E-GOVERNMENT AND THE PERFORMANCE OF SMALL AND MEDIUM ENTERPRISES IN KISUMU COUNTY CENTRAL BUSINESS DISTRICT, KENYA

BY

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NOVEMBER 2016
DECLARATION

I, the undersigned, declare that this is my original work and has not been submitted to the University of Nairobi or any other college for academic credit

Sign…………………………… Date……………………………

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D61/71905/2014

DECLARATION BY SUPERVISOR

This research proposal has been submitted with my approval as the University of Nairobi supervisor.

Sign…………………………… Date……………………………

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ACKNOWLEDGEMENT

I give praise to the God the Almighty for bestowing upon me best of health, understanding and providence which made it possible for me to carry out this project. His name is glorified forever.

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DEDICATION

I dedicate this work to my entire family; Sabina, Alloys, Winfrida, Jael, Aunties Winnie and Mary, Rebecca, Brian, Edna, George for your support throughout the long passage in search for knowledge. Special dedication goes to my mom, Rosa, who inspired and gave me spiritual and financial support to settle and do this study and my late dad, Meshack, for laying firm foundation for me that has seen me this far.
ABSTRACT

The Small and Medium Enterprises (SMEs) sector plays significant role in the economy of Kenya particularly as far as establishment of employment opportunities is concerned. E-government has the capability to speed up transformation, improve delivery of service and boost information transmission in the governments/public institution administration. The motivation behind the research was to establish the relationship between E-government on the performance of Small and Medium Enterprises (SMEs) in Kisumu County Central Business District (CBD), Kenya. Descriptive cross-sectional research was the nature of the study, with population target being 332 registered and active business enterprises operating within Kisumu County CBD. The SMEs were stratified according to business type and then from each stratum, a representative number of businesses were purposively sampled. A sample size of 77 SMEs were picked of which the researcher received 53 responses from respondents to whom the questionnaires were administered. The primary data collected through questionnaires were analyzed using SPSS and to summarize the findings, descriptive statistics and correlation analysis were applied. The findings revealed notably low adoption rate and moderate use of E-government platforms with iTax being the highly adopted and utilized E-government platform while the least adopted and used being eProcurement. According to the findings, E-government platforms have effect on the performance of the SMEs in Kisumu County CBD. The study recommends that the National and County Governments develop clear strategies that will enable seamless implementation of E-government in all their public service delivery then conduct joint mass sensitization and offer incentives for use of E-government especially among business enterprises. SMEs on the other hand should also adopt and use E-government platforms as it can help reduce operational costs incurred while accessing public services and enhance sustainable profitability.
TABLE OF CONTENTS

DECLARATION........................................................................................................................................... i

ACKNOWLEDGEMENT............................................................................................................................. ii

DEDICATION................................................................................................................................................ iii

ABSTRACT.................................................................................................................................................... iv

LIST OF TABLES........................................................................................................................................... viii

LIST OF FIGURES........................................................................................................................................ ix

LIST OF ABBREVIATIONS.......................................................................................................................... x

CHAPTER ONE : INTRODUCTION.............................................................................................................. 1

1.1 Background of the Study ...................................................................................................................... 1

1.1.1 E-government ................................................................................................................................ 4

1.1.2 Performance of SME ....................................................................................................................... 5

1.1.3 Kisumu County CBD ....................................................................................................................... 6

1.2 Research Problem ................................................................................................................................ 7

1.3 Objectives of the Study ....................................................................................................................... 9

1.4 Value of the Study ............................................................................................................................... 9

CHAPTER TWO : LITERATURE REVIEW .................................................................................................. 10

2.1 Introduction.......................................................................................................................................... 10

2.2 Theoretical Framework ...................................................................................................................... 10

2.2.1 Diffusion of Innovation Theory (DOI) ............................................................................................ 10

2.2.2 Theory of Reasoned Action (TRA) ................................................................................................. 12

2.2.3 Technology Acceptance Model (TAM) ......................................................................................... 13

2.3 E-government in Organisations ......................................................................................................... 14
2.3.1 Benefits of E-government ........................................................................ 15
2.3.2 Challenges to E-government .................................................................... 16
2.4 Empirical Literature Review ........................................................................ 18
2.5 Summary of Literature Review .................................................................... 21
2.6 Conceptual Framework .................................................................................. 22

CHAPTER THREE : RESEARCH METHODOLOGY ............................................ 23

3.1 Introduction .................................................................................................... 23
3.2 Research Design ............................................................................................. 23
3.3 Population ........................................................................................................ 23
3.4 Sample design .................................................................................................. 24
3.5 Data Collection ................................................................................................ 25
3.6 Data Analysis ................................................................................................... 25

CHAPTER FOUR: DATA ANALYSIS, FINDINGS AND DISCUSSIONS .......... 26

4.1 Introduction .................................................................................................... 26
4.2 Response Rate .................................................................................................. 26
4.3 Descriptive statistics on general information .................................................. 26
4.4 Descriptive Statistics on E-government ........................................................... 30
4.5 Correlation Analysis ......................................................................................... 33
4.6 Regression Analysis ......................................................................................... 35
4.7 Discussion ......................................................................................................... 37

CHAPTER FIVE : SUMMARY, CONCLUSIONS AND RECOMMENDATIONS.. 40

5.1 Introduction .................................................................................................... 40
5.2 Summary .......................................................................................................... 40
5.3 Conclusion ........................................................................................................ 41
5.4 Recommendations ........................................................................................... 41
5.5 Limitations of the Study ................................................................. 42
5.6 Suggestion for Further Studies ...................................................... 42
REFERENCES .................................................................................43

APPENDICES ...............................................................................I

Appendix A: Questionnaire ................................................................I
Appendix B: SME Target Population ..................................................IV
Appendix C: Introductory Letter ........................................................V
LIST OF TABLES

Table 4.3:1 Gender of the respondent......................................................................................... 27
Table 4.3:2: Age bracket of the respondent.................................................................................. 27
Table 4.3:3 Level of Education..................................................................................................... 28
Table 4.3:4 Position held in the organization ............................................................................... 29
Table 4.3:5 Duration of active business operation in years ......................................................... 29
Table 4.4:1 Descriptive statistics on E-government adoption ..................................................... 31
Table 4.4:2 Descriptive statistics on E-government frequency of use........................................ 32
Table 4.5:1 Correlation between E-government and SMEs performance ................................. 33
Table 4.6:1 Model summary ......................................................................................................... 35
Table 4.6:2 ANOVA Results ........................................................................................................ 35
Table 4.6:3 Coefficients of Determination .................................................................................. 36
LIST OF FIGURES

Figure 2.2.1:1 Diffusion of Innovation Theory (DOI) .................................................. 11
Figure 2.2.2:1 Theory of Reasoned Action (TRA) .................................................... 12
Figure 2.2.3:1 Technology Acceptance Model (TAM) ............................................. 13
Figure 2.6:1 Logical framework .............................................................................. 22
### LIST OF ABBREVIATIONS

<table>
<thead>
<tr>
<th>Abbreviation</th>
<th>Description</th>
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<tbody>
<tr>
<td>CBD</td>
<td>Central Business District</td>
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<tr>
<td>DOI</td>
<td>Diffusion of Innovation Theory</td>
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<tr>
<td>G2B</td>
<td>Government-to-business</td>
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<tr>
<td>G2C</td>
<td>Government-to-citizen</td>
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<tr>
<td>G2E</td>
<td>Government-to-employee</td>
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<td>G2G</td>
<td>Government-to-government</td>
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<tr>
<td>GDP</td>
<td>Gross Domestic Product</td>
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<tr>
<td>ICT</td>
<td>Information and Communication Technology</td>
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<tr>
<td>IFMIS</td>
<td>Integrated Financial Management information system</td>
</tr>
<tr>
<td>KNBS</td>
<td>Kenya National Bureau of Statistics</td>
</tr>
<tr>
<td>OECD</td>
<td>Organisation for Economic Co-operation and Development</td>
</tr>
<tr>
<td>PEOU</td>
<td>Perceived Ease of Use</td>
</tr>
<tr>
<td>PU</td>
<td>Perceived Usefulness</td>
</tr>
<tr>
<td>SACCO</td>
<td>Savings and Credit Cooperative Organization</td>
</tr>
<tr>
<td>SME</td>
<td>Small and Medium Enterprise</td>
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<tr>
<td>SPSS</td>
<td>Statistical Package for Social Sciences</td>
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<td>TAM</td>
<td>The Technology acceptance model</td>
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<td>TRA</td>
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CHAPTER ONE: INTRODUCTION

