

**INFLUENCE OF TECHNOLOGY CHANGE ON TELEVISION VIEWERS
SATISFACTION IN NAIROBI COUNTY; A CASE OF DIGITAL MIGRATION IN
LANG'ATA SUBCOUNTY, KENYA**

BY

KEPHA OCHORA OCHOI

**A RESEARCH PROJECT REPORT SUBMITTED IN PARTIAL FULFILMENT OF THE
REQUIREMENTS FOR THE DEGREE OF MASTER OF ARTS IN PROJECT
PLANNING AND MANAGEMENT OF THE UNIVERSITY OF NAIROBI**

2016

DECLARATION

This research project report is my original work and has not been submitted for any award in any other university.

Signature..... Date:

REGISTRATION NO: L50/73460/2014

KEPHA OCHORA OCHOI

This research project report has been submitted for examination with my approval as university supervisor.

Signature..... Date.....

DR. JOHN MBUGUA

Lecturer,

University of Nairobi.

DEDICATION

This study is dedicated to my parents and friends; Zephaniah Ochoi, Matha Elizabeth, Erastus Makali, Mary Kariuki, Ednah Nyamokami and Charles Mulinga. They readily availed the moral, material and scholarly support.

ACKNOWLEDGEMENT

My gratitude goes to my supervisor, Dr. John Mbugua for his professional advice and guidance as I was writing this research project proposal. His continuous communication and availability throughout the study period has enabled me finish the work in time. My gratitude goes to the University of Nairobi Extra Mural Centre for offering the Master of Art in Project Planning and Management thus giving me an opportunity to conveniently do the course. I am grateful for all the assistance and cooperation from fellow colleagues as well. They helped me throughout the course and indeed, in the completion of this research paper as well. Through their consistent reminders, prayers and moral support, I have finally been able to complete my final thesis. I cannot forget to mention the lecturers at the School of Extra Mural Studies. They have been patient and considerate with my distant studies and constant prayers for deadline extensions and special classes. Their support and dedication to all the students made it possible for me to complete my class work. I am really humbled by their commitment and dedication. I appreciate the services of the Jomo Kenyatta Memorial Library at the University of Nairobi which has provided reading materials needed during the study.

TABLE OF CONTENT

DECLARATION	ii
DEDICATION	iii
ACKNOWLEDGEMENT	iv
TABLE OF CONTENT	v
LIST OF TABLES	ix
LIST OF FIGURES	x
LIST OF ABBREVIATIONS AND ACRONYMS	xi
ABSTRACT.....	xii
CHAPTER ONE	1
INTRODUCTION	1
1.1 Background of the Study.....	1
1.2 Statement of the Problem	2
1.3 Purpose of the Study	3
1.4 Research Objectives	3
1.5 Research Questions	4
1.6 Significance of the Study	4
1.7 Limitations of the Study	4
1.8 Delimitations of the Study.....	5
1.9 Assumptions of the Study	5
1.10 Definition of Significant Terms	5
1.11 Organization of the Study	6
CHAPTER TWO	7
LITERATURE REVIEW	7
2.1 Introduction	7
2.2 Digital Migration Planning and Television Viewers satisfaction	7
2.3 Stakeholders Involvement in Digital Migration.....	9

2.4 Change of Analogue and Television Viewers satisfaction	10
2.5 Subscription Type and Television Viewers satisfaction	11
2.6 Satisfaction of Television Viewers	12
2.7 Theoretical Framework	12
2.7.1 Theory of Planned Behavior	12
2.7.2 Technology Acceptance Theory.....	15
2.7.3 Diffusion of Innovation Theory	15
2.8 Conceptual Framework	16
2.9 Gaps in Literature Review.....	19
2.10 Summary of Literature Review	19
CHAPTER THREE	21
RESEARCH METHODOLOGY	21
3.1 Introduction	21
3.2 Research Design	21
3.3 Target Population	21
3.4 Sample Size and Sampling Procedures	22
3.4.1 Sample Size	22
3.4.2 Sampling Procedures.....	22
3.5 Data Collection Instrument	23
3.5.1 Pilot Testing of the Instrument.....	23
3.5.2 Validity of the Instrument	23
3.5.3 Reliability of the Instrument	24
3.6 Data collection Procedures.....	25
3.7 Data Analysis Techniques.....	26
3.8 Ethical Considerations.....	26
3.9 Operational Definition of Variables	27
CHAPTER FOUR.....	28

DATA ANALYSIS, PRESENTATION AND INTERPRETATION	28
4.1 Introduction	28
4.2 Questionnaire Return Rate	28
4.3 Demographic Characteristics of the Respondents.....	29
4.3.1 Age of the Respondents	29
4.3.2 Length of time of viewing Digital TV	30
4.3.3 Academic Qualification of Respondents.....	30
4.4 Digital Migration Planning and its Influences on Television Viewers' Satisfaction.....	31
4.4.1 Time to buy digital decoder was sufficient for me	32
4.4.2 Information on digital migration was availed to us hence we were able to plan for the shift....	33
4.4.3 Accessibility of Digital Set Top Boxes.....	34
4.4.4 The price of digital decoders was not expensive to purchase.	34
4.4.5 Installation cost	34
4.4.6 Regulation of Digital Migration.....	35
4.4.7 Personal computers with digital TV cards	35
4.4.8 Time notice to blocking analogue signal	36
4.5 Stakeholders Involvement in Digital Migration.....	36
4.5.1 Availability of information on free to air TV and Pay TVs	37
4.5.2 Availability of information on digital migration to the stakeholders.....	38
4.5.3 Content Regulation on Digital	38
4.5.4 The disposal of analogue TV	39
4.5.5 Viewers involvement in digital migration.....	39
4.6 Change From Analogue to Digital Television	39
4.6.1 Better Contents on Digital Television.....	41
4.6.2 Information on Analogue Change.....	41
4.6.3 Compatibility of Set Top Boxes.....	41
4.6.4 Picture and Sound Quality Of Digital Television	42
4.6.5 Ease of Operating Digital Television.....	42
4.6.6 Variety of TV Channels	42
4.6.7 Digital Television and Value For Money.....	43

4.7 Subscription Types of Digital Television.....	43
4.7.1 Sufficiency of Free to Air Contents	44
4.7.2 Fairness Subscription Cost.....	44
4.7.3 Accessibility of Payment Options.....	45
4.7.4 Installation and Reinstallation Fees	45
4.7.5 Digital Decoders Are Easy to Operate	45
4.7.6 Pay TV has More Quality	46
CHAPTER FIVE	47
SUMMARY OF FINDINGS, DISCUSSIONS, CONCLUSION AND RECOMMENDATIONS.....	47
5.1 Introduction.....	47
5.2 Discussions	47
5.2.1 Digital Migration Planning	47
5.2.2 Stakeholders Involvements	48
5.2.3 Change from Analogue to Digital Television.....	48
5.2.4 Subscription Types of Digital Television	49
5.3 Summary of Findings.....	49
5.3.1 Digital Migration and Satisfaction of Television Viewers	49
5.3.2 Stakeholders Involvement and Satisfaction of Television Viewers	50
5.3.3 Change from Analogue to Digital Television.....	50
5.3.4 Subscription Types of Digital Television	51
5.4 Recommendations.....	51
5.5 Suggestions for further Study	52
REFERENCES	54
APPENDICES	60
APPENDIX .A: LETTER OF INTRODUCTION.....	60
APPENDIX C: QUESTIONNAIRE FOR TV VIEWERS’	61

LIST OF TABLES

Table 3: 1 Sample Size	22
Table 3: 2 Reliability of the Instrument	24
Table 4: 1 Age of the Respondents	29
Table 4: 2 Length of time of viewing Digital TV	30
Table 4: 3 Academic Qualifications of Respondents.....	30
Table 4: 4 Digital Migration Planning and its Influences on Television Viewers' Satisfaction ..	31
Table 4: 5 Time to buy digital decoder was sufficient.....	33
Table 4: 6 Information on digital migration	Error! Bookmark not defined.
Table 4: 7 Accessibility of Digital Top Boxes in the Market	Error! Bookmark not defined.
Table 4: 8 Stakeholders Involvement in Digital Migration	Error! Bookmark not defined.
Table 4: 9 Change from Analogue to Digital Television	41
Table 4:10 Subscription types of Digital Television	Error! Bookmark not defined.

LIST OF FIGURES

Figure 2.1 Conceptual Framework	17
---------------------------------------	----

LIST OF ABBREVIATIONS AND ACRONYMS

CAK-	Communication Authority of Kenya
COFEK-	Consumer Federation of Kenya
DTC-	Digital Television Committee
FTA-	Free to Air
ICT-	Information and Communication Technology
ITU-	International Telecommunications Union
KBC-	Kenya Broadcasting Cooperation
KBNS-	Kenya National Bureau of Statistics
KTN-	Kenya Television Network
NACOSTI-	National Commission for Science, Technology and Innovation
SPSS -	Statistical Package for Social Sciences
STB-	Set Top Box
TAM-	Technology Acceptance Model
TV -	Television
UN-	United Nations

ABSTRACT

Over the last three decades, there have been rampant changes in technology in all industries across the globe. It is true to suffice that the information and communication technology affects the operations of many institutions, both private and public. Kenya changed the transmission of television from analogue to digital in the year 2015. This shift called for careful planning and information dissemination to the general public in a timely fashion. However, not all changes are appealing. There is a need to assess the impact of technology changes in the television sector on the satisfaction of viewers in the country. The purpose of this study was to investigate the influence of technology change on television viewers' satisfaction in Nairobi City County, a case of Lang'ata Sub County. The study was set to achieve the following objectives; To establish the impact of digital migration planning on television viewers' satisfaction, to assess the influence of stakeholder's involvement in digital migration on television viewers' satisfaction, to assess the impact of analogue TV change on television viewers' satisfaction in Nairobi County, to examine the influence of subscription type on television viewers' satisfaction in Nairobi City County. The study is of significance to the general public who already use digital decoders to assess their relevance and impact to the entertainment sectors of the country. Also, the government will find the study significant in that it will give insights on the various aspects of digital migration and foster its reception by the television viewers which will present new ways of bettering the information industry and ensuring that television viewers are satisfied. The study used a descriptive survey design where simple random sampling was used in selecting the respondents. Data was collected using semi-structured questionnaires. The study will have a target population of 126,715 residents of the sub county. A sample size of 384 respondents was taken using stratified sampling techniques to be a representative of the target population. Descriptive statistics was used to analyze data and Statistical Package for Social Sciences (SPSS) was used in data analysis. Data analysis involved computing means, standard deviations and working out frequency distributions. The change from analogue to digital was the most influencing factor, followed by subscription types, then stakeholders' involvement and finally digital migration planning. The study recommends that where technological changes are being planned, and they influence the general public it is important that information is disseminated on a timely fashion, that all stakeholders are involved in the planning and implementation of the changes. Further, it is crucial to offer the general public avenues of voicing their views on such changes like digital migration.

CHAPTER ONE

INTRODUCTION

1.1 Background of the Study

Prior to examining digital migration implications on television viewers, it is important to understand its background and the difference between analogue and digital broadcasting. Analogue broadcasting as described by Berger (2010) is a direct process where each element in the streaming of the content subsequently transmits in an ordered manner. This utilises a lot of internet bandwidth hence utilising electronic frequencies inherently in order to transmit digital signals in this manner. This limits the number of stations that can be accommodated on the radio spectrum. Changes have been felt with the run of digital electronic technologies in the market. These technologies imply that multimedia, as well as text and images, can be stored and transmitted in binary form. Digital signals can also be better utilized as they allow better demarcation of frequency spectrums. The allocation of channels on the same digital waveform is a common phenomenon that cannot be replicated with analogue signals. The significance of all this for broadcasting is that many more radio and TV channels can be squeezed into the exact same frequency space than is possible under analogue transmission (Berger, 2010).

The migration from analogue broadcasting to digital broadcasting debate began in the 1990s. It began in UN International Telecommunications Union (ITU) conferences. The International Telecommunications' Union is behind the ongoing global digital migration. The agency is part of the United Nations' team that coordinates the use of radio spectrum and assigns satellite orbits globally as it develops policy and standards that guide the improvement of telecommunications infrastructure. ITU is based in Geneva, Switzerland and has a membership of 193 states Kenya among them. Kenya alongside others signed a resolution on the 16th June, 2006 at an international ITU conference in Geneva to migrate from analogue to digital broadcasting by 17th June 2015 (Ochieng, 2015; Kimanthi, 2016). This binding convention has changed the landscape of broadcasting in Kenya and has immense implications not only on the business models of media houses and advertising but also on the television viewers in Kenya.

The FTA TV market in Kenya is dominated by: Standard Media Group, Royal Media Services and Nation Media Group. As well as owning newspapers and radio stations, Nation Media Group

runs one TV channel, NTV. This makes Nation Media one of the largest digital services providers in the country. Standard Media Group offers a popular general entertainment channel, KTN, while Royal Media Services broadcasts another popular general entertainment channel, Citizen TV. These three media houses dominate the print and television markets under the regulation of the Communications' Authority, of Kenya, as well as the Competitions' Authority. The official government broadcast media, Kenya Broadcasting Corporation (KBC) airs two channels – the general entertainment channel KBC 1, which is free to air, and the culture-led Heritage TV which is provided in all pay TV packages as well. The KBC channels broadcast in English and Swahili while some of their programmes are also broadcasted in the other Kenyan local languages (Martin, 2016).

As in the rest of Sub-Saharan Africa, television viewership in Kenya is majorly on analogue television sets. Nonetheless, the adoption of digital televisions in Kenya is picking pace, as more Kenyans continue to adopt the digital transformation era. Majorly, this has been a popular policy with the current Kenyan government and the ministry of ICT. As at December 2014, more than 1.5 million homes; representing 43% of the number of households with television sets in the country had subscribed to digital television. According to the Scan Group (2015), Kenyan ranked better than the average for the Sub-Saharan Africa households, which was 40%.

