this context, it is useful to organize trade facilitation measures along typologies depending on the main set of trade transactions being targeted. Arranged along the chain sequence of a trade transaction, this

can be made to coincide with the organizing framework of the World Bank's IEG portfolio of trade facilitation activities summarized.

However, the categories are not mutually exclusive. A trade facilitation measure nearly always has cross-cutting impacts on several outcomes. For example, conformity assessment procedures for sanitary and phytosanitary (SPS), and technical regulations usually undergo documentary and possibly physical verification on reaching the border of the importing country. A trade facilitation reform that puts in place a mutual recognition agreement (MRA) between regulatory agencies in the importing and exporting countries involves cross-agency dialogue and coordination but will also simplify trade-related rules and procedures at the border. The broadest scopes develop general indicators for different aspects of trade facilitation. For example, infrastructure indicators can be constructed from information on the length or quality of road networks, mobile telephony uptake, and so on.; while institutional quality indexes are constructed from indicators of governance transparency, democracy, and so on. Limao and Venables (2001) employ the mean of the normalized components as an infrastructure indicator for trade facilitation. Francois and Manchin (2013) and Portugal- Perez and Wilson (2012) develop their trade facilitation metric using principal components and factor analyses to capture the main elements driving variations in each indicator. All three studies confirm infrastructure access and good quality institutions have significant positive effects on trade flows. Developing facilitation measurements in this manner has the advantage of wide country and temporal coverage. Nonetheless, the aggregation of information limits the possibility of disentangling the effects of specific. This approach is closely related to a class of literature that estimates border effects and home bias, which infers trade costs in terms of the tendency of a country to trade within itself compared with other countries. An example of this is Anderson and Yotov (2010).

1.1.2 Modernization of Border Operations

Modernization of border operations aim to lower trade costs by adopting procedures hinged on automation, incorporation of information and communication technology systems, and use of modern equipment such as scanners. This has implications on the ease with which border agencies can coordinate, and the transparency of trade regulations and procedures that are discussed in Section 4.2. Empirical work on the area is still lacking, and most of the discussions of the review draws from qualitative work. The limited empirical findings suggest that reforms in this area lead to reduction of trade costs, and thereby encourage trade flows. The most immediate impact is on trading times. Hillberry and Zhang (2015) predict that automation can reduce the time to import by 30 percent. Among TFIs, formalities relating to automation are also found to be among one of the most important predictors of trade costs and trade flows for low and middle-income countries (Moisé and Sorescu 2013). In terms of regions, the largest effects are foreseen in Asia and Sub-Saharan Africa.

A channel by which ICT can reduce trade costs is by making information that are electronically encoded simultaneously accessible to multiple parties. This induces a virtuous effect in facilitation measures that encourage cross-agency dialogue, coordination, and integration. Moreover, ICT has implications on the ability to track a shipment's progress along the trading chain possibly in real time. In this sense, it helps firms plan and manage inventory arrangements. In some cases, the negative effects of long border procedures can be even mitigated if ICT improves information availability.

As the WTO (2015) pointed out, long lead times are not necessarily a problem if it is predictable. This is most important for firms engaged in GVC trade. Countries can develop their own

customs ICT systems such as Trade Net in Singapore. This has the benefit of being tailored to a country's specific needs and priorities (UNCTAD 2017). But these can also be expensive to implement. Instead, there are several off-the-shelf customs software management systems that are available. The most widely used is Automatic System for Customs Data (ASYCUDA), installed in over 90 countries as of 2017 (UNCTAD). The system was developed by United Nations Conference on Trade and Development (UNCTAD) to lodge information on manifests and customs declarations, accounting procedures, transit, and suspense procedures. Because of the broad coverage of countries, the adoption ASYCUDA and other systems can also possibly function as a resource network of best practices that can be shared. Modernization of border operations often represents a hugely expensive undertaking. Data from implementation costs collected by the WTO (2015) reveal the median expenditure of an automation project to be close to USD 9 million in real terms and are often incurred upfront. Moreover, the cost estimates of past projects exhibit wider variation than expenditures in other areas of reform (WTO 2015). The cost of installing an electronic data interchange system is \$1.6 million in Afghanistan, \$5.5 million in Jamaica, but as much as \$32 million in Turkey (World Bank 2009). The costs of modernization are also often inflated by the need to fulfill a priori requirements that dictate the absorption capacity of a country's customs institutions and its private sector. For example, aside from having the skills and manpower to sustain the automated operations, reorganization of customs processes and reallocation of manpower are necessary. In some cases, legislation reforms granting legal status to electronic documents may also be needed (OECD 2009).

Despite being expensive and complicated, case studies often suggest that benefits from automation outweigh the costs (WTO 2015). Moreover, the burden of costs can be attenuated by charging user fees. The benefits most broadly documented include time savings in border

procedures and improved customs revenue collection. In Rwanda, the introduction of the electronic single window reduced release times by 50 percent from over two days to one over a span of two years (Nizeyimana and De Wulf 2016). A similar experience is associated with the adoption of Orbus – an electronic single window system—in Senegal in 2004 (Diagne 2010). According to Diagne (2010), Orbus coincided with a significant cut in the time associated with formalities and clearance from more than four days to as little as half a day, and also increased total revenue collection. In Korea, the completion of a comprehensive electronic single window project is estimated to translate to savings of \$2 billion per annum. Most of the cost savings accrue to expenditures of firms on freight storage and inventory (World Bank 2009).

In all these case studies, the introduction of automation was far from a smooth process as resistance and adjustments often needed to be overcome. In Rwanda, the introduction of the electronic single window was preceded by extensive consultations with public and private stakeholders. The involvement of the latter was critical in ensuring that commercial instruments, such as electronic payment arrangements with commercial banks are in place in time for the roll out of the single window (Nizeyimana and De Wulf 2016).

The evidence on cross-agency dialogue, coordination and integration relies on both case studies and empirical evidence. Existing empirical works suggest information availability enhances trade flows and is particularly favorable to SMEs. But empirical evidence is most developed in terms of the effect of SPS and TBT regulations on trade. The general finding is that they reduce trade flows as well as variety in trade. However, harmonizing them with international standards can help overcome the negative effects. Moreover, a reversal of the negative effect is possible when

harmonization help exporters overcome reputational asymmetries about their products. Meanwhile, what can be known about other types of coordination and integration rely mostly on case studies such as those relating to the establishment of single windows or the operation of OSBPs

1.1.3 Kenya perspective

Kenya is a founding member of WTO and therefore, commitment to WTO principles is integral to its economic policies. It accords Most Favoured Nation (MFN) treatment to all its trading partners. Kenya is also a member of COMESA, EAC, OAU, IGAD, and ACP/EU and pursues preferential trade agreement as a means of increasing the flow of trade. The country has amended some pieces of legislation, including anti-dumping, countervailing and intellectual property to bring them into conformity with the WTO Agreements. The 2002 development plan spells out a trade policy to be implemented, the continued reduction and eventual elimination of tariffs and government role way from control and regulation toward the facilitation of private sector development. Kenya now relies on the tariff as its main trade policy instrument Kenya also recognises the importance of trade facilitation and considers it to KAM: A Study to Analyze Kenya's Trade Facilitation Systems be a significant component of its trade policy especially with the major developments happening in the various trade agreements. Kenya is implementing all the WTO Agreements which relate to trade facilitation. These include the Customs Valuation Agreement, and Agreements on Pre-shipment Inspection, Rules of Origin, Import Licensing Procedures, Technical Barriers to Trade and Sanitary and Phytosanitary measures. At the same time, Kenya is a member of the World Customs Organisation (WCO) and participates in negotiations towards accession to customs agreements with international application (such as the Harmonised System Convention that forms the basis for tariff classification of goods traded in

the international market). Membership to WCO assists in developing best international practices through benchmarking, training of customs officers and networking with other members and organisations that have a stake in international trade, including the WTO, the International Chamber of Commerce, and UNCTAD among others. Further to this, Kenya has embarked on a Customs Services Department Reform and Modernization Project (CRM). The aim of this project is to transform customs into a modern customs administration by 2008/09, in accordance with internationally accepted conventional standards and best practices as outlined in WTO agreements and the WCO Revised Kyoto Convention on Simplification and Harmonisation of Customs Procedures. Kenya has not yet ratified the Revised Kyoto Convention. To date, trade facilitation in Kenya remains a challenge despite the signing of the various multilateral trade agreements that have been highlighted above. The prevailing inadequacy of a legal and regulatory framework, institutional and human capacity, poor ports, rail and road infrastructure and the inefficiency of trade documentation processes continue affecting the trade community by inflicting delays in the movement and clearance of goods at the various entry and exit points. This has resulted in the entire process being associated with high transaction costs which reduces the competitiveness of Kenyan products in the global market.

In Kenya ,Mombasa port has been characterized by congestion due to inefficiency in the management of cargo, multiple inspections by different stakeholders, poor rail transport, power outages that interferes with seamless electronic process of customs documents, police road blocks and long convoys of trucks along the northern corridor, multiplicity of institutions and processes at the borders, all impose avoidable costs on business McKinnon(2005)

1.2 Statement of the Problem

Traders in the Malaba Border face numerous challenges in doing business. These challenges hinder positive impacts of Trade Facilitation to be fully realized, (Policy Brief 2012). These include unnecessary and excessive data and documentation requirements, lack of transparency, inadequate legal redress, delayed release and clearance, absence of co-ordination between Customs and other Government agencies (OGAs), little use of modern customs technology techniques and all are compounded by unchecked corruption. Although the Customs environment has changed due to reforms and the entire East African Customs Union is working to address these problems through multilateral, regional and bilateral initiatives, the process is slow and ineffective. It is also notable that non-tariff regulatory barriers deter trade development. While there is across-the-board agreement on the necessity of trade facilitation, not all East African countries have shown enthusiasm in ongoing negotiations of a multilateral nature under the pretext of inability to afford the modern technology required.

There is a tendency to take on additional legal obligations that may expose countries within East Africa to Dispute Settlement Mechanisms (DSM). Taking into consideration the pace of integration of East African countries and their resolve to deal with outstanding issues towards fully fledged customs union and free market economy and the few studies done on trade facilitation on the east African border points, there is no doubt that there exists an underlying problem and gap that requires urgent attention. It is in this spirit that this study has attempted to assess factors influencing Trade Facilitation and make recommendations based on the conclusions drawn from the study.