1.1 Background of the Study

The rapid advancement of information and communication technology (ICT) has intensified mankind’s urge to gain computerised support to resolve complicated problems; those that awhile back were viewed to be exclusively in mankind’s thought process, especially in enterprises. These desire to access services economically; faster and with convenience render it necessary to formulate appropriate steps for the formation, management and exploitation of information systems in organizations (Hassan & Wang, 2015). Due to the ever-changing citizens’ demands coupled with shifting worldwide procedures and legislations, counties are tasked to deliver public services in timely and with quality in mind (Nkwe, 2012). Governments are confronting the citizen-demand by re-engineering their procedures and ultimately Information and Communication Technology (ICT) is critical and forms foundation for projected solution. Gradually, E-government is amassing support worldwide and presents a complete shift from the customary procedures in public management (Monga, 2008). More and more governments worldwide in their drive to enhancing service delivery, reducing transaction costs for residents and enhancing competence and effectiveness at county and national levels of the public institutions are introducing E-government. It has been documented that 93.23% members of UN declared that they have advanced strategies to execute E-government and therefore amongst the top concerns for governments worldwide is E-government (UN, 2008).
Small and Medium Enterprises (SMEs) can be considered a lifeblood of most economies and are regarded as one of the vital drivers of socioeconomic growth in the African perspective. They characterize the bulk of companies in a given nation, generate prosperity, employment and broadly reckoned as catalyst enhance competitiveness of a country. They are also hailed for supporting community’s sustainable developments in addition to economic growth (Pelham, 2000). Despite their significance, SMEs usually encounter unique challenges; challenges that come on the way of their profitability and expansion. These lessen the SMEs capacity to effectively sustain the growth. IFC (2011) identified these challenges namely the absence of creative capability and experience, insufficient skill sets and knowledge, technological challenges, insufficient data on industry and difficulties in accessing credits. Historical statistics show that 3 out of 5 enterprises flop within the initial months of business operation and another 80 percent flop along the way prior to the 5th year (Kenya National Bureau of Statistics, 2007). A study conducted by Deloitte portrayed the deliberate employing ICT usage; majorly E-government can be capable of drastically reducing the time, finances and effort that enterprise must commit to fulfil the procedures and legislation (Deloitte Research study, 2003). This can be through diverse means for instance by; offering data in single accessible domain; making simple services delivery to companies; enhance communication among government agencies and with businesses; making it easy for companies to find data and service from the government units; doing transactions (obtaining permits, paying fees) easier; and more convenient, effective and less costly. Businesses using E-government services successfully could enjoy some strategic gain.
A fundamental prerequisite for the efficacious execution of the ICT systems like E-government is an individual acceptance of new innovation. Numerous schools of thought have been advanced in order to give explanation to the concept of Information and Communication Technology applications and systems adoption. Some of these theories and models are aimed at highlighting determinants of ICT applications and systems adoption within an organisation. The theories and models that can be examined may include but not limited to; technology acceptance model, the theory of planned behaviour, unified theory of acceptance and use of technology, the theory of reasoned action, diffusion of innovations.

Kenya has forty seven counties and Kisumu County is one of them. To the Southern part it is bordered by Homa Bay County, to the North East by Nandi County, Kericho County on the Eastern, to the North West by Vihiga County and Siaya County to the Western side. Kisumu county has it’s headquarter in Kisumu city; the third largest city in Kenya after Mombasa and Nairobi. Kenya National Bureau of Statistics documents Kisumu’s population as per the last conducted Population and Housing Census in 2009 to be approximately 968,909 people where 474,687 are males and 494,222 are females. It has seven (7) sub-counties as follows: Kisumu Central, Nyando, Kisumu East, Seme, Kisumu West, Nyakach and Muhoroni with thirty five (35) administrative wards in total. The main economic activities include fishing, farming, mining, tourism and manufacturing and it serves as main centre of trade and transport for western Kenya with its elaborate railways, road networks, airport and airstrips. Kisumu County consequently, is tipped to be the economic hub for the Western Kenya region especially with the plan to improve its railway lines to link with Kisumu International Airport.
1.1.1 E-government

E-Government, according to World Bank (2015), refers to the government usage of information and communication technologies (ICT) that is capable of transforming interaction with citizens, enterprises and other units of government. The resultant gains can be greater transparency, increased convenience, less corruption, growth in revenue, and/or reductions of costs. This was the definition that the study adopted. E-government is defines the employing of ICT to enhance service-delivery in public administration and to increase citizen involvement in democratic administration (Davies, (2015). OECD defines Electronic government as ICT deployment, and principally over the internet, as an instrument to attain improved governance (OECD, 2003). Therefore, E-government is more of business unusual, it puts emphasis on ICT deployment to revamp the configurations, processes and most prominently the government culture. E-government is one of the key focuses of the Kenyan Government in the direction of attaining of countrywide growth objectives and goals for creation of job, as per Kenya Vision 2030. In Kenya the programme was launched in June 2004. It has subsequently dedicated itself in the direction of achieving an operational and effective E-government to assist improved and efficient provision of information and services to the populations, uphold throughput among public employees, inspired involvement of residents in Government and gave power to Kenyans (IST-Africa, 2014).

OECD (2006) examined thoroughly initiatives in E-government for the members states then enumerated the benefits of E-government as: improved competence in handling enormous amount of information; enhanced service delivery taking into consideration users’ requests; adding up to countrywide reforms by ensuring improvement in
transparency, simplifying sharing of information and emphasizing inner discrepancies; and helping trust building between citizens and governments, a vital factor in better governance by making use of internet-based policies to ensure involvement of citizens in the strategy process, exemplifying government accountability and transparency.

Although it is obvious that E-government and Information and Communication Technology, are dominant catalyst of wealth generation and development, there still remains various hindrances which impede the exploitation and exploration of its prospects. These hindrances can be in relation to ICT infrastructure, procedures, human resources improvement, management of change, alliance and partnership, management and strategy (Abdelkader, 2015).

1.1.2 Performance of SME

Definitions of Small and Medium Enterprises often differ depending on a country and are usually founded on the total employees, the annual income or the value of business assets. Typically, small enterprises have ten (10) to one hundred (100) staff and medium enterprises are those with one hundred (100) to two hundred and fifty (250) staff (International Labour Office, 2015). This was the definition that was adopted for this study.

Performance is an extensively used concept in various areas. Typically, performance is a measure of the manner in which a process/mechanism attains its intended goal. In business administration, Moullin (2003) outlines a performance as “how well the business is administered” and “the value addition by the organization to the clients and other shareholders.” Assessing corporate performance in current economic setting is a
vital issue for academicians and practising administrators. Every organization has performance or success indicators which help assess progress in achieving goals and objectives whilst benchmarking against other businesses within its industry. Regular metrics used in determining enterprise performance are margin, yield on asset, turnover, number of clients, quality of design and improvement of product (Wood, 2006). Small and Medium Enterprises are often very unwilling to openly disclose their genuine monetary performance, and academics have reflected upon the necessity of subjective metrics (like Likert scale in practical study) while assessing enterprises performance. For the purposes of this research, the quantifiable measures adopted to assess the performance of SMEs were monthly net profit, revenue growth and employee turnover rate.

1.1.3 Kisumu County CBD

Kisumu County is one of the forty seven counties in Kenya. It lies within longitudes 33° 20’East and 35° 20’East and latitudes 0° 20’South and 0° 50’South. To the Southern border it has Homa Bay County, North East by Nandi County, Kericho County on the Eastern, to the North West by Vihiga County and Siaya County to the Western side. The county has 567 km² covered by water a cumulative land area of 2009.5 km². Its population density was 847 persons per km² according to the 2009 Population and Housing Census (County Government of Kisumu, 2013). Kisumu County consequently is tipped to be the economic hub for the Western Kenya region especially with the plan to improve its railway lines to link with Kisumu International Airport. There have been few published studies on SMEs within Kisumu CBD and specifically on the influence of E-governance of the Small and Medium Enterprises.
1.2 Research Problem

E-government has the capability to speed up transformation, improve delivery of service and boost information transmission in the government administration as shown by previous researches (Njuru, 2011; Ndou, 2004; OECD, 2006). E-government helps to reduce administrative costs that enterprises incur to comply with requirements for registration established by government legislation. This is achieved through making services quicker and less costly for enterprises to fulfil their commitments, such as paying taxes or applying for various permits. Reduction of effort and time is made possible due to the expediency and speed of online delivery of information, the incorporation of ICT tools and processes (Davies, 2015). However, there are numerous hindrances that can disrupt advancement towards recognizing the promise of E-government including challenges related to Information and Communication Technology infrastructure, issues of privacy, security, policies and regulations, personnel issues, digital-divide, cultural, leadership and management support (Abdelkader, 2015; Lam, 2005; Basu, 2004).