1.2 Statement of the Problem

Migration of TV from analogue to digital creates opportunities for more viewership among a country's population (Beal, 2013). However, digitization change is not a simple and needs a lot of planning and execution for acceptability by the citizens. Digital migration was envisioned to establish pluralism by building an equitable, people-centered information society by using technology to connect those in the most remote parts of the globe. This was to be achieved by providing enhanced sound and picture quality and enabling hosting of more channels that will offer audiences a vast selection of content (Ochieng, 2015). In Kenya, digital migration journey began in earnest in March 2007 with an advisory taskforce which recommended the formation of the Digital Television Committee (DTC) that was to set up and implement digital migration. Although dogged with controversies, Kenya started implementing its digital migration with a switch off of analogue broadcasting in Nairobi on February 2014 (Halonyere, 2015).

Digitization needs a lot of money in order to be accepted by the citizens and thus calls for dozens of consumers' awareness programmes (Mackay, 2007).

In the light of this observation, it is thus critical to consider the overall effect of digital migration and its influence of satisfaction of consumers. This digital migration is expected to have implications on the audience, media houses and related industry (Berger, 2010). However, studies on the implications of digital migration in Kenya are scarce. Githinji (2013), established that unavailability was a challenge to digital migration in Makadara region in Nairobi. Due to the time change, it is likely that accessibility may not be a challenge. Few studies that exist have focused on implications of digital migration on media houses' business model and advertising (IPSOS Synovate, 2014; ScanGroup, 2015) with little or no attention on digital migration implications on television viewers. This proposed study therefore seeks to bridge this gap by examining digital migration and its implications on television viewers in Nairobi County. TV viewership is important to the general population for news and entertainment. This begs the question if digital migration increases the utility of TV viewing. It is important to note that change is only appealing if it is for the better. This study had sought to establish the influence of technology change on television viewers' satisfaction in Nairobi County.

1.3 Purpose of the Study

The purpose of this study was to investigate the influence of technology change on television viewers' satisfaction in Lang'ata Sub-County.

1.4 Research Objectives

This study was guided by the following objectives:

1. To establish influence of digital migration planning on television viewers' satisfaction in Lang'ata Sub-County
2. To establish the influence of stakeholders' involvement in digital migration on television viewers' satisfaction in Lang'ata Sub-County
3. To assess the influence of analogue TV change on television viewers' satisfaction in Lang'ata Sub-County

4. To examine the influence of subscription type on television viewers' satisfaction in Lang'ata Sub-County

1.5 Research Questions

1. How did digital migration planning influence television viewers' satisfaction in Lang'ata Sub-County?
2. What was the role of stakeholders' involvement in digital migration and how did it influence television viewers' satisfaction in Lang'ata Sub-County?
3. What role did analogue TV change play in influencing television viewers' satisfaction in Lang'ata Sub-County?
4. How did subscription type influence television viewers' satisfaction in Lang'ata Sub-County?

1.6 Significance of the Study

The switch from analogue to digital broadcasting has the potential to improve the quality and quantity of what is on television and increasing the number of people who were be able to watch it as well as prospective employment in the media sector. However, these advantages do not seem to be realized as of yet due to the audience's reluctance to purchase the set-top boxes.

This study is aimed at contributing to policy where the government and media bodies will use it as a guideline in the event of defining the parameters regarding technological advances. It will as well invent improved methods of diffusing information on technology based innovations and enhance procedures for achieving success while introducing new ideas to society.

1.7 Limitations of the Study

This study was limited to the objectives being sought by the study. It is important to note that there are various factors that affect television viewers' satisfaction. With this knowledge, the study wishes to caution that television viewing satisfaction was taken without eliminating the effects of other factors. Also this study involved collecting information from households and thus the exact correctness and honesty of information may not be determined. Further the tudy is

limited in that the sample size may not be a true reflection of the population in the study. It is thus important to note cluster sampling was adopted to allow for obtainance of a representative sample.

1.8 Delimitations of the Study

This study focused on influences of four elements on television viewers' satisfaction. These four elements are digital migration planning, stakeholder's involvement, change from analogue, and subscription type. The study had sought to collect data from the audiences or television viewers in Lang'ata Sub County in Nairobi City County. With this in light, the researcher wishes to caution that other factors with potential influence on satisfaction of TV viewership were not considered in the study. It is important to delimit this study to the objectives since it is virtually not possible to study all the factors influencing television viewers' satisfaction in a single study.

1.9 Assumptions of the Study

This study presupposed that there was no new developments in digital migration that influenced planning of digital migration, stakeholders' involvement; change from analogue and subscription in the near future that could significantly influence the outcome of this study during the period of study. It is also assumed that there were no others factors that could influence television viewers' satisfaction significantly in Nairobi City County.

1.10 Definition of Significant Terms

Technology change- this refers to the change from an old form of technology to a new or advanced level of technology. For the purpose of this study, it implies to the change from analogue television transmission to digital transmissions.

Digital migration planning- this is the setting of procedures to be followed during the change from analogue to digital television

Stakeholders- these are all individuals who have interests in something. For this study stakeholders include the general public, government entities that are charged with digital migration and the supplies of digital set top boxes.

Analogue television- this is a television that uses analogue transmissions where each programmes is transmitted in its one frequency channel

Digital television- this is a television that uses digital signals where many programmes can use a single distribution frequency

1.11 Organization of the Study

The study is organized into Five chapters. Chapter One contained the background of the study, statement of the problem, purpose of the study, objectives, research questions, significance of the study, limitations, delimitations, basic assumptions of the study and the organization of the study.

In Chapter Two, both theoretical and empirical review of literature is discussed. Also, the chapter contains a conceptual framework and at the end research gaps are presented.

Chapter Three has the outline the research methodology that was used in the study and includes research design, target population, sample size and sampling techniques, research instruments, questionnaires, validity of the instruments, reliability of the instruments, and pilot test. The chapter also presents the operationalization of variables table.

Chapter Four contains data analysis, presentation and interpretation of data while Chapter Five entails a summary of findings, discussions of findings, conclusions, recommendations and suggestions for further research.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

This chapter covers review of relevant literature for this study. It comprises of the themes that the objectives of this study aim to achieve. They include digital migration, stakeholders' involvement in digital migration, change from analogue and subscription types. The chapter also presents the theoretical and conceptual framework of the study as well as explanation of variables. This chapter ends with the gaps in literature and a summary of literature review.

2.2 Digital Migration Planning and Television Viewers satisfaction

The Communications Commissions of Kenya (2016) asserts that digital migration was started on 2014 in Nairobi and in early 2015 it was launched into other parts of the country. Thus, digital migration was not instantaneous but rather was launched in phases like any other carefully executed process. According to Nikolanikos (2016) digital TV involves the transmission of encrypted data through signal which require access systems in order to view. Having noted this, it is evident that digital migration was effected with full recognition of the requirements of the systems. Faourie (2007), notes that an innovation implementation must begin with awareness stage. To this end, digital migration calls for a massive awareness program on what it is and how it functions. The general population may not be having full information of the contents and work of the digital televisions and thus information should be fully provided to them. Consequently, consumers will be in a position to make informed choices with respect to the use of digital TV.

It should be noted that when a new product or process is introduced into the market, different people will get attracted to into at different times. According to Grant and Meadows (2006) adoption of innovation may be divided into five categories beginning with innovators, early adopters, early majority, late majority and laggards. Thus, in planning for digital migration need to be done meticulously not to deter all consumers from adopting it. Set-top converter boxes are devices that convert the analogue signal to a digital signal, allowing viewers to keep their current television sets. Work with set-top box manufacturers to ensure that affordable, approved devices are available to the viewers. When the migration switchover took place a significant number of

viewers were unprepared, that could have had an influence on the size of the audience, advertising revenue and brand loyalty (Beal, 2015).

It is important for digital television providers to make sure that there are converter devices available for those who want to continue using their analogue television sets. The providers should be able to negotiate with vendors to meet the demands of the consumers, and do so in a cost-effective manner. They also may want to keep a number of devices available at the station to service the customers (Beal, 2015). A survey conducted in Nairobi by IPSOS Synovate revealed that nearly all Nairobi TV owners are aware of the TV digital migration. In spite of this, majority (68%) seem not to feel the urgency to purchase a Set Top Box (STB) but intend to do so soon. Only a third indicated that cost is a key barrier to purchase. Ninety nine percent of TV owners are aware of the digital TV migration and the need to purchase a STB. Another 75% know of the importance of purchasing a STB from an approved dealer or the need in future to purchase a TV set that has an in-built STB (18%). Awareness and understanding of the STB is quite impressive due to the coverage the issue has received on the media. Ironically, only 32% of those who own a TV set have purchased a STB. This percentage is low considering that migration took place in 2013 (Kimani & Iravo, 2017).

Digital migration was hampered to the fact that it was difficult to access the digital top boxes. Perhaps, this is an indication that proper prior planning had not been undertaken (Mbote, 2013). Much as the digital television transmission may provide a wide content, it is important for information to be disseminated to the people on what to expect. Equally, the disputed between COFEK and the CAK is an indication that all stakeholders had not been involved in planning of the change. Appropriate planning calls for all participants to be involved in order to reduce resistance in execution of changes.

The media failed to inform the general public adequately on the digital migration process (Beal, 2015). Through this, it can be observed that the digital migration process was not effective. Langat (2014), noted that consumers ran for the set top boxes that they later learnt were not their preferred choices. Thus, this lead to loss of money in case they replaced them at a later date. Further, on the initial days of digital migration the decoders were priced highly hence discouraged consumers from shifting. However, this CAK (2015) indicates that Kenya has

successfully migrated to digital notwithstanding the challenges encountered in planning the digital migration.

2.3 Stakeholders Involvement in Digital Migration

Digital migration involves changes that need an input of various stakeholders. According to Scan group (2015) most Kenyans living in Nairobi were not clear on the set top boxes to purchase and thus this compromised digital migration move. For this reason, it is important for digital migration to involve all concerned stakeholders before switch off is done.

The process of digitization of broadcasting transmissions comes with high picture and sound quality (Ndonye, Khaemba and Bartoo, 2015). The vision of the international telecommunications union is a world broadcasting approach that offers sharper; brighter picture and improved sound with less interference. Digital transmission offers these benefits. However, it is important to consider whether the pay TV allow for parental control in order to foster morality among the general public. To the least, a variety of content on TV may not necessarily imply healthy living standards and thus it is important for regulations for it to warrant such.

Digital broadcasting makes it easier for the media regulators because the signals are not limited. Digital signals can carry many channels without affecting the quality of the content transmission and reception. This ability for multi-channeling is unique to digital transmission and offers media houses and media regulators better utilization of frequencies. For example, in Kenya, the Communications Authority of Kenya (CAK) is in a position to put unused frequencies in different uses.

Although digital migration has been associated with benefits, it is considerably crucial for regulators to hear out the opinions of the public with respect to the migration. According to Yong (2003) digital migration may be expensive when the platform does not offer a free to air services. According to Beal (2013) digital migration should consider the safety of the public. For this reason, to increase satisfaction of viewing, it is necessary for control viewing especially among the younger generation. Information on digital migration should be disseminated to all stakeholders in good time, to make them make informed choices on the types of set top boxes to purchase.

2.4 Change of Analogue and Television Viewers satisfaction

Change of broadcasting to digital enables greater efficiency in terms of variety of channels, good visual and audio effects and high perceived value. Thus, the digital migration has accompanying benefits to television viewers in the country. However, this change should be tested to compatibility with the existing televisions (Kinyanjui, 2014). The digital migration necessitates consumers to change their TV sets to digital smart TVs or otherwise buy set top boxes. This requires resources and also, the time to change to the new platforms. According to Ndonye *et al* (2015) digital shift allows HD viewing which has a high picture and sound quality.

In an article in *The Star* Newspaper, Gachara (2015) argued that the initial reaction to the digital migration was very positive and affirmative. However, problems soon arose when Kenyans were informed they had to pay monthly subscriptions to view their common television stations. Unlike the analogue regime where audiences were only limited to the standard definition television, digital regime enables the audience to enjoy high definition television, which provides extra gratification. High definition television is the premium version of digital television which offers high picture and sound quality. In another article with the *Standard* newspaper, Ageyo (2015) posited that; although it seemed a noble idea, the digital migration in Kenya would affect viewers' freedom by restricting them to only the television stations they could afford.

The digital transmission promises double vertical and horizontal resolution as likened to the traditional analog signal (Ndonye *et al* 2015). Each television viewer imagines unlimited selections of the channels given that the audience has become dynamic and has different predilections of content. Digital Transmission offers such freedom because digital signals take up much less bandwidth and therefore more channels can be broadcast simultaneously without interference (Okon, 2015). The Kenya policy on Digital Migration establishes that there is a need to have more free-to-air channels for the diverse Kenyan population as well as the youth, women and farmers among others. This is also envisioned in the Kenya ICT policy that enumerates the benefits that ICT can have on the society members especially in offering them with their preferred products (Ndonye *et al*, 2015).

The set top boxes used in the conversion of digital signal are fitted with electronic program guides for digital television broadcasting. The viewers navigate channels using the guides. There are more advanced guides that offer the viewers options of, for instance, setting reminders for program viewing and searching programmes by genre among others (Ndonye, Khaemba and Bartoo, 2015).

2.5 Subscription Type and Television Viewers satisfaction

There are three ways that one can access digital content. The first way is through acquiring a TV set which has inbuilt digital tuners or receivers. The second way is by subscribing to a cable or satellite service provider that can convert their digital signal to analogue so that analogue receivers can continue displaying digital content. The third solution is for the viewers to purchase converters such as set-top-boxes. Set top boxes are electronic decoders that are plug into analogue receivers and converts digital signal to analogue signals making the analogue receivers to display the digitally broadcast content (Ndonye, Khaemba and Bartoo, 2015).

In a report by the Open Societies Foundation, Nyabuga & Booker (2013) surveyed households in Nairobi to establish the subscription type among different homesteads in the city. The study revealed that more than 70% of the respondents had subscribed to the *Star Times* decoder, owing to its cheaper options. The study also revealed that many Kenyans were more likely to subscribe to cheaper options if they were presented in the future. Indeed, cost was a major concern in the decision these respondents in Nairobi made about the choice of television viewership they made.

