

**PRACTICES OF POLICY AND THE IMPLEMENTATION OF
INCLUSIVE EDUCATION IN PUBLIC SECONDARY SCHOOLS IN
THARAKA-NITHI COUNTY- KENYA**

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DECLARATION

This thesis is my original work and has not been presented for a degree in any other university or for any award

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DEDICATION

To my family members, my mother, my sisters and my brother; Thanks for your love and support. You are a great inspiration.

To Sr. Adelina M. Muguna, the Superior General and all the Nazareth sisters, thanks for your prayers and support.

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TABLE OF CONTENTS

DECLARATION.....	ii
DEDICATION.....	iii
ACKNOWLEDGEMENTS.....	iv
TABLE OF CONTENTS.....	v
LIST OF TABLES.....	x
LIST OF FIGURES.....	xiii
APPENDICES.....	xiv
ABBREVIATIONS AND ACRONYMS.....	xv
ABSTRACT.....	xvi
INTRODUCTION	1
1.1 Background to the Study.....	1
1.2 Statement of the Problem.....	6
1.3 The General Objective	6
1.4 Specific Objectives	6
1.5 Hypotheses of the Study	7
1.6 Assumptions of the Study	7
1.7 Justification of the Study	7
1.8 Significance of the Study	8
1.9 Scope and Limitations of the Study	8
1.9.1 Scope of the study.....	8
1.9.2 Limitation of the study.....	9
1.10 Operation Definition of Key Terms.....	10
CHAPTER TWO	11
RELATED LITERATURE REVIEW.....	11
2.1 Introduction.....	11
2.2 Education Policy	11
2.2.1 Policy Implementation.....	12
2.2.2 Variables that Influence Inclusive Education Policy Implementation.....	12
2.2.3 School Capacity to Implement the Policy.....	13
2.2.4 Practices Necessary for the Implementation of Inclusive Education	15

2.3 School Guiding Principles	18
2.4 Stakeholders Involvement.....	22
2.5 School Resources (Human, Physical, and Financial)	23
2.5.1 Human Resource.....	24
2.5.2 Physical Resources.....	28
2.5.3 Financial Resources.....	31
2.6 Developing Effective School Strategies	32
2.6.1 School Practices that Hinder the Implementation of Inclusive Education	35
2.6.2 Inclusive Education Policy Strategies in Kenya	37
2.7 Summary of the Literature	40
2.8 Theoretical Framework.....	41
2.9 Conceptual Framework.....	44
CHAPTER THREE	46
RESEARCH METHODOLOGY.....	46
3.1 Introduction.....	46
3.2 Research Design.....	46
3.3 Location of the Study.....	47
3.4 Target Population.....	47
3.5 Sampling Procedures	47
3.6 Sample Size.....	48
3.7 Research Instruments	49
3.7.1 Questionnaires for Teachers	49
3.7.2 In-depth Interview Guide for Learners with Physical Disabilities	50
3.7.3 Focus Group Discussions for Non-Disabled Students.....	50
3.8 Piloting Study.....	51
3.9 The Validity and Reliability.....	51
3.9.1 Validity.....	51
3.9.2 Reliability.....	51
3.10 Data Collection Procedure	52
3.11 Data Analysis	53
3.11.1 Quantitative Data Analysis	53

3.11.2 Qualitative Data Analysis	53
3.12 Logistics and Ethical Considerations.....	54
3.12.1 Logistical Considerations.....	54
3.12.2 Ethical Considerations.....	54
CHAPTER FOUR.....	55
RESULTS, INTERPRETATION AND DISCUSSION	55
4.1 Introduction.....	55
4.1.1 Instrument Return Rate.....	55
4.1.2 Characteristics of the Schools in the Study.....	55
4.1.3 Distribution of Teachers by Gender.....	56
4.1.4 Distribution of Teachers by Age.....	56
4.1.5 Distribution of Teachers by Positions.....	57
4.1.6 Additional Teacher-Training on Special Education Needs	57
4.1.7 Learners with Physical Disabilities Enrolled in Schools	59
4.2 School Guiding Principles and the Implementation of Inclusive Education	60
4.3 Stakeholders’ Involvement and the Implementation of Inclusive Education	63
4.4 School Resources and the Implementation of Inclusive Education	66
4.4.1 Human Resources and the Inclusive Education Implementation	67
4.4.2 Physical Resources and Inclusive Education Implementation.....	68
4.4.3 Financial Resources and the Implementation of Inclusive Education	71
4.5 School Strategies and Overcoming Physical Barriers	74
4.6 Focus Groups Findings.....	78
4.6.1 Promotion of Equal Opportunities for Learners with Disabilities.....	79
4.6.2 Help Given to Students with Disabilities.....	79
4.6.3 How do you Help them Fight for their Rights in School.....	79
4.6.4 Working Together to Uplift their Academic Progress.....	80
4.7 Challenges Facing Practices of Policy towards Inclusive Education.....	80
4.7.1 Challenges Facing School Guiding Principle.....	80
4.7.2 Suggestions for Overcoming Challenges Facing Schools Guiding Principles.....	81
4.7.3 Challenges Facing the Rate of Stakeholders’ Involvement.....	82
4.7.4 Suggestions for Overcoming Challenges Facing Stakeholder Involvement.....	83

4.7.5 Challenges Facing School Resources towards Inclusive Education.....	84
4.7.6 Suggestions for Overcoming Challenges Facing the School Resources	85
4.7.7 Challenges Facing School Strategies in Overcoming Physical Barriers	86
4.7.8 Suggestions for Overcoming Challenges Facing School Strategies	87
4.8 Regression Diagnostics.....	88
4.8.1 Outliers.....	89
4.8.2 Normality	89
4.8.3 Homoscedasticity.....	92
4.8.4 Linearity.....	93
4.8.5 Multicollinearity	94
4.9 Hypothesis Testing.....	95
4.9.1 School Guiding Principles and Implementation of Inclusive Education	95
4.9.2 Stakeholder Involvement and Implementation of Inclusive Education.....	97
4.9.3 School Resources and Implementation of Inclusive Education.....	98
4.9.4 School Strategies and the Implementation of Inclusive Education	99
4.10 Mediation Effects.....	100
4.10.1 Mediation Effects of Administrative Support on the Relationship between School Guiding Principles and Inclusive Education.....	101
4.10.2 Mediation Effects of Administrative Support on the Relationship between Stakeholders Involvement and Inclusive Education	102
4.10.3 Mediation Effects of Administrative Support on the Relationship between School Resources and Inclusive Education	103
4.10.4 Mediation Effects of Administrative Support on the Relationship between School Strategies and Inclusive Education	104
4.11 Moderation Test.....	105
4.11.1 Moderation of Administrative Support on the Relationship between School Guiding Principle and Inclusive Education	106
4.11.2 Moderation of Administrative Support on the Relationship between Stakeholder Involvement and Implementation of Inclusive Education	107
4.11.3 Moderation of Administrative Support on the Relationship between School Resources and Implementation of Inclusive Education.....	109

4.11.4 Moderation of Administrative Support on the Relationship between School Strategies and Implementation of Inclusive Education.....	110
CHAPTER FIVE	113
SUMMARY, CONCLUSIONS AND RECOMMENDATIONS.....	113
5.2.1 School Guiding Principles and Inclusive Education Implementation	113
5.2.2 Stakeholders Involvement and Inclusive Education Implementation.....	114
5.2.3 The School Resources and Inclusive Education Implementation.....	114
5.2.3.1 Human Resources and Inclusive Education Implementation	114
5.2.3.2 The Physical Resource and Inclusive Education Implementation.....	115
5.2.3.3 Financial Resources and Inclusive Education Implementation.....	115
5.3 Challenges Affecting Practices of Policy	116
5.3.1 Challenges Facing School Guiding Principles.....	116
5.3.2 Challenges Affecting Stakeholders Involvement.....	116
5.3.3 Challenges Affecting School Resources	117
5.3.4 Challenges Affecting School Strategies.....	117
5.4 Conclusions.....	117
5.4.1 School Guiding Principles and Implementation of Inclusive Education	117
5.4.2 Stakeholder Involvement and Implementation of Inclusive Education.....	118
5.4.3 School Resources and the Implementation of Inclusive Education.....	118
5.4.3.1 Human Resource and Inclusive Education Implementation	118
5.4.3.2 Physical Resources and Inclusive Education Implementation.....	119
5.4.3.3 Financial Resources and Inclusive Education Implementation.....	119
5.4.4 School Strategies and the Implementation of Inclusive Education	119
5.4.5 Challenges Affecting Practices of Policy	119
5.5 Recommendations.....	120
5.6 Recommendations for Further Research.....	121
References.....	122

LIST OF TABLES

TABLE 2.1 <i>Population Sampling Frame</i>	49
TABLE 4. 1 <i>Age Distribution</i>	56
TABLE 4. 2 <i>Distribution of Teacher by Positions</i>	57
TABLE 4 3 <i>Teachers' Additional Training on Special Needs Education</i>	58
TABLE 4.4 <i>Total Number of Learners with Physical Challenges Currently as Reported by the Enrolled in the SchoolsTeachers</i>	59
TABLE 4.5 <i>Total Number of Learners with Physical Challenges Previously Enrolled in the Schools as Reported by Teachers</i>	59
TABLE 4.6 <i>Teachers' Opinion of the Effectiveness of School Guiding Principles in Addressing the Needs of Learners with Disabilities</i>	60
TABLE 4.7 <i>Teachers' Opinions of the Influence of Stakeholder Involvement towards the Implementation of Inclusive Education</i>	64
TABLE 4.8 <i>Teachers' Opinions on the Adequacy of Human Resource and Implementation of Inclusive Education</i>	67
TABLE 4.9 <i>Teachers' Opinion on the Adequacy of Physical Resources towards the Implementation of Inclusive Education</i>	68
TABLE 4.10 <i>Teachers' Opinions of Provision of Financial Resources towards the Implementation of Inclusive Education</i>	72
TABLE 4.11 <i>Adequacy of School Strategies in Overcoming Physical Barriers that Hinder the Implementation of Inclusive Education</i>	74
TABLE 4.12 <i>Suggestions for Overcoming Challenges Facing School Resources</i>	86
TABLE 4.13: <i>Tests of Normality</i>	89
TABLE 4.14: <i>Breusch-Pagan and Koenker Test Statistics</i>	92
TABLE 4.15 : <i>Model Summary</i>	93
TABLE 4.16: <i>ANOVA Table</i>	94
TABLE 4.17: <i>Tolerance and VIF Values</i>	94
TABLE 4.18: <i>Model Summary for School Guiding Principle and Implementation of Inclusive Education</i>	95
TABLE 4.19: <i>ANOVA for School Guiding Principle and Implementation of Inclusive Education</i>	96

TABLE 4.20: <i>Regression Coefficients for School Guiding Principle and Implementation of Inclusive Education</i>	96
TABLE 4.21: <i>Model Summary for Stakeholder Involvement and Implementation of Inclusive Education</i>	97
TABLE 4.22: <i>ANOVA for Stakeholder Involvement and Implementation of Inclusive Education</i>	97
TABLE 4.23: <i>Regression Coefficients for Stakeholder Involvement and Implementation of Inclusive Education</i>	98
TABLE 4.24: <i>Model Summary for School Resources and Implementation of Inclusive Education</i>	98
TABLE 4.25: <i>ANOVA for School Resources and Implementation of Inclusive Education</i>	98
TABLE 4.26: <i>Regression Coefficients for Resources and Implementation of Inclusive Education</i>	99
TABLE 4.27: <i>Model Summary for School Strategies and Implementation of Inclusive Education</i>	99
TABLE 4.28: <i>ANOVA for School Strategies and Implementation of Inclusive Education</i>	100
TABLE 4.29: <i>Regression Coefficients for School Strategies and the Implementation of Inclusive Education</i>	100
TABLE 4.30: <i>Regression Coefficients for School Guiding Principles and Administrative Support</i>	102
TABLE 4.31: <i>Regression Coefficients for Administrative Support and Implementation of Inclusive Education</i>	102
TABLE 4.32: <i>Regression Coefficients for Stakeholder Involvement and Administrative Support</i>	103
TABLE 4.33: <i>Regression Coefficients for Resources and Administrative Support</i>	104
TABLE 4.34: <i>Regression Coefficients for School Strategies and Administrative Support</i>	105
TABLE 4.35: <i>Model Summary for Moderation of Administrative Support on the Relationship between School Guiding Principle and Inclusive Education</i>	106