The Small and Medium Enterprises (SMEs) sector plays significant role in the economy of Kenya particularly as far as establishment of employment/jobs is concerned. Despite the observable increase in number of SMEs in Kenya, on the contrary high business failure, loan defaulting and non-compliance rate of these enterprises have been also noted (Kenya National Bureau of Statistics, 2007; SACCO Societies Regulatory Authority, 2014). These SMEs depend on public institutions to provide them with services like processing and issuance of travel passports, business permits, land title deeds, driving licenses, tax-compliance services, registrations of their business start-ups, offer government tenders, social security administration, and offer avenue for settling utilities
bills. These enterprises expect quicker, effective and efficient delivery of the services. However, some of these public institutions are still characterized by enormous paperwork, bureaucracy, longer queues, and overcrowded spaces marred with a lot of frustrations (Nkwe, 2012). These public institutions are still using the manual systems in conducting their day to day operations. In some instances the role holders in these institutions are absent for longer periods yet they hold the exclusive rights to conduct particular business within their jurisdiction.

It is yet to be established to what extent the implementation of E-government in Kenya has had on performance of SMEs since only few foreign published studies were identified. The identified studies were about E-government’s effect on performance of Small and Medium Enterprises research conducted outside Africa (Devi, 2006; Mahmoudi, 2015). Other studies have focussed on the adoption of E-commerce, E-business, Information systems and performance of SMEs (Rumanyika & Mashenene, 2014, Ashhari et al, 2010, Shemi, 2012). This study therefore sought to fill the knowledge gap on the relationship between E-government and the performance of SMEs in Kisumu County CBD.

Thus, this survey sought to answer the question;

(i) Do SMEs in Kisumu County CBD use E-government platforms?
(ii) How often do SMEs in Kisumu County CBD use E-government platforms?
(iii) What is the effect of E-government platforms on the performance of SMEs?
1.3 Objectives of the Study

The general objective of this research study was to investigate the relationship between E-government and the performance of SMEs in Kisumu County CBD.

Specifically to:-

(i) Establish the adoption rate of E-government platforms by SMEs

(ii) Determine the extent to which SMEs are using E-government platforms

(iii) Establish the effect of E-government platforms on the performance of SMEs

1.4 Value of the Study

To the SMEs, the study was to identify the challenges and possible benefits of adopting E-government platforms in the operationalizing their businesses. This can in turn facilitate informed industry interventions to resolve the challenges identified.

The results of the study are useful to the Government and policy makers in formulating policies and developing regulatory frameworks for SMEs especially where E-governance is concerned.

The study helps Government agencies to gain insight on the E-governance adoption issues and help them identify training and sensitization programmes for its citizens thus contributing to the ongoing governance reforms in the country.

Lastly, to the scholars, the study contributes to the existing bodies of knowledge, especially on E-government in Kenya. It was also intended to inspire future researchers to replicate the study in other segments of the economy and in other regions.
CHAPTER TWO : LITERATURE REVIEW

2.1 Introduction

This chapter examined literature that was already in existence regarding E-government and SMEs and their relationships. It presented an overview of prior work on related thematic areas that provided the necessary background for the purpose of this research. The sections covered theoretical framework, empirical literature, overview of E-government, benefits of E-government, challenges of E-government and relationship between E-government and performance of SMEs. The final section summarized the Literature Review.

2.2 Theoretical Framework

Numerous schools of thought have been advanced to try and explain the concept of E-government adoption. Some of these theories and models informing this study were outlined under this section and which was aimed at highlighting determinants of adoption of E-governments by SMEs in Kenya with specific reference to Kisumu County CBD. The theories examined by this study were; the theory of reasoned action, diffusion of innovations and the technology acceptance model.

2.2.1 Diffusion of Innovation Theory (DOI)

DOI has been slowly but surely customized and developed, Rogers (1995) finally refined the model overtime. The procedure of innovation acceptance is depicted by Rogers (1995) as “the process via which an enterprise carry forth from initial information of an
innovation, to creating an outlook towards the innovation, to a resolution to accept or refuse, to execution of the new idea”, and that the consciousness of character of an innovation has an effect upon the intention of the person to usage the technology (Rogers, 1995). Innovation circulation is reliant upon the relative complexity, advantage, trialability, compatibility and observability as illustrated in figure 2.2.1.1. The dissimilarity in the theories of innovation proposes that an innovation contributing superior relative advantages, triability, compatibility, observability and lower complexity will be distributed earlier.

**Figure 2.2.1:1 Diffusion of Innovation Theory (DOI)**

![Diffusion of Innovation Theory (DOI)](Source: Google images)
2.2.2 Theory of Reasoned Action (TRA)

Lean et al. (2009) consider that Theory of Reasoned Action (TRA) is singled out to incorporate evaluation of individual actions towards the employment and adoption of computers. The theory states that it is convictions that influence the intent of humans, and intention persuades the action of humans (Belanger and Carter, 2008). It portrays that deeds is theme to individual attitudes and personal norms, and defined as “an person’s positive or negative judgment (evaluative effect) about performing the intended deeds” (Fishbein and Ajzen, 1975; p. 216). Subjective norm is “the individual’s discernment that majority of people s/he considers important to her/him think s/he should or should not perform the deeds in question” (Fishbein and Ajzen, 1975; p. 302). The below figure illustrates the theory of reasoned action.

Figure 2.2.2: Theory of Reasoned Action (TRA)

Source: Google images
2.2.3 Technology Acceptance Model (TAM)

The Technology acceptance model (TAM) is adapted and transferred from the TRA to the field of information systems. The outlook of a person is at the centre of Technology acceptance model, and its emphasis is on personal intent to utilize, as well as the real usage of the technology. Benbasat & Barki (2007) believe that TAM is the largely extensively acknowledged and utilized model within the narratives, including information systems. Two psychological dimensions, Perceived Usefulness (PU) and Perceived Ease of Use (PEOU) and the outcome upon person outlook toward the definite utilization of the technology are thought within TAM as illustrated in figure 2.2.3.1. Perceived Usefulness (PU) is known as “the extent to which an individual considers that utilizing a particular system would improve his or her job performance”. Perceived Ease of Use (PEOU) is defined as “the extent to which an individual considers that utilizing a specific system would be liberate the effort” (Davis, 1989; p. 320).

Figure 2.2.3:1 Technology Acceptance Model (TAM)

Source: Google images
2.3 E-government in Organisations

E-government delivers services to those authorised to conduct transactions electronically with the government. Its functions can be categorised into four classifications below:-

The first category of E-government services is Government_to_citizen (G2C). Most of public institution services fit in this class, with the aim of offering citizens and enterprises with all-inclusive electronic provisions to sort individuals’ normal frequent concerns and transactions with the government. In the application of the G2C idea, clients have convenient and instant access to services plus needed information from government everywhere at any time, through exploiting numerous means.

G2B is the next most used concept of E-government. Government_to_business has the capability to enhance substantial competences to both public administration and enterprises. Government_to_business comprise numerous services transacted between enterprises and the government, comprising circulation of memos, policies, rules and legislations. Enterprise services provided include procurement of up-to-date enterprise information, downloading application documents, filling taxes, new regulations, renewing their licenses, registration of businesses, procuring permits and numerous others. Fang (2002) maintained that G2B model dynamically propels e-transaction initiatives like the electronic marketplace development for government procurements and e-procurement; and conduct government procurement bids via electronic methodologies for exchange of goods and information.

The category coming third is Government-to-government (G2G), which is the communications over internet between various government agencies, departments and organisations over a super - government database. Government-to-government
advancement is for improvement and enhancement of inter-administration managerial procedure by reorganizing coordination plus cooperation.

The fourth and last category is G2E, this is the lesser segment of e-government in the governance. Government-to-employee is the model that defines association between the government and its staff only. The objective of this association being attending to staff and provide services over the internet such as application of annual leave online, checking for the leave balance, and go through salary payslips, amongst other services (Seifert, 2008).