The deadline posed as a challenge due to unpreparedness of media houses, media regulators, and the governments. The Kenyan leading media houses cited that the deadline was so close for them. The three media houses argued that the installation of digital infrastructure was too expensive to be dismantled and replaced. This was not specific to Kenya; Okon (2015) supports that a few countries in the world attain their set timelines. There are also the financial challenges that faced both the media houses and the governments. For example, in Kenya, the government had limited resources to carry out protracted sensitization campaign.

Most Kenyans may not afford set top boxes which are free to air given that the level of unemployment and therefore poverty is very high. If something is not done to salvage the poor,

media houses would lose their audience and their business alike. Studies have pointed out common challenges such as technological gaps, unprepared government, corruption and gross mishandling of the digitization process (Ndonye *et al* 2015).

2.6 Satisfaction of Television Viewers

Watching television bring satisfaction in terms of news awareness and also it is a common source of entertainment for many household. Digital television has clearer picture and sound quality. Nevertheless, the COFEK (2015) filed a case on the reason that the CAK had no ground for witching off the analogue transmissions for a short notice. According to Langat (2014), media houses were not willing to shift to digital transmissions. Thus, this begs the question why even after given the benefits associated with digital migration. It is important to note that digital television has a wider content when compared to the analogue television. For, this reason watching digital television exposes the viewers to wider television coverage. To the least, this offers a choice of selection given that some channels are Free to Air and thus may be less costly once the set top box has been acquired. Digital television also offers subscription for the channels that interest the respective viewers. The subscription bouquet vary in prices and thus allows more watching depending on preferences and ability to pay of the households.

According to Blackwell *et al.*, 2006) consumer satisfaction may be compromised if the perceived value if lived up to the expectations of the consumers. Thus, consumers' satisfaction may not be measured at a single point in time but is evaluated in both the phases of pre-implementation and post implementation of changes in the television transmissions. Beal (2013) asserts the migration of digital televisions from analogue is better since viewers can use single aerial among them. For this reason, digital television saves costs to the television consumers.

2.7 Theoretical Framework

This study was guided by the following theories: Theory of Planned Behavior, Technology Acceptance Theory, and Diffusion of Innovation Theory.

2.7.1 Theory of Planned Behavior

The study is relevant to the elements of the Theory of Planned Behavior which was developed by Icek Ajzen in 1988. Theory of Planned Behavior, offers a model which can measure how human actions are guided. It predicts the occurrence of a particular behavior, provided that behavior is

intentional. Ajzen (1991) explains the conception of this theory which began as the Theory of Reasoned Action in 1980 as a way to predict a person's intention to participate in a behavior at a specific time and place. The intention of the theory was to explain all behaviors over which people are able to exert self-control. The crucial element of the theory was behavioral intent. He extends his argument stating that behavioral intentions are influenced by the attitude about the likelihood that the behavior will have the expected result and the subjective evaluation of the risks and benefits of that result.

The theory has been used to explain an extensive range of behaviors and intentions such as drinking and health service utilization, among others. He emphasizes that behavioral achievement depends on both motivation (intention) and ability (behavioral control). In contrast to the Theory of Reasoned Action, which proved to not to be 100% voluntary and under control, the Theory of Planned Behavior possesses perceived behavioral control where it predicts deliberate behavior since behavior can be deliberative and planned.

The theory of Planned Behavior is an expansion of the theory of Reasoned Action by Fishbein and Ajzen after discovering that behavior was not completely voluntary and under control. This statement points out that specific attitudes toward the behavior in question can be expected to predict that behavior since behavior can be deliberative and planned, the behavior in question, being the attitude by media consumers toward the change in broadcasting during the digital migration period. The implication here is that if the consumers have a positive attitude toward the change in broadcasting they will eventually feel confident to comply with purchasing Set-Top boxes in order to receive the digital signal.

Behavior is not performed automatically but rather follows a reasonable and consistent approach to behavior-relevant information that is available to anyone. He suggests that the theory of reasoned action, the root of the Theory of Planned Behavior, is partly traced to a confrontation with radical behaviorism and its law of effect. He refers to operant conditioning principles which state that behaviors succeeded by rewarding events are reinforced and vice versa (Lange, Kruglanski and Higgins, 2012:438). This addresses the consideration that the individual makes in the Behavioral Attitude part of the Planned behavior model, where he makes the evaluation of whether the behavior is enjoyable or not. Therefore, relating to this study, the media consumers

should be able to evaluate whether there is a rewarding quality in complying with the change in broadcasting (Kihagi, 2015).

Model borrowed from Theory of Planned Behavior was used by Sheppard, Hartwick and Warshaw (1988) for recognizing that it does not only calculate consumer intentions but it also presents a relatively simple basis for identifying where and how to target behavioral change attempts of the consumers. However, Sheppard et. al cite Fishbein and Ajzen as stating that a behavioral intention measure will predict the performance of any voluntary performance, unless intent alters prior to that performance or if the intention measure does not match the behavioral criterion in terms of action, context, time-frame or specificity. Therefore, practically, time-frame and specificity can be reduced by paying attention to the connection between performance criterion and wordings of the attitude, subjective norm and intention questions. Keen administration of the measures of attitudes, subjective norms and intentions to the performance time as well can aid in the reduction of the constraint to behavioral intention measure.

The model borrowed from Theory of Planned Behavior is applied to situations where: the target behavior is not completely under the subjects' voluntary control and the subjects' intentions are evaluated when it is impossible for them to have access to the necessary information to form a completely confident intention. Here, Sheppard et.al argue that if a consumer is not able to have control over a particular behavior or are not confident in it due to lack of proper information about it, then they will most likely not participate in it. In relation to the change in broadcasting covered in this study, in order for the consumers to succumb to the change in broadcasting, they should be able to feel confident in its benefits by having adequate knowledge on it. Soy (2015) argues that most Kenyans were left confused and in the dark after TV stations switched off their digital signals in protest on February 14 2015, due to a long-running dispute with the government over the switch to digital broadcasting, where the day before the Supreme Court ruled against their request for a three-month delay. The theory discussed in this study portrays different aspects of the human behavior toward an introduction of an idea. It assesses the behavior of individuals toward new ideas thus measuring how human actions are guided. The theory explores the exertion of self-control by an individual (Behavioral intent) as well as Motivation (Intent) and Ability (Behavioral).

2.7.2 Technology Acceptance Theory

Technology Acceptance Model (TAM) is a model developed by Davis in the 1980s. TAM is a theory that seeks to assess the factors that influences the acceptance of new products. According to Venkatesh and (2000), the perceived usefulness of a new technology is influenced by the perceived ease of the new tool. Where the item is user friendly it has a higher perceived use. To this end, new technology is accepted if it can be use easily by the targeted users. Technology changes rapidly and thus it is crucial for developers to ensure that the new systems, processes or products can be used with much ease. Consequently, acceptance of new technology is thus a function of easiness of use. According to (Ma & Liu, 2004), this theory helps in examining the adoption of technology, acceptance and usage of new technological. Aleke *et al* (2010), TAM is based on the concept of reasoned action meaning that change acceptance is influenced by beliefs and attitudes towards the proposed changes in technology. According to Khosrowpour, 2002), this theory is based on the intended user of technology. Use of technology depends on various factors. Among the factors are the perceived value of the technology, ease of use and the usefulness of the technology.

This theory is best suited for this study because adoption of digital television involves acceptance of new technology. Digital migration transmissions are a change from analogue to digital and thus its acceptance depends on the user's perceived usefulness that is a function of ease of use and perceived quality. Viewing television in digital transmissions provides a wide content in terms of channels. However, the content perceived value is different from one user to another. This is also true for the usefulness of digital television.

2.7.3 Diffusion of Innovation Theory

This theory was postulated by Everret Rogers in the 1990s and seeks to explain the spread of innovations across departments of the same industry or across industries. Adoption of new technology is a complex process and involves the transfer of messages among change agents in the industry. According to Saleh (2013) the traits of an innovation may encourage or discourage the adoption of a new technology. Powell (2008) identifies that an innovation has three phases: the innovation itself, diffusion process and adoption. Of importance is the adoption of the new technology by the first agents to come by it since if it is perceived to be of high quality and

utility, then it will be diffused to other segments in the market. This theory is important in that it helps in relating the study to the subtle reasons that may lead to its acceptance when its newly introduced in the market.

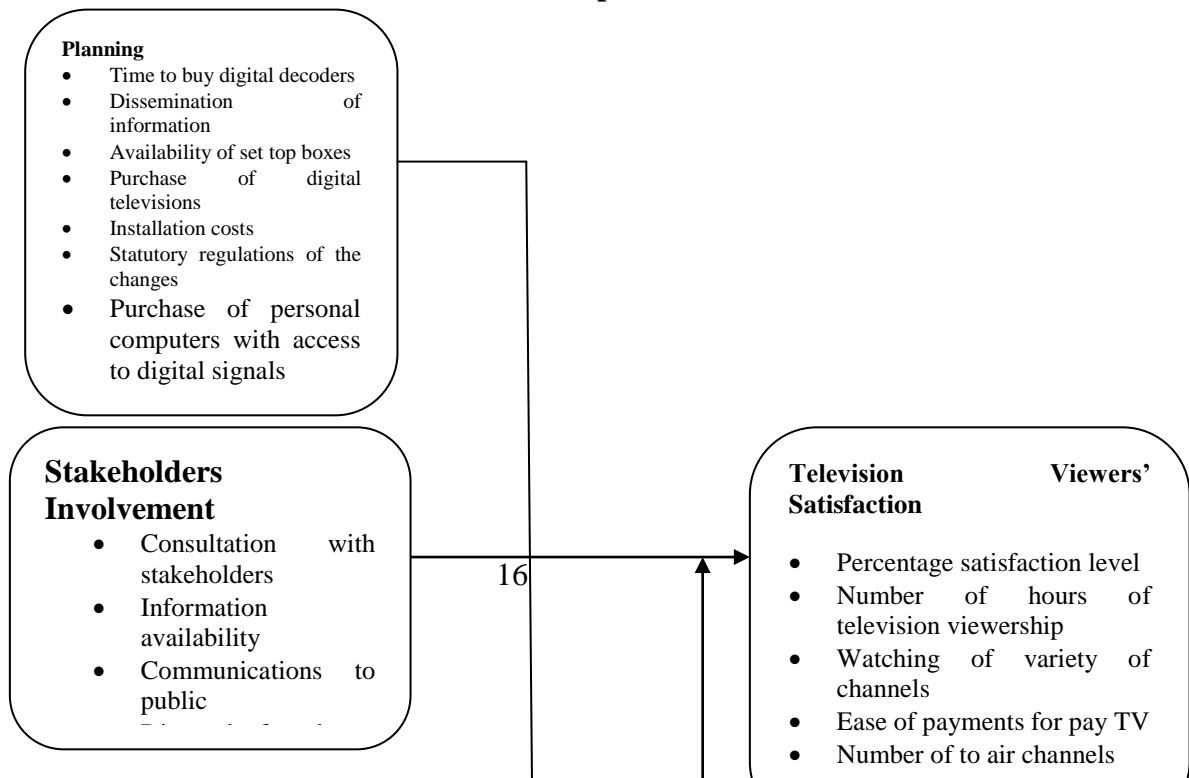
According to Fourie (2007), the adoption of a new technology begins with the awareness in which the target users get the information on the existence of a new technology. This phase is very important as it disseminates the information about proposed changes. When the people are aware of the existence of a new technology, they may gain interest or not. If there is no interest, then the technology does not receive good acceptance in the market. If the perceived value is high, the new technology may be adopted and use fully. This theory is very crucial because it helps in shedding light on what causes new technology to fail or succeed in the market. Asfaw (2006) notes that effective implementation of a new technology calls for a careful planning at the initial stages. Thus, the migration to digital television calls for proper planning if it is to succeed. This theory connects well with this study because it explains on the reason why digital television may receive good or bad acceptance.

2.8 Conceptual Framework

The conceptual framework shown on figure 2.1 represents the conceptualized interaction between the independent variables and the dependent variable. Therefore, the conceptual framework generally depicts the conceptualized influence of planning, stakeholders, change and subscription on television viewers' satisfaction among the audiences in Lang'ata Sub County.

Independent Variables

Dependent Variable



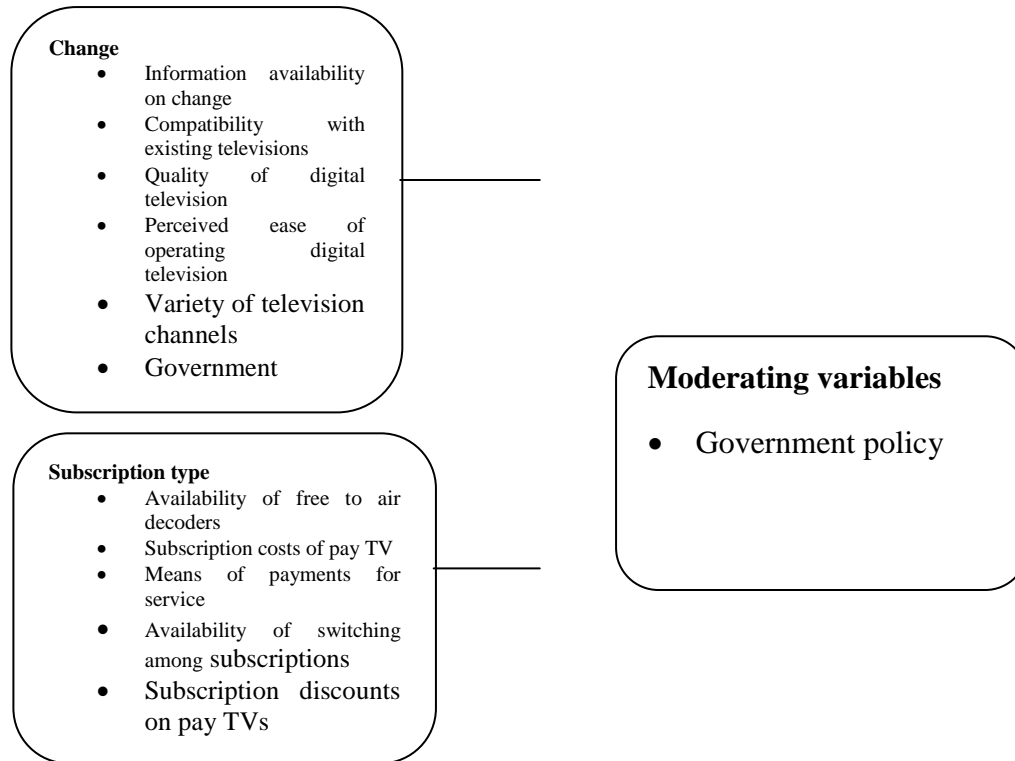


Figure 2.1 Conceptual Framework

Planning for the digital migration was important since the change would be faced with some opposition. There is a need for the CAK to offer timely information on the switch off dates and also clarify on the availability of the set top boxes. It may be necessary to ensure that enough time is given to the general public in order to acquire the decoders. Thus, they need to be priced fairly and information on if they are free to air or pay TV be disclosed on set. By large this will need installation costs and thus will reduce the amount of savings for the household by the same. To this end, it is paramount that the perceived value and quality of digital TV be high to record good acceptance by the public. If this happens, then the digital migration will be successful and consequently may lead to higher consumer satisfaction. Further, enough time before switching to digital transmissions. Compatibility of the existing technologies need to be tested for

amendments rather than doing an overhaul of the whole transmission systems. This would further save cost for the communications regulator in Kenya.