1.3: Research Objectives

1.3.1: General Objective

The study was to investigate the factors affecting Trade Facilitation in East Africa: A case of the Malaba Border Station

1.3.2: Specific Objectives

- i. To find out the effect of infrastructure and implementation on trade facilitation at the Malaba Border Station
- ii. To establish the effect of stakeholder cooperation on trade facilitation at the Malaba Border Station
- iii. To determine the influence of customs documentation on trade facilitation at the Malaba Border Station.

1.4: Research Questions

- i. Does infrastructure development affect trade facilitation at the Malaba Border Station?
- ii. Does stakeholders cooperation affect trade facilitation at the Malaba Border Station?
- iii. How does customs documentation affect trade facilitation at the Malaba Border Station?

1.5 Significance of the study

1.5.1 Importers and Exporters /

A majority of economists agree that trade facilitation leads to growth in trade and benefits accrue that improve the welfare of all involved. However, other schools of thought feel that costs attributable to implementation of trade facilitation are huge and beyond the capability of developing and least developed countries. The research finding will enhance knowledge on the factors affecting trade facilitation in East Africa.

Understanding the relationships among various variables relating to trade facilitation will be a step forward in global research and has built understanding of capacity of multilateral trade negotiators in the region.

1.5.2 Policy makers

It is expected that the outcome of the study will assist policy and decision makers in various government institutions and agencies involved in the global supply chain in understanding the positive impact that trade facilitation can contribute towards reduction of costs to trade and growth of the economy.

1,5.2 Future researchers

The findings are expected to also increase the stock of the theoretical and empirical knowledge on Trade Facilitation and related aspects of trade. The study is expected to form a point of reference and a basis for further research.

1.6 Scope of the Study

The study focuses on factors affecting trade facilitation in East Africa. The scope was limited to the Malaba Border. The study will concentrate on traders operating on the Kenya Tanzania Border Station. The study will go at lengths to try and deal with every trader, to determine the factors influencing cross border trade facilitation in East Africa in a case of the Malaba border Station.

1.7 Limitations of the Study

Respondents were naturally suspicious and uneasy when directed to cooperate in a study that they were not aware of its consequence. To further calm and set at ease the respondents, the researcher explained the nature of the study and its intended purpose and that it was purely an

academic undertaking and that information divulged would be held in confidentiality by the researcher.

Owing to the sensitivity of information sought, the management considered it confidential; therefore, access was at times denied or otherwise limited. This negatively affected the validity and reliability of the data collected or unnecessarily made the research impossible. The researcher mitigated this by obtaining an introduction letter and pledge confidentiality and assured that the data was to be used solely for academic purposes.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

The literature review is a critical discussion and summary of the statistical literature that is of ‘general’ and ‘specialized’ relevance to the particular area and topic of the research problem. It is the evaluative report of studies found in the literature related to the selected area of study. The review describes, summarize, evaluate and clarify the literature. It gives a theoretical basis for the research and help you determine the nature of your own research. .

2.2: Theoretical Literature Review

The study will be pinned on regional integration theory, diffusion theory, theory of planned behaviour and stakeholder theory.

2.2.1. Theory of Regional Integration

The theory of regional integration has been associated with Haas (1964) a prominent neo-functionalists known for his concept of “The uniting of Europe”. This is because Europe remained the point of convergence for the vast majority of the deals with territorial incorporation hypothesis in spite of the fact that in the current past the use of reconciliation hypothesis to Latin America, Africa and Asia has expanded. Haas and Schmitter built up a calculated structure that has spread the process of regional integration beyond Europe in industrial and non-industrial settings with a concept approach that is applicable to both (Anna, 2008). The basic postulation of neo functionalists is the decline of nationalism and nation-states and their replacing by large units more suited for the roles they play in society. The neo functionalist thus does not see nation-states as units of analysis but the whole region as a unit.

Modern neo-functionalists who were inspired by European integration still exist and put emphasis on supranational institutions; among them are Sandholz and Sweet 1998 and multilevel governance (Marks, Hooghe and Blank 1996). This was after the European integration process started to experience an emergency in the mid-1960s. Haas and these researchers presumed that his hypothesis was excessively deterministic and Haas conceded that he had not predicted a resurrection of patriotism and flexibility of sovereign nation-states within functionalist organization of supra-national institutions referred to as regionalism. Lindberg and Scheingold singled out a portion of the significant instruments and flow. It was reasoned that neo-functionalists had not considered local legislative issues adequately and that they could have misrepresented the part of supranational foundations. The other opponent of neo-functionalism is Pierson, Pollock 1996, Scheneider and Aspinwall, (2011) who used the new institutionalism approach to integration studies. According to Pierson there are gaps that emerge among the member states which are difficult to close. These gaps are created by autonomous action of integration establishments, the confined time skylines of political choices creators, unforeseen outcomes and moves in approach inclinations of governments (Diodorus, 2006). This makes the gaps very difficult to close because of the reluctance of supranational actors, institutional barriers to reform and various costs to change.

Due to these gaps and the difficulty in closing them, Pierson, Pollock and Scheneider and Aspinwall argue that this forms the foundation of disintegration rather than integration. Therefore these authors see nothing than disintegration as states pursue their own agenda defined as state interest among community of states. This disintegration and the consequent pursued by individual interest is therefore a source of disharmony since it is equivalent to a chaotic state of nature.

With this state of nature, states are likely to disagree and by extension war erupts. The war is a war in a whole community of states. As states push and shove over their interests, there is likely war in the whole community while in the individual states, there will be peace. This in Nye (1971) phrase is the “peace in parts”. The parts are individual states which internally are at peace but externally in relation to other states are not, as each state attempts to promote and protect its own self-interests, there is no peace i.e. the states are in a state of war always in their protection and promotion of self-interest. Nye’s thesis rests on rather simple question of how there can be integration as proposed by neo-functionalists when there is no peace in the whole but only in the parts (Rutabanzibwa, 2004). Rather how can the peace existent in parts be utilized to guarantee peace in the whole. Simply how can states be at peace while they all pursue their own self-interest in the same environment? This according to Nye’s thesis is impossibility. This theory is relevant because it talks about collective decision making.

Policies in EAC are determined by consensus which covers a varying number of functional areas. Ernst Haas came up with the concept of spill-over which “alludes to a circumstance in which a given activity, identified with particular objectives, makes a circumstance in which the first objectives can be guaranteed simply in the wake of taking further activities, which thus make a further condition and a requirement for more activity et cetera”. This refers to policies that are agreed upon and the partner states need to implement them for the prosperity and continuous existence of the integration.

2.2.2 Diffusion of Innovation Theory

The theory of Diffusion of Innovations as described by Rogers (1995) is well known. Rogers describes diffusion of innovations as: “the process by which an innovation is communicated through certain channels over time among the members of social systems. It is a special type of

communication, in that the messages are concerned with new ideas” (Rogers, 1995). Technology diffusion is an indispensable process through which technological potential of innovative activities can be actually turned into productivity. Various characteristics of the economic environment in which diffusion takes place may affect the pace of diffusion, while the diffusion itself may also have feedbacks on the environment. A decision not to adopt an innovation relates to the rejection of the available new idea. However, in order to explain the rate of adoption of innovations Rogers suggests measurement of the following perceived characteristics of innovations: relative advantage compatibility; complexity; trial ability; and observability. Rogers (1995) postulated that the adoption of innovations is influenced by these five characteristics, and that they can explain the rate of technology adoption.

Cheung et al. (2000) defined complexity as the extent to which an innovation can be considered relatively difficult to understand and use. They found that complexity negatively influences the adoption of internet usage. Complexity is the opposite of ease of use. Ease of use refers to the extent to which mobile banking is perceived as easy to understand and operate. Lin, (2011) suggests that there is a strong impact of perceived ease of use of new technology on its adoption. As banking services have very user friendly interfaces, users see them as easy to use, and hence to form positive attitudes towards them (Lin, 2011).

Observability of an innovation describes the extent to which an innovation is visible to the members of a social system, and the benefits can be easily observed and communicated (Rogers, 2003). Moore and Benbasat (1991) simplified the original construct by redefining observability into two constructs: visibility and result demonstrability. In the context of banking, observability is defined as the ability to access the banking services at any time and from any location without

any delay or queue, and seeing the effect of banking transactions immediately, and conveying the accessibility benefits to others.

Diffusion of Innovation (DOI) Theory is one of the oldest social science theories. It originated in communication to explain how, over time, an idea or product gains momentum and diffuses (or spreads) through a specific population or social system. The end result of this diffusion is that people, as part of a social system, adopt a new idea, behaviour, or product. Adoption means that a person does something differently than what they had previously (i.e., purchase or use a new product, acquire and perform a new behaviour, etc.). The key to adoption is that the person must perceive the idea, behaviour, or product as new or innovative. It is through this that diffusion is possible.

Adoption of a new idea, behavior, or product (i.e., innovation) for example that of mobile led financial services does not happen simultaneously in a social system; rather it is a process whereby some people are more apt to adopt the innovation than others. Researchers have found that people who adopt an innovation early have different characteristics than people who adopt an innovation later. When promoting an innovation to a target population, it is important to understand the characteristics of the target population that will help or hinder adoption of the innovation (Rogers, 1995).

Researchers have attributed poor strategy implementation consistency to firms with low financial performance. Love, Priem and Lumpkin (2012) observe that the major reason for this has been seen in the fact that over performers presumably have a great interest in ‘conserving’ their level of strategy implementation consistency. More importantly, firms with adequate financial resources have the ability to align past strategies with new ones for effective production.

Financial resources include the money required to effectively implement the strategies laid out in the farms under the area of study. Financial resources enable all the other variables including performance management, leadership, capacity and culture to be achieved.

2.2.3 Theory of Planned Behaviour

This theory of planned behaviour is a theory about the link between beliefs and behaviour. The concept was proposed by Ajzen (1991) to improve on the predictive power of the theory of reasoned action by including perceived behavioural control (Ajzen, 1991). It is one of the most predictive persuasion theories. It has been applied to studies of the relations among beliefs, attitudes, behavioural intentions and behaviours in various fields such as advertising, public relations, advertising campaigns and healthcare. The theory states that attitude toward behaviour, subjective norms, and perceived behavioural control, together shape an individual's behavioural intentions and behaviours. In relation to the study, this theory was used to explain effect of capacity of the personnel on the implementation of one stop border post strategy. This is because the policies put in place would predict how the capacity of the personnel affect implementation of one stop border post strategy at the Malaba border, Kenya.