2.3.1 Benefits of E-government


E-government can assist enhance efficiency in public organisation and improve online access to quality service and information, enables the services delivery to residents and enterprises at their convenience and on their terms, instead of adapting to the logic of government structures internally (OECD, 2006). Besides saving scarce resources, execution of e-government also significantly increase the service levels by reducing bureaucracy.

Successful initiatives of E-government provide concrete opportunities that may include: revolution of burdensome public management and delivery of service processes thus enhance efficiency of public institutions, empowerment and involvement of residents
which in the long-run reinforces democratic progressions, uphold greater accountability and transparency (Kitaw, 2006).

E-government services are also often thought of as a way of decreasing corruption by eradicating intermediaries between the residents and the real service provision in addition to decreasing government carbon footprint by decreasing paper-based processes and travel.

E-government offers the chance to lessen administrative burdens that is; the charges that enterprises incur to fulfil requirements for registration put in place by government legislation. These charges can be decreased by hastening and making it less expensive for enterprises to realize their commitments, such as paying taxes or applications for permits. Reduction of effort and time is made possible since the rapidity and convenience of provision of information over internet, the amalgamation of ICT processes and tools (Davies, 2015).

Overall, the benefit of adoption and successful execution of E-government can ensure effectiveness, efficiency and productivity in public administration on one end and on the other reduces costs and time taken to access public services by citizens and businesses.

2.3.2 Challenges to E-government

First, there are barriers which are due to legislations mostly due to; the absence of an appropriate legislative structure which handles tendering of documents electronically, liabilities emergent from documents done electronically, and counter-checking documents value electronically against documentations manually. Also in order to provide proof of identity and reliability of document electronically, globally recognized structure is not available to handle such (Abdelkader, 2015). Additionally, legal hurdles,
for instance physical assessments, the need for being present physically, examinations and inspections, this impede conversion to complete ability to offer services electronically, because some procedures still have to be handled manually (Vassilakis et al., 2005).

Numerous researchers have discovered that privacy and security factors impact the extent of E-government acceptance, because these controls the extent of trust between the citizens and the government (Lam, 2005). The apprehension about the misappropriation of personal data divulged on the internet, the safeguarding of information, and the usage of fiscal transactions done online grown into a weighty issue in development of e-government systems in the governmental context (Vassilakis et al., 2005).

Consequently, unsatisfactory confidence by residents in online services restricts the intent to utilize E-government applications (Belanger & Carter, 2008), hence tools for security of data have are vital element of systems of digital-government. Basu (2004) revealed that in evolving countries, most residents are so more concerned with confidentiality and privacy issues they choose to forego e-government offerings.

Countries also encounter the hurdles presented by the partial digitization in expediting the countywide access over-the-internet services in addition to assurance that all residents obtain appropriate internet and computer skills. This is further made worse by the fact that the rate of illiteracy and poverty is still high in the country and which impacts on possible technological advancement. Vast areas within Kenya are also not connected to electricity or solar power thus hindering implementation of digitization in some areas within the country.
2.4 Empirical Literature Review

Small and Medium Enterprises (SMEs) are very pivotal in economic growth because they have been the major foundation of employment creation and increase production, both in developed in the same manner as in developing states (Love & Roper, 2013). The non-formal businesses generated approximately 625,900 new employments in 2013 equivalent of 84.3 percent of all latest employments (KNBS, 2014); The Trade and Industry Department of South Africa approximated the cumulative economic yield of Small and Medium Enterprises in the country approximated at 50 percent of Gross Domestic Product and offers jobs to about 60 percent of the work force; Small and Medium Enterprises forms 98 percent of formal businesses, and which translate to approximately 18 percent of Ivory Coast’s nationwide GDP, whereas Unites States brags of having 99 percent of the businesses falling under the category of SMEs and in European Union it is 85 percent (Sakai, 2012).

It is however noted that despite their importance, historical data point out that 3 in 5 businesses flops in a span of first few months of active business operation and out of those that continue with operation, 80 per cent stop operations before the fifth year (Kenya National Bureau of Statistics, 2007). An analysis of Kenya National Bureau of Statistics Economic Surveys of 2013, 2014 and 2015 indicate that there was a decline in growth in informal sector employment from 10.29 per cent in 2013-2014 to 2.23 percent in 2014-2015. Further, Kiveu & Ofafa (2014) imply that there exists an increasing alarm over continual stagnation and reduction in growth of SMEs in Kenya. The expansion and continued existence of SMEs are endangered by hurdles that may possibly be present in the administration areas within the business. Numerous studies have highlighted major
hurdles, such as lack of experience in industry, missing technical knowhow, poor administrative skills, poor forecasting skills, and absence of skills in industry research, which are impeding SMEs success in developing states (Schwartz & Hornych, 2010). Fumo & Jabbour (2011) posits that legislative and regulatory issues are also hurdle that Small and Medium Enterprises are faced with. Small and Medium Enterprises proprietors may often not be aware of the legislations and as a consequence, may find themselves incurring penalties and fines. This situation is aggravated by poor and inadequate service offered by some public institutions relevant to SMEs.

In the earlier period, delivery of service methodology of the government agencies left much to be desired. Overcrowded spaces; untidy atmosphere; impolite employees and their persistent absenteeism; demands for self-satisfaction; incompetence at job; extended queues; procrastinating officers; bureaucratic complications; among others, were some of the detrimental features of the operations of the government agencies. Consequently, a trip to government agency by a resident to access any public service was a traumatic experience. With the increasing knowledge amongst the nation and their better familiarity with the private sector; the requirement for superior services on the part of government agencies became more prominent. The combination of Information and Communication Technology has played an outstanding role in tackling such a demand (Monga, 2008).

E-Government is an enabler of transformation and can be a strong provider for the attainment of governmental policies. It can computerize, transform, and make available new insights; it handles the course of action, with data and with individuals. It is capable of facilitating a stronger role for the nationals in their dealings with all ranks of government and rise above the aggravation arising from interrelation with the range of
vertical organization that governments depend on to execute their strategies; agencies and programmes (Mahmoudi, 2015). The benefits of E-government include long-term reduction of operational costs and enhanced quality of service (Kaisara & Pather, 2009). These costs reduction are manifested in reduced trips to government offices, reduced kickbacks for services, reduced time spent in processing that are now redirected to useful business operations. The quality of service is enhanced by receiving accurate, timely and faster services from the government agencies.

An observation was made that government of Kenya has put emphasis on access to PCs in most of governmental agencies (Kashorda, 2009). According to UN E-Government survey 2014, an evaluation of the e-involvement structures in public portals and community networking websites, a worldwide standing recognized Kenya, Tunisia and Morocco being the countries within Africa in the top 50; on the online service delivery rankings, leading the pack was Rwanda which globally was ranked 63rd, Kenya was ranked 79th and Ethiopia 72nd under low-income category in 2014. Open government data portal are only found in Kenya, Ghana, Morocco and Tunisia amongst Africa countries. Making SMEs aware of this digital revolution is not just about increasing their incomes, it concerns generating employment plus growth. During this new age of digital technology, no enterprise will flourish devoid of proper usage of Information and Communication Technology platform for instance E-government. Kozak, (2011) posits that SMEs can grow 2 to 3 times more rapidly when they adopt and use technology. Since E-government is an inevitable emerging platform it is recommended that enterprises should adopt and use it to help reduce costs incurred while accessing public services and ensures sustainable profitability.
2.5 Summary of Literature Review

Small and Medium Enterprises are considered the “lifeblood of contemporary economies” generating even more employments than those created by their larger counterparts and contributing considerably to their countries’ of operations GDP as documented in the literature reviewed (Love & Roper, 2013) and that the impact in economy vary from one country to another (Mutwiri & Mingaine, 2014). Despite these significant contributions, the literature reviewed indicates that the SMEs face sustainability problems due to a myriad of challenges that hinder their growth (Schwartz & Hornych, 2010; Fumo & Jabbour, 2011).

The previous studies reviewed point out that E-government can enhance the service delivery quality provided by public institution and in effect in enhance performance of organisations that transact with the governments (Njuru, 2011; Kaisara & Pather, 2009; Mahmoudi 2015). Numerous studies undertaken worldwide have shown an increasing focus on E-government implementation by various countries including Kenya (Mahmoudi, 2015; Kashorda, 2009). Kozak, (2011) posits that SMEs can grow 2 to 3 times more rapidly when they adopt and use technology.