TABLE 4.36: ANOVA Table for Moderation of Administrative Support on the Relationship between Guiding Principle and Inclusive Education.....	1066
TABLE 4. 37: Regression Coefficients for Moderation of Administrative Support on the Relationship between School Guiding Principle and Inclusive Education	107
TABLE 4. 38: Model Summary for Moderation of Administrative Support on the Relationship between Stakeholder Involvement and Implementation of Inclusive Education	107
TABLE 4. 39: Model Summary for Moderation of Administrative Support on the Relationship between Stakeholder Involvement and Inclusive Education.....	108
TABLE 4. 40: Regression Coefficients for Moderation of Administrative Support on the Relationship between Stakeholder Involvement and Inclusive Education.....	108
TABLE 4. 41: Model Summary for Moderation of Administrative Support on the Relationship between School Resources and Inclusive Education	109
TABLE 4. 42: ANOVA Table for Moderation of Administrative Support on the Relationship between School Resources and Inclusive Education	109
TABLE 4. 43: Regression Coefficients for Moderation of Administrative Support on the Relationship between School Resources and Inclusive Education	110
TABLE 4. 44: Model Summary for Moderation of Administrative Support on the Relationship between School Strategies and Inclusive Education	110
TABLE 4. 45: ANOVA Table for Moderation of Administrative Support on the Relationship between School Strategies and Inclusive Education	111
TABLE 4. 46: Regression Coefficients for Moderation of Administrative Support on the Relationship between School Strategies and Inclusive Education	111

LIST OF FIGURES

FIGURE 2. 1: School Practices towards the Implementation of Inclusive Education	44
FIGURE 4. 1: Challenges Facing School Guiding Principles towards Inclusive Education	81
FIGURE 4. 2: Suggestions for Overcoming Challenges Facing Guiding Principles	82
FIGURE 4. 3: The Challenges Facing the Rate of Stakeholders' Involvement	83
FIGURE 4. 4: Suggestions for Overcoming Challenges Facing Stakeholder Involvement	84
FIGURE 4. 5: Challenges Facing the School Resource towards Inclusive Education	85
FIGURE 4. 6: Challenges Affecting School Strategies	87
FIGURE 4. 7: Suggestions for Overcoming Challenges Facing School Strategies	88
FIGURE 4. 8: Normal Q-Q Plot for Inclusive Education.....	90
FIGURE 4. 9: Histogram with Normal Curve for Inclusive Education	91
FIGURE 4. 10: Regression Standardized Coefficients.....	91
FIGURE 4. 11: Normal P-P Plot for Regression Standardized Residuals.....	92
FIGURE 4.12: Plot of Regression Standardized Residuals against Regression Standardized Predicted Values	93

APPENDICES

APPENDIX I Teachers Questionnaires.....140

APPENDIX II Focus Group Discussions.....148

APPENDIX III Interview Guides.....149

ABBREVIATIONS AND ACRONYMS

ANOVA	Analysis of Variance
BOM	Board of Management
CRPD	Convention on the Rights of Persons with Disabilities
EFA	Education for All
GPE	Global Partnership for Education,
IDEA	Individuals with Disabilities Education Acts
KESP	Kenya Education Sector Support Programme
KNCHR	Kenya National Commission of Human Rights
LWD	Learners with Disabilities
OECD	Organization for Economic Cooperation and Development
PTA	Parent Teacher Association
NACOSTI	National Council of Science, Technology and Innovation
NGO	Non-Governmental Organization
NCPWD	National Council of Persons with Disabilities
UN-CRPD	United Nations Committee on the Rights of Persons with Disabilities
UNESCO	The United Nations Educational, Scientific and Cultural Organization
UNICEF	United Nations Children's Fund
UNICEF	United Nations Children's Emergency Fund,
UPAIS	Union of Physically Impaired Against Segregation
WHO	World Health Organization

ABSTRACT

Practices of policy are critical towards the successful implementation of inclusive education in schools. The approach recognizes the learners' diversity, enabling them to access course content, fully participate in learning activities and demonstrate their strength at assessment. The mandate of inclusive education policy implies that regular schools modify their guiding principles that inform all decisions, policies and practices to cater for learner diversity. This is particularly significant since the fundamental aim of inclusive education is to accommodate all learners regardless of their physical, intellectual, social and emotional conditions. In spite of the inclusive education policy, disability remains a major course of exclusion in schools in Kenya. Thus, the purpose of the study was to analyse the effects of practices of policy towards the implementation of inclusive education in public secondary schools. The actual sample constituted 161 respondents. Data was collected using a questionnaire administered to 100 teachers, an interview guide for 11 learners living with physical disabilities and 5 focus group discussions each group comprising 10 non-disabled learners. The study was guided by the Social Model of Disability and adopted a mixed method design. Quantitative data was analysed using inferential statistics. The ANOVA and t-test were done to test the study hypotheses. Qualitative data was organized by developing codes, then categorizing them into themes presented in a narrative form. Linear regression was carried out to check the linear relationships between the variables. The overall results showed that practices of policy in schools were rated by majority of teachers as ineffective in addressing the needs of learners with disabilities. School guiding principles that address the needs of learners with disabilities was rated; Not Sure (52%); Stakeholder involvement in planning and strategizing for learners with disabilities; Not effective at all (50%), Human resource especially the teacher factor; Not effective at all (92%), Adequacy and modification of physical resources; Not done at all (62%), Provision of finances to restructure the school environment; Not provided (67%) and finally School strategies in overcoming physical barriers that hinder the implementation of inclusive education; Not effective at all (67%). Further, the study established that all the variables accounted for a small variance towards the implementation of education. The study concluded that inclusive education has not taken root in public secondary schools. Learners with disabilities have to adapt to get the needed education or drop out of school. The main conclusion of the study was that lack of effective practices of inclusive education policy was a major obstacle to the implementation of inclusive education in secondary schools. The policy framework is weak in guiding the schools on effective strategies for developing school practices that positively influence the implementation of inclusive education. The study recommends that the Ministry of Education through the County Education Boards, develop a well-coordinated master plan for consistent school reform founded on clear inclusive education philosophy, policies and practices to effectively implement inclusive education in public secondary schools in Kenya.

CHAPTER ONE

INTRODUCTION

1.1 BACKGROUND TO THE STUDY

Building inclusive schools remains one of the biggest challenges facing the education system worldwide (Mitchell, 2015). The concept of inclusion remains a complex and contentious issue as the execution of inclusive practices in schools is not clearly understood (Ainscow, 2005; Anastasiou & Kauffman, 2012). Inclusive education affects not just the conceptualization and the nature of education provided for students with special learning needs, but it also calls for questioning the broader aims of education, the purpose of schools, the nature of the curriculum, approaches to assessment and schools' accommodation to diversity (Winzer & Mazurek, 2017). The way in which regular schools respond to students with special education needs can be a measure of quality education for all students (UNESCO, 2015). Weber and Ruch (2012) argue that a good school ensures quality for all students and works for the achievement of all learners. However, there are practices related to school systems and individuals that work against the development of good inclusive practices. The school systems, practices and strategic plans need to adapt and to create an environment that can give all learners fair access to education. This calls for a need to modify the learning and school environment to meet learners' diversity (Rickert, 2010; Agarwal & Chakravarti, 2014).

The concept of inclusive education dates back to the 20th century, with many countries striving to adopt and develop education for learners with special education needs. The movement towards inclusive education for learners with special learning needs began in the 1960s (Forlin, 2005). The United Nations has made influential declarations regarding inclusive education, such as the Convention against Discrimination in Education (1960) that mandated persons with disability to access education without discrimination. The declaration on the Rights of Disabled Persons (1975) guaranteed the respect and dignity of persons living with disability and the Convention on the Rights of the Child (1989) endorsed the right of every child. Similarly, the World Conference of 1990 (Jomtien Declaration) in Thailand, set goals of Education for All (EFA), which was reaffirmed in the Dakar Framework of 2000 in Senegal. Subsequently, the Salamanca Statement and

Framework of Action on Special Needs Education in Spain adopted the principle of inclusion and provided a major impetus for inclusive education (UNESCO, 1994). The Salamanca Statement is arguably the most significant international document in the field of special education (Budlender, 2015). The major recommendation of Salamanca Statement was that every child with special learning needs has a right to access education in the neighbourhood school. The governments were required to give priority on their policy, legal and budgetary provision to restructure the education system to cater for learner diversity (UNESCO, 2015)

Despite this directive for inclusion, there has been confusion in the practice due to lack of authority in the definition of an inclusive education (The United Nations Children's Emergency Fund, 2016; Global Partnership for Education, 2018). Consequently, the Convention on the Rights of Persons with Disabilities (CRPD), was published and endorsed by 177 signatory countries (United Nations, 2006). The CRPD intended to safeguard the right and pride of people with disabilities and ensure that they enjoy equal rights in the society. In this document, inclusive education became legally binding for all signatory nations and it provided a clear and an authoritative definition of inclusion: “Inclusion involves a process of systemic reform embodying changes and modifications in content, teaching methods, approaches, structures and strategies in education to overcome barriers with a vision serving to provide all students of the relevant age range with an equitable and participatory learning experiences and environment that best correspond to their requirements and preferences”, (UN-CRPD, 2016)

Subsequently, there has been considerable efforts by many nations to work on their educational policies and practices towards inclusive education, although questions arise on its efficacy and efficiency (Kalyanpur, 2014; Mukhopadhyay, 2015). Although several countries' legislations and policies appear to be committed to inclusive education, practices in schools may not meet this rhetoric (Mitchell, 2005). In USA, for example, one of the thorniest policy questions that confront American education is the placement and serving of students with disabilities in the most inclusive environment under the Individuals with Disabilities Education Act of 1997 (IDEA). Although IDEA mandates

the learning of students with disabilities in the least restrictive environment, a few disagree with the practice. Besides, teachers are not trained on how to work with or teach students living with special education needs (Sindelar, et al., 2006).

Germany became a signatory of the convention in 2007, endorsed it in 2009; thus, committed itself to a progressive implementation of inclusive education that requires the state to desist from any act contrary to the agreement (Niemeyer, 2014). In spite of endorsement of the international law, exclusion rate continued to grow, due to lack of an inclusive educational model, poor allocation of resources, gender imbalances and substantial regional inconsistencies in relation to inclusivity (Klemm & Preuss-Lausitz, 2017; Niemeyer, 2014). Although mainstreaming is strongly supported in England, (Evans & Lunt, 2002) analysis of the effects of the policies on inclusion found common obstacles faced by teachers implementing inclusive education. They include large class sizes, inadequate pre-service and in-service training, lack of resources and support by the government (Boyle, Topping, & Jindal-Snape, 2013; Fraser & Greig, 2015; Cooper & Jacobs, 2011; Rix, Sheehy, Fletcher-Campbell, Crisp, & Harper, 2013)

The evidence underpinning inclusive education in African countries has been confirmed to be weak and fragmented (Howgego, Miles & Myers, 2014). Inaccessible environments, lack of reasonable accommodation, negative attitudes, discriminatory application and admission procedures and lack of disability policies and choices disadvantage students with special education needs in Africa (Chataika, Mckenzie, Swart & Cleophas, 2012). Despite the fact that Nigeria enacted inclusive education policy in 2008, a study by Igbokwe, Mezieobi and Eke (2014) on teachers' attitude to curriculum change: implications for inclusive education, asserts that Nigeria experiences socio-economic barriers and a lack of teacher preparedness on inclusive practices, which is compounded by administrative problems within schools. Similarly, inclusive education in Ugandan experiences major hitches which include negative cultural attitudes towards learners with special education needs, poor funding and inadequate teacher training in inclusive practices and lack of mobility devices, which discourage resource allocation to learning institutions (Abimanyi & Mannan, 2014).

Kenya is among African countries that have made remarkable advances in the pursuit for inclusive education (Nungu, 2014). This has been demonstrated through ratification and embracing of several international agreements and endorsing them into laws and policies geared towards organizational modification for access and participation of learners with disabilities. The government has embraced and supported the practice of inclusive education by domesticating various international agreements in its laws (Njoka, Riechi, Obiero, Kemunto, Muray, Ongoto, & Amenya, 2012). The Special Needs Education Policy Framework (Republic of Kenya, 2009) highlights a collection of key aspects touching on special needs education and outlines a wide-ranging policy framework that attempts to match education service delivery for learners with special needs in all education subsectors. In order to implement crucial SNE policy strategies, the National Education Sector Plan (NESP, 2013-2018), recommended the review process, which culminated into the development of the Sector Policy for Learners and Trainees with Disabilities (2018). The policy statements relevant to this study was to address the prevailing policy and implementation gaps on: (a) the provision of a safe and conducive learning environment for learners with disabilities; (b) access and participation in quality education for all learners; (c) capacity building and human resource development; (d) financing and sustainability of inclusive education; and (e) collaboration and coordination among key stakeholders (Republic of Kenya, 2018).

Despite the efforts the Kenyan government has put in place, a number of challenges have persisted with respect to the implementation of inclusive education (Njoka et al., 2012). In a study conducted among learning institutions in Kenya, Adoyo and Odeny (2015), establish that defining the key roles of education stakeholders such as the parents, teachers, learners with disabilities and the educationalists are crucial in the development of inclusive education services. According to Akinyi, Onyango and Ordho, (2015), secondary schools in Migori County were experiencing a myriad of interrelated challenges ranging from lack of instructional facilities and parental negative attitudes regarding learners with disabilities. Another study by Wamala (2019), found that school administrators in Bungoma County lacked training on special education and this influenced negatively the implementation of inclusive education in Bungoma county.