2.2.4 Stakeholder Theory

Stakeholder theory asserts that organisations should consider the concerns of individuals and groups that can affect or are affected by their activities (Gibson, 2000) while making decisions and achieving organizational goals. Organisations are expected to do so because they are responsible and accountable to a broad range of stakeholders for their activities, rather than just shareholders. Stakeholder theory recognizes the existence of a dynamic and complex relationship between organisations and their stakeholders (Gray, Owen & Adams, 2014) and, emphasizes the management of these relationships (Friedman & Miles, 2002). Therefore, stakeholder theory

plays a significant role in understanding the stakeholders' influences on organizations' actions and how organisations respond to these influences.

Modern stakeholder theory is an expansion of Freeman's seminal work *Strategic Management: A Stakeholder Approach* (Freeman, 2013). Before this, theorists were struggling to establish the duties and responsibilities that an organization has towards other groups and individuals besides shareholders, suppliers, customers and employees (Shankman, 2014). Stakeholders can be defined as any group or individual who can affect or are affected by the achievement of the organization's objectives (Freeman 2013). According to this definition stakeholders have the potential to both benefit and harm organisations (Gibson, 2000). Therefore stakeholders' concerns should be recognized and addressed by organisations to ensure their survival and successful goal accomplishment.

In order to recognize and address stakeholder's needs and expectations Clarkson (1995) categorizes stakeholders into primary and secondary stakeholders. The primary stakeholders are those individuals and groups whose support is essential for the survival of an organization, whereas secondary stakeholders are those individuals and groups who affect or are affected by the activities of an organization. On the basis of the above categorization, organisations can have a wide range of current and potential stakeholders such as: fund providers, employees, suppliers, investors, shareholders, regulatory authorities, Non-Government Organisations, media, labour unions, society and local community.

Organisations can have a broad range of stakeholders with different interests and it is not possible for organisations to address the issues and concerns of all their stakeholders. Therefore identification of stakeholders which can impact or are impacted by an organization's actions

becomes essential. In the absence of stakeholder identification, the effectiveness of stakeholder engagement becomes questionable or doubtful (Belal, 2002). The key criteria for identifying and prioritizing stakeholders include: attributes of power, legitimacy and urgency; and the stakeholders' ability to affect or be affected by the organization's actions (Mitchell, Agle & Wood, 2014).

2.3: Conceptual Framework

To achieve the study objectives, the various aspects under study can be conceptualized as being in association as presented in figure 2.1 below.

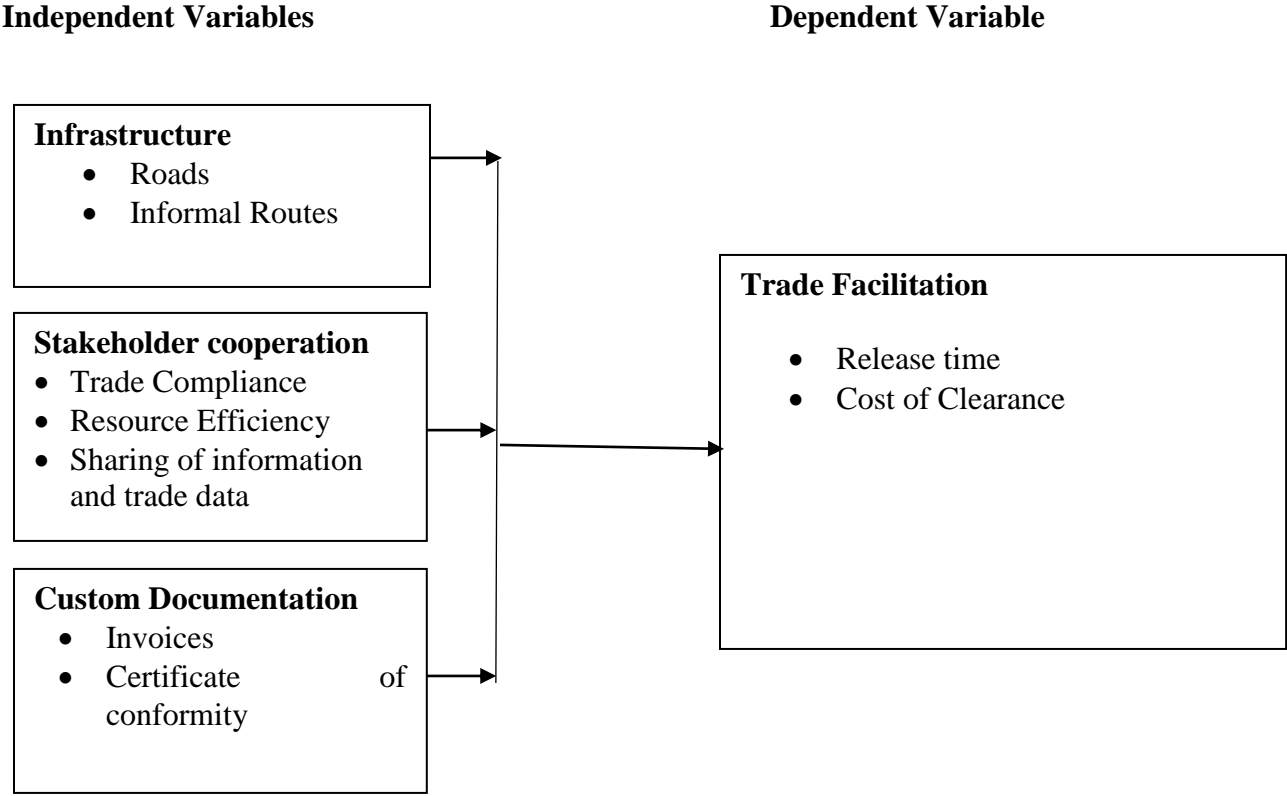


Figure 2.1: Conceptual Framework

2.4: Empirical Literature Review

Empirical research is research using empirical evidence. It is a way of gaining knowledge by means of direct and indirect observation or experience (Hoek et al., 2012). Empiricism values such research more than other kinds. Empirical research is based on observed and measured phenomena and derives knowledge from actual experience rather than from theory or belief.

This covered what other studies have found in relation to the current study through investigation of the body of knowledge that has relevance to the topic of research and highlights motivations, initiatives/strategies that have been employed by economists factors influencing trade facilitation, its advantages and an appreciation of challenges.

2.4.1: Infrastructural Development

Port efficiency, proper customs environment, regulations that are prominently published after consultation with parties concerned and consolidated costs that are commensurate with services rendered by government agencies form the basic frame work of Trade facilitation that result in immense benefits as reiterated by UNCTAD,(2004).The benefits range from ‘overall increase in trade flows’(Hertel, Wansley and Itaura,2001) Electronic commerce has been found to reduce in the time spent doing business which results in savings Global Economic Prospects (2004), clearly outlines the links between trade reform measures that address factors affecting trade facilitation to poverty reduction. Because most poor people live in rural areas and engage in agricultural production. Cutting trade barriers in agriculture is among the effective strategy to combat poverty. A relatively simple program to cut tariff peaks in rich countries to 10 percent in agriculture and 5 percent in manufacturing, reciprocated with cuts upto 15 percent and 10 percent respectively in transition and developing countries.

At a micro-economic level, trade facilitation has a direct impact on total logistical costs, the sum of time and money involved in moving traded goods. (UNCTAD, 2004). Trade Facilitation benefit small and Medium scale Enterprises (SME) have been found to be ‘the engines of economic development in many transitional countries’ (World Bank, 2002)

Reduction in the costs associated with the movement of goods across borders and regulatory environment, Reforms have been cited as drivers to economic growth (University of Manchester, 2009). ‘The reductions of tariff barriers in successive rounds of international trade negotiations, the continued expansion of world trade, and the growth in global supply chain management practices have resulted in a heightened interest in the impact of on-the-border and inside-the-border trade transaction costs on international trade.’ Clarke (2015) illustrates that export performance of manufacturing enterprises in African countries that manufacturing enterprises are less likely to export in countries with ‘poor customs administrations and restrictive trade and customs regulation’. Landlocked countries such as Uganda, Burundi and Rwanda face particular problems with Kenya and Tanzania transit arrangements, and have proposed changes to EAC rules which would help address their difficulties.

2.3.4 Stakeholder’s Cooperation on Trade Facilitation

Inter-agency cooperation refers to horizontal coordination and cooperation between different agencies responsible for implementing related border management activities. These agencies could be at a local, regional or central level. In addition, the areas of cooperation range from day-to-day formal or information exchanges on operational matters to strategic short and long term plans on border management matters (Erasmus, 2013). This level of coordination is aimed at minimizing policy discrepancies that could easily confuse members of the public. One of the

major challenges to inter-agency cooperation at the borders is attributable to the different authority levels of officers working for different agencies.

International cooperation in the context of Integrated Border Management involves cooperation among border agencies of the adjoining states. Similar to the other levels of cooperation, international cooperation could be at the local level at the border, bilateral level between the two countries or at a multinational stage. Strong international cooperation on border management issues is a useful way for enhancing trade and for dealing with cross-border crime and irregular migration. The difficulty with achieving this ideal level of international cooperation is particularly acute in instances where a country shares a border with a failed state. A lot of such great initiatives are relegated to the sidelines in pursuit of narrow or self-serving interests. What options would the neighbors have in such circumstances? In the quest for excellence in border management, it is important to bear in mind that continuous reform is an important element largely due to the changing and shifting nature of border challenges. Based on this notion, IBM should not be considered as an end in itself but rather as a means for identifying challenges and building responsive solutions (Doyle, 2011).

Buyonge & Kireeva (2008) claim that trade facilitation guarantees better economic progression than benefits accruing from tariff reductions. This is supported by Hoekman & Shepherd (2013), who claim that trade facilitation can eliminate resource wastage by avoiding duplications. The above observations reinforce the importance of trade facilitation to Zambia, which has a high trade-to-gross domestic product ratio.

Prospective benefits of Border Agency Cooperation explain its increasing popularity at various policy-making arenas. Governments may expect Border Agency Cooperation to enhance tax

collection, achieve higher trader compliance, and improve resource efficiency through elimination of duplicated and overlapping activities. Wider exchange of trade information and intelligence between border agencies and across borders would improve accuracy of risk assessment of cargo movements and result in better targeted interventions (Widdowson, 2005).