It is however notably noted that there are limited published studies on the effect of E-government on performance of Small and Medium Enterprises. The identified studies were about E-government’s effect on performance of Small and Medium Enterprises research conducted outside Africa (Devi, 2006; Mahmoudi, 2015). Other studies have focussed on the adoption of E-commerce, E-business, Information systems and performance of SMEs (Rumanyika & Mashenene, 2014; Shemi, 2012).
2.6 Conceptual Framework

The study focused on establishing relationship between adoption of E-government and the performance of SMEs in Kisumu County CBD. The independent variables were based on specific E-government model relating to SMEs that was Government to Business (G2B). The dependent variables were the indicators of performance of SMEs namely; monthly net profit, revenue growth and employee turnover rate. The conceptual framework was presented in Figure 2.6.1 below.

Figure 2.6:1 Logical framework

<table>
<thead>
<tr>
<th>Government to Business online services</th>
<th>SME Performance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Filling tax return (iTax)</td>
<td>Monthly net profit</td>
</tr>
<tr>
<td>Business registrations, permits &amp; licenses</td>
<td>Revenue growth</td>
</tr>
<tr>
<td>E-procurement</td>
<td>Employee turnover rate</td>
</tr>
<tr>
<td>Travel visa, passport &amp; work permit</td>
<td></td>
</tr>
<tr>
<td>Land rates &amp; title deed transactions</td>
<td></td>
</tr>
<tr>
<td>Payment of utility bills</td>
<td></td>
</tr>
<tr>
<td>IFMIS</td>
<td></td>
</tr>
</tbody>
</table>

Source: Researcher (2016)
CHAPTER THREE : RESEARCH METHODOLOGY

3.1 Introduction

This Chapter addressed the research methodology that was used during the study. The section entailed; research design, population, sample design, data collection and data analysis.

3.2 Research Design

The study was descriptive cross-sectional survey research. According to Saunders et al (2009), descriptive research is a study for which the objective is to offer an accurate depiction of individuals, happenings or conditions at a particular point in time. Therefore, this research design was appropriate for this study since the main objective was to establish the relationship between adoption of E-government and the performance of Small and Medium Enterprises (SMEs) in Kisumu County CBD.

3.3 Population

The research’s target population comprised a sum of 332 registered and operational enterprises operating within Kisumu County CBD. The businesses include retailing, fashion business, hardware, telecommunication; hotels, tours and travels businesses among others. The unit of study was SMEs with the respondents being the various SMEs proprietors and managers of the sampled SMEs.
3.4 Sample design

Conducting research on entire population may be challenging hence it is only practical to draw sample size from population targeted by a study. Yamane model was successfully used by Abayo & Oloko (2015) to draw sample size from population they targeted to study; this research adopted the model. The formula and parameters used are as follows:-

\[ n_s = \frac{N}{1 + N(e^2)} \]

Using \( n_s \) as the size of the sample; \( N \) represent size of the population;

e- Precision level (at 0.90 confidence interval, \( e = 0.1 \))

In the study \( N = 332 \), thus;

\[ n_s = \frac{332}{1 + 332(0.1^2)} \]

\[ = 77 \text{ Respondents} \]

The SMEs were stratified according to their business type and then from each stratum, a representative number of businesses were purposively sampled.

Further, from every selected SME, the proprietor or any person entrusted with managerial duties or key functional responsibility was engaged as respondent for the study.
3.5 Data Collection

In this study, emphasis was given to primary data collection. The primary data was collected using questionnaire containing question which were both structured and semi-structured. The researcher issued the respondents with questionnaires directly to reduce the time to response and allow clarification of any doubt that the respondents might have regarding any questions at that time. This provided chance to expound on the topic and encourage respondents to give their genuine response. However, for respondents who had time constraints, online questionnaire were emailed for self-administration.

3.6 Data Analysis

To summarize observations and findings made from the study, descriptive statistics was used for data analysis. Correlation analysis was applied to assess the relationship between E-government and performance of SMEs in Kisumu County CBD, using the socioeconomic characteristics from the samples. Linear regression was conducted to test the relationship between E-government services as independent variables and gross monthly profit as a measure of SMEs’ performance which is the dependent variable.
CHAPTER FOUR: DATA ANALYSIS, FINDINGS AND
DISCUSSIONS

4.1 Introduction

This chapter presents analysis, findings and discussion with regards to the objective. The data collected was analyzed using descriptive statistics and correlation analysis. To present the findings; frequency distribution, mean, percentages and standard deviations were used. Finally the discussion tries to relate the results obtained to the literature that exists in the thematic area.

4.2 Response Rate

The response rate is important in that it helps the researcher to determine if the number of responses obtained out of the questionnaires issued is enough to form an opinion. The higher the number of respondents the reliable the information obtained and this study the researcher received 53 responses from sampled 77 SMEs respondents to whom the questionnaires were administered; which gave a rate of response of 68.8%. This was quite substantial for the analysis of data.

4.3 Descriptive statistics on general information

The following relates to the responses received from the respondents in regards to the demographics of the respondents and business information. This information included gender, age bracket, highest level of education and position held in the business. Length of operation of the business (in years) was also captured.
Table 4.3:1 Gender of the respondent

<table>
<thead>
<tr>
<th>Gender of the respondent</th>
<th>Frequency</th>
<th>Percent</th>
<th>Valid Percent</th>
<th>Cumulative Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Male</td>
<td>27</td>
<td>50.9</td>
<td>50.9</td>
<td>50.9</td>
</tr>
<tr>
<td>Female</td>
<td>26</td>
<td>49.1</td>
<td>49.1</td>
<td>100</td>
</tr>
<tr>
<td>Total</td>
<td>53</td>
<td>100</td>
<td>100</td>
<td></td>
</tr>
</tbody>
</table>

Source: Survey data (2016)

The findings in the above table 4.3.1 show the gender of the respondents. The research study established from the findings that bulk of the respondents were male as shown by 50.9%, while females were 49.1%.

Table 4.3:2: Age bracket of the respondent

<table>
<thead>
<tr>
<th>Age bracket(in years)</th>
<th>Frequency</th>
<th>Percent</th>
<th>Valid Percent</th>
<th>Cumulative Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>18-25</td>
<td>9</td>
<td>17</td>
<td>17</td>
<td>17</td>
</tr>
<tr>
<td>26-35</td>
<td>22</td>
<td>41.5</td>
<td>41.5</td>
<td>58.5</td>
</tr>
<tr>
<td>36-45</td>
<td>13</td>
<td>24.5</td>
<td>24.5</td>
<td>83</td>
</tr>
<tr>
<td>Above 46</td>
<td>9</td>
<td>17</td>
<td>17</td>
<td>100</td>
</tr>
<tr>
<td>Total</td>
<td>53</td>
<td>100</td>
<td>100</td>
<td></td>
</tr>
</tbody>
</table>

Source: Survey data (2016)

On the age of the respondents, the study findings indicate that 41.5% of the sampled respondent were in the age bracket between 26 to 35 years, 24.5% indicate their age
bracket to be between 36 to 45 years, 17.0% indicate their age bracket to be between 18 to 25 years; the same as those of age above 46 years.

### Table 4.3:3 Level of Education

<table>
<thead>
<tr>
<th>Level of education</th>
<th>Frequency</th>
<th>Percent</th>
<th>Valid Percent</th>
<th>Cumulative Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Secondary</td>
<td>3</td>
<td>5.7</td>
<td>5.7</td>
<td>5.7</td>
</tr>
<tr>
<td>Diploma</td>
<td>18</td>
<td>34</td>
<td>34</td>
<td>39.6</td>
</tr>
<tr>
<td></td>
<td>18</td>
<td>34</td>
<td>34</td>
<td>73.6</td>
</tr>
<tr>
<td>Undergraduate</td>
<td>14</td>
<td>26.4</td>
<td>26.4</td>
<td>100</td>
</tr>
<tr>
<td>Postgraduate</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Valid Total</td>
<td>53</td>
<td>100</td>
<td>100</td>
<td></td>
</tr>
</tbody>
</table>

Source: Survey data (2016)

According to the findings on highest level of education, 34.0% of respondents had an undergraduate degree; the same percentage had diploma, 26.4% of the respondents had postgraduate degree, while a small proportion of respondents as indicated by 5.7% had a secondary certificate.