Notwithstanding the benefits of inclusive education, gaps are evident in its implementation in Tharaka-Nithi County. A study by Mutembei, (2014) in primary schools in Magumoni, Division in Tharaka-Nithi County, established that lack of teaching and learning materials to nurture learner diversity was evident. Out of 41 public primary schools in the division, only 3 schools were implementing inclusive education, (Meru South District Education Office, 2013). In addition, two separate studies conducted in primary schools in Tharaka-Nithi County established that negative attitude among the school community and teachers' unwillingness to accept the intellectually challenged learners in regular schools, were main challenges affecting inclusion (Wanjiku, 2015). On the other hand, Nkirote and Mugambi (2019), established that factors such as community participation, donor-funding, monitoring and evaluation affected the enrolment and academic performance of orphans and vulnerable children in Tharaka-Nithi County.

According to the Kenya National Bureau of Statistics (KNBS, 2016), the number of learners with special needs enrolled in primary schools in Tharaka-Nithi stood at 2734 pupils with 347 pupils with hearing impairment, 1666 pupils with intellectual impairment, 254 pupils with multiple disabilities, 285 pupils with physical impairment and 182 pupils with visual challenges. The same year, 90 students with special needs were enrolled in secondary schools in the County with 27 students with hearing impairments, 14 students with intellectual impairments, no student with multiple disabilities, 30 students with physically disabilities and 19 students with visual impairments. The implication is that the transition of pupils with special needs from primary schools to secondary schools remains a major challenge in the county. Therefore, it is imperative for schools to adopt, design and implement the policy of inclusive education (Republic of Kenya, 2009, 2012, 2018). Schools can only be viewed as inclusive when they become committed to developing values that recognize diversity and participation for all learners. Hence, the study was designed to examine how public secondary schools are keeping the pace as mandated by educational policy frameworks on inclusive education implementation.

1.2 Statement of the Problem

Although many nations have ratified and domesticated inclusive policies in their legal frameworks and agreed to implement inclusive education, information about the successful implementation of inclusive practices in developing countries is scanty, compared to developed countries (Nguyen, 2010). Policies adopted in education frameworks for promoting inclusive education mandate schools to provide a safe and accessible environment, flexible curriculum, provide adequate and skilled teachers as well as enrol more students with special education needs and disabilities in all the learning institutions (Republic of Kenya, 2004; 2009; 2012). In spite of the policy, disability continues to be one of the primary causes of educational marginalization, contributing to a large number of students who remain out of school (Republic of Kenya, 2016). Action at the national and international levels to address exclusion has been delayed by lack of aggregated data needed to assess, monitor and advance the inclusion of students with special education needs in regular schools (Saebones, 2015). Thus, this study analysed context-based school practices that influenced the implementation of inclusive education for learners with special education needs and disabilities, as well as, the extent to which the prevailing barriers and inconsistencies impact on the implementation of inclusive education policy in public secondary schools in Kenya.

1.3 The General Objective

To examine the effectiveness of public secondary schools in the implementation of inclusive education policy in Tharaka-Nithi County, Kenya

1.4 Specific Objectives

The study was guided by the following research objectives;

1. To examine the effect of school guiding principles on the implementation of inclusive education in public secondary schools in Tharaka-Nithi County, Kenya.
2. To determine the extent to which stakeholders' involvement influences the implementation of inclusive education.
3. To determine the effects of school resources on the implementation of inclusive education in public secondary schools.

4. To analyse the influence of school strategies in overcoming physical barriers that hinder the inclusive education for learners with disabilities,

1.5 Hypotheses of the Study

The study envisaged to test the following hypotheses at 0.05 level of significant.

HO₁: There is no significant relationship between school guiding principles and the implementation of inclusive education in public secondary schools in Tharaka-Nithi County, Kenya.

HO₂: There is no significant relationship between stakeholder involvement and the implementation of inclusive education for learners with disabilities.

HO₃: There is no significant relationship between school resources and the implementation of inclusive education for learners with disabilities.

HO₄: There is no significant relationship between school strategies and overcoming physical barriers that hinder the inclusion of learners with disabilities.

1.6 Assumptions of the Study

The study made the assumptions:

- i) That all study schools were implementing practices of policy as mandated by the law as a result of having learners with disabilities (LWD).
- ii) That all the study schools had developed strategies to overcome physical barriers that deter inclusion of learners with disabilities.
- iii) That the respondents would answer questions honestly, accurately and reliably to give a true picture on the implementation of inclusive education in public secondary schools.

1.7 Justification of the Study

The Kenyan government has made some progress towards meeting obligations under its laws as well as endorsing and domesticating various international policies to support inclusive education (Njoka et al., 2012). The Constitution of Kenya (RoK, 2010) embraces a bold rights-based approach to education, which provides for the rights of all learners to a free and compulsory basic education. Despite Kenya's commitment to the

international agreements to realize the right to education for learners with special education needs and disabilities, few studies have been carried out among secondary schools in Kenya and in particular, no study has been conducted to analyse the effects of practices of policy towards the implementation of inclusive education in public secondary schools. Literature on Kenya regarding the practices of inclusive education policy are scarce. Therefore, the findings of the study are expected to contribute towards the knowledge generation and transfer on practices of policy in relation to the implementation of inclusive education in a school context.

1.8 Significance of the Study

The findings and the recommendations of this study are expected to provide information that will enable the policy makers to comprehensively address the teacher training needs on inclusive education. The study findings are also expected to provide treasured information to school managers on practices of policy that facilitate the implementation of inclusive education in public secondary schools. Further, the findings may provide information to the school managers on the importance of engaging key stakeholders so as to meet the needs of learners with special education needs and disabilities and strategize in order to overcome physical barriers that hinder the implementation of inclusive education for the learners.

1.9 Scope and Limitations of the Study

1.9.1 Scope of the Study

The study confined itself to analysing the practices of policy and the implementation of inclusive education in public secondary schools in Tharaka-Nithi County. The study respondents constituted learners with disabilities, secondary school teachers teaching students with disabilities and non-disabled students leaning in the same classes with LWD. The sampled students were selected from schools that had admitted learners with physical disabilities among form one and four classes.

1.9.2 Limitations of the Study

The study relied on teachers' perspectives through the questionnaires, interviews from the learners living with physical disabilities and focus group discussions from non-disabled students learning in the same classes with LWD. The involvement of form one students in the research posed a limitation as they had a short duration in high school with little experiences on inclusive education support systems in schools. However, this limitation did not affect the study outcomes and generalizability because the study also used form four students who had the longest stay with a lot of experiences on inclusive support systems in selected schools. Besides, Tharaka-Nithi County has a combination of urban, small town and rural schools fairly symbolizing the diversity of Kenya's public schools' system. Thus, the research results may be generalized beyond the study sample and area.

1.10 Operational Definition of Key Terms

Disability - This is lack or restriction of ability to perform an activity in the manner within the range considered normal within the cultural context of the human being hearing impairment, mental handicap, visual impairment and those with physical handicap (Republic of Kenya, 2009).

Implementation- It is the realization of an application or execution of a plan, idea, model or design as in carrying out the principles of Special Needs Education Policy in order to create equal access to quality and relevant education as well as training inclusive institutions.

Inclusive education implementation- Inclusive education is defined as a process of addressing and responding to the diversity of needs of all learners and reducing exclusion to and within a regular secondary school (UNESCO, 2009)

Physical Disability- Any restriction or lack of ability to perform an activity in the manner or within the range considered normal for a human being (physical handicap and cerebral palsy, Brittle bones diseases; Muscular Dystrophy; Spina Bifida and hydrocephalus; Cystic Fibrosis) (Republic of Kenya, 2009)

Policy: Policy is described as an authoritative statement by a government about its intentions. (Althaus, Bridgman & Davis, 2007)

Practices: These are clear strategies from the policy that schools need to implement and they are consistent with the policy. These practices outline not only what should be done but how and why it should happen.

Special education skills- The ability to teach students with special needs, in a way that addresses their individual differences.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

This chapter presents literature related to practices of policy towards the implementation of inclusive education in schools. Literature related to this study has been reviewed under several sub-headings. The themes addressed are education policy and policy implementation, variables that influence policy implementation and the school capacity to implement the policy. The reviewed literature also focused on practices necessary for the implementation of inclusive education policy and school practices that hinder the implementation of inclusive education. The reviewed literature further provides a context for this research by examining existing knowledge in the problem area. The gaps that the research sought to address have equally been identified.

2.2 Education Policy

An Education Policy is described by Althaus, Bridgman and Davis (2007), as a commanding statement by a government about its intention to shape education and its people as citizens. The phase of policy creation, implementation and enactment is complex as it is created amidst uncertainty, and tested in the most demanding situations (Althaus et al., 2007). One advantage for the existence of policy in education sectors is the view that policy provides a collective understanding, agreement and a strategy for realizing improved educational results (Mingat et al., 2003). An Education Policy can be seen as a key component and a productive resource for schools to evolve their inclusive practices (Dyson & Gallanaugh, 2008). The view that schools need to refocus on the intent of the policies guiding them provides the basis for the discussion of policy and its implementation in this review. Policy can become a resource to assist school leaders persuade and influence others to get things done. On the other hand, Apple (2004) reminds us that policy may help learning institutions to restructure circumstances that reflect undesired economic, governmental or cultural principles that compete with the realization of schools' inclusive values (Ainscow & Sandill, 2010). This is especially significant when participants see policy as a force for challenging the current order and maintain a right to participate (Allan, 2008).

2.2.1 Policy Implementation

The implementation of a new policy is a complicated process due to the strains, conflicts, insights and predicaments related to the many players and systems that engage during the implementation process (Stofile, 2008). Whereas most education policies are adopted by a distinct body of decision makers, such as the school board of governors and parents' representatives, they are implemented by many actors. Fullan (2007) notes that policy implementation may fail because no distinction is made between structures of change and how the systems affect change. A policy decision discerns the problems to be addressed, specifies the objectives to be followed and identifies the structures the implementation procedures involves (Beatriz, et al., 2008).

2.2.2 Variables that Influence Inclusive Education Policy Implementation

According to Stofile (2008), effective implementation of inclusive education policy can only be recognized when all relevant variables that regulate the implementation process are in control. This is because policy implementation is concerned with working within the school systems through which policy goals are put into practice. Some of the problems associated with practices of inclusive education policy that are evident during implementation are as a result of errors made from the other stages (Gallup, 2017). According to Sabatier (2005), five variables influence policy implementation namely; the policy content and the context through which the policy must be implemented. The commitment of implementers towards the policy, the capacity of the implementers to implement the policy and the support of policy consumers and partners whose interests are affected by the policy (Mulugeta, 2015; Tesfaye et al., 2013; Puhan et al., 2014)

Policy content is one of the crucial pillars upon which policy implementation on inclusive education policy are founded. The content of policy is generally viewed as a fundamental factor in creating the parameters and guidelines for implementation, although it does not determine the exact sequence of implementation (Brynard & De Coning, 2006; Fullan, 2015). The content of policy includes: what it sets out to be done; how it communicates about the problem to be solved and how it aims to resolve the problem (Brynard & DeConing, 2006; Gallup, 2017). Commitment of policy implementers is usually assumed

to be the most significant factor in policy individual achievement. Commitment means promising oneself to a definite line of action. Commitment is biased and very hard to measure (Brynard & De Coning, 2006; Gallup, 2017). However, there are pointers that show the level of commitment of a school to a particular mission. One indicator is accomplishing responsibilities and assurances, especially when the school knows what its roles are towards the implementation of inclusive education policy. Practices of policy may be noble, but if the implementers are reluctant to come up with effective strategies to carry it out, implementation will not occur (Brynard & De Coning, 2006; UNESCO, 2005; Mason, 2016; Pont, 2017)

Formation of policy consumers and partners, among those affected by the practice of policy is one of the most central components during the implementation process. The success or failure of policy, depends on the support the policy produces among those who are affected (Brynard & De Coning, 2006; Maharaj, 2005; Hopfenbeck, Florez Petour & Tolo, 2015). Research on policy implementation has revealed that the understanding of any public policy rests on the capability to implement it (Fukuda-Parr, Lopez & Malik, 2002; Makoa, 2004; Hess, 2013). It is mostly known that many development efforts are unsuccessful in many countries because they lack organizational ability to implement and sustain the practices of a policy. Capacity is normally defined as the ability to accomplish policy functions, solve problems, set and realize policy objectives (Hopfenbeck et al., 2015). Brynard and De Coning (2006) view the general organization's ability as the structural, functional and cultural capacity to implement the policy objectives. Willems and Baumert (2003) on the other hand, pay attention to all the scopes of institutional capacity. These dimensions include: authorization, financial investment, an enabling environment, ethos, core values, and the way the individuals and institution intermingle in the public sector and within community as a whole (Bell & Stevenson, 2015). Inclusive education focuses on transforming all aspects of an education system.