Television viewing is for the general public and to this end; all stakeholders need to be consulted before the switching is done. It is equally important for the public to be made aware on how to dispose their analogue televisions should they be rendered unusable. Electronic equipment should be disposed correctly; hence information pertaining the migration and other pertinent information should be made available to the general public. Further, there may be a need to regulate content provided by the digital television to safeguard the morals of the community. This is because of the variety of content present in adoption of digital television. The public opinion on digital transmission need to be heard and the same factored in digital migration.

Information on the proposed change from analogue to digital need be communicated to all. The general public should be educated on the compatibility of the decoders they have already. In as much as the change to digital television has accompanying benefits, it is important for the change to be communicated in good time. The international telecommunication union agreed that all televisions should broadcast by digital transmissions by late of June 2015. This proposed change was meant to ensure saving on systems as digital transmissions would accommodate much line across a bandwidth. However, there have been conflicts in Kenya regarding the move. It is for this reason that this study proposal seeks to assess if the change from analogue to digital has led to a higher satisfaction among the televisions viewers in Nairobi City County.

Also, subscription to digital television should be fair for consumers to afford them. Thus, in this light, TV owners need to acquire equipment that permit or receive digital wavelengths. Each pay TV will hence require a decoder. Decoders may be expensive depending on the income of the people. Pay per view is a type of subscriptions in which the viewers can pay to watch specific programs of their interests. However, there are free to air set top boxes that are fairly inexpensive and are thus attractive to many subscribers. All these factors may lead to high or poor viewers' satisfaction on the digital platform. This study will seek to establish the influence of digital migration on the satisfaction of televisions viewers.

Proper planning and organization of the digital migration process influenced the satisfaction of TV viewing in Kenya. This is because, when the public has information and time to shift, the

reception of the change may be good. The change calls for changes in TV sets and purchase of decoders and set top boxes. It is important for stakeholders to be involved in such a change in transmissions. Much as the government is mandate to effect policies of international cooperation and concern, like digital migration, it is prudent for all members with interest to be consulted. The general public has a right to information on proposed changes and accessibility of the decoders for ease of purchase. The change in TV transmissions may change the view on perceived quality in terms of picture and sound. Digital TV comes with a variety of content too. The type of subscription also has an influence on the satisfaction of viewership. The free to air digital platform may benefit those with low resources. Pay TV on the other hand is good for those who may have disposable income. This study will seek to assess the influence of digital migration planning, stakeholders' involvements, change from analogue and subscription type of television viewers' satisfaction in Nairobi City County.

2.9 Gaps in Literature Review

Previous studies in digital migration have concentrated on challenges of the process and the causes of such challenges (Beal, 2015; Ndonye, Khaemba and Bartoo, 2015; Okon, 2015). These studies have not shown implications of digital migration and television viewers' satisfaction among audiences. In addition, subscription type, stakeholders' involvement and change from analogue to digital TV have not been investigated in terms of their influence on television viewers' satisfaction among audiences. It is in this background that the proposed research study seeks to bridge research gaps by establishing the influence of planning of digital migration, stakeholders' involvement; change from analogues and subscription satisfaction in Nairobi City County.

2.10 Summary of Literature Review

The literature reviewed has shown that planning of digital migration, stakeholders' involvement, and change from analogue and subscriptions may have influence on television viewers' satisfaction. The review also connects the theoretical and conceptual framework of the study as well as explanation of variables. Indeed, the major concept in the research is that the digital migration process in Kenya was planned, in order to influence the views and perceptions of television viewers in the country. Regardless of the efforts made, the general satisfaction in the

country is still wanting in this regard. The research sought to establish the tenets of dissatisfaction among television viewers. Based on empirical data from other studies, the main variables in the research have been identified as factors that influence satisfaction among television viewers, since the onset of digital migration. It is these views that are further explored in the ensuing survey done in this study.

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

This chapter presents the research methods and procedures that were used to achieve the set objectives of the study. It comprises of research design, target population, sample size and sampling procedures, data collection instruments, data collection procedures, data analysis techniques, ethical considerations and operational definition of variables.

3.2 Research Design

This study adopted a descriptive survey design. Research design refers to the arrangement of conditions for collection and analysis of data in a manner that aims to combine relevance to the research purpose with economy in the procedure (Babbie, 2002). According to Mugenda and Mugenda (2003) a descriptive research design is suitable in describing the elements as they exist in the phenomenon under assessment. A descriptive survey design is the most appropriate for investigating the implications of digital migration on television viewers' satisfaction in Lang'ata Sub-County. The reason for adopting a descriptive research design is because; this study seeks to describe the phenomenon in the area of study. This is because it was possible to have data in various forms that enhanced description of the existing scenarios. Another reason for adopting descriptive research design is that the researcher literally went to the field during the survey to ask about the interests in the population under study. This study therefore adopted descriptive type of research design where both quantitative and qualitative methods were used. Quantitative methods were a good aid in generalizing the findings of a research. On the other hand, qualitative data helped in getting insights that of television viewers that may not be expressed into numerical terms.

3.3 Target Population

According to Mugenda and Mugenda (2003), a target population is the entire group of individuals or items under consideration in any field of inquiry and has a common attribute. The population in this study comprises of television viewers in Lang'ata Sub County. There are estimated 126,715 in households with TV sets (KNBS, 2009).

3.4 Sample Size and Sampling Procedures

Sample is the portion of the study population that represents the whole. It is expected to have similar characteristics with the whole and findings in this sample are normally generalized to represent study population. Sampling procedure is the method of selecting individual respondents who will form the sample. This procedure is important and is expected to provide every potential respondent with an equal chance of being selected to participate in the study.

3.4.1 Sample Size

Since the number of households with TV sets Lang'ata Sub County is higher than 10,000. The sample for this study was determined using Fisher's formula $n = \frac{Z^2 pq}{d^2}$,

Where:

n = required sample size

p= 1-q (variance expected in the responses assumed to be 50:50 proportion rate).

Z = Z score value at 95% confidence level (standard value of 1.96)

q = Estimated responses.

d = Level of precision or margin of error at +/-5% (standard value of 0.1).

$$n = \frac{Z^2 pq}{d^2} = \frac{1.96^2 (0.5 * 0.5)}{0.05^2} = 384$$

3.4.2 Sampling Procedures

This study used cluster sampling to select a sample size of 384 respondents from Lang'ata Sub County. The total sample was therefore be 384 as shown in Table 3.1.

Table 3: 1

Sample Size

Category	Sample	Methods of Sampling
Number of Respondent Households	384	Cluster sampling

3.5 Data Collection Instrument

This study used a semi-structured questionnaire and interview schedule to collect data. The questionnaire had both open and closed ended questions to allow standardization of responses and at the same time give respondents the opportunity to indicate their opinion on the phenomenon under study. It had six sections. The first section seeks information on the background information of the respondents. The second, third, fourth and fifth sections sought information on digital migration planning, stakeholder's involvement, change to analogue TV and subscriptions types respectively.

3.5.1 Pilot Testing of the Instrument

A pilot study of 38 respondents was carried out before the main study. The sample comprised of television viewers in area under study. The aim of this pilot was to test the research instrument to be used in the main study. Mugenda and Mugenda (2003), cite that a relatively small sample of 10 % of respondents is enough for a pilot study. Further, the pilot study helped the researcher to reword the sections of the questionnaires that may not be clear to the respondents. The sample size of the study was 380 respondents. To this end, 10 % is 38.4 rounded down to 38. It is important to note that the respondent in the pilot study was taken from the remaining respondents after the sample size has been taken. This helps in collecting data in a non-manipulated environment. The findings are presented in Table 3.2 (Pg. 26).

These findings of the pilot study indicate that subscription type has the highest reliability ($\alpha=0.821$) followed by digital migration planning ($\alpha=0.813$), change from analogue TV ($\alpha=0.782$) and finally stakeholder's involvement ($\alpha=0.741$). These finding indicate that the four independent variables were reliable since their reliability was more that the lower limit of 0.7 (Nunnally, 1978).

3.5.2 Validity of the Instrument

Validity of a research instrument is the measure of the quality of data a given set of data collection instrument provides with respect to what it is expected to collect. In other words, it

means whether the data collected by an instrument is capable of being analysed into meaningful inferences. This study proposal adopted content validity. For this reason, the researcher involved a professional in the field of technology to guide on the development of the questionnaires to households. It is important to note that content validity leads to logical conclusion as to if the research instrument contains what it is supposed to. Content validity ensures that the questions accurately assess what they are supposed to. Validity is valuable to a researcher since it ensures that findings can be generalized about the phenomenon being assessed. According to Robinson (2002), validity is the degree to which result obtained from the analysis of the data actually represents the phenomenon under study. The validity of research instruments used in the study ensured by reviewing and discussing them with the supervisor. The supervisor was able to advice on the most appropriate indicators that will measure variables of the study.

3.5.3 Reliability of the Instrument

The accuracy of data to be collected largely depended on the data collection instruments in terms of reliability (Mugenda & Mugenda, 2003). Reliability is the degree to which a research instrument is consistent in capturing information on a phenomenon. This study adopted internal consistency reliability. This was achieved by pilot testing the instrument to be used to identify and change any ambiguous, awkward, or offensive questions and techniques as emphasized by Cooper & Schindler (2003). In this study, reliability ensured through pilot testing of the research instruments and using Cronbach's Alpha value to establish whether the research instrument is reliable or not. A Cronbach's Alpha value of 0.7 and above is recommended for a reliable research instrument (Nunnally, 1978). The Cronbach's alpha is obtained by correlating the score of each item and comparing them with the outcome of all scales of items. It is used for ensuring that consistent results are obtained after a rewording the concept questions in the study questionnaires. Thus, the alpha value helps in identifying the number of items in a test question to meet the objectives. However, the alpha value is not an indication of validity. This study adopted internal consistency reliability as depicted by the alpha value, to ensure that the questionnaire can be depended upon in meeting the objectives of the study.

Table 3:2

Reliability of the Instrument

Variables	Cronbach's Alpha	Number of Items
Digital migration planning	0.813	8
Stakeholders' involvement	0.741	5
Change from analogue TV	0.782	8
Subscription type	0.821	6

3.6 Data collection Procedures

The method of data collection used both primary and secondary methods. Primary data is data collected first hand from the respondents. On the other hand, secondary data is collected from already available materials such as other researchers and journal articles. Primary data was collected from television viewers in Lang'ata Sub-County using questionnaires. A questionnaire is a useful instrument of collecting primary data for a descriptive study. The study questionnaire had two types of questions: the closed ended questionnaires were meant to capture data on specific issues while the open-ended questions made it possible to collect information that may not be foreseen during development of the questionnaire. Further, the questionnaire was divided into two main sections. The first section sought to collect data on demographic traits of the respondents while the second section sought to collect data specific objectives being sought by the study. The questionnaires were administered using drop-and-pick-later method. This method gave respondents ample time to fill their questionnaires. Face-to-face interviews method was used to collect data from key informants. Secondary data was obtained from publications such as journals, published and unpublished research work, dissertations among others. Secondary data is referred to as data mining and is helpful in determining what has been established prior to the current study. It is important to note that data analysis will involve comparisons with other findings documented in other studies. Thus, it is inevitable to carry out a study without carrying a background check on what has been done by other researchers and scholars.

3.7 Data Analysis Techniques

The study had both quantitative and qualitative data. Quantitative data was analyzed using descriptive and inferential statistics. Descriptive statistics such as viewership frequencies, subscription percentages and satisfaction mean scores were used to describe each variable. Data was analysed using SPSS, version 22 in order to get the mean and standard deviations of the responses that seeks to meet the study specific objectives. The study presented data in frequency tables for all the objectives as this was a guide in giving the insights about the indicators of the variables being assessed. Of importance is that data were interpreted by explaining the percentages, means and standard deviations. Content analysis was used to analyze qualitative data.

3.8 Ethical Considerations

The researcher sought approval and obtained a research permit from National Commission for Science, Technology and Innovation (NACOSTI). The researcher also informed consent from the respondents. The respondents were requested not to indicate any identifying information in the questionnaires that they filled. Confidentiality was upheld throughout the study from data collection to reporting.