There might be benefits of international scale if border control agencies in neighboring countries invested jointly in common screening equipment, information and communication technologies (ICT)/systems and facilities. Coordinated maintenance and staff training bring further cost savings. Also, if border control agencies coordinated their inspections, streamlined their operations and shared responsibilities both between different agencies and across the borders, there would be less need for staff that inspects cargo, vehicles and people at the borders. Cooperation also often simplifies and clarifies border procedures, and this way it reduces fraudulent and corrupt practices that are often found in opaque and complex trading environments. In the broader picture, cooperation between border agencies and across borders makes cross border trading faster, cheaper and more predictable (time- and cost-wise) – a significant trade facilitation benefit with positive implications to export-driven economic growth. Transparent and accountable government also helps attract direct foreign investments, a major incentive for developing countries to engage in BAC.

Higher throughput of border crossings also reduces pressure on infrastructure, especially on congested waiting areas at borders. The extended cooperation across borders benefits particularly the trading community. In the globalizing economy, many companies have adopted just-in-time manufacturing and synchronized logistics on international scale, as well as global sourcing strategies (Grainger, 2011). Common to these management strategies is that they call for fast and predictable cross-border logistics and transport. For this reason, many trading companies are

putting pressure on government agencies, which play a role in facilitating the cross-border trade to provide fast, predictable and simple public services at borders.

Besides the shorter waiting times at borders, simplified border formalities save time and money that trading companies must spend to ensure their compliance with regulatory requirements. This benefits especially small and medium-sized enterprises (SMEs) that may be discouraged to export due to complicated regulatory requirements and customs formalities. BAC removes disincentives of these SMEs to expand their sales internationally, with obvious impact on the economic development worldwide. Trade facilitation and border agency cooperation activities hold a huge potential in emerging and developing economies. According to McLinden (2015), who refers to the World Bank's Doing Business data, "it takes three times as many days, nearly twice as many documents, and six times as many signatures to import goods in poor countries than it does in rich ones."

USAID reports that there are up to ten border control agencies operating at certain border posts in East-Africa, each agency conducting their own inspections and levying their own charges on the cross-border traffic (Pearson, 2011). Sherry generalizes that 40% of delay time in international supply chains can be attributed to administrative burden caused by paper-based documents and uncoordinated inspections (Sherry, 2013). Numerous further examples exist in trade facilitation literature, making the "baseline trade facilitation business case" a positive one.

2.4.2: Customs documentation

Several research studies have confirmed that a better trade facilitation environment increases import and export volumes. Wilson et. Al. (2003) estimated the impact of trade facilitation on trade flows using a gravity model methodology. Their results indicate large potential increases in

trade and growth rates from trade facilitation reform in countries that have above average trade transaction costs. Djankov et al, (2006), found that on average, each additional day that a product is delayed prior to being shipped reduces trade by at least 1 percent as well as the effect on trade volumes. It has been shown that a reduction in customs clearance times can have a significant influence on attracting foreign investment. Nordas et al, (2000) analyzed the relation between time for exports and imports, logistics services and international trade and found that time delays result in lower trade volumes and reduce the probability that firms will enter export markets for time sensitive products.

The OECD study on potential impact of Trade Facilitation on developing Countries' Trade and Trade Facilitation Indicators ,(2013) conclude that the costs for implementing. Maintaining and operating automated customs systems are substantial. OECD However, stipulates proposals that can alleviate the situation in developing countries and result in benefits. OECD has done this by developing a set of TF Indicators to help government policy makers improve border procedures, reduce trade costs, boost trade flows and reap greater benefits from International trade. This set of indicators identify key areas for action when implementing potential reforms. OECD in the studies mentioned the importance of initial analysis and diagnosis of trade facilitation issues. One of the most common causes of failed reform is inadequate or insufficient understanding of problem areas that need to be addressed thus the development of indicators appended to this study.

According to the African Development Bank Data Platform report (2010), the key economic sectors such as services, with an indication of (45.1%), agriculture (32%) and mining and quarrying (14.9%) are key indicators drive the regional growth process. while the contribution of

manufacturing (8%) is still small, this could be improved. Growth in these sectors could improve with investment in Trade Facilitation initiatives.

Trade Facilitation initiatives can affect the distribution of income hence aid poverty reduction in a society in three key ways: Trade facilitation increases the volume and range of a country's international trade, by reducing the transaction costs of trade, making exports more competitive, leading to Sector Contribution to GDP in 2009 increases in wages and the numbers employed in the exporting sectors, and imports less expensive, thereby also increasing real wages. World Bank, (2003). Trade facilitation contributes to economic growth, which in turn leads to higher incomes the final way that Trade Facilitation impacts on income distribution and poverty reduction relates to the increase in government revenues, which is the concomitant of increased trade flows.

The direct financial and revenue benefits of a well-designed trade facilitation programme can often outweigh the costs, with potentially large indirect economic benefits in the longer term. The static efficiency effects on economic welfare are fairly small but the longer term dynamic effects are potentially much larger. These gains are not available in EAC countries, which have made less progress than the EU in implementing efficient TF and workable TF border procedures and reforms.

Trade facilitation can contribute to fixed capital formation through increased foreign direct investment, since investing companies require cheap, quick, transparent and predictable customs services. Improved business climate, can have a positive impact on Foreign Direct Investment (FDI), which itself creates further knowledge spillages and linkage externalities. It is reasonable to anticipate beneficial employment effects from Trade Facilitation measures. Efficient Trade Facilitation will increase employment at border points of many countries.

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The overview of related literature on trade facilitation indicates that though the topic of trade facilitation has attracted a lot of attention, there is limited academic research on the topic. This study addressed this gap by adding to the existing scarce literature by bringing out the factors affecting Trade facilitation in East Africa. The literature review has brought an understanding of the relationship between Trade facilitation and trade flows which may appear complex. Trade facilitation has centered the checklist of issues affecting trade facilitation in four categories (Otsuki et al, 2002 namely, port efficiency, Customs environment, Regulatory environment and the use of technology in the process of trade.

The economists allude to the fact that measures to address trade facilitation for each country will enhance trade for these countries even with their unique trade facilitation measures and patterns of trade. The review has shown that using augmented gravity model resulted in confirming that Trade facilitation enhances trade. Survey of information was used with care and the transparent secondary data with respect to data sample questions was investigated and yielded desired results. This study benchmarked with the World Forum, Global competitiveness Report 2001-2002 for authenticity.

The General Agreement on Tariffs and Trade (GATT, 1994) which has given the legal framework for Trade Facilitation summarized in Articles v, viii and x namely, Freedom of Transit, fees and charges and publication and administration of trade rules is the basis of trade facilitation and reforms directed toward trade facilitation will accrue benefits to countries

involved. The World Bank's 'Doing Business' report (2009) on regulatory reforms gave guidance on the treatment of non-tariff barriers to trade. The literature reviewed converged on the fact that elimination of non-tariff barriers enhances trade which leads to economic well-being due to increased trade flows.

2.5 Critiques of the studies

Buyonge & Kireeva (2008) claim that trade facilitation guarantees better economic progression than benefits accruing from tariff reductions. This is supported by Hoekman & Shepherd (2013), who claim that trade facilitation can eliminate resource wastage by avoiding duplications. The above observations reinforce the importance of trade facilitation to Zambia, which has a high trade-to-gross domestic product ratio.

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Nordas et al, (2000) analyzed the relation between time for exports and imports, logistics services and international trade and found that time delays result in lower trade volumes and reduce the probability that firms will enter export markets for time sensitive products.

2.6 Research knowledge gap

While there is across-the-board agreement on the necessity of trade facilitation, not all East African countries have shown enthusiasm in ongoing negotiations of a multilateral nature under the pretext of inability to afford the modern technology required. There is a tendency of reluctance to take on additional legal obligations that may expose countries within East Africa to Dispute Settlement Mechanisms (DSM). However, this fear has been dispelled by the best endeavor clause in the text and the benefits that trade facilitation brings to the economies of East Africa. Taking into consideration the pace of integration of East African countries and their resolve to deal with outstanding issues towards fully fledged customs union and free market economy, there is no doubt that there exists an underlying problem that requires urgent attention.

2.7: Summary

Chapter one gave an introduction and background to the study and outlined the problem statement and the purpose of the study, it also clearly stated the research questions that the study aims to achieve. The significance alongside beneficiaries of the study has been outlined. The scope both geographical and conceptual is covered. The chapter concludes by defining the key terminologies used. Chapter two elucidates the findings from the literature with the emphasis on the tax compliance and non-compliance. It will therefore serve to clarify how relationship between tax compliance and tax evasion and tax avoidance. Chapter three comprise of the research methodology used in the study. The chapter defines the research design, population targeted, sample design, procedures of data collection and analysis of data techniques. Also discussed are characteristics of the study design and why the research deemed it appropriate for this study. The chapter also provides information on the population, sample frame and size, sample selection. Data collection method and data collection tool used in the study is also provided. Presentation the findings and results of the study is covered in chapter four.

Presentations of the findings and results were presented in table forms. Percentages were used for easy interpretation and understanding. Chapter five is a summary and discussion of the research researching findings on the factors affecting voluntary tax compliance on rental income

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

Research methodology refers to the hypothetical examination of the research techniques, which looks to clarify the justification behind the chose to investigate the outline and particular methodology. The methodology is a plan of activity that connects methods to results, which gives a general view of hypothetical analysis in connection to nature of knowledge (Creswell, 2003).

This chapter presents the methodology that was used to carry out the research. It presents the research design, the target population, sampling procedure data collection procedures instruments and data collection procedures instruments and data analysis.

3.2 Research Design

Research design is a plan that guides the research in the process of collecting, analyzing and interpreting observations; the researcher's blueprint for the methods and instruments used to gather information and to evaluate it, in order to respond to the research questions of the study (Mugenda, & Mugenda, 2003).

This study used a descriptive research design. The aim of a descriptive research was to determine and report the way things are and it guides in determining the current status of the population under research. This creates a profile of a cluster of problems, people, or events, through the gathering of data and tabulation of the frequencies on examined variables or their interaction (Kothari, 2014).

3.4: Sampling Frame

Saunders, Lewis, & Thornhill (2007) characterize examining outline as the entire rundown of all cases in the population from which a likelihood test was drawn. A testing outline is a far reaching rundown of all inspecting units, from which a specimen can be chosen (Mugenda & Mugenda, 2009). The testing outline for this examination comprised of traders operating across the Kenya Tanzania border. The information was obtained from the Human Resources Manager.