2.2.3 School Capacity to Implement the Policy

The central role of the school managers is to create inclusive schools that are both excellent and equitable for all students. Inclusive schools develop and adopt a variety of

strategies. These strategies include: (a) coming up with a collective inclusive vision and mission, (b) independent inclusive implementation strategies, (c) utilization of staff to ensure effective inclusive service delivery, (d) developing collaborative agendas and teams, (e) providing continuous professional development opportunities to staff, (f) regularly monitoring and evaluating service delivery and (g) deliberately creating a positive school environment (Causton & Theoharis, 2014; Mcleckey & Waldron, 2015). Deep systematic modifications are required if inclusive education is to be successful. Moreover, practices of policy are central since a common goal and commitment to the goal is essential to successful inclusion. While inclusion has been achieved in several countries, it has not been achieved universally because the fundamental elements are missing (Ainscow, 2005).

The schools that are committed to inclusive education are keen to have its success measured. Researchers throughout the world have shown varied results. In Netherlands, a large-scale longitudinal study was undertaken to compare the development of matched pairs of primary school children in regular and special education over two and four years (Peetsma, Vergeer, Roeleveld & Karsten, 2001). The sample was chosen from an age cohort of 5000 learners within special education and 35,000 in regular education. After two years, 252 matched pairs remained and after four years, 216 pupils were still in the study, but only 40 matched pairs remained. This decrease was caused by the educational policy moving quickly in Netherlands towards inclusion model and many of their participants were moved from special schools to regular schools during the four-year period of the study. The researchers concluded that, over the first two years, some children did better in regular education while some did better in special education schools. Over the four years, however, cognitive development in language and mathematics of those students in regular schools was significantly stronger than their colleagues in special education schools.

In their evaluation from 225 schools in USA which had implemented the Success of All Programmes, a programme requiring a whole school restructuring for schools that serve students at risk of failure, Copper, Slavin and Madden (1998) “identified school

commitment to reform as one of the paramount issues”, and also that “all stakeholders must have a shared vision for change”. This view was supported by a synthesis of ten in-depth studies from six countries reported by Nind and Wearmouth (2005) describing successful inclusive practices of policy implementation. They stressed the need for all teachers to share and understand a common idea within the school, where individuals who have experienced difficulties are respected. Lipsky and Gartner (1998) analysed the findings from a survey from nearly 1000 district schools in the UK and found out seven key factors necessary for the inclusive education for the learners with disabilities; visionary leadership, collaboration of all stakeholders, appropriate and focused use of assessment, sufficient support for both teachers and students, adequate funding, positive parental involvements and effective programme models with adaptation to curriculum and instruction. Thus, it was imperative that the underlying school energies that influence the implementation of inclusive education in a learning environment be studied

2.2.4 Practices Necessary for the Implementation of Inclusive Education

Practices of policy are critical towards the successful implementation of inclusive education as the approach recognizes the students’ diversity (Hayes & Bulat, 2017). It enables all the learners to access course content, fully participate in learning activities and demonstrate their strength at assessment. Inclusive practices focus not only on education quality and equality of learners with disabilities but also demands that the learning environment should be restructured to accommodate diversity (Peters, 2004). Simply dumping of students with special learning needs in regular schools without addressing issues of exclusion, instructional and physical modifications, human and structural support towards educational diversity, condemns inclusion to failure (Hughes, 2015; Harnandez, 2008; Sapon-Shevin, 2007; Thomas and Vaughan; 2005).

In order to provide efficient educational responses for all learners, inclusive school development needs an on-going process towards true inclusive cultures, policies and practices. It also requires improving the presence, participation and achievement of all learners and at the same time, being watchful for exclusionary pressures towards marginalized learners (Ainscow & Miles, 2008; Booth & Ainscow 2011; Florian &

Rouse 2001; Villa & Thousand, 2005). Secondary education represents a challenging context for inclusive school development. From a cultural perspective, in secondary schools, the shift of early inclusive education towards school restructuring debate collides with the long-standing tension between equity and excellence (Avramidis, et al., 2002; Florian & Rouse, 2009). Because of its transition function towards higher education or the labour market, secondary education has to deal with more public consideration for accountability, which forces the schools to define school efficiency solely by the educational outcomes of their students (Graham & Harwood, 2011).

In spite of the benefits of inclusive programmes, at the secondary level inclusive practices remain scarce for a long time (Pearce, Gray, & Campbell- Evans, 2010). Due to the expansion of the concept of inclusion, at present research on inclusive practice in secondary education is fragmented and scarce. Studies on inclusive education in secondary schools represent different patterns of inclusion and refer to different target groups (Carrington & Elkins 2002; Davies & Howes 2005; Lawson, Waite, & Robertson 2005; Paliokosta & Blandford 2010; Sindelar et al., 2006). Finally, culture and policy are translated into inclusive practices in which resources are mobilized and learning is coordinated (Booth & Ainscow, 2011). On the other hand, self-reflective and collaborative strategies invite teachers and school administrators to improve and create school level practices for all learners. Practices such as creating responsibility, support activities and tools underline social values and improve responsiveness to students' needs (Booth & Ainscow 2011; Villa et al., 2005)

According to Aguis (2013), inclusive schools are characterized by a philosophy that celebrates diversity, rewards collaboration among its staff, students and other professionals, and teaches students how to help, support and learn from one another. Ainscow's (1999) typology of five features seem to be a characteristic of moving a school towards becoming more inclusive. These factors include: effective leadership, not only by the school principal but spread throughout the school; involvement of the staff, students and community in school policies, practices and decisions; a commitment to

collaborative planning; attention to the potential benefits of inquiry and reflection; and a policy for staff development that focuses on teaching approaches.

Inclusive education literature shows that many nations across the world have accepted inclusive education. Peters (2003) notes that although different nations are committed to inclusive education, no coherent strategy is obvious in literature. She further indicates that the implementation of inclusive education in many nations is often based on a variety of purposes embracing different goals.

Norway for instance, endorsed an inclusive education system in 1990 where comprehensive changes took place within the Norwegian school system as described by the European Agency for Development in Special Needs Education Report, (2004). This report indicates that the changes led to a re-organization of “special pedagogical initiatives” for learners with special needs. The special support services gave all learners rights to education. The European Agency for Development in Special Education Report (2004) shows that although there are success stories, the challenge Norwegian schools face is to create an inclusive school and avoid learning difficulties which lead to stigmatization. The report shows that some of the factors that contribute to the successful implementation of classroom practice with adapted and inclusive tuition for learners with special needs in Norway include: adequate teachers’ knowledge and skills on special education needs; teacher co-operation regarding the preparation of individual education plans and adaptation of individual plans to pupils’ abilities and aptitude for learning and educational needs (European Agency for Development in Special Education Report, 2004)

India was one of the signatories to the Salamanca statement and has committed itself to the development of inclusive education. Singal (2005) indicates that while inclusive education is defined as providing equitable opportunities for all learners in India, such an assertion seems to operate only at the level of rhetoric. This comes to light in the two projects: Project Integrated Education for the Disabled (PIED), and the Multi-Site Action Research Project that were implemented in India. These projects, according to Singal,

were aimed at providing equal opportunities as well as equal educational experiences for disabled children. The way in which inclusion was implemented in these projects suggests that, in theory, inclusion is about provision of equal opportunities for all learners, but in practice, inclusion is an ideal opportunity for children with disabilities who have no access to education (Singal, 2005). Singal indicates that the evaluation of these projects showed remarkable results that relate to increased enrolment of disabled children, comparable achievement with their non-disabled peers, and improved school environments.

Lesotho's national movement towards inclusive education began as early as 1987 (Johnstone, 2007). The basis for this movement was based on the cost-effectiveness of inclusive education and its cultural congruence with Lesotho's traditions. The government through its Ministry of Education and Training (MOET) established Special Education Unit to implement inclusive education. According to Maqelepo (2008), this unit was mandated to implement and support inclusion of learners with special educational needs (LSEN) in the mainstream education. To support inclusion, Lesotho has appointed inspectors, assistant inspectors and itinerant teachers that are responsible for specific disability categories. The biggest challenge to the education system in Lesotho has been widening access at all levels of education and providing opportunities for excellence (De Waal, 2008)

2.3. School Guiding Principles

Guiding principles are precepts that guide a school as an organization throughout its life in all circumstances, irrespective of changes in its goals, strategies, type of work, or the top management. The guiding principles help the school to determine if it is on the right path and fulfilling their goals by creating an unwavering guide (Frattura, & Capper, 2007). For years, educational leaders have addressed the importance of identifying a shared vision and mission for all learners in their school communities. The results are often a mixture of broadly yet fairly complex mission statements that have little support from the staff, parents, and other key stakeholders. When the school goals are developed

from unclear mission statements, the goals and action plans become ambiguous and the mission may not address the needs of all students (Frattura & Capper, 2007).

A major part of developing an inclusive, shared vision and mission comprises shaping a school culture that values all learners and nurtures cohesive learning opportunities for all students to thrive. A school should build a culture that upholds diversity and promotes the development of a vision and mission that includes all learners. As a part of that culture, the whole school community upholds the significance of not isolating students who are more gifted. In this way, all stakeholders understand the meaning of developing a mission that can set the stage for meeting the needs of all learners without discrimination (Frattura & Capper, 2007). For schools to be truly inclusive, inclusion must be a way of thinking, a philosophy of how educators remove barriers to learning and value all members of a school community (Abawi & Oliver, 2013). School ethos must be created on a set of core values and beliefs that enlighten all decision making, policies and practices to achieve inclusive education. A key characteristic of inclusion is the belief that the general education classroom should be structured to meet the needs of all the students irrespective of their ability or disability.

Embracing inclusive education as a guiding principle naturally requires transformation of education systems, and this change process is consistently challenged with several encounters. To understand change within the school, it is important to discern what change looks like from different points of view (Sarton, Smith & Mark, 2018). Reforming school systems to become inclusive is not only about putting in place developed inclusive policy guidelines that meet the needs of learners, but also transforming the schools' strategies, beliefs and values (UNESCO, 2014). It is important to note that the transformation process towards inclusion involves overcoming some obstacles such as; a) existing non-inclusive ethos, beliefs and tenets (Elder et al., 2016), b) lack of understanding of inclusive policy, c) lack of inclusive education skills among teachers, d) limited physical, human and financial resources and e) unsuitable school organization.

Loreman (2009) provides a synthesis of the features of inclusive education. They include; (a) that all learners attend their neighbourhood school without discrimination, (b) that schools have a zero-rejection policy when it comes to registration of learners with disabilities; (c) that all children study in regular, diverse classrooms with peers, (d) that all learners follow basically similar programs of study, with curriculum that can be adapted and modified; (e) that modes of teaching are varied and receptive to the needs of all, and (f) that all learners contribute to classroom learning activities and social events (Lai et al., 2015). However, schools give a myriad of reasons for not admitting learners with physical challenges, such as inadequate physical resources and lack of special education teachers. The school admission policies and practices as outlined by the Basic Education Act No. 14 of 2013, stipulates that ‘no school should discriminate any learner, seeking admission on any ground and no child should be denied admission in a public school’.

Researchers have acknowledged the significance of a clear vision and mission that are the basis for precise goals, expectations, and plans on how to bring about school development (Linton, 2011; Cotton, 2003; Levine & Lezotte, 1990). More specifically, the clarity and direction provided by a collaborative vision and mission are the basic building blocks for school reform. In a research by the Southern Regional Education Board (2010) for building leaders’ tasks in turning around deteriorating high schools, the results revealed that it is important to build leaders together with an ability to develop a vision that focuses students for career goals in the 21st century. With a clear vision, solutions can be established that are personalized to the unique needs of their own students and societies. It is obvious from this report that without a set vision, a mission that defines plans for school advancement cannot be put in place. Furthermore, the results clearly give emphasis to the strong need for school administrators and teachers to jointly create a vision that embraces the fundamental concerns of students in the school.

A study conducted in South Africa on school effectiveness and inclusion by Makoelle (2014) established that highly effective schools seemed to have incorporated inclusion within their vision and mission and school development planning. Makoelle further

found that encompassing inclusion within the school's vision and mission gives purpose and direction to implementation of inclusion. Oluremi (2015) established that inclusive education policy in Nigeria was ratified and incorporated in Nigerian laws in 2008. Nonetheless, students with special education needs are yet to be fully integrated into regular schools. In Tanzania, case studies by Possi and Milinga (2017) revealed that implementation of inclusive education suffers in a number of different ways. There is absence of support services, lack of supportive infrastructure and properly trained teachers in special education in schools.