This research survey also intended to investigate the position that the sampled respondents held the SMEs. From the findings as tabulated below, the respondents who were owner of the business were 52.8%, while 26.4% of the respondents were managers and staff members were represented by 20.8%.
Table 4.3:4 Position held in the organization

<table>
<thead>
<tr>
<th>Position held in the business</th>
<th>Frequency</th>
<th>Percent Valid</th>
<th>Percent Cumulative Valid</th>
<th>Percent Cumulative Valid</th>
</tr>
</thead>
<tbody>
<tr>
<td>Business Owner</td>
<td>28</td>
<td>52.8</td>
<td>52.8</td>
<td>52.8</td>
</tr>
<tr>
<td>Manager</td>
<td>14</td>
<td>26.4</td>
<td>26.4</td>
<td>79.2</td>
</tr>
<tr>
<td>Staff member</td>
<td>11</td>
<td>20.8</td>
<td>20.8</td>
<td>100</td>
</tr>
<tr>
<td>Valid Total</td>
<td>53</td>
<td>100</td>
<td>100</td>
<td></td>
</tr>
</tbody>
</table>

Source: Survey data (2016)

Table 4.3:5 Duration of active business operation in years

<table>
<thead>
<tr>
<th>For how long has the business been in operation [in years]</th>
<th>Frequency</th>
<th>Percent Valid</th>
<th>Percent Cumulative Valid</th>
<th>Percent Cumulative Valid</th>
</tr>
</thead>
<tbody>
<tr>
<td>Less than 1 year</td>
<td>5</td>
<td>9.4</td>
<td>9.4</td>
<td>9.4</td>
</tr>
<tr>
<td>1 to 3 years</td>
<td>17</td>
<td>32.1</td>
<td>32.1</td>
<td>41.5</td>
</tr>
<tr>
<td>4 to 7 years</td>
<td>12</td>
<td>22.6</td>
<td>22.6</td>
<td>64.2</td>
</tr>
<tr>
<td>7 to 10 years</td>
<td>7</td>
<td>13.2</td>
<td>13.2</td>
<td>77.4</td>
</tr>
<tr>
<td>Above 10 years</td>
<td>12</td>
<td>22.6</td>
<td>22.6</td>
<td>100</td>
</tr>
</tbody>
</table>

Source: Survey data (2016)

The respondents were required to indicate the duration of active business operation of the SMEs in years. The findings as shown on the table 4.3.5 above indicate that majority of
the SMEs represented by 32.1% had been in operation between 1 to 3 years, a tie of 22.6% for those between 4 to 7 years and those above 10 years. SMEs that have been in operation for 7 to 10 years were 13.2% whereas those that operated for less than a year were 9.4%.

4.4 Descriptive Statistics on E-government

The respondents were requested to select the E-government services they have ever accessed online from a list of available online E-government services. This was to help the researcher determine the extent of E-government adoption by the SMEs in Kisumu County CBD and the findings is as per table 4.4.1 below.

For the researcher to establish the extent of E-government use the respondents were requested to indicate the frequency of use of E-government and the results has been displayed in table 4.4.2 below.

According to the findings from the research on the adoption of E-government, the mean score for those who have done online registration of business was 1.68, those who have applied or renewed travel visa or passport was 1.64, those who have applied or renewed business licenses online was 1.70, those who have ever accessed E-Procurement was 1.72, those who have ever accessed to NSSF Portal had a mean score of 1.62, respondents who have ever accessed NHIF online was represented by a mean score of 1.42, those who have ever accessed iTax was indicated by mean score of 1.11 and finally those who have ever accessed utilities transaction online was 1.25.
Table 4.4:1 Descriptive statistics on E-government adoption

<table>
<thead>
<tr>
<th>Descriptive Statistics</th>
<th>N</th>
<th>Mean</th>
<th>Std. Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Have you ever accessed Online registration of business</td>
<td>53</td>
<td>1.68</td>
<td>0.471</td>
</tr>
<tr>
<td>Have you ever accessed Online application/renewal of travel visa or passport</td>
<td>53</td>
<td>1.64</td>
<td>0.484</td>
</tr>
<tr>
<td>Have you ever accessed Online application/renewal of business licenses</td>
<td>53</td>
<td>1.7</td>
<td>0.463</td>
</tr>
<tr>
<td>Have you ever accessed E-Procurement</td>
<td>53</td>
<td>1.72</td>
<td>0.455</td>
</tr>
<tr>
<td>Have you ever accessed NSSF online</td>
<td>53</td>
<td>1.62</td>
<td>0.489</td>
</tr>
<tr>
<td>Have you ever accessed NHIF online</td>
<td>53</td>
<td>1.42</td>
<td>0.497</td>
</tr>
<tr>
<td>Have you ever accessed iTax</td>
<td>53</td>
<td>1.11</td>
<td>0.32</td>
</tr>
<tr>
<td>Have you ever accessed Online utilities transaction</td>
<td>53</td>
<td>1.25</td>
<td>0.434</td>
</tr>
<tr>
<td>Valid N (listwise)</td>
<td>53</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Source: Survey data (2016)

The findings indicate that majority of the respondents have accessed iTax followed by online utilities transactions (water and electricity) while eProcurement was least accessed. Consequently, it can be derived from the findings that E-government adoption was still low, with a cumulative mean score of 1.51, based on yes (1) and no (2) options used in the questionnaire issued.
Table 4.4: Descriptive statistics on E-government frequency of use

<table>
<thead>
<tr>
<th>Descriptive Statistics</th>
<th>N</th>
<th>Mean</th>
<th>Std. Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>How often do you access eBusiness</td>
<td>53</td>
<td>2.81</td>
<td>1.226</td>
</tr>
<tr>
<td>How often do you access iTax</td>
<td>53</td>
<td>3.77</td>
<td>0.974</td>
</tr>
<tr>
<td>How often do you access eProcurement</td>
<td>53</td>
<td>1.85</td>
<td>1.246</td>
</tr>
<tr>
<td>How often do you access NHIF Portal</td>
<td>53</td>
<td>3.04</td>
<td>1.544</td>
</tr>
<tr>
<td>How often do you access NSSF Portal</td>
<td>53</td>
<td>2.45</td>
<td>1.514</td>
</tr>
<tr>
<td>How often do you access Kenya Power apps</td>
<td>53</td>
<td>3.72</td>
<td>1.292</td>
</tr>
<tr>
<td>How often do you access KIWASCO paybill, SMS</td>
<td>53</td>
<td>3.68</td>
<td>1.397</td>
</tr>
<tr>
<td>Valid N (listwise)</td>
<td>53</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Source: Survey data (2016)

According to the findings from the research on the frequency of E-government access, the mean score for those accessing eBusiness was 2.81, those accessing iTax was 3.77, accessing eProcurement was 1.85, those accessing access NHIF Portal was 3.04, access to NSSF Portal had a mean score of 2.45, respondents accessing Kenya Power apps was represented by a mean score of 3.72 and finally the frequency of accessing KIWASCO paybill was 3.68. The findings indicate that majority of the respondents were frequently accessing iTax portal followed by utilities (water and electricity) portals while eProcurement portal was least accessed. Consequently, it can be derived from the findings that the respondents often access E-government service portal, with a cumulative mean score of 3.55, based on 5 point likert scales used in the questionnaire issued.
4.5 Correlation Analysis

The study tested the relationship between E-government platform and the performance of SMEs in Kisumu county CBD. The Table 4.5.1 shows the summary of finding.