3.3 Target Population

The study target population was 300 which comprised of traders, customs officers, clearing agents and immigration personnel operating across the Kenya Uganda border. The research was carried out at the Uganda border, which is an important transport and trade conduit linking Kenya and Uganda.

Table 3.1: Sample Size

	target population
Traders	150
Customs officers	30
Clearing Agents	12
Immigration Personnel	8
Total	200

3.5: Sample size and Sampling Technique

In order to establish the sample size, the study adopted purposive and stratified random sampling technique. Purposive sampling is where the researcher selects what he/she is a “typical” sample based on specialist knowledge or section criteria. Research scholars contend that an adequate sample size must be picked with the end goal that it speaks to the whole population. Be that as it may, as Denscombe (2003) states, the sufficiency of test estimate relies

upon various components associated with the examination which should be borne as a main priority and weighed upon by analyst during the time spent achieving a choice about the vital example. In this way, indisputably the size relied upon the many-sided quality of the . According to Mugenda and Mugenda (2011), a good sample should be between 10- 30% of the accessible population. Also, sampling within each stratum was done through simple random sampling.

Table 3.2: Sample Size

	target population	Sample Size (30%)
Traders	150	56
Customs officers	30	9
Clearing Agents	12	6
Immigration Personnel	8	4
Total	200	75

3.6 Data Collection Instrument

According to Sekeran (2003), there are two main types of data collection methods namely, primary and secondary data. Primary data comprises of Interview guides, questionnaires and focus group discussions. The researcher was primary data which was largely be quantitative. It was concerned on the objectives of the study and will be collected through questionnaires. The researcher administered the questionnaire to the various respondents with the help of trained research assistants.

The study used both primary and secondary data. Interview schedule as well as a questionnaire will be used. The instruments were administered in a language the traders understand such as English and Kiswahili. The questionnaires targeted the traders who have extensive information on cross border trade while interview schedules were for customs officers, security and immigration personnel.

3.6 Data Collection Instruments

In this study the main data collection instruments was questionnaires. Closed ended structured questionnaire was preferred because they are effective data collection instruments that allow respondents to give much of their opinions pertaining to the researched problem. The questionnaire used the five Likert scale (from strongly agree to strongly disagree).The questionnaires were self-administered to the personnel who handle taxes in the sampled taxpayers.

3.7 Data Collection Methods

The study will employ primary data collection. Primary data was collected through a self-administered questionnaire. The questionnaire was adopted closed structured ended questions. The responses in the questionnaires helped gain an in-depth understanding.

A questionnaire was gathered statistically meaningful data on the perspectives of respondents on an issue of interest based on a set of predetermined questions. According to Kothari (2008), a questionnaire is the most appropriate instrument for this study due to its ability to collect a large amount of information in a reasonably quick span of time hence why the questionnaire was an appropriate instrument for this study. Secondary data was used to collect data on revenue performance

3.7.1 Primary Data

These are the data which are collected from some primary sources i.e., a source of origin where the data generate. These are collected for the first time by an investigator or an agency for any statistical analysis.

3.7.2 Secondary Data

These are the data which are collected from some secondary source i.e. the source of reservation storage where the data is collected by one person and used by other agency. These are collected as primary data and used by other as secondary data. According to Kothari (2004) secondary data involves data that was collected by use of the library, internet and books. Secondary data was drawn from the library, websites, newspapers, journals, books, financial publication, and magazines such as the frequency analysis relating to our study.

3.8 Pilot study

Pilot study was carried to determine the reliability as well as validity of the research tools in order to ensure there is consistency and accuracy of the research instruments.

3.8.1 Validity of the research instruments

Kothari (2008) defines validity as a sound measurement that indicates the degree to which an instrument measures what it purports to measure. This study adopted content validity which is the extent to which a measuring instrument provides adequate coverage of the topic under study. So as to establish content validity and make adjustments to the research instruments, consultations and discussions with the supervisor was done.

3.8.2 Reliability of the research instruments

Reliability of an instrument is the measure of the degree to which a research instrument yields consistent results or data after repeated trials (Cooper, 2003). Instrument reliability is the dependability, consistency or trustworthiness of a test.

Cronbach's Coefficient Alpha approach was used to measure internal consistency of the research instruments. Cronbach's Coefficient Alpha is a scale measurement tool appropriate in measuring internal consistency in descriptive survey researches as recommended by Cohen, Manion and Morrison (2007). Computation of Cronbach's Alpha was done using statistical package for social sciences (SPSS Version.24)..

3.9 Data analysis and presentations

The SPSS (Statistical Package for Social Sciences) Version 20.0 program was used to analyze data. Both quantitative analysis and regression analysis used as data analysis techniques. The data collected was through various models to clearly bring out the factors influencing use of automated tax system in West of Nairobi Station in Kenya.

3.9.1 The Qualitative Analysis

Qualitative data was collected through questionnaires and response rate calculated. The data was then categorized into different themes according to research variable and descriptive statistics such as mean, standard deviation and frequency distribution which according to Kothari (2012) measures the point about which items have a tendency to cluster and describe the characteristics of the data collected was computed. Qualitative data for the study was derived from the questionnaires and the purpose for analyzing the data.

3.9.2 The Quantitative Analysis

Quantitative data was analyzed using inferential statistics where both parametric (Chi-Square test) and non-parametric (Pearson correlation coefficient) test was used. Chi-square test was used to test statistically significant difference between large and mutually unrelated parametric samples. Pearson correlation test was conducted to test level of significance between all independent variables and dependent variables. Pearson's correlation coefficient was used as a measure of linear correlation. The measure is symbolized by letter R and varies between -1 and +1, with 0 indicating no linear relationship while Coefficient of determination (R^2) measures the amount of variation in the dependent variable explained by independent variables. The closer the R^2 is to 1 the better the regression line to the actual data (Sekaran, 2000).

3.10 Empirical Model

Multiple regression analysis measures the effects of multiple independent variables on one dependent variable. Multiple regressions was therefore be adopted to measure the effects of multiple independent variables on the dependent variable and effects of multiple independent variable.

Regression analysis was applied in all the cases where correlation was found to exist between the independent and dependent variables. It is important to carry out regression analysis so as to establish the extent of the influence exerted on the dependent variable by the independent variable. The model was as follows:

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

Where:

Y = Trade facilitation

β_0 = Constant Term

$\beta_{1,2,3}$ = Beta coefficients

X_1 = Infrastructure development

X_2 = stakeholders cooperation

X_3 = customs documentation

ε = Error

CHAPTER FOUR

RESEARCH FINDINGS AND DISCUSSION

4.1 Introduction

This chapter discusses the interpretation and presentation of the findings obtained from the field. Descriptive and inferential statistics have been used to discuss the findings of the study.

4.2 Response Rate

Research's data collection instruments (questionnaires) were administered within a period of three weeks. Out of 60 questionnaires administered the researcher ensured a 98% response rate by personally administering the questionnaires with the help of research assistant. A total of 58 questionnaires were successfully completed and returned. Bailery, (2000) asserts that a response rate of 50 is considered good, and response greater than 70% is considered very good, therefore the response was very good. The findings are presented in Table 4.1.

5 Table 4.1: Response Rate

Response Rate	Frequency	Percent
Returned	58	98%
Unreturned	2	2%
Total	60	100

4.3: Reliability results

Reliability of the questionnaire was evaluated through Cronbach's Alpha which measures the internal consistency. Cronbach's alpha was calculated by application of Statistical Package for Social Sciences (SPSS) version 23 for reliability analysis. The value of the alpha coefficient ranges from 0-1 and may be used to describe the reliability of factors extracted at 0.5

significance level from dichotomous and or multi-point formatted questionnaires or scales. A higher value shows a more reliable generated scale. Cooper & Schindler (2008) have indicated 0.7 to be an acceptable reliability coefficient. Table 4.2 shows that had the highest reliability was infrastructure ($\alpha=0.831$) followed by Custom Procedure ($\alpha=0.827$), and custom documentation ($\alpha=0.796$). This illustrates that all the five scales were reliable as their reliability values exceeded the prescribed threshold of 0.7 (Mugenda & Mugenda, 2008).

Table 4.2: Reliability Coefficients

Scale	Cronbach's Alpha	Number of items
Infrastructure	0.831	5
Custom Procedure	0.827	5
Custom Documentation	0.796	5

4.4: Demographic information

The study sought to establish the general information of the respondents. This included the gender of the respondents, the age of the respondents, the number of years worked and their highest education level. The results from the analysis of findings are elaborated in the following subsections as shown.

4.4.1: Gender of the respondents

The study sought to establish gender of the respondents. The results from the analysis of findings are illustrated in the figure 4.3 below as shown.

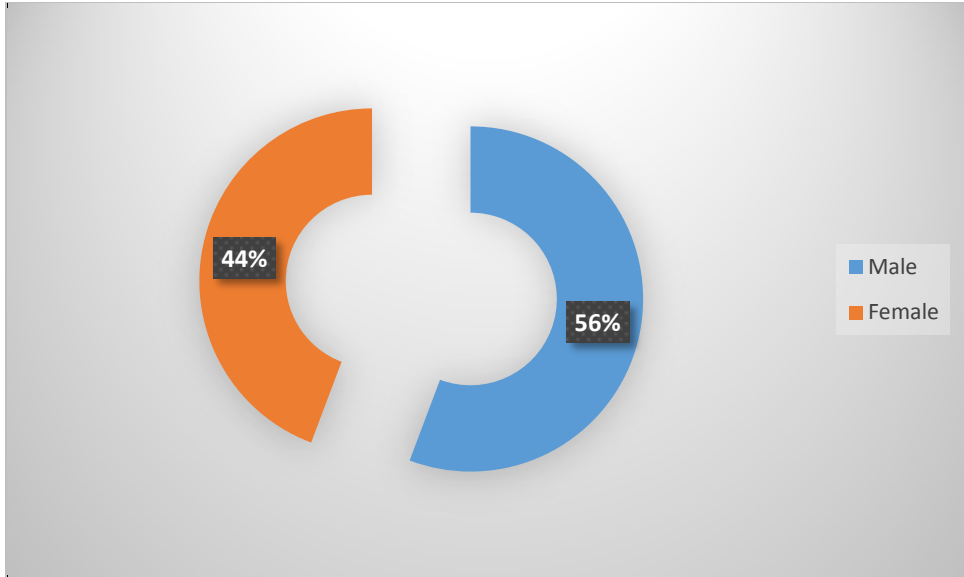


Figure 4.2: Gender of the respondents

From the analysis of findings, it was noted that majority of the respondents (56%) indicated that they were male while 44% of the respondents indicated to be female. The 10% differential was however noted to be little to create any gender bias for the study on the factors influencing cross border trade facilitation in East Africa: A case of the Malaba Border Station.