3.9 Operational Definition of Variables

Variable	Type	Indicators	Type of analysis	Scale
Digital migration planning	Independent	<ul style="list-style-type: none"> • Time to buy digital decoders • Dissemination of information • Availability of set top boxes • Purchase of digital televisions • Installation costs • Statutory regulations of the changes • Purchase of personal computers with access to digital signals • Time notice to block analogue signals 	Descriptive statistics <ul style="list-style-type: none"> • Mean • Standard deviation • Frequency distribution tables • Inferential statistics 	<ul style="list-style-type: none"> • Nominal and Ordinal
Stakeholders involvement in digital migration	Independent	<ul style="list-style-type: none"> • Consultation with stakeholders • Information availability • Communications to public • Disposal of analogue TVs • Content regulations • Parental control of digital television • Public opinions on digital migrations 	Descriptive statistics <ul style="list-style-type: none"> • Mean • Standard deviation • Frequency distribution tables • Inferential statistics 	<ul style="list-style-type: none"> • Nominal and Ordinal
Analogue TV change	Independent	<ul style="list-style-type: none"> • Information availability on change • Compatibility with existing televisions • Quality of digital television • Perceived ease of operating digital television • Variety of television channels • Government regulations • Perceived utility and value of digital television 	Descriptive statistics <ul style="list-style-type: none"> • Mean • Standard deviation • Frequency distribution tables • Inferential statistics 	<ul style="list-style-type: none"> • Nominal and Ordinal
Subscription type	Independent	<ul style="list-style-type: none"> • Availability of free to air decoders • Subscription costs of pay TV • Means of payments for service • Availability of switching among subscriptions • Subscription discounts on pay TVs • Installation and reinstallations costs • Self-servicing of decoders 	Descriptive statistics <ul style="list-style-type: none"> • Mean • Standard deviation • Frequency distribution tables • Inferential statistics 	<ul style="list-style-type: none"> • Nominal and Ordinal
Technology change	Dependent	<ul style="list-style-type: none"> • Change from analogue to digital television • Acquisition of digital decoding tools 	Descriptive statistics <ul style="list-style-type: none"> • Mean • Standard deviation Inferential statistics	<ul style="list-style-type: none"> • Nominal and ordinal

CHAPTER FOUR

DATA ANALYSIS, PRESENTATION AND INTERPRETATION

4.1 Introduction

This chapter contains data analysis, presentation, interpretation and discussions of the findings on the specific objectives that were being sought by the study. The purpose of this study is to investigate the influence of digital migration on television viewers' satisfaction in Nairobi City County. The study sought to establish the influence of digital migration planning, stakeholder's involvement in digital migration, change from analogue to digital television and subscription of digital TV on the level of satisfaction of television viewers. This study has presented data in form of frequency tables and interpretations have been enhance by use of percentage.

4.2 Questionnaire Return Rate

The study had issued 384 questionnaires to the respondents in order to collect data for analysis. 319 questionnaires were filled and returned making the response rate be 83%. A response rate of 83 % is considered excellent and is good enough for data analysis and generalization of findings. According to Mugenda and Mugenda (2003) a response rate of 50% is adequate for data analysis and findings reporting; a rate of 60% is good and a response rate of 70% and above is excellent. The excellent response rate is attributed to the fact that the respondents were given enough time to fill the questions. The questionnaire return rate results are presented in Table 4.1

Table 4: 1

Questionnaire Return Rate

Questionnaire Category	Number	Rate (%)
Questionnaires issued	384	100
Questionnaires returned	319	82.2
Questionnaires not returned	65	17.8

4.3 Demographic Characteristics of the Respondents

The study had a target population of TV viewers in Nairobi City County. To its end it was important to collect data on demographic features of the respondents.

4.3.1 Age of the Respondents

The study collected data on the age of the respondents. The findings are indicated in the Table 4.2.

Table 4: 2

Age of the Respondents

Age Bracket	Frequency	Percentage
Between 12-20 years	31	10
Between 21-30 years	97	30
Between 31-40 years	113	35
Between 41-50 years	50	16
Above 50 years	28	9
TOTAL	319	100

Table 4.2 indicates that a majority of the TV viewers were in 31-40 age bracket. Within this bracket were 113 viewers, representing 35% of the respondents. 30 % of the respondents (97 viewers) were in the 21-30 age bracket. 50 viewers, representing 16 % of the respondents were in the 41 -50 years category. A further 10 % of the respondents (31 viewers) were below 20 years. 28 viewers, who were above 50 years represented 9 % of the sample. This finding indicates that a majority of TV viewers are of middle age.

4.3.2 Length of time of viewing Digital TV

The study ought to establish the time period the respondents have being viewing the digital Television. The findings of the objective are indicated in the Table 4.5.

Table 4: 3

Length of time of viewing Digital TV

Length of time of viewing Digital TV	Frequency	Percentage
Less than1 month	11	3
Between 1- 5 months	63	20
Between 6- 10 months	98	31
Above 11 months	147	46
Total	319	100

Table 4.3 indicates that a majority, 46 % have watched digital TV for more than 11 months, 31n % for 6 -10 months, 20 % for 1-5 months and 3 % for less than 1. This indicates that digital TV have been around for a considerable time period. Also, it means that the respondent could articulate the benefits of digital TVs, the process of digital migration and satisfaction and thus this fosters the validity of the study findings.

4.3.3 Academic Qualification of Respondents.

The study had sought to find out the highest level of academic qualification of the respondents and the study finding are tabulated as in Table 4.4

Table 4: 4

Academic Qualifications of Respondents

Highest Level of Education	Frequency	Percentage
Primary Education	3	1

Secondary	21	7
College	135	42
University degree	160	50
None	0	0
TOTAL	319	100

Table 4.4 indicated that a majority 50 % of respondents had university education, 42 % college education, 7 % had secondary education, 1 % had primary education. This finding indicates that the respondents had achieved different level of education. With respect to this research, this finding indicates that the respondents were educated enough to understand and fill the questionnaires correctly.

4.4 Digital Migration Planning and its Influences on Television Viewers' Satisfaction

The study has sought to establish whether digital migration planning influences television viewers' satisfaction in Nairobi County. The findings are indicated in the Table 4.5

Table 4: 5

Digital Migration Planning and its Influences on Television Viewers' Satisfaction

Digital Migration Planning and its Influences on Television Viewers' Satisfaction	Mean	Standard deviation
I welcomed digital TV migration because the time to buy digital decoders/set top boxes was sufficient for me	2.13	1.581
I welcomed digital TV because Information on digital migration was availed to me hence we were able to plan for the shift.	3.17	0.192
I kept watching TV during the shift time because the digital set top boxes were accessible in the market	2.79	1.513
I switched to Digital televisions immediately after the deadline because it was not expensive to acquire the decoders	1.13	0.179
In my opinion, I switched to digital after a while since installation costs were high in the market	3.45	1.394

The digital migration was well regulated hence it was easy to shift almost immediately after the analogue shutdown.	2.83	1.421
I opted to use of personal computers with digital TV cards hence the shift did not stop me from viewing TV	1.27	0.625
I welcomed digital TV because the time notice for blocking analogue signal was sufficient and hence the shift was accepted	2.04	1.318

The study found out that the most influencing factor on digital migration planning is the cost of digital televisions which affected the viewers' satisfaction at the lowest mean of 1.13 with a standard deviation of 0.179. Digital migration was effected by the communications authority of Kenya which is a government department. It is important when such a change is proposed the general public be educated on the choice available as it will ensure that the adoption of the change will not face resistance. However, the digital migration was an international declaration and hence it was the responsibility of the respective government to ensure a smooth transition. The time to buy the digital decoders should be enough and the same should be accessible in the market. On the same note, information should be disseminated in full and on a timely fashion such that all members of the television fraternity are aware on the change and what to expect. The available options should be communicated to the general public without misleading them into buying decoders that won't do them any good. Technology changes such as digital migration is a change that primarily is implemented by the government and thus should not face hiccups since the government has mechanisms of ensuring smooth transitions. Further, it's important to ensure that the time notice is fair to enable households plan for the acquisition of digital set boxes or digital televisions.

4.4.1 Time to buy digital decoder was sufficient for me

The study had sought to establish the influence of time to buy digital decoder and if it was sufficient for the respondents. The data findings were in Table 4.6

Table 4: 6

Time to buy digital decoder was sufficient

	Frequency	Percentage
Strongly agree	20	6
Agree	39	12
Neither agree nor Disagree	41	13
Disagree	117	37
Strongly Disagree	102	32
TOTAL	319	100

Table 4.5 indicates that a majority (37%) of the respondents disagreed that the time given to them to buy digital decoder was sufficient thus enabling continued viewing. 32% of the respondents strongly disagreed with the study, 13% remained neutral while 12% agreed and 6% of the respondents strongly agreed. These findings indicate that the time that was given to viewers to purchase digital decoder was not sufficient to allow continued viewing of the television. It is important to note that information on the technology changes is vital and the general public should be given time in order to plan for the move. Further, decoders may be expensive to some people and thus enough time should be given to household in order to plan and buy digital enabled television or set top boxes.

4.4.2 Information on digital migration was availed to us hence we were able to plan for the shift

The study had sought to determine whether the information on digital migration was available to viewers to allow them plan for the shift. From the findings of the study, a majority 26 % of the respondents disagreed that information on digital migration was sufficient to them, 22 % strongly disagreed, 20 % agreed, 18% were neutral and 15 % strongly agreed. Information on digital

migration was necessary to allow the viewer's plan for the shift on time. These findings indicate that households were not satisfied with how information was disseminated during the planning of the digital migration.

4.4.3 Accessibility of Digital Set Top Boxes

The study had sought to establish if the set top boxes were accessible in the market during the shift to digital migration. From the findings of the study, a majority, 26 % disagreed on the availability of set top boxes in the market during the migration shift. 25% of the respondents agreed with the study, 22% were neutral, 16% strongly agreed with the study and 11% strongly disagreed. It is worth noting that the accessibility of the set top boxes in the market was significant in the digital migration. The shift from digital to analogue ensures that television consumer can watch more channels and the clarity of picture and sound is better. However, at the inception the digital set top boxes were not accessible and thus most households were left with no television.

4.4.4 The price of digital decoders was not expensive to purchase.

The study had sought to determine if the digital decoder were available to viewers at a friendly price thus enabling them to shift easily to the digital experience. The study, found out that a majority, 36 % of the respondents agreed that the decoders were expensive thus making the digital migration inefficient, 30% strongly agreed, 21% of the respondents were neutral, 7% disagreed and 5% of the respondents strongly disagreed with the study. These finding indicates that the decoders were expensive and thus at the inception most households were left with no television. It is important to ensure that when a new technological equipment is being introduced in the market, on a government directive, it should be made available to the general public at a fair price. Digital migration was an international declaration and thus Kenya had no option than to comply. Nevertheless, the government should ensure that the transmission shift is done swiftly without locking people from watching televisions.

4.4.5 Installation cost

The study had sought to establish whether the installation cost was high thus affecting the shift to digital migration. The study, found out that a majority of respondents, 30 % remained neutral on the cost of installation being high during digital migration. 27% agreed, 25 % disagreed, 11 %

strongly agreed while 5% strongly disagreed. This finding indicates that the cost of installation influenced the adoption of the digital television transmission. The installation costs should be fairly set by the digital content providers particularly because this was a new move and thus the public needed governmental consumer protection. If left at the hands of the business people, it may result to exploitation of the general public due to lack of appropriate information.

4.4.6 Regulation of Digital Migration

The study had sought to establish whether digital migration was well regulated facilitating the shift right after the analogue shutdown. A majority of the respondents, 32% were neutral on the efficiency of regulation on digital migration in facilitating the shift. 27% of the respondents agreed, 26% disagreed, 11% strongly agreed and 4% strongly disagreed. This finding indicates that the households were not sure if the digital content were being regulated by the responsible authority. It is important to ensure that digital content, in as much as it come with benefits, there may be harm due to variety. Thus, they are a need to regulate in order to ensure fairness in the industry and also safeguarding of the morals of the nations.

4.4.7 Personal computers with digital TV cards

The study had sought to determine whether there was use of personal computers with digital TV card to facilitate the digital migration. The data findings were in Table 4.7

Table 4: 1

Use of Personal Computers

	Frequency	Percentage
Strongly agree	26	8
Agree	47	15
Neither agree nor Disagree	58	18
Disagree	85	27
Strongly Disagree	103	32
TOTAL	319	100

According to Table 4.7, a majority of the respondents comprising of 32 % strongly disagreed on the use of personal computers and digital TV card in facilitation of digital migration. 27% disagreed, 18% were neutral, 15% agreed and 8% strongly disagreed. According to the study, there was minimal use of personal computers with digital TV cards in the time of shift to digital migration. To this end, it can be deduced that households settled on buying decoders or digital televisions and not use of personal computers. The utility of using personal computers as family television may be minimal and perhaps this is why most settled on decoders.

4.4.8 Time notice to blocking analogue signal

The study sought to establish if the time notice for blocking analogue signal was sufficient and hence the shift was accepted. The study, found out that a majority, 30 % of the respondents disagreed that the time notice given for blocking analogue signal was not enough to allow smooth shift to digital migration. 27% strongly disagreed, 25% remained neutral on the study, 11% agreed and 7% strongly disagreed. TV viewers required more notice time for blocking analogue signal to allow smooth migration to digital signals. Time is of the essence when implementing huge technological changes that affects the general public. To this end, there is a need of allowing enough time to shift and buy decoders or acquire digital televisions. Failure to this, the general public will develop mistrust to the communication authority even when the proposed change is beneficial to them.

4.5 Stakeholders Involvement in Digital Migration

The study has sought to establish how the stakeholder’s involvement in digital migration may have affected viewer’s satisfaction level in Nairobi County. The findings are indicated in the Table 4.8

Table 4: 2

Stakeholders Involvement in Digital Migration

Statement on Stakeholders Involvement in Digital Migration	Mean	Standard deviation
I received all necessary information on free to air TV and Pay TVs and thus I made my choice basing on benefits.	3.49	0.204
Information on digital migration was availed in good time and	3.12	1.413

this is why I like digital televisions.	2.61	0.319
I watch digital televisions because the content regulation in digital TV good for the public	3.83	1.017
The disposal of analogue TV was done in an environmental friendly manner hence I value the change.	2.14	0.029
I believe I was sufficiently involved in digital migration and this is why I like it.		