Table 4.5:1 Correlation between E-government and SMEs performance

<table>
<thead>
<tr>
<th>Correlations</th>
<th>Pearson Correlation</th>
<th>Sig. (2-tailed)</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>What is the average monthly gross profit of the business in Ksh.</td>
<td>Pearson Correlation</td>
<td>Sig. (2-tailed)</td>
<td>1</td>
</tr>
<tr>
<td>N</td>
<td></td>
<td></td>
<td>53</td>
</tr>
<tr>
<td>How often do you access eBusiness</td>
<td>Pearson Correlation</td>
<td>Sig. (2-tailed)</td>
<td>-0.117</td>
</tr>
<tr>
<td>N</td>
<td></td>
<td></td>
<td>53</td>
</tr>
<tr>
<td>How often do you access iTax</td>
<td>Pearson Correlation</td>
<td>Sig. (2-tailed)</td>
<td>0.399**</td>
</tr>
<tr>
<td>N</td>
<td></td>
<td></td>
<td>53</td>
</tr>
<tr>
<td>How often do you access eProcurement</td>
<td>Pearson Correlation</td>
<td>Sig. (2-tailed)</td>
<td>0.208</td>
</tr>
<tr>
<td>N</td>
<td></td>
<td></td>
<td>53</td>
</tr>
<tr>
<td>How often do you access NHIF Portal</td>
<td>Pearson Correlation</td>
<td>Sig. (2-tailed)</td>
<td>0.366**</td>
</tr>
<tr>
<td>N</td>
<td></td>
<td></td>
<td>53</td>
</tr>
<tr>
<td>How often do you access NSSF Portal</td>
<td>Pearson Correlation</td>
<td>Sig. (2-tailed)</td>
<td>0.289*</td>
</tr>
<tr>
<td>N</td>
<td></td>
<td></td>
<td>53</td>
</tr>
<tr>
<td>How often do you access Kenya Power apps</td>
<td>Pearson Correlation</td>
<td>Sig. (2-tailed)</td>
<td>0.186</td>
</tr>
<tr>
<td>N</td>
<td></td>
<td></td>
<td>53</td>
</tr>
<tr>
<td>How often do you access KIWASCO paybill, SMS</td>
<td>Pearson Correlation</td>
<td>Sig. (2-tailed)</td>
<td>0.235</td>
</tr>
<tr>
<td>N</td>
<td></td>
<td></td>
<td>53</td>
</tr>
</tbody>
</table>

**. Correlation is significant at the 0.01 level (2-tailed).
*. Correlation is significant at the 0.05 level (2-tailed).

Source: Survey data (2016)
Correlation analysis provides answers to three basic questions about the two variables in a research. First whether there is any relationship between two variables and if so; what is the direction of relationship and subsequently, the magnitude of the relationship?

The finding in the Table 4.5:1 shows that there is a higher positive relationship between the services; iTax, NHIF, NSSF and the performance of the SMEs in Kisumu County CBD $r = 0.399$, $(p<0.003)$, $r = 0.366$, $(p<0.007)$, $r = 0.289$, $(p<0.05)$ respectively. Since the p-value obtained in the correlation table is less than 0.05, the study concludes that the two variables have a relationship between them.

From the findings above, the higher positive relationship between performance and iTax can be attributed to the fact that the adoption of the electronic filling of tax has reduced the penalties and fines incurred by SMEs using manual system which either delayed their filling of tax or the relevant documents being misplaced or omitted.

The relationship with NHIF and NSSF could be linked to the improved employee morale when their statutory deductions are remitted on time and again the SMEs incur less or no penalties and court cases due to delayed remittance of statutory deductions to the two bodies.

It can be noted that e-Business had low negative relationship with the performance of the SMEs in Kisumu County CBD $r = -0.117$, $(p<0.405)$. This can be attributed to the low adoption and use of eBusiness portal services and unavailability of some of the eBusiness services like application and renewal of Single Business Permit which is still done using manual system in Kisumu City Management.
4.6 Regression Analysis

Linear regression was conducted to test the relationship between E-government platforms as independent variables and gross monthly profit as a measure of SMEs’ performance which is the dependent variable.

Model Summary

Table 4.6:1 Model summary

<table>
<thead>
<tr>
<th>Model</th>
<th>R</th>
<th>R Square</th>
<th>Adjusted Square</th>
<th>R</th>
<th>Std. Error of the Estimate</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>.558(^a)</td>
<td>.311</td>
<td>.204</td>
<td>.735</td>
<td></td>
</tr>
</tbody>
</table>

Source: Survey data (2016)

The finding in the Table 4.6:1 indicate that independent variables studied explained only 20.4 percent of the variations in the performance of the SMEs in Kisumu County CBD represented by the adjusted R-square. This indicates that the remaining 79.6 percent is attributed by other factors that are not included in the research.

Table 4.6:2 ANOVA Results

<table>
<thead>
<tr>
<th>ANOVA(^a)</th>
<th>Model</th>
<th>Sum of Squares</th>
<th>df</th>
<th>Mean Square</th>
<th>F</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Regression</td>
<td>10.982</td>
<td>7</td>
<td>1.569</td>
<td>2.901</td>
<td>.014(^b)</td>
<td></td>
</tr>
<tr>
<td>Residual</td>
<td>24.339</td>
<td>45</td>
<td>.541</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>35.321</td>
<td>52</td>
<td>.541</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Source: Survey data (2016)
The finding in the Table 4.6:2 shows that the null hypothesis that all E-government services have no effect on the performance of the SMEs in Kisumu County CBD is rejected. All these variables jointly have effect on the performance of the SMEs in Kisumu County CBD.

Table 4.6:3 Coefficients of Determination

<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
</tr>
<tr>
<td>1</td>
<td>(Constant)</td>
<td>0.667</td>
</tr>
<tr>
<td></td>
<td>How often do you access eBusiness</td>
<td>0.186</td>
</tr>
<tr>
<td></td>
<td>How often do you access iTax</td>
<td>0.313</td>
</tr>
<tr>
<td></td>
<td>How often do you access eProcurement</td>
<td>0.126</td>
</tr>
<tr>
<td></td>
<td>How often do you access NHIF Portal</td>
<td>0.099</td>
</tr>
<tr>
<td></td>
<td>How often do you access NSSF Portal</td>
<td>0.034</td>
</tr>
<tr>
<td></td>
<td>How often do you access Kenya Power apps</td>
<td>0.105</td>
</tr>
<tr>
<td></td>
<td>How often do you access KIWASCO paybill, SMS</td>
<td>0.091</td>
</tr>
</tbody>
</table>

Source: Survey data (2016)

The finding in the Table 4.6:3 shows that use of iTax has significant influence on the performance of the SMEs in Kisumu County CBD $t=2.467$, ($p$-value = .018). Since
the critical t value obtained in the coefficient table is greater than 1.96, the study concludes that the use of iTax has a relationship with performance of SMES in Kisumu County CBD. This could be attributed to the reduction of costs incurred in filling tax returns that is now dedicated to resourceful business operation by these SMEs in addition to reducing penalties and fines incurred due to late filling and remittance to KRA.

Again, the findings shows that less often use of eBusiness applications has negative significant influence on the performance of the SMEs in Kisumu County CBD $t = -2.065$, ($p$-value = .045). Since the critical t value obtained in the coefficient table is less than 1.96 the study concludes that the use of eBusiness has a negative relationship with performance of SMES in Kisumu County CBD. This could be linked to the fact that some of the important business services like renewal of Single Business Permit, renewal of licences and payment of rates are still conducted manually by Kisumu City Management.

4.7 Discussion

It has been observed from the analysis that there was relatively high level of response rate which could be attributed to the researcher resorting to the use of online questionnaires and in some instance administering the questionnaires personally. The research findings also indicate that majority of respondents operating SMEs within Kisumu County CBD were male, who were slightly higher in number compared to their female counterpart. Another observation was that most of these SMEs are run by youths of age bracket between 26 and 35; with their highest level of education either being diploma or undergraduate. This phenomenon can be attributed to the high unemployment rate of
youths despite having acquired the necessary level of education to seek formal employment.

It was observed that most of the SMEs sampled had been in operation for less than 7 years that is a cumulative percentage of 64.2 percent, most of which employ staff not more than 20 represented by a cumulative mean of 77.4 percent and making monthly gross profit of below Ksh. 50,000. This data however could not be authenticated and may not represent the actual information.

It can be observed from the findings that the adoption level of E-government is still considerably low, a mean score of 1.51, despite the concerted efforts by the government agencies to sensitize citizens on the benefits of its use. This can be attributed to the challenges facing E-government implementation such as; privacy and security factors, the fact that some procedures still have to be handled manually, digital-divide, unsatisfactory confidence by residents in the use of online services and absence of an appropriate legal structure as highlighted in the earlier studies (Belanger & Carter, 2008; Lam, 2005; Abdelkader, 2015; Vassilakis et al., 2005). The E-government service often accessed by the SMEs in Kisumu County CBD was identified to be iTax and this can be attributed to the marketing drive by KRA to have citizens and businesses to use it in favour of manual filling of tax returns. The least accessed E-government service is the eProcurement; while it was deemed to help in fighting corruption and enhance fair participation in public procurement, it has had its share of implementation challenges thus the low adoption rate.

The theory that best informs this phenomenon is Technology Acceptance Model (TAM) that posits that the decision to utilize an innovation is majorly dependent on its perceived
usefulness and perceived ease of use hence in the study iTax and utilities applications were the highly adopted and used E-government applications.