The Special Needs Education Policy Framework (Republic of Kenya, 2009) came up with several guiding principles to direct the learning institutions towards the implementation of inclusive education. They include: (a) provide maximum service delivery to the learners with special needs and disabilities; (b) equal access to all learning institutions; (c) non-discrimination enrolment and retention for learners with special needs; (d) easy transition at all levels of learning without hindrances; (e) learner-centred curriculum and provision of teaching/learning materials; (f) nurturing full potentiality among learners with special needs; (g) protection of human rights of learners with special needs; (h) gender parity to enable equal educational participation; (i) active participation of all key stakeholders and (j) equal opportunities for all learners with special needs. In summary, the policy guiding principles aim at ensuring that all learners access all learning institutions without discrimination.

The Basic Education Act (Republic of Kenya, 2013a) describes the need to increase access, enhance retention, improve quality education and to strengthen early identification and placement and to ensure equal education opportunities for learners with disabilities. The school admission policies and practices as outlined by the Basic Act No. 14, stipulates that 'no school should discriminate any learner, seeking admission on any ground and no child should be denied admission in a public school'. This means that the schools should not reject any learner seeking admission. Hence, inclusion being an intricate process, it is crucial that practices of policy towards the implementation of inclusive education be examined.

2.4 Stakeholders Involvement

Stakeholders influence the effectiveness of educational programs through informed decision-making; hence, improve the overall quality of the educational system. Collaboration among key stakeholders is an essential component on the effectiveness of inclusive educational practices. The underlying assumption of such partnerships is that they work together to provide the learners with the best education possible. An empirical study, by Munirul (2015), in Indonesia, suggests that to attain a high-quality education system, perceptions of both internal and external stakeholders are paramount. Educational stakeholders include school principals, teachers, parents, community members, parent–teacher associations (PTAs), and school management committees, elected officials, students and boards of governors. Teachers as key stakeholders in education system are fundamental in ensuring quality education through effective teaching which requires necessary facilities to attain the objectives (Thangeda et al., 2016).

The rate at which stakeholders are involved in implementing any education policy has the greatest impact and influence on its outcomes; therefore, key stakeholders such as teachers need to ascertain necessary conditions to implement inclusive education practices (Watkins, 2007). In order to provide such support, the roles and responsibilities of all personnel involved must be clearly set out in contracts or service agreements (Lacey, 2000; Frattura & Capper, 2007). All the effective, inclusive schools emphasized the collective participation of all key stakeholders to enable learners with disabilities to receive necessary support.

Policies and practices aimed at redesigning the organizational structures and changing institutional habits in school systems are not easily accepted by public view. Such policy practices need to be cautiously developed and implemented in collaboration with key stakeholders, such as social partners and parents. In order to build stamina for change and involve stakeholders in designing a well-organized and effective education, it is significant not to focus simply on cost savings but to guarantee that each strategy is meant to improve quality and equity. Parents are a central resource and partners with teachers and other stakeholders in ensuring appropriate education for learners

(Engelbrecht et al., 2005). The inclusion of students with disabilities in general education necessitates collaboration between administrators, general educators, special educators, parents, and other key stakeholders in order to deliver quality services to all students. In a survey done to experts in the field of severe disabilities, Jackson and colleagues (2000) reported that collaboration was often cited as a foundation to the implementation of inclusive education (Jackson, Ryndak, & Billingsley, 2000).

Collaboration among teachers and other related stakeholders is also a critical factor in implementing effective inclusive education. Soto and colleagues found that general educators who have regular opportunities to work in partnership with professional peers show evidence of increased, varied instructional skills as well as decreased tendencies to make referrals to special education (Soto, Müller, Hunt, & Goetz, 2001). Two studies by Hunt and colleagues (2001) further document the effectiveness of collaboration as a strategy for improving student outcomes in inclusive settings. In both studies, researchers document the successful teaming of teachers, inclusive service providers, and parents in implementing support plans for students with severe disabilities and typical peers considered academically at-risk. Consistent implementation of these plans resulted in increased academic skills, engagement in class activities, interactions with peers, and student-initiated interactions for all learners (Hunt, Doering, Hirose-hatae, Maier, & Goetz, 2001; Hunt, Soto, Maier, & Doering, 2003). This study envisioned to establish the influence of stakeholder involvement towards the implementation of inclusive education in schools.

2.5 School Resources (Human, Physical, and Financial)

In many African countries, key challenges to the implementation of inclusive education have remained the shortage of resources, inadequate facilities, a lack of skills among the teaching staff on inclusion, lack of support by key stakeholders, overcrowding of classes and a lack of support from the County based education teams (Donohue & Bornman, 2014). In this regard, the situation in rural areas is far worse where the scarcity of basic resources is significantly needed. Mainstream schools are not prepared to face the

challenges of teaching learners with diverse needs, in particular because teachers lack professional development programmes to meet their needs (Ntombela, 2011).

2.5.1 Human Resource

Transforming the school vision into practice requires additional information and skills, in which teachers and school managers must be trained (OECD, 2008). Professional development prepares the school and raises staff confidence for implementing inclusive practices, powered by belief and the motivation to move in the new direction (UNESCO, 2003). The quality of teachers and their teaching have the greatest impact and influence on educational outcomes; therefore, teachers need certain conditions to implement inclusive education practices. In order to provide such support, the roles and responsibilities of all personnel involved must be clearly set out in contracts or service agreements (Watkins, 2007; Loreman, 2009).

Teachers' approaches towards inclusive education play a key role towards the implementation of inclusive education. Teachers may facilitate or restrain the implementation of an inclusive policy. If teachers have negative views towards the process of inclusive education, probably the implementation of inclusion will be problematic. Thus, funds and resources may not automatically be a key to successful implementation of inclusive practices (Boyle et al., 2013; Kraska & Boyle, 2014; Sharma & Nuttal, 2016). Teachers must keep up with the growth in special educational needs through developmental training. The primary instrument identified by reform and restructuring proposals to bring about the needed change is to provide educational staff with quality professional development. However, the characteristics that influence the effectiveness of staff development are varied and highly complex. Traditionally, professional development efficacy relied on the gratification of the participants, however currently; educators desire more accurate guidelines on developing quality staff development as well as approaches to evaluate the effectiveness of the actions on student learning outcomes (Guskey, 2003).

The influence of professional development on students' outcomes is accomplished through a positive change on the knowledge and practices of the teachers and school administrators. The immediate outcomes of professional development activities lie with the teachers' knowledge and practices. This equates to the most significant factor for encouraging the relationship between professional growths and improving students' outcomes (Guskey & Sparks, 2002). The understanding and practices of school administrators are also influenced by the quality of the professional development program. Administrators may not influence student outcomes directly; however, Guskey (2003) identifies two ways through which administrators can influence student outcomes indirectly; by their interactions with teachers and in forming school practices and culture, administrators can have immense influence over student outcomes (Guskey & Sparks, 2002). According to Desimone (2009), the most powerful teacher learning and application occur inside the teacher's classrooms through practice and self-reflection. School based professional development allows for specific problem-solving sessions in which teachers are able to work together to identify the needed resources and strategies to meet the needs of all the students in the classroom.

While many educators support the right of all learners to access education in regular schools, some lack self-confidence in their ability to meet the needs of all students with increased differing needs. The teachers found that the required changes to planning, practices and assessments is overwhelming as they have historically only seen themselves as trained and therefore competent to teach non-disabled learners (Fergusson, 2003). Forlin (2001), while examining 571 regular Australian school teachers found that the greatest possible stressor when including students with moderate to severe disabilities is their perceived professional competence. In a study involving 10,000 regular education teachers in the USA, two thirds supported the concept of inclusion, but less than a third thought it was the best place for students with disabilities (Kavale & Fornes, 2000). In a USA study that targeted 248 regular and learners with disabilities in middle school over three years, Wentzel (1997) found that if students perceived their teacher to be caring, was significantly related to their motivation which links to the students' performance. Agreeing with these results and taking a step further to include peer relationships, Anton-

Lee (2003) cited a synthesis of international studies which identified the establishment of caring and an appreciation for diversity in the classroom as important factors in student learning.

Effective inclusion happens when there is sufficient pre-school or in-service training for regular teachers underscoring the benefits of inclusion and focusing on practical skills improvement. Key issues for successful inclusion as described by teachers were: (a) availability of support for teachers; (b) support being provided in modifying the classroom or activities; (c) extra planning time being provided and (d) taking account on class size with inclusion of learners with disabilities (Smith & Smith, 2000)

A study by Burstein et al. (2004) reporting on the effectiveness of change model to help schools become inclusive that was instituted in two South California schools in districts over three years, noted that both general and special education feel incompetently prepared to assist students with disabilities in general classrooms. In support of this view, Fisher, Frey and Thousand (2003) analysed the skills and capabilities special teachers in inclusive schools require in addition to the information and the skills they needed in exclusionary setting. These include collective teaming and teaching, and instructional modifications, personal support, assistive technology and positive behaviour support. In schools where there is effective inclusion, teacher's ownership of issues and their engagements is deep rooted, critical consideration improves efficiency and empowers them to engage in action which results in improved practice (Ainscow et al., 2004).

A study conducted by Tungaraza (2014) in Tanzania, established that teacher training in special education faced a myriad of challenges that include lack of teaching and learning materials, few trained teachers, teacher attrition, negative attitudes, barrier to information, and inaccessible environment. Further, a study by Brittany (2015) indicated that the training of teachers implemented in Uganda and Zambia are illustrations of the evolving role of mainstream and special needs teachers in the inclusive education conversation. With proper training on inclusive education skills, Singal, (2010) found that the

mainstream teachers are capable of working with students with disabilities when the tools to work with disabled students are provided.

The Special Needs Education Policy Framework of 2009, noted a challenge on lack of trained teachers on special education needs. The policy framework underscored the need to facilitate an effective and efficient professional development to support learners with disabilities. Further, the Ministry of Education has to team up with development partners to develop mechanisms that improve efficiency in human resource training and deployment of special education teachers in all learning institutions. The policy framework for Education (Republic of Kenya, 2018) established a major challenge on inadequacy of staff with special needs education skills to support learners with disabilities. Hence, the government emphasized on the need to recruit and deploy human resource with essential knowledge and skills in special needs education.

A national survey (KISE, 2018) found that 13 percent of the head teachers of special primary schools and 77 percent of the head teachers of integrated primary schools did not have specialized training in special needs education. The policy emphasizes on the need to facilitate and provide specialized human, institutional and community capacity development. Hence, the government expressed its commitment to recruit and deploy human resource with knowledge and skills in special needs education in schools and increase financial support for capacity development activities. In a study on challenges facing inclusive education in developing countries, Wanjohi, (2019) postulates that inadequate teacher training on handling both disabled and non-disabled students in the same class contributes to poor performance among learners living with disabilities due to poor teaching skills and abilities, which negatively affects them. Given the significance of the teachers' input, it was necessary to establish how the schools are keeping the pace regarding staff development in inclusive education practices to meet the needs of all learners.

2.5.2 Physical Resources

Provision of physical resources is imperative for the success of special needs education services (Republic of Kenya, 2009). The quality and adequacy of resources such as physical facilities have a direct bearing on quality of education, as they determine how effectively the curriculum is implemented. Learners with special needs and disabilities require a learner free environment to maximize their functional and academic potentials (Republic of Kenya, 2018). Resources play a significant role in enabling provision of special needs education services in the country (Laudan & Loprest, 2012). Learners with special needs require more and specialized material resources for their education than their non-disabled peers. Material resources are needed at both the individual and school levels. The nature and type of materials required depend on the type and degree of disability (United Nations, 2018). The mandate of education frameworks is to create an environment that serves all learners regardless of their learning needs. However, in the planning of new buildings and in the security of school facilities and equipment, the tendency has been to make only minor changes from the arrangements of the past, on the assumption that the same equipment and instructional materials could serve equally well for the nurturance of all forms of abilities among all children, (Republic of Kenya, 2005, 2009; Kochang, 2003; Chepkwony, 2013).

Lipsky and Gartner (1998) too, analyse reports from 1,000 school districts in the US which adopted inclusive education programmes. Their analysis recognized seven practices that ensured successful implementation of inclusive education. They include: visionary leadership, partnership, refocused use of assessment, support for staff and students, funding, effective parental involvement and use of effective programme models and classroom practices. Avramidis et al. (2002) in their in-depth case study at school level identified various practices that promote inclusive education. The most important is to determine the fundamental requirements for all learners. The others are: provision of resources (human, physical and financial), restructuring the cultures, policies and practices in schools, reducing barriers to learning and participation for all students, organization changes and instructional adaptation and that ongoing professional development is mandatory (Lacey 2000; Frattura & Capper, 2007). Resources play a

significant role in enabling provision of special needs education services in the country. Unfortunately, the limitation of resources remains a barrier in many learning institutions in developing countries, and therefore, it is advisable to intensify activities to ensure resource allocation (Lynch, 2011; Bagree & Myers, 2011).