The study found out that the most important factor in stakeholders' involvement in digital migration is the information availed to the viewers concerning the digital migration with a mean of 4.12 and standard deviation of 1.413. Technological changes that affect the general public need to be done with consultations of all the stakeholders in the industry. The media houses should be involved in the planning since they will be the medium of the change. When the media is involved in such changes, it is more likely that they will educate the public on the changes. On the reverse case, where the media houses are excluded, it follows they may jeopardize such a move by the government. This was the case where the media houses filed a suit opposing the digital migration. Additionally, it is important that the equipment be made accessible and available to the affected sections of the public. In the case, most citizens were affected and thus proper communication on the availability of the digital decoders should be enhanced. Information is crucial in all change environment be it in the public or private sector and thus education was necessary. It is important for the government to ensure that such information dissemination is not left on the hands of the business people since they would manipulate them for their own financial gains. There is also a need to regulate the industry firmly in order to protect the general public from exploitations and also exposure to programmes that may corrupt the morals of the society.

4.5.1 Availability of information on free to air TV and Pay TVs

The study had sought to establish whether the information on free to air TV and Pay TVs was availed to the viewer's thus enabling decision making. According to the study, a majority of the respondents 31% were neutral. 26% agreed and 20% of the respondents disagreed with the study. 17% of the respondents strongly agreed and 6% strongly disagreed. This finding indicates that

there was relative information on free to air televisions and the pay television was available to the general public. However, when they indicated that information dissemination on the planned digital migration was not efficient. Perhaps this means that the households were aware that there was pay TV but they did not have any information on the digital migration. It is important to ensure that proper information is given to the public to avoid misconceptions of the technological changes.

4.5.2 Availability of information on digital migration to the stakeholders

The study had sought to establish whether the information on digital migration was availed to the stakeholders on time enabling them plan for the shift. The study found out that a majority, 30 % of the respondents agreed that the information on digital migration was availed to the stakeholders on time enabling them plan for the shift. 27% of the respondents strongly agreed with the study, 25% remained neutral, 10% disagreed and 8% strongly disagreed. This finding indicates neutral results when inferentially interpreted. Information is crucial on changes and thus the government needs to ensure that the public gets information that is proper and fully disclosed. Digital migration is a kind of an overhaul change that transforms the whole of television platforms. Digital television offers more content on viewership and thus should be welcomed by the general public. However, no matter how good is the change, without proper prior information many may not adopt it in its first introduction.

4.5.3 Content Regulation on Digital

The study had sought to establish whether content regulation on digital TV was good for the public view. From the study, a majority of the respondents, 38% of the respondents disagreed that the content regulation on digital TV was good for the public during the shift. 20% of the respondents remained neutral on the study, 18% strongly disagreed, 13% agreed and 11% strongly disagreed. This finding indicates that digital industry is not regulated enough. Thus, the households may not feel the benefits associated with the change especially where there is an intrinsic cost to be borne. The digital television offers wide television content and thus needs to be regulated that that national standards or morals are not compromised. Also, the digital content providers should be regulated in a way that they remain in business but they don't exploit the general public. It is thus, the responsibility of the government to regulate the industry and ensure

fairness to the general public, to the digital content providers, media houses among other stakeholders.

4.5.4 The disposal of analogue TV

The respondents were requested to rate whether the analogue TV were disposed in an environmentally friendly way thus encouraging the public to embrace the digital migration. Table 4.18 shows that a majority, 31 % of the respondents remained neutral on the study that the disposal of analogue TV was done in an environmentally friendly manner. 24% of the respondents agreed, 20% disagreed, 165 strongly agreed and 9% strongly disagreed with the study. This finding indicates neutral results in that the households were not in a position to tell if the equipment rendered not usable were disposed in the right manner. It is important to ensure that disposal of materials rendered obsolete due to environmental change are done in an environmentally friendly way.

4.5.5 Viewers involvement in digital migration

The study had sought to establish whether the viewers were sufficiently involved in the process of digital migration making them embrace it. From the findings of the study 40 % of the respondents disagreed, 24 % were neutral, 19% strongly agreed, 10% agreed and 6% strongly agreed. A majority of the respondents depicted that they were not involved in digital migration thus made it difficult to embrace it. This finding indicates that digital planning did not consider all stakeholders. Change is good when all to be affected stakeholders are involved in planning. The media houses particularly should have been involved since in this case they would be the change agents. The Communications Authority of Kenya needed to ensure that all institutions were consulted in order to realize an efficient shift from analogue to digital television transmissions.

4.6 Change From Analogue to Digital Television

The study had sought to establish the influence of change from analogue to digital television on television viewers' satisfaction. The data findings are presented in Table 4.9

Table 4.9

Change from Analogue to Digital Television

Statement on change from analogue	Mean	Standard deviation
Digital TV offers much better contents than the analogue TV and hence I watch it for more hours.	4.71	0.065
In my opinion, information on change from analogue was available to you in good time and thus I was prepared hence the change was pleasant for me.	3.58	0.958
Digital set top box is compatible to existing TV set and thus it was not expensive to install the new platform hence my liking digital is fine.	3.19	0.413
I now watch TV for more hours because digital television has high picture and sound quality than the analogue ones.	4.45	0.321
For me, operating Digital TVs is easy	4.17	0.978
Digital TV offers a variety of TV channels hence I like it more than the analogue TV.	4.13	0.159
I believe that digital TV offers services of high quality and offers me value for money.	3.96	1.012

The study has established that Digital TV offers much better contents than the analogue TV and hence I watch it for more hours has the highest positive relationship with viewers' satisfaction with a mean of 4.71 and standard deviation of 0.065. When all facets are considered the study has found out that change from analogue to digital television as a technological change has the highest influence on television viewers satisfaction in Nairobi City County. Digital transmissions ensure that the picture and sound quality is of high quality and thus more entertaining. Also, it comes with a wider geographical coverage as one can watch international channels. The transmission offers a variety of channels hence more satisfaction. Additionally, the study established that most respondents preferred the digital transmissions to the analogue one. The study has established that digital television viewing offers value for the households' money.

Perhaps this is due to the watching of many channels that can be viewed through the digital televisions.

4.6.1 Better Contents on Digital Television

The study had sought to establish if television viewers are more satisfied by watching digital television than analogue television. The study established that a majority, 45 % agreed, 24 % of the respondents strongly agreed, 21 % of the respondents were neutral while 6% disagreed and 5 % of the respondents strongly disagreed on the betterment of content presented by digital television. This finding indicates that the digital televisions transmission is better than the analogue transmissions. It is true to suffice that digital televisions have more channel and also has radio stations. It is for this reason that perhaps, the households indicated positive relationship between digital television and televisions viewing satisfaction.

4.6.2 Information on Analogue Change

The study had sought to establish if information on analogue change was availed in good time and if they were prepared on the change. From the study majority of the respondents, 39 % were neutral, 29 % disagreed, 17 % of the respondents agreed, 14 % of the respondents strongly agreed and those who strongly disagreed were 2 % of the respondents. Where the results are inferentially interpreted, it can be deduced that information was not disseminated promptly enabling. There is a need for technology changes to be communicated without delays especially on the subtle issues. The households need information on compatibility to the existing televisions. It is true to suffice that information is very important while planning and implementing changes at all levels across the institutions irrespective of the industry.

4.6.3 Compatibility of Set Top Boxes

The study had sought to establish if the existing set top boxes were compatible with existing televisions. The study found out that a majority of the respondents, 24 % strongly disagreed, 23% of the respondents strongly agreed, 21% agreed, 20% disagreed while 13 % strongly disagreed. This finding indicates neutral results on compatibility of the existing televisions to the new transmission platforms. Ideally for technology change to succeed, it is crucial that it I done

in a manner that it is compatible with the existing technology. Digital television comes with change in television sets and or buying of digital enabled televisions.

4.6.4 Picture and Sound Quality Of Digital Television

The study had sought to establish if digital television had a more quality picture and sound. According to the study, a majority of the respondents comprising of 56 % agreed, 38 % strongly agreed, 4 % were neutral, 1% disagreed while 1% strongly disagreed. This finding indicates that digital transmissions offers clearer picture and sound. It is for this reason that change from analogue to digital television enhances the satisfaction of television viewers in Nairobi City County.

4.6.5 Ease of Operating Digital Television

The study had sought to establish if the digital television is easy to sue hence fostering satisfaction of television viewers. The study found out that majority of the respondents, 30 % agreed that operating digital television was easy, 18 % were neutral, 29% disagreed, 7 % strongly disagreed and 16 % strongly agreed. This means that digital television and its accompanying decoders are not complex to adopt and thus have been accepted by the households. Technological changes are often in form of new gadgets or new ways of doing things. To this end, digital transmission involves acquisition of new set top boxes or digital televisions. When they are regarded as with ease of use, they will be adopted fast by the households and their satisfaction will be high.

4.6.6 Variety of TV Channels

The study had sought to establish if Digital TV offers a variety of TV channels hence I like it more than the analogue TV. The study established that majority of the respondents, 55 % agreed that digital television offered a variety of content, 37 % of the respondents strongly agreed, 3 % strongly agreed, 2 % of the respondents disagreed while 3 % were neutral. This finding indicates the digital television transmissions allow watching of many channels and this increases the number of hours households watch televisions. It is true to suffice that digital television transmissions offers a wide coverage both locally and internationally. Digital television offers the free to air channels and has pay channels. The free to air channels are quite enough for the

households without much disposable income to service the subscription on monthly basis. On the other hand, pay television offers more channels with a premium charge.

4.6.7 Digital Television and Value For Money

The study had sought to establish that digital TV offers services of high quality and offers me value for money. The study determined that majority of the respondents, 27 % agreed that digital television offer value for their money, 26 % of the respondents disagreed, 4 % remained neutral, and 23 % strongly disagreed. This finding indicates that the households are satisfied that digital television offers them a value for money. Primarily, consumers would keep consuming products and services which they feel they are getting value for their money. Thus, when they feel that the digital television charges and yet they may discontinue on the pay televisions and settle on the free to air stations.

4.7 Subscription Types of Digital Television.

The study had sought to establish the potential influence of subscription types on satisfaction of television viewers. The data findings are presented in table 4.10

Table 4: 3

Subscription Types of Digital Television.

Statement on Subscription Types of Digital Television	Mean	Standard deviation
The Free to Air channels on digital TVs have enough contents and thus I can watch all the programmes that are of interest to me through them	2.15	1.134
Subscription costs for digital TV is fair hence I can watch TV for sufficient hours and this enhances my satisfaction in TV viewing.	2.98	0.589
The means of payments for the subscriptions are accessible hence I do not get disconnected and this does not reduce my TV hours and for this reason digital TV is pleasant to me.	4.17	0.742
The installation and reinstallation fees are fair for digital television decoders are fair and do not make me feel burdened.	3.17	0.781

Digital decoders are easy to operate and service hence saves on cost of hiring repairers due to their ease of use.	3.91	0.138
Pay TV has more quality services that the Free to Air channels and hence I spent more hours on the former.	4.32	0.624

The study has established that subscription type affects the satisfaction of television viewers in Nairobi City County. The most influencing facet was found to be that, pay television offers more channels and hence enhances the satisfaction of television viewers at a mean of 4.32 and standard deviation of 0.624. With this observation, it can be deduced that there is a positive relationship between subscriptions types and satisfaction televisions viewers. The study has further established that the free to air channels are not as satisfying as he pays TV channels. Perhaps, this is because, the pay television channels offer more sporting channels and broadcast games in real time. The households also indicated that the subscriptions were not fair and thus there is a need to make the pricing of the pay channel reachable by the majority of the general public. The digital transmission of television waves ensures that a single bandwidth is used to transmit different programmes and thus should be fairly priced. The study has also established that the means of payment of subscriptions charges are accessible and hence convenient for the subscribers.

4.7.1 Sufficiency of Free to Air Contents

The study had sought to establish if the Free to Air channels on digital TVs have enough contents and thus if they can watch all the programmes that are of interest to me through them. The study established that a majority of the respondents, 56 % of the respondent disagreed that free to air offer sufficient content, 21 % strongly disagreed, 14 % agreed, 5 % strongly agreed and 3 % were neutral. This finding indicates that the free to air channels are not satisfying to the households. It is crucial for digital content providers to ensure that they offer more channels to the those who may not be in a financial position of subscribing for the paid channels.

4.7.2 Fairness Subscription Cost

The study had sought to establish if subscription costs for digital TV is fair hence they can watch TV for sufficient hours and this enhances my satisfaction in TV viewing. From the study,

majority of the respondents comprising of 30 % strongly disagreed, 25 % of the respondents strongly agreed, 20 % of the respondents agreed, 11% of the respondents disagreed and 13 % of the respondents disagreed. This means that the households did not consider the digital television as fair and thus this may compromise their satisfaction while watching television. To the least, the digital content providers should consider the low-income earners when they are pricing their categorizing the bouquets.

4.7.3 Accessibility of Payment Options

The study had sought to establish if the means of payments for the subscriptions were accessible hence viewers did not get disconnected and this did not reduce their TV hours. From the study, majority of the respondents comprising of 59 % (187 respondents) agreed that the payment means of digital TV were accessible, 34 % of the respondents (109 respondents) strongly agreed, 2 % of the respondents (5 respondents) strongly disagreed, 1% of the respondents (3 respondents) disagreed and 5 % of the respondents (15 respondents) were neutral. These findings indicate that accessibility of payments fosters the satisfaction of television viewers in Nairobi City County.

4.7.4 Installation and Reinstallation Fees

The study had sought to establish if installation and reinstallation fees were manageable and thus did not affect television viewers negatively. The study found out that a majority of the respondents, 24 % disagreed that installation and reinstallation costs were fair, 21 % strongly disagreed, 18 % were neutral, 17 % strongly agreed. About 20% of the respondents disagreed with the study while 18% agreed. This implies that the installation and reinstallation costs of digital television platforms are expensive and thus the government needs to consider lobbying with the digital content providers to lower them. It is true to suffice that change is an expensive affair and thus it is good when the equipment is lowly priced.