Based on the outcomes of correlation analysis it can be said that there is a moderate positive relationship between E-government and the performance of the SMEs in Kisumu County CBD. It also points out that E-government adoption and use is a factor that slightly affects SMEs performance among other factors within the targeted population.
CHAPTER FIVE: SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

5.1 Introduction

This chapter presents a summary of the findings, draws conclusions and makes recommendations of the research based on the objectives of the study. It also proposes future studies that would widen the knowledge base of E-government and other information systems.

5.2 Summary

The general objective of the study was to investigate the effect of adoption of E-government on the performance of SMEs in Kisumu County CBD. The study was carried out in Kisumu County where 77 SMEs were sampled and 53 responses were received from the respondents.

Data analysis and interpretation revealed that majority of the most of SMEs operating within Kisumu County CBD were owned by educated youths below 35 years of age and that most of the businesses had operated for not more than 7 years making gross profit of between Kshs.1 to 50,000.

The study reveals that the adoption rate of E-government in accessing public service delivery is considerably low and it was noted that the E-government services with high rate of adoption were those that were well marketed and users sensitized, for example iTax and utilities online transactions.
The study further found out that despite acceptance and usage of E-government, the performance of SMEs in Kisumu County CBD has not been significantly affected. This indicates that E-government has slight effect of performance of business and can only be complimented with other factors not discussed in this study.

5.3 Conclusion

SME are considered to have a pivotal role in a country’s economic and social development; they are deemed to generate wealth and employment and enhance a country’s competitiveness. Based on the findings above, which showed a higher percentage of youths between 26 to 35 years owning businesses; it is evident that SMEs can be the ideal yardstick to reducing unemployment rate and poverty level especially amongst the youths.

The study also concludes that there is low adoption rate and moderate use of E-government platforms by SMEs in Kisumu County CBD which if adopted can help improve the performance of the businesses especially when complimented by other factors affecting business performance since there is a relationship between E-government and performance of the SMES.

5.4 Recommendations

This study recommends that the National and County Governments should develop a clear strategies ensure seamless implementation of E-government in all their public service delivery then carry out joint mass sensitization and offer incentives for the utilization of E-government especially among business enterprises.
In addition, the study also recommends that in order to improve performance, SMEs should develop dynamic approach to the ever changing business environment. Since E-government is an inevitable emerging platform they should adopt and use it to help reduce costs incurred while accessing public services and ensure sustainable profitability.

5.5 Limitations of the Study

There were respondent related challenges including the unwillingness to provide certain business information, respondents providing biased inaccurate information and delay in submission of their responses.
E-government being an emerging issue required initially briefing to the respondents to ensure understanding and that accurate responses will be provided.
Time constraint was a major hindrance to the study as it usually requires ample time for one to conduct detailed survey but in this case the researcher had limited time to do so.

5.6 Suggestion for Further Studies

The researcher suggests that further studies should be done on the effect of E-government on performance of SMEs in other counties, regions or entire Kenya in order to allow generalization of results.

A study can also be done on other emerging information systems such as Information Centers, Data Mining and Electronic Data Management Systems (EDMS).
REFERENCES


APPENDICES

Appendix A: Questionnaire

Request: Kindly take a few minutes to respond to this questionnaire. The nature of the study is academic and information you provide will be treated with utmost confidentiality and will only be published as anonymous statistical data.

SECTION A: GENERAL INFORMATION

You are requested to provide your personal information from Question 2 to 5 below.

1. Name of business (Optional)……………………………………………………………………………………………………………………

For Question 2-5; please tick (✓) only one response

2. Gender of respondent Male [ ] Female [ ]

3. Age bracket

18-25 [ ] 26-35 [ ] 36-45 [ ] Above 46 [ ]

4. Highest level of education

Primary [ ]

Secondary [ ]

Diploma [ ]

Undergraduate [ ]

Postgraduate [ ]

5. Position held in the business

Business Owner [ ]

Manager [ ]

Staff member [ ]
6. For how long has the business been in operation [in years]? (Please select one only)

<table>
<thead>
<tr>
<th></th>
<th>Less than 1 year</th>
<th>1 to 3 years</th>
<th>4 to 7 years</th>
<th>7 to 10 years</th>
<th>Above 10 years</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>B</td>
<td>C</td>
<td>D</td>
<td>E</td>
<td></td>
</tr>
</tbody>
</table>

SECTION B: E-GOVERNMENT ADOPTION

7. Have you ever accessed these E-government services online [over website or mobile phone network/apps/paybills]? (Tick Yes or No)

<table>
<thead>
<tr>
<th>E-government Services</th>
<th>Yes</th>
<th>No</th>
</tr>
</thead>
<tbody>
<tr>
<td>Online registration of business</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Online application/renewal of travel visa or passport</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Online application/renewal of business licenses</td>
<td></td>
<td></td>
</tr>
<tr>
<td>E-Procurement(Open Government Tenders) or IFMIS payments</td>
<td></td>
<td></td>
</tr>
<tr>
<td>NSSF registration, employee payroll byproduct submission, payments</td>
<td></td>
<td></td>
</tr>
<tr>
<td>NHIF registration, employee payroll byproduct submission, payments</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Filling tax returns(iTax)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Checking and making payment of utilities (electricity, water bills)</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

8. How often do you access these online services [self-service websites/apps/paybills]? (Please rate by ticking the frequency where; 1 = Never, 2 = Rarely, 3 = Moderate, 4 = Often and 5 = Very often)

<table>
<thead>
<tr>
<th>E-government Services</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
</tr>
</thead>
<tbody>
<tr>
<td>eBusiness Portal (business name search &amp; registration, business licences, driving</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>licenses, visa, travel passport, NTSA licenses etc)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>iTax Portal (KRA PIN, Tax returns)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>eProcurement Portal (Online government tenders, IFMIS, Agpo)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>NHIF Portal (payroll byproduct for employees, status check)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>NSSF Portal (payroll byproduct for employees, status check)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Kenya Power apps (E-bill, paybill payments, purchase of tokens)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>KIWASCO paybill, SMS (paying water bills, checking bills)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
SECTION C: BUSINESS PERFORMANCE

9. How many additional staff has the company employed since start of business operation? (Please select only one option)

<table>
<thead>
<tr>
<th></th>
<th>Below 5</th>
<th>6 to 20</th>
<th>21 to 50</th>
<th>51 to 100</th>
<th>Above 100</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>B</td>
<td>C</td>
<td>D</td>
<td>E</td>
<td></td>
</tr>
</tbody>
</table>

10. What is the average monthly gross profit of the business in Kenyan shillings? (Please select only one option)

<table>
<thead>
<tr>
<th></th>
<th>1 to 50,000</th>
<th>50,001 to 100,000</th>
<th>100,001 to 500,000</th>
<th>Above 500,000</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>B</td>
<td>C</td>
<td>D</td>
<td></td>
</tr>
</tbody>
</table>

END

The researcher is grateful for the time taken by you to answer the survey questions. In order to receive results of this study or if you require more information, kindly contact researcher using the following email address: m_orux@yahoo.com.
### Appendix B: SME Target Population

<table>
<thead>
<tr>
<th>Nature of Business</th>
<th>Total counts</th>
</tr>
</thead>
<tbody>
<tr>
<td>Computer &amp; Electronics</td>
<td>79</td>
</tr>
<tr>
<td>Food &amp; Beverages</td>
<td>45</td>
</tr>
<tr>
<td>Sallons &amp; Barbershops</td>
<td>33</td>
</tr>
<tr>
<td>Boutiques</td>
<td>61</td>
</tr>
<tr>
<td>General supplies</td>
<td>114</td>
</tr>
<tr>
<td><strong>Totals</strong></td>
<td><strong>322</strong></td>
</tr>
</tbody>
</table>

Source: Kisumu County (2015)
Appendix C: Introductory Letter

TO WHOM IT MAY CONCERN

The bearer of this letter Mr. Oruko Mark Onyango

REGISTRATION NO: D61/71905/2014

The above named student is in the Master of Business Administration degree program. As part of requirements for the course, he is expected to carry out a study on “E – Government and the Performance of SME’s in Kisumu County Central Business District, Kenya”

He has identified your organization for that purpose. This is to kindly request your assistance to enable him complete the study.

The exercise is strictly for academic purposes and a copy of the final paper will be availed to your organization on request.

Your assistance will be greatly appreciated.

Thanking you in advance.

Sincerely,

ALEX JALEHA
CO ORDINATO, SOB, KISUMU CAMPUS

Cc File Copy