4.4.2: Age bracket of the respondents

The study sought to establish the age of the respondents. The results from the analysis of findings is illustrated in the figure 4.4 as shown below.

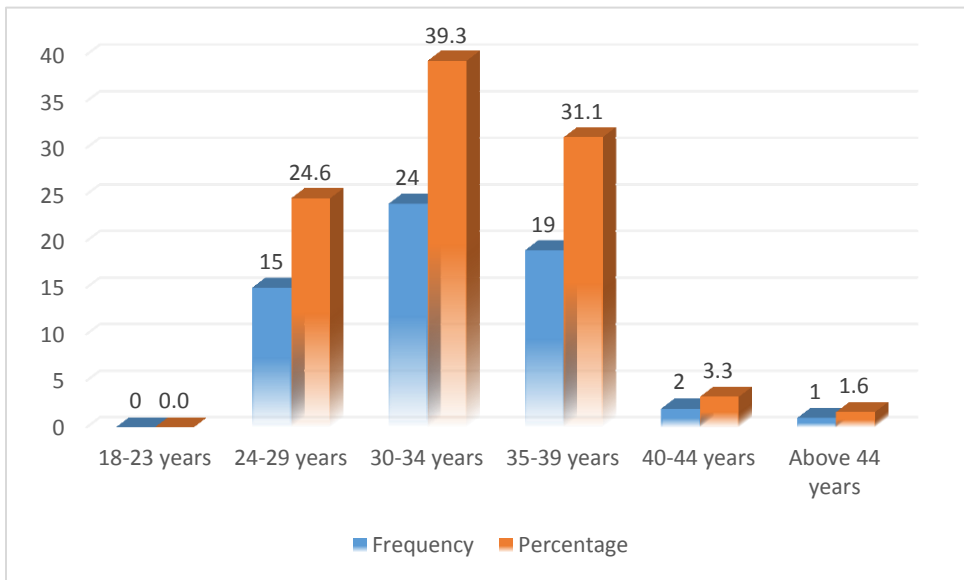


Figure 4.3: Age of the respondents

From the analysis of the findings, majority of the respondents (24, 39.3%) were aged between 30 and 34 years old. Closely after were respondents (19, 31.1%) who stated that they were aged between 35 years and 39 years old. 24.6% of the respondents were aged 24-29 years and above while 3.3% of the respondents indicated that they were aged between 40 and 44 years old. 1.6% of the respondents indicated that they were aged above 44 years while the none of the respondents stated that they were aged between 18 to 23 years old.

4.4.3: Number of years Worked

The study sought to establish the number of years the respondents had been working. The results from the analysis of findings are illustrated in the figure below.

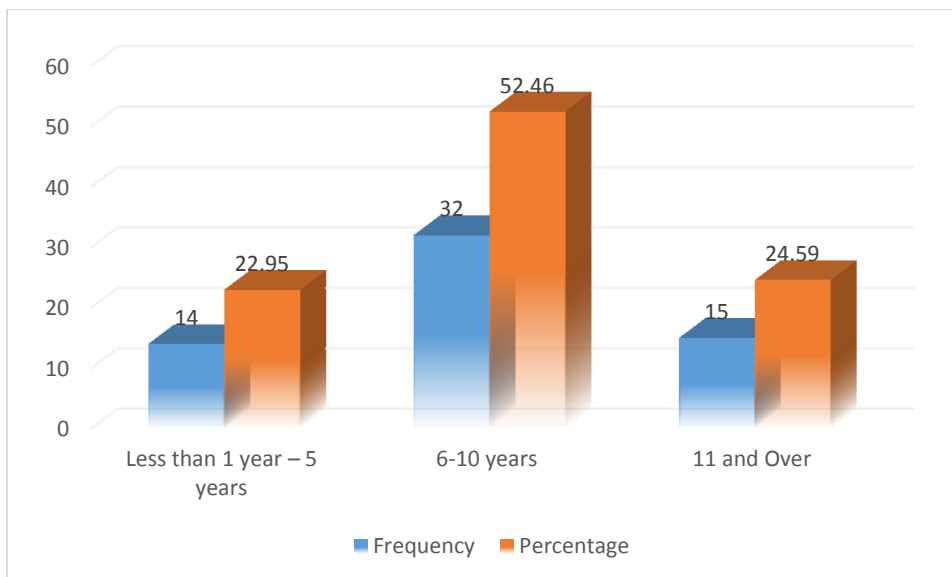


Figure 4.4: Number of years worked

From the analysis of findings, majority of the respondents indicated that they had working experience of 6 to 10 years. Closely after, were respondents who indicated that they had worked

for a period of 11 years and above. The least response was of respondents who indicated that they had worked for a period of less than 1 year to 5 years. The study was thus able to infer that majority of the respondents had the necessary education to provide information on factors influencing cross border trade facilitation in East Africa in a case study of the Malaba Border Station.

4.4.4: Highest Level of Education

The study sought to establish the education level of the respondents. The results from the analysis of the findings is illustrated in the in the figure 4.6 below.

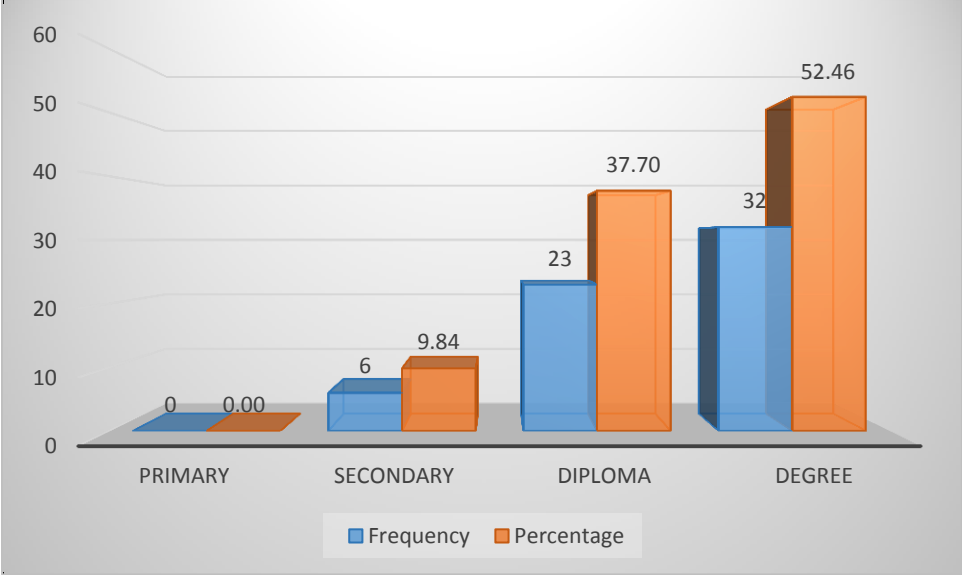


Figure 4.5: Highest Level of Education

From the findings it was established that majority of the respondents (32, 52.46%) indicated their highest level of education as a university degree, 37.7% of the respondents indicated their highest education level as a college diploma while 9.84% of the respondents indicated that their highest education level was secondary education. None of the respondents indicated that their highest level of education was primary education. The study thus saw the respondents had the

relevant education to provide information on the factors influencing cross border trade facilitation in East Africa.

4.5 Descriptive Statistic

The study sought to establish the factors influencing trade facilitation in East Africa at the Malaba border. The respondents were asked to rate how they felt about different variables related to factors influencing trade facilitation in a five point Likert scale. The range was from strongly agree (5) to 'strongly disagree' (1). The score of 1 represented "strongly disagree" 2 represented "disagree", 3 represented "neutral", 4 represented "agree" and five represented "strongly agree"

4.5.1: Infrastructure Development and trade Facilitation

The study sought to the relationship between infrastructure development and trade facilitation. The table 4.3 below shows the findings from the respondents.

Table 4.3: Infrastructure Development and trade Facilitation

Observation	Mean	Std. Deviation
Infrastructural development results in reduced costs associated to movement of goods	4.32	0.845
Infrastructure results in overall increase in trade flows'	3.98	0.716
Trade facilitation has a direct impact on total transportation costs	4.52	0.458
Manufacturing enterprises are less likely to export in countries with poor	4.15	0.325

From the findings in the SPSS analysis, the statement, trade facilitation has a direct impact on total transportation costs had the highest level of mean (4.52) meaning that majority of the respondents concurred with the statement. The standard deviation calculated from the analysis of 0.458 indicated uniformity in the responses from the respondents. The study also noted that a great number of the respondents strongly agreed that infrastructural development results in

reduced costs associated to movement of goods. This was supported by the mean value calculated of 4.32. The statement also calculated a standard deviation of .845 which also indicated that there was little variance from the mean mark. A significant number of the respondents strongly agreed that manufacturing enterprises are less likely to export in countries with poor infrastructure. This was inferred from the mean value calculated in the analysis of 4.15. The standard deviation of 0.325 calculated in the SPSS indicated that majority of the respondents were of a similar opinion. The study also established from the descriptive statistics that Infrastructure results in overall increase in trade flows'. This was noted from the mean calculated of 3.98. The standard deviation calculated of .716 indicated uniformity in the responses from the respondents. Generally, it was clear that the infrastructural development plays a significant role on cross border trade facilitation.

4.5.2: Custom Procedures and trade facilitation

The study sought to establish the influence of custom procedures on trade facilitation. The findings are illustrated in the table 4.4 below.