4.7.5 Digital Decoders Are Easy to Operate

The study had sought to establish if digital decoders were easy to operate and if they saved them repair costs. From the study, a majority of the respondents at 28 % agreed that decoders were easy to use and were not prone to damages hence less repairs costs, 24 % strongly agreed, 20 %

disagreed, 11 % strongly disagreed while 18 % were neutral. This finding indicates that digital decoders are easy to use and hence they enhance the satisfaction of the television viewers. Where the new equipment is easy to operate and are not prone to damages they may last longer and thus have the television viewers resources.

4.7.6 Pay TV has More Quality

The study had sought to establish if pay TV has better quality than the free to air TV. The findings are indicated in Table. 4.34

The study indicates that, a majority of the respondents comprising of 42 % agreed that pay TV has more benefits than the Free-to-Air TV, 33% of the respondents strongly disagreed, 12 % disagreed, 8 % were neutral and 5 % strongly disagreed. This finding indicates that's the pay TV is more preferred than the free to air television. In conclusion, digital television has been established to enhance the satisfaction of television viewers in Nairobi Sub-County.

CHAPTER FIVE

SUMMARY OF FINDINGS, DISCUSSIONS, CONCLUSION AND RECOMMENDATIONS

5.1 Introduction

The chapter presents a discussion of the findings, conclusions and recommendations on the specific objectives of the study on the influence of technology change on the television viewers' satisfaction.

5.2 Discussions

The study has established that digital migration planning, stakeholders' involvement, change from digital to analogue and subscription type affects the satisfaction of viewers in Nairobi City County. The study has further established that change from analogue to digital televisions, subscription type, stakeholder involvements and lastly digital migration planning.

5.2.1 Digital Migration Planning

On digital migration planning and, the study has established that it affected satisfaction of television. Also, the study has established that the relationship is not significant. Further, the study has found out that the digital migration shifting was not cheap and thus most respondents had a difficulty in shifting. The study has established that the time to shift was not enough and thus most television viewers had a challenge in adopting the digital shift. Digital migration planning is an important phase in enhancing the acceptability of the shift. There is a need for buying set top boxes or acquisition of digitally enabled television sets. The government department charged with implementing the move ought to offer guidance and information on the expected changes in transmissions. Thus, technology changes that will affect the general public need to be done with care appreciating that the society accepts changes at different levels. The study has also established that the time notice of blocking the analogue television was not sufficient. Perhaps this is because, the change involved buying decoders and this called for buying decisions. Equally, there were many decoders on sale including the Free to Ari and the ay TVs decoders. Information on their working was not easily accessible and thus many consumers

took time to buy them. Thus, digital migration affects satisfaction of television viewers in Lang'ata Sub-County.

5.2.2 Stakeholders Involvements

On the stakeholders' involvement and satisfaction of television viewing, the study has established that most stakeholders indicate they were not fully involved in the shift. The study has established that stakeholders viewed that information on digital planning was not easily available for consumers. It is important to note that where changes are expected to affect the general public, information should be freely available and in good time. For instance, information of the available decoders and if they were free to air or paid for should be disseminated with utmost honesty. On the regulation of digital content, most respondents disagreed that it was fair for the general public. As a fact, digital television comes with a wider coverage in terms of international channels and thus offers a variety of viewership. However, for the morality of the public content should be regulated as per the morals of the country. The study has established that most respondents did not consider the regulation sufficient. Most respondents were neutral on whether disposal of analogue television sets was done in an environmentally friendly manner. Equally, viewers did not indicate that they were involved in the shift. Perhaps this is because; digital migration was a directive of the government that ultimately had to be followed. Nevertheless, it is important for stakeholders to be involved in such a shift that affects the day-day life.

5.2.3 Change from Analogue to Digital Television

On from analogue to digital television, the study has established that it is the most influencing factor to television viewers' satisfaction. This is because the digital television offers more content in terms of channels. Respondents agreed on a high extent that they can spend more hours watching digital television due to the content variety. Further, respondents indicated that the shift to digital television was compatible to their existing televisions and thus it enhanced their acceptance and satisfaction. This is due to the fact that, when households acquired the set top boxes they could continue watching television. The study has established that viewers enjoy more hours of television watching because of the clarity of picture and sound. Digital television has clearer picture due to digital transmission platforms and thus watching television is more fun. Most respondents indicated that operating digital television was easy and thus enjoyed using the

equipment. It is true to suffice that where an item is perceived to have ease of use, its acceptability is much likely and thus adoption is quick. The study has also established that digital television offers value for households' money. Perhaps this is due to the variety of content it presents and to this end more consumers feel the satisfaction in adopting the shift from analogue to digital.

5.2.4 Subscription Types of Digital Television

On the influence of subscription types and satisfaction of television viewing, the study has established that subscription types affect satisfaction of television viewing. However, the satisfaction was low when compared to other facets studies with respect to technology changer. Most respondents did not regard the Free to Air channels did not have enough content and thus they were not satisfied. Consequently, thus they had to subscribe to the pay TV and they regarded it as expensive. However, the study established that the means of payments for the subscription were accessible and thus they did not get disconnected from watching television. Further, the study has established that most respondents were neutral on installation and reinstallation costs of the digital transmissions platforms. It is important to consider that subscription is paid on monthly basis and thus a financial decision is involved. Most respondents indicated that the subscriptions were expensive and thus did not fully welcome the shift. The ease of use was also regarded as a satisfaction to most respondents. To a high extent, most respondents indicate that pay TV had more picture and sound quality than the free to air channels. To this end, it can be deduced that most respondents preferred the pay TV to free to air channels. However, the subscription costs limit their access to the Pay TVs.

5.3 Summary of Findings

5.3.1 Digital Migration and Satisfaction of Television Viewers

The study concludes that digital migration planning affects satisfaction of television viewers in Nairobi City County. The study has established that time to buy decoders or acquire digital enabled television sets was not enough and thus most consumers were locked off watching television for some time. Also, the study concludes that information dissemination on the planned change was not sufficient and thus reduced the fast adoption of the move. Further, the

study concludes that digital set boxes were inaccessible to most households either due to financial constraints. The study equally concludes that consumers did not use computer TV cards as equivalents to television viewing. Most either bought digital set top boxes or digital television sets. Finally, the study concludes that the time notice of blocking analogue television was not enough. Thus, it is important for meticulous planning when such technological changes are being done. With this consideration, their reception and consequent adoption will be welcome by the general public. Information should also be disclosed fully and on a timely fashion.

5.3.2 Stakeholders Involvement and Satisfaction of Television Viewers

The study further concludes that stakeholders' involvement affected the reception of digital shift and hence satisfaction of television viewers. First, the study concludes that information on digital migration was not made available to all stakeholders in good time and hence this lowered the perceived importance of the digital shift. Secondly, the study has concluded that households did not get enough information on free to air and pay televisions and this hampered their decision making in terms of which one to buy. It is important to note that when there is a proposed technology change, there are intuitions in the market and thus inappropriate information may be in circulation and thus hamper the making of right choice. The study also concludes that digital content is not strictly fairly regulated and thus this limits the satisfaction of television viewing among the households. Further, the study established that there was a neutral response on whether the analogue televisions were disposed of in an environmentally friendly manner. Finally, the study concludes that not all stakeholders were involved in digital planning and thus some felt left out. It is crucial for all stakeholders to be considered and their opinions taken into consideration when such shifts are being planned.

5.3.3 Change from Analogue to Digital Television

The study concludes that change from analogue to digital television is the most influencing facet of technology change that affects television viewers' satisfaction. The study has established that digital television offers a wider content and thus enhances the satisfaction of television viewers. Also, the study concludes that information on the change was not available to households in good time and this blocked them from watching television for some time. Digital television involves a change in transmissions and hence information on the requirements for continued viewing should be provided to households in good time. However, the study concludes that digital televisions are

easy to operate and thus households can watch more shows and channels. The study further concludes that digital television offers a higher perceived quality of picture and sound. For this reason, most respondents indicated that digital television offers value for money. Digital television allows more television viewership and thus may increase the satisfaction of TV viewers.

5.3.4 Subscription Types of Digital Television

On subscription types and satisfaction of television viewers, the study concludes that it is the second most influencing factor after change from analogue to digital television. The study concludes that the Free to Air channels are not as satisfying as the Pay TV due to the perceived quality of sound and pictures. Also, the study concludes that the digital television subscription was deemed expensive and thus most households settled for the free to air. However, the means of Payments were accessible and convenient to those who adopted the pay televisions. Further, the study concludes that digital televisions and decoders are easy to operate and thus are not a burden to the respondents. Finally, the study has concluded that pay TV are perceived to have more quality picture and sounds and thus are more satisfying than the free to air channels. Technology changes are often associated with shifts in equipment and thus households should be given fair platforms.

5.4 Recommendations

On digital migration planning and satisfaction of television viewers, the study recommends that such a shift should be planned well in advance. It is important to note that digital migration involves different institutions and affects the general public. For this reason, it is recommended that technological of government directive be done in a careful manner. This is because; they affect the general public who may not have a chance of voicing their opinions on the proposed changes. The study recommends that the equipment be priced fairly to ensure that the households are not blocked from continued enjoyment of such services associated with the changes. Further, the study recommends that time to change technology be set appropriately in order to allow the households acquire such equipment that may be necessary. It is recommended that the government and the government department involved make the equipment available to the households at fair prices. Regulation of the digital content is also important in order to protect the societal morals of the people of country.

On stakeholders' involvement, the study recommends that all interested parties be considered when such a technology change is being planned. Ideally, digital migration involves the shift from analogue transmissions to digital televisions transmission which was an international agreement. Thus, the media companies, the concerned government departments and the general public needed to form a transition platform where each was to be heard. It is important to note that some sections of the media had filed a suit opposing the shift. They argued that the move was being hasten unreasonably given the international deadline. Nevertheless, the suit did not go through. It is also important to sensitize the general public on the importance of a planned move. This study also recommends that where changes necessitates the acquisition of new equipment, such equipment should be accessible to the public.

Further, the study recommends that where technology changes are being planned, is it important for the general public to be informed through civic education on the benefits. For instance, the shift from analogue to digital television needed to be explained to the general public in terms of what it meant, what changes were to happen and what equipment choices they had. It is important to note that change faces resistance if the perceived benefits are not explained in good time. For this reason, this study recommends that information dissemination on proposed changes be done on a timely fashion.

On subscription types, the study recommends that the digital content providers offer fairly priced bouquets. Most respondents indicated that the cost of subscription was high and thus they settled on the Free to air since they could not afford the pay television which was they preferred options. Additionally, this study recommends that the government should ensure that the general public is not misled on the acquisition of digital set top boxes. Further, decoder should be within the reach of the people and this can be done if the government implements a subsidized set top box for the less privileged in the country. The digital content providers may also allow installment payments on the decoders. This would encourage people to buy and consequently their satisfaction in watching television will be enhanced.

5.5 Suggestions for further Study

This study majored on the effects of technology on television viewers' satisfaction in Nairobi City County, a case of Lang'ata sub-county). This study suggests that another research be done

with the sample size being extended to a number of counties in the country especially in the rural areas. Also, a study on the business performance of digital TV service providers may be done in Kenya in order to capture insights on their end since this current study concentrated on viewers only.

REFERENCES

- Adogame, A., & Spickard, J. V. (2010). *Religion Crossing Boundaries: Transnational Religious Dynamics in Africa and the New African Diaspora*. Brill.
- Ageyo, J. (2015). Despite its rosy side, digital migration might be threat to freedom in Kenya. *The Standard*.
- Armstrong, C., & Collins, R. (2011). Digital turmoil for South African TV. *International Journal of Digital Television*, 2(1), 7-29.
- Berger, G. (2010). *Challenges and perspectives of digital migration for African media*. Panos Institute of West Africa: Dakar, Senegal.
- du Plessis, D. (2012). Introduction: African communication/media theory. *Communicatio*, 38(2), 123-126.
- Gathara, P. (2015). Kenya: Why the Media Is Losing the Digital Migration Debate. *The Star*.
- Halonyere, A. (2015, February 13). Kenya: Regulator Gets Go-Ahead for Digital Switch and Told to Give Media Houses Permit. <http://allafrica.com/stories/201503020416.htm>_Retrieved August 20, 2015.
- IPSOS Synovate (2014). Digital TV Migration: What will change for TV audiences? www.ipsos.co.ke/spr/.../downloads.php?dir...Digital%20Migration Retrieved October 20, 2016.
- Ochieng, R.K. (2015). Impact of digital migration on broadcast television in Kenya. Position Paper. https://www.academia.edu/11232283/The_Impact_of_digital_migration_on_broadcast_television_in_Kenya Retrieved August 20, 2015.
- Ohito, D.. (2015). Kenya-s-tv-industry-headed-for-stormy-days. *The Standard*. Retrieved March 4, 2015
- Salifu, A. M. (2012). Analog To Digital TV Migration In Ghana. *i-Manager's Journal on Communication Engineering and Systems*, 1(4), 5.

- Scangroup (2015). Digital migration and its immediate implications to advertisers: Media Analysis Department, Scangroup Ltd.
- Agona, S., & Otim, J. S. (2011). Readiness of Uganda for Analog to Digital Migration by December, 2012. *International Journal of Computing & ICT Research*, 5(2).
- Ajzen, I. (1991). *The Theory of Planned Behavior: Organizational Behavior and Human Decision Processes*. Massachusetts: University of Massachusetts.
- Berger, G. (2010). *Challenges and Perspectives of Digital Migration for African Media*. Dakar: The Panos Institute West Africa.
- Bozsoki, I. (2012). *Why Digital Migration Matters*. Barbados: International Communication Union.
- Cheruiyot, K. K. (2011). *The geography of the intra-national digital divide in a developing country: A spatial analysis of regional-level data in Kenya* (Doctoral dissertation, University of Cincinnati).
- Communications Authority of Kenya. (2010, January 8). *Digital TV Broadcasting launched in Kenya*. Retrieved October 2013, from http://www.cck.go.ke/news/2010/news_08jan10.html
- Gathara, P. (2015). Kenya: Why the Media Is Losing the Digital Migration Debate. *The Star*.
- Gilroy, A. A. (2013). *Telecommunications and Media Convergence: Selected Issues for Consideration*. Washington D.C: Congressional Research Service.
- Gray, C. L. (2011). Soil quality and human migration in Kenya and Uganda. *Global Environmental Change*, 21(2), 421-430.
- Kennedy, R., George, K., Vitalice, O., & Okello-Odongo, W. (2015, September). TV white spaces in Africa: Trials and role in improving broadband access in Africa. In *AFRICON, 2015*(pp. 1-5). IEEE.