Schools need to be restructured in order to respond effectively to the needs of all learners. Adapting the school environment refers to adjusting the general school setting to encourage a barrier-free learning environment (Operti & Brady, 2011). For example, the architectural structure of the classrooms and walkways, such as tracks on the school ground, should be made easily accessible for the mobility of learners living with disabilities. Consequently, adapting the whole school environment reduces the difficulties experienced by learners with disabilities. This can be done by creating a barrier free environment that increases the capacity to experience freedom in learning and accessibility. The inclusive school ought to be pro-active relative to a variety of needs of all learners rather than reactive as an integrated education has been (Naukkarinen, 2010; Peters, 2007; Kisanji, 1998). In order to provide a truly inclusive school, the physical environment needs to be safe and accessible to all students, including those with physical and sensory disabilities (Hayes & Bulat, 2017). Issues relating to the design and outline of the physical environment can only be addressed at the planning stage for school buildings and those concerned are the educational authorities, builders and architects (NCSE, 2010). A school with learners with disabilities requires special resources to cater for their needs. In addition, different types of special needs require different types of resources.

Tugli, Zungu, Goon and Anyanwu (2013) evaluated the perceptions of students with disabilities concerning access and support at the University of Venda. Participating students highlighted challenges pertaining to facilities, student support materials and physical access within the university environment. Twenty-eight students affirmed that the physical environment constituted a great barrier to their learning, and more than half maintained that the physical environment was unsafe and made them vulnerable. Similarly, the study findings by Hemmingson and Borell (2016) in Swedish schools

found that a total of 34 students with physical disabilities aged between 10 and 19 faced mobility limitations due to infrastructure barriers.

A study carried out by Mafa (2012) cited that in Zimbabwe, buildings in most schools were not accessible to learners with disabilities especially those using wheelchairs. Such challenges made implementation of inclusive education complicated. The situation of inclusion in Zimbabwe was compounded by cultural barriers and negative attitudes toward learners living with disability. A study conducted in Ethiopia on inclusion by Zelelew, (2016), showed that lack of resources is a major challenge to access of education in higher education for learners with impairments. One of the typical barriers to inclusive education in tertiary education is the inaccessibility of the physical environment such as the unavailability of ramps and unmodified toilets. Unless the physical environment is accessible to students with disabilities, it is hard to ensure their successful inclusion in higher education.

A study by Mwangi and Orodho (2014) in Nyeri County, Kenya showed that physical and teaching/learning resources were either inadequate or quite dilapidated. Undoubtedly, many students with physical disabilities face barriers in the school. As a result, they lack confidence, feel different compared to their peers and out of place at times. Another study conducted by Buhehe and Ochieng (2013), in Bungoma County, revealed that the integration of inclusive education lacked support structures, lack of knowledge and skills among teachers for handling the available resources and inadequate teaching / learning resources. Wanjohi, (2019) points out that lack of adequate resources to meet the educational needs of the learners with disabilities in the mainstream schools cause parents to be uncertain as to whether the needs of their children are adequately met in these schools.

The Special Needs Education Policy Framework (Republic of Kenya, 2009) outlines several accessibility challenges facing learners with special needs and disabilities. They include: inaccessible buildings, lack of amenities, equipment and furniture. The framework embraces practices that adopt the provision of adequate resources, learner-

friendly buildings, modified furniture and equipment in learning institutions for learners with special needs and disabilities.

According to the Sector Policy for Learners and Trainees with Disabilities, (Republic of Kenya, 2018), many regular learning institutions lack barrier-free physical and social environments, that limits mobility, independence and compromises safety for learners with disabilities. This is aggravated by inadequate safe water and sanitation, poor standards of hygiene and environmental health (Global Health Action, 2016). The government resolved to provide adequate resources and barrier-free environment, adequate, clean and safe water and sanitation in all learning institutions. Given the significance of learner-friendly environment, it was imperative to examine on how the schools are keeping the pace in relation to the provision of adequate and modified physical resources for accessibility of learners with disabilities.

2.5.3 Financial Resources

The debate on financing of inclusive education was raised at the international level in 2006, with the launch of the UN Convention on the Rights of Persons with Disabilities (United Nations, 2006), which impacts upon countries' legislation. The means of funding have a direct influence on the strategic conduct of the actors that play a specific role in implementation of inclusive education, such as teachers, parents and other stakeholders (Meijer, 1999). This shows how critical the financial aspect is to the implementation of inclusive education. Although there have been many challenges experienced by governments trying to implement inclusive education, progress has occurred with decentralizing educational financing in many regions (UNICEF, 2012). According to Zelelew (2016), lack of financial resources for learners with disabilities is becoming a great challenge in many developing countries. One of the most serious barriers to inclusion in those countries is the lack of an adequate budget.

The Kenya government's policy framework on inclusive education is contained in the Kenya Education Sector Support Programme (KESSP) document and the National Special Needs Education Framework (2009). It aims at designing and implementing

programs that enhance inclusive education in all institutions. To operationalize this policy, the government in partnership with donor agencies, religious and Non-Governmental Organizations (NGOs) have funded education for children with special needs (Republic of Kenya, 2005). The specific areas that the government has funded include: (a) advocacy and awareness creation programme; (b) provision of equipment in special institutions; (c) teachers' training on special needs education; (d) coming up with a flexible curriculum; (e) funding each public primary school with Ksh. 10 000 for making school inclusive.

According to Gachiri (2010), annually, learners with special needs are allocated Kshs. 3,020 by the government, which is Kshs. 2000 more than what other non-disabled learners get. However, children with special education needs require at least Kshs. 18,000, to give them an education that equalizes with the mainstream classmates. This is because their education requires specialized equipment, trained teachers and institutions that have facilities which make learning easier. To this end, it is imperative that elaborate dynamics of school financial resources towards the implementation of inclusive education in schools be examined.

2.6 Developing Effective School Strategies

Kilgore (2013) acknowledges the compelling body of research on the central role played by the school as an agent in creating effective inclusive strategies to the implementation of inclusive education. An effective inclusive school adopts a variety of strategies. This include; (a) identification of current inclusive practices that are already being implemented in the school, (b) creating inclusive practice-leadership players, (c) developing an action plan for school transformation to meet the needs of all learners, (d) determining implementation limitations/barriers including reviewing student timetables and updating inclusive education programmes, (e) providing an ongoing professional learning opportunities and support for all staff, (f) involving family members and other key stakeholders, (g) identifying indicators of effective implementation practices, (h) monitoring the implementation of inclusive policies and practices and (i) a need for an action plan that outlines details of how a school will implement inclusive practices.

Finally, it is crucial to celebrate success and motivating the staff for achieving the action plan goals.

Booth and Ainscow (2002) highlight the significance of the Index for Inclusion developed by The Centre for Studies on Inclusive Education, in guiding the transformation of the school into an effective inclusive environment. The index comprises three scopes, namely; creating inclusive cultures, producing inclusive policies, and evolving inclusive practices. The index provides the framework for self-review of school cultures, policies, and practices, and the identification of the barriers to learning and participation. The following are recommended: (a) appreciating all students and staff equally; (b) increasing access and participation of students in school and minimizing their discrimination from the cultures, curricula and communities of schools; (c) modifying the school cultures, policies and practices in schools so that they respond to the learner diversity in the neighbourhood; (d) minimizing barriers to learning and participation for all students, not only those with impairments or those categorized as learners with special educational needs; (e) gaining skills from efforts to overcome barriers to the access and participation of particular learners to make changes for the benefit of students more widely; (f) viewing the difference amongst students as resources that support learning, rather than as problems to be overcome; (g) recognizing the right of students to an education in their neighbourhood schools; (h) move the schools forward for staff as well as for the learners; (i) underscoring the responsibility of schools in creating the community and nurturing inclusive values, as well as in increasing attainment; (j) cultivating mutually sustaining relationships between schools and communities as well as (k) understanding that inclusive education is one characteristic of inclusion in society (Booth & Ainscow, 2002)

As a school moves towards inclusion, it is imperative for stakeholders to follow a process for transformation. Kotter's change model (2012) provides core information for educational authorities presently engaged in or in view of improving inclusive practices in a school. The IRIS (2010) module provides complete support for leaders getting ready to create an inclusive school and this is structured around the eight components outlined

in Kotter's change model (2012). The model suggest that the school managers can create inclusive schools by using the following strategies: (a) initiating a sense of seriousness for modification; school managers should establish a need to change by reviewing current data and identifying learning gaps between all students; (b) building an inclusive guiding team that incorporates the key stakeholders in the transformation process, with a vision and expertise to make and implement decisions; (c) creating a vision statement that is clear, focused and measurable on the vision and desired outcomes; (d) discuss the vision with the staff, families and the community to gain support and ownership; (e) school managers should facilitate an action plan that empowers the teachers and other key stakeholders to take action and remove numerous implementation barriers; (f) guarantee short-term achievements which are consistent with the vision and which can be stepping stones to greater opportunities for success; (g) advance and expand opportunities; the school managers should establish what is and is not working and use the information to adjust the plan for progress; (h) be rooted for the transformation; guiding teams should ensure changes are incorporated into the document that guide the school's processes and procedures (Kotter's Change Model, 2012)

Schools need to put in place strategies related to practices of inclusive education policy in order to respond effectively to the needs of all learners and to minimize barriers that hinder the implementation of inclusive education. Adapting the school environment refers to adjusting the general school setting to encourage a barrier-free learning environment. Creating a barrier free environment increases the capacity of the students with disabilities to experience freedom in learning and accessibility. The inclusive school ought to be proactive relative to the range of needs of all children rather than reactive as an integrated education has been. In order to provide a truly inclusive school, the physical environment needs to be safe and accessible to all students, including those with physical and sensory disabilities. Many of the issues relating to the design and layout of the physical environment can only be addressed at the planning level by the educational authorities, builders and architects (Naukkarinen, 2010; Operti & Brady, 2011; Peters; 2007; NCSE, 2010). Learners with special needs in a school require special resources to cater for their needs. Inclusive policy strategies to overcome physical barriers are critical

towards the successful implementation of inclusive education as the approaches address the needs of every learner.

2.6.1 School Practices that Hinder the Implementation of Inclusive Education

Placement of learners in mainstream schools is just not enough, for it may not guarantee respect for being different or access to the material, social, cultural and educational funds that people who have no disabilities expect. Schools must adopt the features of inclusion, while at the same time be prepared to abolish structures and practices leading to exclusion (Forlin, 2013; Boer, Pijl, & Minnaert, 2011). Learning and participation are hindered when learners encounter learning barriers (Booth & Ainscow, 2011). These hindrances can occur due to interaction with any aspect of a school: its buildings and physical arrangement; school organization, cultures and school policies and practices; the relationship between and amongst children and adults; and approaches to teaching and learning among others. Resources not only enable learning and participation, but also play a significant role in children's emotional and social development. In addition to teachers' creativity to invent materials, one of the most important resources at no cost for the participation of students with visual impairment in classroom activities is supportive work facilitated by teachers (Booth & Ainscow, 2011)

Inclusive education is about the incorporation of the disabled learners in schools. It is under this inclusion model that learners with special needs spend most or all of their time with non-disabled learners (Hayes & Bulat, 2017). While inclusive education has its benefits, there are enormous challenges hindering its effective implementation especially in developing countries. In most of the schools especially in developing countries, lack of adequate reading materials, to desks, classrooms among others are some of the factors affecting effective implementation of inclusive education (Nyabuto, 2014). According to a study conducted by Oakes and Saunders (2002), shortages of teaching and learning materials has a negative impact on the learners especially the disabled ones with less knowledge about a subject. Lack of adequate resources to meet the educational needs of learners with disabilities in the mainstream schools, cause most of the parents to have doubt as to whether the needs of their children are adequately met in these schools

(McMillan, 2008). To this end, it is crucial to establish the effects of school strategies in overcoming physical barriers that hinder the implementation of inclusive education.

Acceptance of the notion that learners can be excluded from mainstream education because they are branded as disabled amounts to institutional discrimination (Ashby, 2012). Students with disabilities cannot attend school if buildings are physically inaccessible (Woolley, 2006). To ensure equity for learners with disabilities to an education, accessibility must be addressed broadly, in relation to entry and exit pathways to key resource rooms, appropriate sitting arrangement, modified furniture and facilities, and transportation to the educational facility (Banham, 2018). Negative attitudes and damaging beliefs create a significant barrier to the education for learners with disabilities. These learners may face violence, abuse or social isolation from their non-disabled colleagues (WHO, 2011). The negative attitudes towards learner differences that result to discrimination and prejudice in the school and the society manifest itself as a critical barrier to the learning process (UNESCO, 2014).