Table 4.4: Custom Procedures and Trade Facilitation

Observation	Mean	Std. Deviation
Proper valuation of goods and services has a significant influence on trade facilitation	4.26	0.212
Maintaining and operating automated customs systems are essential in enhancing trade facilitation	4.33	0.483
Transparency, predictability and access to trade regulations and procedures enhance trade facilitation	3.98	0.791
Non-discriminatory and uniformly administered customs rules and procedures influence trade facilitation	4.79	.109

Based on the responses from the respondents, it was clear that most respondents strongly agreed that Non- discriminatory and uniformly administered customs rules and procedures influence trade facilitation. This inference was realized due to the high mean value calculated in the analysis of 4.79. The standard deviation .109 was in support of the study as it indicated little variation from the mean mark. It was established from the analysis that most respondents strongly agreed that proper valuation of goods and services has a significant influence on trade facilitation. This was established by the high mean value calculated of 4.26. The small standard deviation calculated indicates uniformity in the responses from the respondents. It was also established that maintaining and operating automated customs systems are essential in enhancing trade facilitation. This was seen true by the high mean value calculated in the descriptive analysis of 4.33. The standard deviation calculated in the analysis of 0.483 indicated little variance from the mean mark in the responses. Also noted from the analysis of findings was transparency predictability and access to trade regulations and procedures enhance trade facilitation. This was inferred from the mean calculated of 3.98. The standard deviation calculated of .791 indicated little deviation from the mean. From this analysis, it was clear that the independent variable custom procedures have a significant influence on the cross border trade facilitation.

4.5.3: Stakeholders cooperation and Trade Facilitation

The study sought to establish the relationship between customs documentation and trade facilitation. The findings are illustrated in the table 4.6 below.

Table 4.5: Effect of stakeholders cooperation and Trade Facilitation

Observation	Mean	Std. Deviation
Stakeholders are faced with ever-rising volumes of trade documents	4.35	0.94
Adoption of integrated customs management systems enhances trade facilitation.	4.25	0.58
Stakeholders cooperation enhances trade flow by simplifying trading formalities and procedures	4.10	0.87
Stakeholders cooperation at the Malaba Border station has facilitated trade.	2.17	.79

From the analysis of the descriptive statistics, it was clear that most respondents believed that custom documentation has a significant influence on trade facilitation. This was noted by the responses made from the respondents of statements related on statement relative to customs documentation. For instance, It was noted that respondents agreed that customs administrations are faced with ever-rising volumes of trade documents. This inference was established by the mean of 4.35. The small standard deviation indicated that there was little variance in the responses from the respondents. Also noted was that most respondents agreed that adoption of integrated customs management systems enhances trade facilitation. This was noted true by the mean calculated on the statement of 4.25. The standard deviation calculated in the study of 0.58 indicated little variation from the mean mark. Also noted from the analysis of findings was that majority of the respondents conceded that documentation at the customs aids in expediting trade flow by simplifying trading formalities and procedures. This was seen true by the mean calculated of 4.10. The standard deviation calculated of .87 indicated little deviation from the

mean mark. Conversely, it was noted that majority of the respondents disagreed that double documentation at the Malaba Border station has facilitated trade. This was seen by the low mean value calculated of 2.17. The standard deviation calculated of 0.79 indicated that majority of the respondents were of a similar opinion.

4.7 Correlation Analysis

Correlation shows the relationship existing between variables in the study. The study's dependent variable is automation tax system and the independent variables consist of infrastructure development, stakeholders cooperation and customs documentations.

The results depicted in table 4.9 below

Table 4.9: Correlation between independent variable and dependent variable

Variables		Trade facilitation	Infrastructure development	Stakeholders cooperation	Customs documentations
Trade facilitation	Pearson Correlation	1			
	Sig. (2-tailed)				
Infrastructure development	Pearson Correlation	0.486	1		
	Sig. (2-tailed)	0.002			
Stakeholders cooperations	Pearson Correlation	0.441	.3421	1	
	Sig. (2-tailed)	0.001	.0014		
Customs documentations	Pearson Correlation	0.478	.1240	.0621	1
	Sig. (2-tailed)	0.003	.0120	.0043	

According to the findings as indicated in table 4.9, it was clear that there was a positive correlation infrastructure development and trade facilitation as depicted by a correlation value of 0.486. This implies that infrastructure development was linearly related to trade facilitation. The study also depicted that there is a positive correlation between stakeholders cooperation and trade facilitation with a correlation value of 0.441. Another positive correlation was between

customs documentations and trade facilitation with a correlation value of 0.478 and a positive correlation. This shows that there was a positive correlation between infrastructure , stakeholders cooperation, and customs documentations and trade facilitation. The findings of this study agreed with the study conducted by (Kaldor, 1956).

4.8 Regression Analysis

A multiple regression analysis was conducted to investigate the joint causal relationship between the independent variables and dependent variable rental revenue collection. This is represented by the overall model $Y = \beta_0 + \beta_1 X_{1z} + \beta_2 X_{2z} + \beta_3 X_{3z} + \beta_4 X_{4z} + \epsilon$

The coefficient of multiple determinants denoted by R Squares is a measure of proportion of the variation of the regress and explained and by the corresponding explanatory variables. The values of R squared lies between zero and unity, $0 < R^2 < 1$. A value of unity implies that 100% of the variation of Y has been explained by the explanatory variables.

a) Infrastructure development

To evaluate the effect infrastructure and trade facilitation in Kenya.

Table 4.10: Model Summary of infrastructure

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.467 ^a	.198	.187	.87522	1.9823

a. Predictors: (Constant), infrastructure

b. Dependent Variable: trade facilitation

The R square value in table 4.10 in this case is 0.198 which clearly suggests that there is a strong relationship between infrastructure and trade facilitation as indicated in table above. This indicates that infrastructure share a variation of 19.8% of trade facilitation

Table 4.11: ANOVA of Stakeholders cooperation

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	11.892	4	10.892	13.162	.000 ^b
	Residual	43.767	135	.767		
	Total	44.648	135			

a. Dependent Variable: infrastructure development

b. Predictors: (Constant), trade facilitation

The ANOVA result in Table 4.11 showed that the overall model was a good fit since (F-value =13.162 and p-value=0.000<0.05).

Table 4.12: Coefficients of infrastructure development

Model		Unstandardized Coefficients		Standardized Coefficients		Sig.
		B	Std. Error	Beta	t	
1	(Constant)	.268	.115	-	2.257	.028
	Infrastructure development	.408	.107	.456	3.665	.000

a. Dependent Variable: trade facilitation

Table 4.12 indicates that the regression weight for infrastructure development was positive and significant ($\beta = 0.407$, $t = 3.665$, $p < .05$). Therefore, the null hypothesis was rejected at $P < 0.05$ level of significance implying that infrastructure development has a significant relationship with trade facilitation. The regression estimate for infrastructure development was 0.408; this indicates that a unit increase in infrastructure development would result in 40.8% increase in trade facilitation.

b) stakeholders cooperation

To find out the effect of stakeholders cooperation on automation tax system in Kenya.

Table 4.13: Model Summary of stakeholders cooperation

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.498 ^a	.218	.207	.85518	2.003

a. Predictors: (Constant), stakeholder cooperation

b. Dependent Variable: trade facilitation

The R square value in Table 4.13 was 0.218 which clearly suggested that there is a strong relationship between stakeholder cooperation and trade facilitation. This indicates that stakeholders cooperation share a variation of 21.8% of trade facilitation

Table 4.14: ANOVA of stakeholders cooperation

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	11.886	1	11.987	14.031	.000 ^b
	Residual	42.643	154	.749		
	Total	54.648	155			

a. Dependent Variable: trade facilitation

b. Predictors: (Constant), stakeholders cooperation

The ANOVA Table in 4.14 indicates that the overall model was a good fit since (F-value=14.031 and p-value=0.000<0.05).

Table 4.15: Coefficients of e-registration

Model		Unstandardized Coefficients		Standardized Coefficients		Sig.
		B	Std. Error	Beta	t	
1	(Constant)	.221	.104	-	2.041	.047
	Stakeholders cooperation	.461	.114	.468	4.001	.000

a. Dependent Variable: trade facilitation

Table 4.15 indicates that the regression weight for e-registration was positive and significant ($\beta=0.461$, $t=4.001$, $p < .05$). Therefore, the null hypothesis was rejected at $P < 0.05$ level of

significance implying that stakeholder cooperation has a significant relationship with trade facilitation. The regression estimate for stakeholders cooperation was 0.461; this indicates that a unit increase in stakeholders cooperation would result in 46.1% increase in trade facilitation in Kenya.

c) Customs documentation

To investigate the effect of customs documentation on trade facilitation in Kenya.

Table 4.16: Model Summary of e-payment

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.421 ^a	.175	.173	.87899	1.996

a. Predictors: (Constant), customs documentation

b. Dependent Variable: trade facilitation

The R square value in Table 4.16 is 0.174 which clearly suggests that there is a strong relationship between customs documentation and trade facilitation as indicated in table above.

This indicates that customs documentation share a variation of 17.5% of trade facilitation

Table 4.17: ANOVA of customs documentations

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	10.617	4	10.608	14.732	.00 ^b
	Residual	44.035	135	.754		
	Total	54.647	135			

a. Dependent Variable: trade facilitation

b. Predictors: (Constant), customs documentations

The ANOVA table in 4.17 indicates that the overall model was a good fit since (F-value=14.732 and p-value=0.000<0.05).

Table 4.18: Coefficients of e-payment

Model		Unstandardized		Standardized		Sig.
		B	Std. Error	Beta	t	
1	(Constant)	.244	.115	-	2.235	.028
	Customs documentation	.408	.108	.442	3.608	.000

a. Dependent Variable: trade facilitation

Table 4.18 indicates that the regression weight for customs documentation was positive and significant ($\beta = 0.412$, $t = 3.608$, $p < .05$). Therefore, the null hypothesis was rejected at $P < 0.05$ level of significance implying that customs documentation has a significant relationship with trade facilitation in Kenya. The regression estimate for customs documentation was 0.408 this indicates that a unit increase in customs documentation would result in 40.8% increase in trade facilitation in Kenya.

Table 4.19: Model Summary for independent and dependent variables

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.707 ^a	.505	.453	.71722	2.001

a. Predictors: (Constant), infrastructure development, stakeholders cooperation and customs documentations

b. Dependent Variable: trade facilitation

From the model summary The R square value in Table 4.19 is 0.505 which clearly suggests that there is a strong relationship between infrastructure development, stakeholders cooperation and customs documentations and trade facilitation as indicated in table above. This indicates that

infrastructure development, stakeholders cooperation and customs documentation share a variation of 50.5% of trade facilitation in Kenya .

The overall goodness of fit was obtained through regressing the goodness of fit for all the independent variables. The results of the multiple regression indicate $R^2 = .505$ and adjusted $R = .453$ as shown in Table 4.19. This is an indication that there is a strong relationship between independent variables and trade facilitation.