- Kenya National Bureau of Statistics. (2011). *National ICT Report*. Nairobi: Kenya National Bureau of Statistics, Communications Commission of Kenya.
- Kihagi, S. (2015). Stakeholders Come Together to Ease Kenya's Digital Migration. *The Standard*. Retrieved March 3, 2015.
- Kimani, E., & Iravo, M. (2017). Factors Affecting the Uptake of Pay TV Among Nairobi Residents In Kenya. *Journal of Marketing Studies*, 1(1), 1-16.
- Kimanthi, I. (2016). *Framework for government ICT disruptive innovation projects: a case study of digital TV migration in Kenya* (Doctoral dissertation, Strathmore University).
- Kinyanjui, P. (2014). *Managers' perceived Effectiveness of Competitive Strategies Adopted By Nation Media Group, Kenya In Response to Digital Migration* (Doctoral Dissertation, School Of Business, University Of Nairobi).
- Kirunda, R. (2015). Assessing Efficiency and Pragmatism in Public Resource Allocation: Digital Migration and the Future of Broadcasting in Uganda.
- Kitisha, G. N., Wanjau, K. L., Mwangi, W., & Ndung'u, S. I. (2015) *Effect of Broadcast Policy & Regulations on Timely Implementation of the Analogue to Digital Migration in Kenya*. Doctoral Dissertation, University of Nairobi.
- Kvasny, L., Payton, F. C., Mbarika, V. W., Amadi, A., & Meso, P. (2008). Gendered perspectives on the digital divide, IT education, and workforce participation in Kenya. *IEEE Transactions on Education*, 51(2), 256-261.
- Langat, A. (2014, February 12). CAJ News Africa - Kenya: Media "Sabotaging" Digital Migration. Retrieved May 5, 2014, from All Africa: <http://allafrica.com/stories/201402131049.html>
- Martin, J. P. (2016). Managing migration. *International Migration Outlook*, 15-24.
- Mbote, K. (2013, January 9). No Upsurge in Set-Top Box Sales despite Friday Hearing. Retrieved January 20, 2013, from Human IPO:

<http://www.humanipo.com/news/3171/no-upsurge-in-set-top-box-sales-despite-friday-hearing/>

Mbugua, P. (2015). *Kenya: Digital Migration, How We Got Here*. Longhorn, Nairobi. Print.

Mullich, J. (2008). *Wireless Advances around the World*. Wall Street Journal.

Muyonga, D., & Anyonje, L. (2016). Assessment of Attitudes of TV Audiences regarding Migration from Analogue to Digital TV in Nairobi, Kenya. *Imperial Journal of Interdisciplinary Research*, 2(12).

Nation Correspondent (2015, January 15). *Ignorance, costs lock many out of TV signal switchover*. Daily Nation, p. 3.

Nation Reporter (2015, January 21). *Court grants PayTV relief in content row*. Daily Nation.

Ndonye, M. M., Khaemba, J., & Bartoo, P. (2015). Digital Migration and the Battle of Terrestrial Titans in Kenya: Issues and Prospects. *Imperial Journal of Interdisciplinary Research*, 4 (10)

Ngugi, K. (2013, August 26). Pay TV Service Providers Face off in Africa. Retrieved June 4, 2014, from Open Eco Source: <http://www.openecosource.org/technology/pay-tv-service-providers-face-off-in-africa/>

Nickson, C. (2013, January 7). A Technology Society. Retrieved June 2, 2014, from Advances in Mobile Phones: <http://www.atechnologysociety.co.uk/advances-mobile-phones.html>

Nkuna, J. (2014). *Universal Access at Crossroads: A political economy of the digital migration policies in South Africa* (Doctoral dissertation).

Nyabuga, G., & Booker, N. (2013). Mapping digital media: Kenya. *A Report by the Open Society Foundations*. Retrieved August, 29, 2014.

Ochieng, R. K. (2015). Impact of digital migration on broadcast television in Kenya. *The Nation*. Retrieved August 9, 2017.

- Okuthe, R. (2014, August 7). More Kenyans Buying digital TV set-top boxes, CA says. Retrieved September 9, 2014, from Tech Moran: <http://techmoran.com/more-kenyans-buying-digital-tv-set-top-boxes-ca-says/#sthash.hOQrWDpC.dpbs>
- Okuthe, R. (2014). More Kenyans Buying digital TV set-top boxes, CA says. Nairobi: Tech Moran.
- Pomphrey, G. (2012, October 25). *Out of Africa - New Developments in Pay TV*. Retrieved June 4, 2014, from Digital TV Europe.net: <http://www.digitaltveurope.net/29440/out-of-africa-%E2%80%93-new-developments-in-pay-tv/>
- Poole, D. (2011). *Digital Transitions and the Impact of New Technology on the Arts*. Quebec: Canadian Public Arts Funders.
- Report of the Task Force on Migration of Terrestrial Television from Analogue to Digital Broadcasting in Kenya. (2007). Nairobi: Communications Commission of Kenya.
- Rosenberg, W. (2013). *The great migration from analogue to digital terrestrial television in Southern Africa*. Retrieved January 2013, from Werksman Attorneys: <http://www.werksmans.com/legal-briefs-view/the-great-migration-from-analogue-to-digital-terrestrial-television-in-southern-africa/>
- Rukanda, G., & Buckley, S. (2016, June). The Impact of Digital Migration on Socio-Economic Factors in Namibia. In *ECEG2016-Proceedings of 16th European Conference on e-Government ECEG 2016* (p. 187). Academic Conferences and publishing limited.
- Saeed, M., Hong, W., & Rafique, K. (2011, October). Realizing digital dividend in a wireless world challenges and opportunities. In *Information Science and Service Science (NISS), 2011 5th International Conference on New Trends in* (Vol. 2, pp. 255-259). IEEE.
- Sandner, P. (2015, February 23). African nations face dilemma over digital switch. Retrieved April 12, 2015, from Deutsche Welle: <http://www.dw.de/african-nations-face-dilemma-over-digital-switch/a-18274182>

- Sheppard, B.H., Hartwick, J. & Warshaw, P.R. (1988). *The Theory of Reasoned Action: A Meta-Analysis of Past Research with Recommendations for Modifications and Future Research*. Journal of Consumer Research, Vol.15, No. 3, 325-343.
- Southwood, R. (2011). Digital Broadcast Migration in West Africa: An overview and strategies to accelerate the transition. *Association for Progressive Communications (APC) and Balancing Act*.
- Sunday Nation Team (2015, February 15). *Anger, frustration as CA shuts down television stations*. Daily Nation, pp. 1-2.
- Tanui, E. K., & Wanjira, L. N. (2016). Digital Migration: E-Learning and Primary School Teacher Nightmare in Kenya. *Africa Journal of Technical and Vocational Education and Training*, 1(1), 82-92.
- Tay, C. (2015). *Factors Affecting Data Migration In The Kenya Government Ministries* (Doctoral Dissertation, School Of Business, University Of Nairobi).
- The Profound Influence of Television on Society. (n.d.). Retrieved June 10, 2013, from Influence: <http://influence.bafree.net/the-profound-influence-of-television-on-society.php>
- Van Lange, P.A.M., Kruglanski, A. W. & Higgins, E.T. (2012). *Handbook of Theories of Social Psychology: Volume One*. London: SAGE Publications Ltd.
- Wangalwa, E. (2015). *The Woes in Kenya's Digital Migration Process*. The Star. Retrieved March 3, 2015.
- Wanjau, K. L., Kitisha, G. N., Mwangi, W., & Ndung'u, S. I. (2016). Effect of Broadcast Policy & Regulations on Timely Implementation of the Analogue to Digital Migration in Kenya.
- Wanyonyi, E., Wandia, M., & Ngare, P. (2016). Analysis of The Consumers' switching Behavior For Digital Set Top Boxes In Kenya. *DBA Africa Management Review*, 6(3).
- Wokabi, C. (2015, January 22). *Three TV stations lose licenses in row over digital switch*. Daily Nation, p.5

APPENDICES

APPENDIX .A: LETTER OF INTRODUCTION

Dear respondent,

I am a student of the University of Nairobi. I am carrying out a research study titled **“INFLUENCE OF DIGITAL MIGRATION ON TELEVISION VIEWERS SATISFACTION IN NAIROBI COUNTY)”** and the aim of this questionnaire is to collect information related to this topic. You are therefore, kindly requested, to respond to these questions as honest as possible. The researcher also pledges that the information given shall be treated with strict confidence. Furthermore, the information will be solely used for academic purpose.

However your participation in this exercise is voluntary

Thank you,

Yours sincerely,

Signature.....

KEPHA OCHORA OCHOI

APPENDIX C: QUESTIONNAIRE FOR TV VIEWERS'

TOPIC: INFLUENCE OF DIGITAL MIGRATION ON TELEVISION VIEWERS SATISFACTION IN LANGATA SUB-COUNTY)

I am a Master's degree student studying project management at the University of Nairobi University and I have formulated the questions in the following questionnaire with regard to the topic of study. Kindly, and honestly answer all the questions to the best of your knowledge. Indicate with a tick or filling in the space(s) provided. Feel free to write at the bottom of the page if you feel you need some more space to indicate your responses.

Section A: Demographic Characteristics of the Respondents.

1. Please indicate your age

(a) Between 12-20 years ()

b) between 21-30 years ()

(c) Between 31-40 years ()

d) between 41-50 years ()

e) Above 50 years ().

2. Kindly indicate how long you have been viewing the digital television?

a) Less than 1 month ()

b) between 1-5 months ()

c) Between 6-10 months ()

d) more than 11 months ().

3. Please indicate the highest level of education completed.

- A) Primary () b) Secondary () (c) College ()
 (d) University () (e) None ().

Section B: Digital Migration Planning

The following statements show how digital migration planning may affect your television viewing satisfaction. Please indicate your rate by ticking appropriately on a scale of 5-1, where 5= strongly agree, 4=agree 3=neutral 2=disagree 1=strongly disagree.

Digital TV Migration Planning	5	4	3	2	1
I welcomed digital TV migration because the time to buy digital decoders/set top boxes was sufficient for me					
I welcomed digital TV because Information on digital migration was availed to me hence we were able to plan for the shift.					
I kept watching TV during the shift time because the digital set top boxes were accessible in the market					
I did not switched to Digital televisions immediately after the deadline because it was expensive to acquire the decoders					
In my opinion, I switched to digital after a while since installation costs were high in the market					

The digital migration was well regulated hence it was easy to shift almost immediately after the analogue shutdown.					
I opted to use of personal computers with digital TV cards hence the shift did not stop me from viewing TV					
I welcomed digital TV because the time notice for blocking analogue signal was sufficient and hence the shift was accepted					

Is there any other way the digital migration planning may have affected your satisfaction in TV viewing (please explain)

.....

.....

.....

.....

Section C: Stakeholders Involvement in Digital Migration

The following statements show how stakeholder involvement in digital migration may affect the satisfaction level of TV viewing. Please indicate your rate by ticking appropriately on a scale of 5-1, where 5= strongly agree, 4=agree 3=neutral 2=disagree 1=strongly disagree.

Stakeholders' Involvement in Digital Migration	5	4	3	2	1
I received all necessary information on free to air TV and Pay TVs and thus I made my choice basing on benefits.					
Information on digital migration was availed in good time and this is why I like digital televisions.					
I watch digital televisions because the content regulation in digital TV good for the public					
The disposal of analogue TV was done in an environmental friendly manner hence I value the					

change.					
I believe I was sufficiently involved in digital migration and this is why I like it.					

Which other ways doe stakeholders' involvement may have influenced the satisfaction in TV viewing? (Please explain).....

.....

.....

.....

.....

.....

Section D: Change from Analogue

The following statements show how change from analogue to digital transmission may have influenced satisfaction level in TV viewing. Please indicate your rate by ticking appropriately on a scale of 5-1, where 5= strongly agree, 4=agree 3=neutral 2=disagree 1=strongly disagree.

Change from Analogue	5	4	3	2	1
Digital TV offers much better contents than the analogue TV and hence I watch it for more hours.					
In my opinion, information on change from analogue was available to you in good time and thus I was prepared hence the change was pleasant for me.					
Digital set top box is compatible to existing TV set and thus it was not expensive to install the new platform hence my liking digital is fine.					
I now watch TV for more hours because digital television has high picture and sound quality than the analogue ones.					

For me, operating Digital TVs is easy					
Digital TV offers a variety of TV channels hence I like it more than the analogue TV.					
I believe that digital TV offers services of high quality and offers me value for money.					

What other ways can the change from analogue to
.....
.....
.....
.....
.....

Section E: Subscription Types of Digital Television

The following statements indicate how subscription types may affect the satisfaction level of TV viewing. Please indicate your rate by ticking appropriately on a scale of 5-1, where 5= strongly agree, 4=agree 3=neutral 2=disagree 1=strongly disagree.

Subscription Type of Digital Television	5	4	3	2	1
The Free to Air channels on digital TVs have enough contents and thus I can watch all the programmes that are of interest to me through them					
Subscription costs for digital TV is fair hence can watch TV for sufficient hours and this enhances my satisfaction in TV viewing.					
The means of payments for the subscriptions are accessible hence I do not get disconnected and this does not reduce my TV hours and for this reason digital TV is pleasant to me.					
The installation and reinstallation fees are fair for digital television decoders are fair and do not make me feel burdened.					

Digital decoders are easy to operate and service hence saves on cost of hiring repairers due to their ease of use.					
Pay TV has more quality services that the Free To Air channels and hence I spent more hours on the former.					

Which other ways does subscription offers your satisfaction in TV viewing (briefly explain)

.....

.....

.....

.....

.....

.....

Thank you for your time and responses