Other barriers that hinder the implementation of inclusive education include inadequacies in policy and legal support, resources and facilities, specialized staff, pedagogical techniques, flexible curricula, supportive leadership, and cultural attitudes. It is imperative that schools put more energy on useful inclusive education strategies that value students' welfare, dignity, self-sufficiency and contribution to the society. Hence, learners with disabilities fully access and participate in the learning alongside their non-disabled colleagues (Cobley, 2018; Florian, Black-Hawkins & Rouse, 2017; Hehir, et al., 2016; UNESCO-IBE, 2016). The physical environmental barriers of the playgrounds can contribute to segregation of learners with physical disabilities. Yantzi, Young and Mckeever (2010) assert that discrimination at the playgrounds occurs through different mechanisms, most of which are neither deliberate nor acknowledged as exclusionary. Marginalization occurs through the operationalization of policies, or the types of material and surfaces that are used. In research interviews, learners with disabilities have termed school playgrounds as places where they experience tremendous segregation (Yantzi, et al., 2010). Other barriers associated with physical activities include lack of trained

teachers to assist students with physical activities and damaging actions such as bullying from non-disabled learners (Padma & Raj, 2016).

2.6.2 Inclusive Education Policy Strategies in Kenya

The Government of Kenya has made some advancement in developing policy strategies for the implementation of inclusive education. In support of inclusive education, the Constitution of Kenya (Republic of Kenya, 2010), section 43 (1), confirms the right of every person to education. Further, section 53 (1) (b) states that every child has the right to free and mandatory basic education. The commitment demands a system of education that guarantees this right. The government, therefore, aims to ensure that learners with disabilities are enabled to transit from basic education in primary, secondary, tertiary and university levels.

Kenya Vision 2030 commits the government to develop human capital regardless of status and disability. The social strategy makes special provisions for Kenyans with various disabilities and previously marginalized communities. The Kenya's blueprint promises to ensure that issues directly affecting persons with disabilities are adequately addressed in policies and legal frameworks, programs and projects. Furthermore, the Persons with Disabilities Act (RoK, 2003) provides a comprehensive legal framework which outlaws all forms of discriminative treatment of persons with disabilities such as the lack of access to education and training. It also provides for adaptation of infrastructural, socio-economic and environmental facilities to ensure a favourable environment for persons with disabilities.

The Sessional Paper No. 1 (Republic of Kenya, 2005a) provides a policy framework for the education sector in Kenya, comprising the necessary legal scenery, in which to plan, develop and implement inclusive education practices. It outlines policy recommendations for improving education access, quality, significance, equity and competence, which are essential factors in the overall success of inclusive education.

The Special Needs Education Policy Framework (Republic of Kenya, 2009) addresses a collection of crucial matters touching on special needs education and provides a comprehensive policy framework that tries to match education service distribution for learners with special needs in all education subsectors. The document endorses inclusive education as the feasible option in augmenting education access, equity, quality, and relevance for children with special needs.

The Policy Framework for Education (Republic of Kenya, 2012), summaries numerous challenges facing all in the secondary education subsector, including: inadequate infrastructural development, the burden of charges and other fees by schools, the assumed lack of relevance of the curriculum, an unfavourable environment, teacher absence and unpunctuality, especially in rural areas and dearth at the household level, all these drive learners away from secondary schooling. Though the framework does not outline an explicit inclusive education policy, it embraces inclusive strategies by adopting the principle of learner-friendly education, while concurrently focusing on a mandatory legal framework to guarantee that schools respect diversity and warrant equality of learning for all learners and that they do not disregard, distinguish, or categorize on the basis of difference.

The Basic Education Act (Republic of Kenya, 2013a) describes the need to increase access, enhance retention, improve quality and relevance of education, and strengthen early identification, documentation, assessment and placement to ensure equal opportunities in the provision of education for learners with disabilities. For example, Section 44 (4) states that, “The Cabinet Secretary shall ensure that every special school or educational institution with learners with special needs is provided with appropriate trained teachers, non-teaching staff, infrastructure, learning materials and equipment suitable for such learners”.

The Ministry of Education Sector Policy for learners and trainers with disabilities (2018) meant to review the 2009 Special Needs Education policy framework as reported by the SNE Policy Review Data Collection Report (2016) was not effectively implemented.

This was attributed to a number of factors which included lack of implementation guidelines, poor dissemination and lack of an implementation and coordination framework. To address the challenges, the policy came up with an implementation guideline to guide the implementers. The policy came up with four objective: 1) align education and training services for learners and trainees with disabilities with the relevant national policy frameworks; 2) develop a clear policy framework for the provision of inclusive education and training; 3) address the existing policy and implementation gaps in the provision of education and training for learners and trainees with disabilities; and 4) develop guidelines for the implementation of the policy.

Despite the policy determination by Government of Kenya (Republic of Kenya 2005a, 2005c, 2009, 2010, 2012), there seems to be inadequate particulars on the nature and the scope of inclusive education policy. The particulars on the provision of delivery models and the roles of stakeholders, within the inclusive education policy framework are less clear. There are no clear guidelines showing the intended direction of the implementation process in different education subsectors, with timelines and standards. Nevertheless, the school managers have significant role in guaranteeing effective implementation and sustainable inclusive education programmes (Causton & Theoharis, 2014; Hehir & Katzman, 2012; Waldron, McLeskey & Redd, 2014). In this regard, it is imperative to examine the practices of policy and how they impact on the implementation of inclusive education in secondary schools.

The influence of head teachers' leadership development in relation to inclusion in primary schools in Kiambu County, revealed that inclusive education implementation in Kenya is facing a myriad of challenges (Maina, 2014). These include: lack of sufficient knowledge and skills among the staff, and a lack of collaborative framework between special education and regular teachers, to promote teamwork spirit in regard to collaborative teaching, design accommodation, modification and adaption to the curriculum. Poor learning resources, crumbling facilities/structures and absence of special learning amenities hamper efficient learning outcomes for students with special educational needs. Mutembei (2014) reported that most of the primary schools lacked

physical facilities such as ramps, adapted toilets, spacious classrooms and levelled playgrounds (KNCHR, 2007).

In Nairobi County, teachers had positive attitude towards inclusive education but lacked basic training on special education needs, which inhibited the effective implementation of inclusive education (Onyango, 2017). The inclusive policy positively affected learners with hearing impairment in Nandi County, but it faced many barriers that hinder accessing secondary school education (Muhombe et al., 2015). The major barriers retarding the implementation of inclusive policy in Kenya is the lack of clarity in the special education policy of 2009 regarding the means through which schools can meet the goals of inclusive education (Adoyo & Odeny, 2015). Eleweke and Rodda (2002) identified that the implementation of inclusive education policy in most developing countries is meagre. They recognize factors such as a lack of adequate support facilities, lack of appropriate materials, poor staff-training programmes, inadequate effective financing structures and an empowering legislation as the major blocks hindering the effective implementation of inclusive education in these countries. Moreover, many challenges have been acknowledged in enhancing inclusive education in Kenya (Buhere, Ndiku & Kindiki, 2014; Buhere & Ochieng, 2013; Mwangi & Orodho, 2014; Njoka et al., 2012). Thus, this justification makes this study both essential and imperative.

2.7 Summary of the Literature

The implementation of inclusive education policy is a complicated process due to the strains, conflicts, insights and predicaments related to the many players and systems that engage during the implementation process. Practices of policy on the implementation of inclusive education have been reviewed. School guiding principles, rate of stakeholder involvement, influence of school resources (human, physical and financial) and the effects of school strategies in overcoming physical barriers that hinder the implementation of inclusive education have been examined. Moreover, the existing gaps in relation to inclusive education implementation is an escalating need for effective practices of policy and a supportive policy atmosphere for nurturing learner diversity. Lack of clear school guiding principles, specific roles and involvement of stakeholders

and timelines for implementation of inclusive education policy have been identified (Republic of Kenya, 2005, 2009, 2012, 2018). Also identified is the growing necessity for physical-resource modification to facilitate the implementation of inclusive education in public secondary schools. Other gaps include escalating need for effective teachers loaded with special needs skills on inclusive education management and effective strategies that nurture a learner-friendly environment free from any barriers to enable learners with disabilities participate fully in their learning process. The gaps identified portend critical implications not only to the practices of inclusive education policy in schools but also the implementation and sustainability of inclusive education.

2.8 Theoretical Framework:

This study was guided by the Social Model of Disability Theory. The model was initially introduced in 1976 by a “disabled” lecturer, Mike Oliver, who adapted it from a booklet published by the Union of Physically Impaired Against Segregation (UPAIS) titled *Fundamental Principles of Disability* (Watson et al., 2012).

According to Brunton and Gibson (2009), the Social Model of Disability was developed as an opposition to what was claimed to be a harmful ‘Medical Model’ which considered disability as principally a medical problem, entailing personal calamity and requiring treatment. Proponents of the Social Model debated that while the ‘impairments’ of people with disabilities were physical, their ‘disability’ was a social phenomenon; the creation of environmental, economic and cultural barriers erected by oppressive societies. This argument tends to separate disability from impairment and equates disability to barriers imposed by society and social construction. Thus, impairment only becomes a disability by virtue of inadequate and discriminatory social arrangements including attitudinal barriers that prevent people with impairments from maximum participation in society (Ransom, 2009; Brunton & Gibson, 2009).

Barnes (2003) states that social model of disability is, first and foremost, a focus on the environmental and social barriers which exclude people with disabilities from mainstream society. It makes a clear distinction between impairment and disability; the

former refers to biological characteristics of the body and the mind, and the latter to society's failure to address the needs of people with perceived impairments. The social model of disability reverses the causal chain to explore how social constructed barriers have disabled people with a perceived impairment (Barnes & Mercer, 2003). Whilst the social model does not deny that some illnesses may have disabling consequences, it strives to understand disability and impairment, and its goal is to work towards the creation of a non-discriminatory culture within the society (Shakespeare & Watson, 2001). What can be inferred from the perspective of the Social Model of Disability is that it considers people with disabilities as an essential and indispensable part of society. This means that they have roles to play in all human activities and enhancement, and that the obstacles that inhibit them from playing such roles are created by the society. Thus, a person's environment has an enormous impact on the experience of disability, and inaccessible environments generate barriers to participation and inclusion (WHO, 2011).

The Social Model of Disability recognizes that all learners have diverse needs and at the same time have equal rights to access and participate in all spheres in the society including education system. The model recognizes that social perceptions, attitudes, institutions and policies, can be modified to respond to learner diversity and access to equal opportunities of people with disabilities (Ahmad, 2015). The school beliefs, rituals and values that give the school its identity are socially constructed. These values and beliefs are highly upheld and easily influence the school activities and perceptions which influence the behaviour of its members especially learners with special education needs (Hendricks, 2016).

Cook and Polgar (2015) argue that the school contextual components include physical, social, cultural and institutional context. The contextual components within mainstreamed schools have been designed to cater for the education of non-disabled learners. The buildings, highly structured curriculum, teachers and environmental background, were structured and prepared to handle un-disabled learners. The concepts of structures, systems, and practices are dominant in the social theory of disability. The theory is relevant to this research to evaluate practices of policy and the implementation

of inclusive education in secondary schools. From the social model of disability, a school that implements inclusive education policy ensures that the systems are supportive and build communities that value, celebrate and respond to learner diversity. This is reinforced by respectful relationships between learners and the school community members. To celebrate this diversity, the school is supported by collaborative relationships with parents and other school stakeholders through continuous communication, learning partnerships, participation and consultative decision-making. Hence, the school provides high quality education to all, views differences as a resource and responds constructively to the special needs of all learners. And more importantly, such a school ensures that inclusive education practices are embedded in their vision, mission and initiatives.

2.9 Conceptual Framework

The study was designed to analyse practices of policy towards the implementation of inclusive education in public secondary schools.