Table 4.19: ANOVA for independent and dependent variables

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	28.376	4	5.466	13.338	.000 ^b
	Residual	28.262	135	.513		
	Total	45.629	135			

a. Dependent Variable: trade facilitation

b. Predictors: (Constant), infrastructure development, stakeholder cooperation and customs documentations

The overall model significance was presented using the ANOVA test table. The results in Table 4.19 shows that the overall model was a good fit since (F-value=13.338 and p-value=0.000<0.05) for all independent variables meaning that null hypothesis is rejected and concludes that there is a relationship between different independent and dependent variables. The findings there imply that all independent variables were statistically significant in explaining automation tax system in Kenya. ANOVA was used to test whether the regression analysis model used is fit or the relationship of the variable just occurred by chance.

Significance of F ratio is used to determine whether model used was fit or not. If the F ratio is significant the model used is considered fit and vice versa. A P - value of less than 0.05 indicates that the F statistics is high and that the null hypothesis of independent needs to be rejected since

it's not true. In this case the F ratio (F=11.338, P=.000^b) was found to be significant hence the model used for analysis was fit

Table 4.20: Coefficients of Overall Regression Model

Model	Unstandardized		Standardize		Sig.
	B	Std. Error	Beta	t	
(Constant)	.197	.093	-	2.052	.041
Infrastructure development	.313	.091	.234	2.261	.011
Stakeholder cooperation	.245	.098	.355	3.560	.043
Customs documentation	.292	.096	.314	3.061	.023

a. Dependent Variable: trade facilitation

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

$Y = 0.197 + 0.313X_1 + 0.245X_2 + 0.292X_3$ were significant with p- values of 0.041, 0.011, 0.043 + 0.023, respectively.

The regression equation above has established that taking all factors into account (infrastructure development, stakeholders cooperation and customs documentations) the findings reveals that assuming other variables are at zero a unit change (increase) in infrastructure development will lead to a 0.313 increases trade facilitation ; a unit increase in stakeholder cooperation will lead to a 0.245 increases trade facilitation ; a unit increase in customs documentation will lead to a 0.292 increases trade facilitation

The regression coefficient results indicate a positive significant effect between independent and dependent variables.

4.9 Discussion of key Findings

The key findings of the study are discussed in this section as per study objectives.

4.9.1 Infrastructure development

Infrastructure development was assessed using five measures and the overall mean score or responses regarding infrastructure development were 2.1 on a 5-point scale which indicates that majority of the respondents agreed that infrastructure development on trade facilitation in Kenya. The average overall standard deviation of 0.7 infers that 68% of the response was spread within one standard deviation of the overall mean. Further collinearity analysis was done and the results showed that infrastructure development had positive and significantly related to trade facilitation ($r = 0.456$, $p\text{-value}=0.00<0.05$).

4.9.2 Stakeholders cooperation

Stakeholders cooperation was assessed using five measures and the overall mean score or responses regarding stakeholders cooperation were 1.6 on a 5-point scale which indicates that majority of the respondents agreed that stakeholders cooperation affects the trade facilitation in Kenya. The average overall standard deviation of 0.66 infers that 68% of the response was spread within one standard deviation of the overall mean. Further collinearity analysis was done and the results revealed that trade facilitation had a positive and significantly related to trade facilitation ($r = 0.431$, $p\text{-value}=0.00<0.05$).

4.9.3 Customs documentations

Customs documentations was assessed using four measures and the overall mean score or responses regarding customs documentation were 2.5 on a 5-point scale which indicates that majority of the respondents agreed that customs documentation affects the trade facilitation in Kenya. The average overall standard deviation of 0.74 infers that 68% of the response was spread within one standard deviation of the overall mean. Further collinearity analysis was done and the results showed that customs documentations had a positive and significantly related to trade facilitation ($r = 0.458$, $p\text{-value}=0.00 < 0.05$).

CHAPTER FIVE

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

Introduction

Chapter five outlines the summary of this research, conclusions and recommendations based on research findings and suggestion of areas which may require further consideration as far as future research is concerned.

5.1 Summary of the findings

The findings of the study have been summarized below as per the study objectives. The findings were supported by the frequencies of the responses

5.1.1 Infrastructure development

The first objective of the study was to evaluate the effect of infrastructure on trade facilitation in Kenya. Methods used to arrive at the findings included descriptive statistics, analysis of variance and regression analysis. The study found out that infrastructure development had a significant positive influence on automation tax system. The overall mean score of responses regarding infrastructure development indicated that majority of the respondents agreed infrastructure development affects the trade facilitation in Kenya.

The reliability analysis results showed that all the coefficients of the constructs were positive and significant.

5.1.2 Stakeholders cooperation

The second objective of the study sought to find out` the effect of stakeholder cooperation on trade facilitation in Kenya. Descriptive statistics, regression analysis and analysis of variance were conducted. The study found out that stakeholder cooperation had a significant positive influence on trade facilitation.

The overall mean score of response regarding e-registration and automation tax system collection indicated that majority of the respondents agreed that stakeholder cooperation affects the trade facilitation in Kenya. Correlation results indicated that there was a positive and significant relationship between stakeholder corporation and trade facilitation. It was therefore concluded that stakeholder cooperation has significant positive effect on trade facilitation.

5.1.3 Customs documentations

The third objective of the study sought to investigate the effect customs documentation on trade facilitation in Kenya. Descriptive statistics, regression analysis and analysis of variance were conducted. The study found out that customs documentation had a significant positive influence on trade facilitation.

The overall mean score of response regarding customs documentation and trade facilitation indicated that majority of the respondents agreed that customs documentations affects the trade facilitation in Kenya. Correlation results indicated that there was a positive and significant relationship between customs documentation and trade facilitation. It was therefore concluded that customs documentation has significant positive effect on trade facilitation.

5.2 Conclusions

The aim of the study was to determine effect of factors affect trade facilitation in Kenya. Data collected and analyzed through both descriptive and inferential statistics established that all independent variables had significant effects on trade facilitation

5.2.1 Infrastructure development

The study found out that infrastructure development had a significant positive influence on trade facilitation. The overall mean score of responses regarding infrastructure development indicated that majority of the respondents agreed that infrastructure development affects the automation tax in Kenya. The reliability analysis results showed that all the coefficients of the constructs were positive and significant.

5.2.2 Stakeholder cooperation

The study found out that stakeholder cooperation had a significant positive influence on trade facilitation. The overall mean score of response regarding stakeholder cooperation and trade facilitation indicated that majority of the respondents agreed that stakeholder cooperation affects the trade facilitation in Kenya. Correlation results indicated that there was a positive and significant relationship between stakeholder cooperation and trade facilitation . It was therefore concluded that stakeholder cooperation has significant positive effect on trade facilitation,

5.2.3 Customs documentation

The study found out that custom documentation had a significant positive influence on trade facilitation. The overall mean score of response regarding customs documentation and trade facilitation indicated that majority of the respondents agreed that custom documentation affects the trade facilitation in Kenya. Correlation results indicated that there was a positive and

significant relationship between e-payment and trade facilitation. It was therefore concluded that customs documentation has significant positive effect on trade facilitation.

5.4 Recommendation

Based on the findings, investment in techniques of Trade Facilitation can enhance trade flows and therefore lead to economic growth. It is recommended that government agencies should initiate reforms that facilitate trade and aim at being coordinated with a lead agency. Governments should engage with the private sector and through dialogue and partnership Trade will be facilitated. Joint verifications, electronic data interchange will speed up communication on trade matters, Use of technology will boost documentation coupled with Business Process Review to get rid of unnecessary documentation

5.5 Recommendation for Further Research

The study sought to establish the factors influencing cross border trade facilitation in East Africa in a case study of the Malaba Border station. For future research, the researcher should examine other aspects that influence cross border trade facilitation. Further studies should also be carried out to establish whether there are similar results in other border stations in East Africa.

This study covered only basic financial literacy summed up with other variables in order to come up with the results. There is need to study a single variable e.g. the effect of custom documentation on cross border trade facilitation.

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Section B: Infrastructure Development and trade Facilitation

Please indicate the extent to which you agree with the following statements on infrastructural development and trade facilitation. The scale below will be applicable:

Key 1= Strongly Disagree 2 = Disagree 3 = Neutral 4 = Agree 5 = Strongly Agree

Infrastructural development	1	2	3	4	5
Infrastructural development results in reduced costs associated to movement of goods					
Infrastructure results in overall increase in trade flows'					
trade facilitation has a direct impact on total transportation costs					
Manufacturing enterprises are less likely to export in countries with poor infrastructure.					

Section C: Custom procedures and Trade Facilitation

Please indicate the extent to which you agree or disagree with the following statements on custom procedures. The scale below will be applicable:

Key 1= Strongly Disagree 2 = Disagree 3 = Neutral 4 = Agree 5 = Strongly Agree

	5	4	3	2	1
Proper valuation of goods and services has a significant influence on trade facilitation					
Maintaining and operating automated customs systems procedures are essential in enhancing trade facilitation					
Transparency, predictability and access to trade regulations and procedures enhance trade facilitation					
Non- discriminatory and uniformly administered customs rules and procedures influence trade facilitation					

Trade procedures play a role in implementing effective controls that secure revenue.					
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Section D: Custom Documentation and Trade Facilitation

Please indicate the extent to which you agree or disagree with the following statements on customs documentation and trade facilitation. The scale below will be applicable

Key 1= Strongly Disagree 2 = Disagree 3 = Neutral 4 = Agree 5 = Strongly Agree

	5	4	3	2	1
Customs administrations are faced with ever-rising volumes of trade documents					
Adoption of intergrated customs management systems enhances trade facilitation.					
Documentation at the customs aids in expediting trade flow by simplifying trading formalities and procedures					
Double documentation at the Namanga Border station has facilitated trade.					

Section C: Trade Facilitation at the Namanga Border Station

Please indicate the extent to which you agree or disagree with the following statements on trade facilitation. The scale below will be applicable:

Key 1= Strongly Disagree 2 = Disagree 3 = Neutral 4 = Agree 5 = Strongly Agree

	5	4	3	2	1
Increased facilitation of trade results in improved economic growth for countries					
Trade facilitation is recognized as a key driving factor in determining export competitiveness of a country					
Organizations engaged with cross border trade need to verify that all procedures are characterized within the timeframe.					
Delays in the customs procedure of the supply network can affect other operations in the border points					

Thank you for your cooperation!