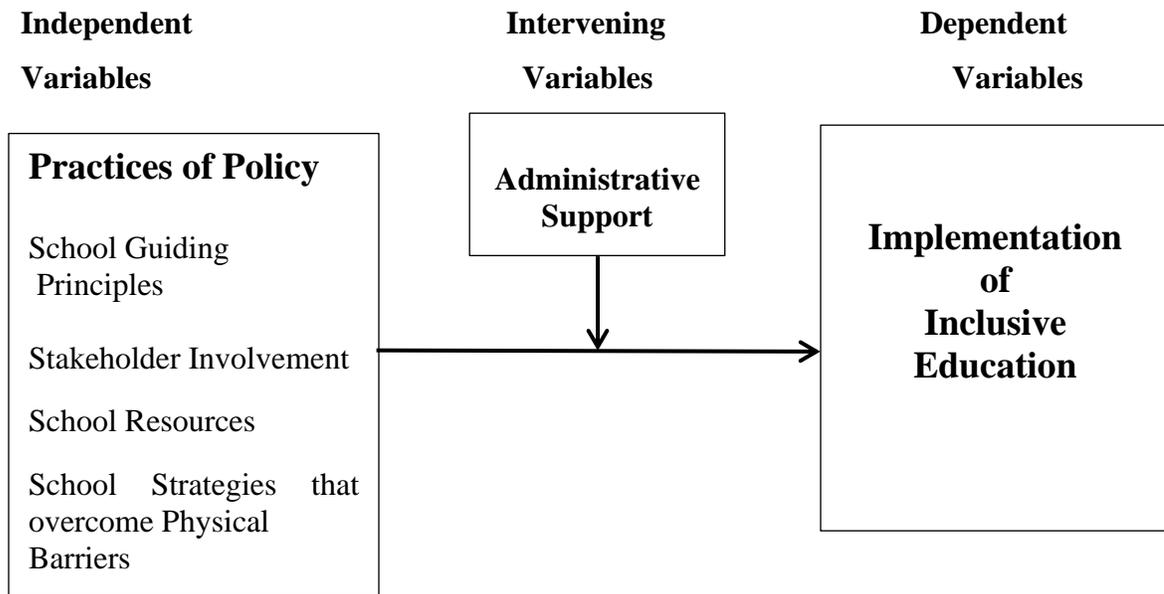


FIGURE 2 1: School Practices towards the Implementation of Inclusive Education; (Source: Researcher's Conceptual Framework)

The conceptual framework captures collection of factors that interact during the implementation of inclusive education in schools. The framework contains three elements: independent, dependent and intervening variables. The framework portrays inclusive education as an interconnected system where different variables interact within a school system. Mitchel, (2006) acknowledges that the independent variables tend to constrain the implementation of inclusive education and are used as a justification for non-implementation. The variables include school guiding principles, school resources (human, financial and physical), stakeholder involvement and school strategies meant to overcome physical barriers that hinder the implementation of inclusive education. These variables can impact negatively on the learners with disabilities if not properly moderated by the school administrative support. All learners depend on them for access and participation in their educational learning process. If these variables are not modified to cater for individual needs, they become a hindrance to the students schooling

A school that facilitates inclusive education implementation is characterized by a continuous process of resource modification (physical, financial and human) that caters for learner diversity. To achieve this, the schools constantly engage in staff development courses that enable teachers to vary their teaching/learning approaches and change their attitudes to cater for various learning needs. Continuous administrative support as a moderator mobilizes key stakeholders to support the modification and restructuring of physical resources that enable learners with special education needs to enjoy schooling and to be actively involved in the learning process. This happens when schools provide the necessary resources and create a safe and supportive environment.

The ultimate outcome is improved accessibility and participation for all learners to thrive intellectually and socially. Intellectually, it makes learners have a positive attitude towards learning and improves their academic potentials, resulting to increased educational success in acquiring personal educational goals. This closes the performance gap that already exists between the non-disabled learners and learners living with disabilities. Similarly, more students with special education needs get enrolled in schools; hence, closing the enrolment gaps. Socially, students feel accepted and connected to others, with improved academic standards. A positive and safe school environment enhances accessibility to all building within the school. This makes learners have a positive attitude towards learning and improves their academic potentials, resulting to increased educational success in acquiring personal educational goals.

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

This chapter describes the procedures that were used in carrying out this study. These are: the research design, location of the study, target population, sample procedures and sample size, research instruments, pilot studying, validity and reliability, data collection procedures and data analysis techniques, logistical and ethical issues.

3.2 Research Design

The study employed mixed methods research designs, in order to provide an in-depth and complete perspective on the influence of practices of policy towards the implementation of inclusive education. Mixed methods research is a class of research where the researcher mixes or combines quantitative and qualitative research techniques and approaches into a single study (Johnson & Onwuegbuzie, 2004; McMillan & Schumacher, 2006). Further, Creswell and Clark (2011) justify the use of mixed methods since the combination of qualitative and quantitative data provides a comprehensive understanding of the research problem than either approach by itself. The benefit of employing mixed methods research design is that the qualitative data analysis is intended to contextualize, enhance and enrich the quantitative data analysis. A mixed-methods approach allows the researcher to gain a broader perspective and deeper understanding of the practices of policy and interactions within them that could not be obtained through a single-method of research (Mertens & McLaughlin, 2004).

Within a mixed method research design, a study precisely utilizes the convergent parallel method, which involved collection and analyses of both quantitative and qualitative data separately on the same time-frame and the two data sets of results are merged for an overall interpretation (Creswell & Clark, 2011). The purpose of the convergent parallel method was to develop a more understanding of inclusive education by comparing and contrasting various results from the same sources. Concurrent timing gives the priority to the methods equally, keeps the elements independent during analysis, and combines the results during the overall interpretation (Creswell & Clark, 2011). The study analysed the

influences of practices of policy towards the implementation of inclusive education of learners with physical disabilities. Secondly, the researcher also examined the school strategies employed to overcome physical barriers hindering inclusive education.

3.3 Location of the Study

The study was carried out in Tharaka-Nithi County representing the forty-seven counties in Kenya. The county has two distinctive zones; a highland zone with many, highly-populated public secondary schools, and semi-arid lower zones with few poorly-populated schools. The zonal diversity influenced the number of school and respondents who participated in the study.

3.4 Target Population

The target population for this study comprised 156 public secondary school that had students with special education needs, their non-disabled learners learning in the same classes and teachers teaching learners with special education needs in Tharaka-Nithi County. There was lack of aggregated data of learners with special education needs and disabilities at the county level. From the 156 public secondary schools, 56 schools were extra-county and county while 108 were sub-county schools.

3.5 Sampling Procedures

In order to obtain an appropriate sample from the total population, purposive sampling was used. Purposive sampling was preferred because it allowed the researcher to select participants who had some experiences with learners with physical disabilities (Orodho, 2012). According to Mugenda and Mugenda (1999), the sample size depends upon the purpose of the study and the nature of the population under scrutiny. Purposively, the researcher selected county and extra-county schools, that had enrolled learners with physical disabilities. Since the aggregated data for learners living with physical disabilities presently or previously in public secondary schools were lacking from the Education Offices in Tharaka-Nithi County, the researcher made courtesy calls to the 56 extra-county and county schools' principals to find out whether they had enrolled learners with physical disabilities. This enabled the researcher to purposively select sixteen extra-

county and county schools which had currently and/or previously enrolled learners with physical disabilities. The researcher targeted extra-county and county schools because she felt that the schools were endowed with physical, financial and human resources necessary for the implementation of inclusive education policy without challenges. Further, the researcher used simple random sampling to select non-disabled students studying in the same classes with learners with disabilities. Random sampling ensures the law of statistical regularity which states that if on average the sample chosen is a random one, the sample will have the same composition and characteristics as the universe (Kothari, 2011). Teachers from the sixteen extra-county and county schools were selected through proportionate sampling.

3.6 Sample Size

From the sixteen county and extra-county secondary schools, four schools had presently enrolled learners with physical disabilities, while twelve schools had previously admitted learners with physical disabilities. From the four schools, the researcher considered form ones and form fours classes as these were the streams where learners with physical disabilities were currently admitted. In total, the researcher selected 11 learners with physical disabilities, six (6) form-four students and five (5) form-one students. The distribution of learners with physical disabilities were six (6) from two (2) extra-county schools and five (5) from two (2) county secondary schools. The researcher also selected 10 non-disabled students from each class with learners with physical disabilities. A total of five (5) focus group discussions, each with ten (10) non-disabled students were selected from the four schools. A total of 100 teachers from the sixteen county and extra-county secondary schools were selected as shown in Table 2.1.

TABLE 2.1: Population Sampling Frame

Schools	No. of LWD	Girls with disabilities	Boys with disabilities	Classes with LWD	Focus groups	No. of Teachers
School - A	4	00	4	Forms 1 & 4	2 Groups	12
School - B	3	00	3	Forms 1	1 Group	6
School - C	2	2	0	Form 1	1 Group	6
School - D	2	00	2	Form 4	1 Group	6
12 Schools	0	00	00	None	None	70
Total - 16	11	2 Girls	9 Boys	5 Classes	5 FGD	100

Note: The 12 schools had no students admitted currently but had previously admitted learners with physical disabilities; LWD= learners with disabilities; FG= Focus Groups Discussions

3.7 Research Instruments

The researcher used the questionnaires and interview guides to solicit data from the respondents, who included teachers, non-disabled students and learners with physical disabilities.

3.7.1 Questionnaires for Teachers

The questionnaire for teachers was developed to provide quantitative data. The questionnaire was divided into seven sections. Section A comprised of teachers' demographic data. Sections B to E, focused on practices of policy that influenced the implementation of inclusive education namely; selected school guiding principles, stakeholders' involvement, school resources (human, financial and physical) and the strategies employed in overcoming physical barriers that hinder the implementation of inclusive education. Section F comprised of the questionnaires on administrators support towards the implementation of inclusive education. Finally, section G consisted of the implementation of inclusive education in schools. The questionnaires gave standard guidelines to all the participants. The questionnaires had both closed and open-ended items. Closed ended items enabled straightforward scoring of data and data analysis.

Open-ended items gave respondents chances to offer their views and provide in-depth information.

3.7.2 In-depth Interview Guide for Learners with Physical Disabilities

The study adopted the interview guide to provide the necessary qualitative data from the learners with physical disabilities. The interviews gave the researcher an opportunity to gather and record information emanating from a few open-ended questions to seek more insights into the perceptions of learners living with physical disabilities. According to Foddy (1993), open-ended questions are used to: (a) allow the participants use their own words in answering questions; (b) respondents are not led to the model answer but use their own discretion; (c) interviews avoid the format effect; and (d) allow complex motivational influences and frame of reference to be identified. The researcher employed interview prompts, probes and follow up questions that necessitated explanations and clarification on the responses to extract more in-depth information from the respondents (McMillan & Schumacher, 2001).

3.7.3 Focus Group Discussions for Non-disabled Students

The focus group discussion is considered suitable for soliciting in-depth qualitative data. A focus group is defined by Krueger (1994), Kelly (1998), Laws et al. (2003), and Babbie (2004) as a gathering of 10 to 15 people brought together to shed light on a guided discussion. Essentially, a focus group was used to explore the opinions, perceptions and views of the participants without putting any pressure on them (Krueger, 1994). The use of focus groups is growing in educational research because of its advantage of forming groups that provide highest quality discussions of the research topic (Cohen, Manion, & Morrison, 2007). Focus groups were used in this study because they are known to stimulate high levels of participation among respondents when there is a need to generate views from the individuals collectively. They were used to minimize the impact of power relationship between the researcher and the participants. In the case of this study, the focus group was used to deal with power relations between the learners, their teachers and the researcher

Five focus group discussions involved non-disabled students learning in the same classes with learners living with disabilities. The focus group participants shared their knowledge and experience on the subject-matter. All the five focus group discussions were audio taped with the participants' consent. In order to make the discussions more meaningful, the researcher used probes to seek further clarification from the participants' responses. Open-ended questions were used in focus groups in order to generate qualitative data regarding views, attitudes, perceptions and opinions.

3.8 Pilot Study

Before commencement of the study, pre-testing of the questionnaires was done. The aim of pre-testing was to determine the accuracy, clarity and suitability of the research instruments and to check their validity and reliability. The pilot study was conducted in two public secondary schools in Embu County, a neighbouring county with Tharaka-Nithi county and the schools had similar characteristics as those in the study area. The schools were not part of the final study. Fifteen teachers from these schools were randomly selected to participate in the pilot study. Analysis of the data collected from the pilot test was done using SPSS version 20 to ensure that the data addressed the research questions.

3.9 The Validity and Reliability

3.9.1 The Validity

According to Gall, Gall and Borg (2007), validity is the degree to which the sample of test items represents the content that the test is designed to measure. To ensure both face and content validity, the instruments were reviewed by the researchers' supervisors. The opinion of the supervisors and the results from the pilot study facilitated the needed revision and correction of test items which ensured that they measured what they were intended to measure.

3.9.2 Reliability

The data gathered from the pilot study was used to calculate the reliability of the instruments. Cronbach's coefficient alpha technique was used to determine internal

consistency of the items. The method is suitable due to the fact that it involves only one administration of the test (Cohen & Swerdlik, 2005). This figure is usually considered desirable for consistency levels (Fraenkel & Wallen, 2000). In the study, the items were considered reliable if they produced a reliability coefficient of 0.70 and above. In this study, the reliability coefficient of items in the questionnaire was 0.706 for the effects of school guiding principles, 0.729 for the influence of stakeholder involvement, 0.708 for the effects of school resources and 0.745 for the effects of school strategies in overcoming physical barriers that hinder the implementation of inclusive education, 0.704 for administrative support and finally 0.703 for the impact on inclusive education, indicating that the items were fairly reliable. The pre-testing helped to assess the clarity of the questionnaire items. The research items which were found not adequate were revised to improve the quality of the research instrument, thus increasing its reliability.

3.10 Data Collection Procedures

The researcher got permission to conduct research from National Council of Science, Technology and Innovation (NACOSTI) Nairobi and the ethical approval from Ethics Review Committee. With the permits, the researcher made courtesy calls to the County Education Officers for clearance to conduct research in the county. The researcher then visited the education offices and the selected extra-county and county secondary schools to explain the purpose of the study and to book appointments with the school principals on the material day to administer the questionnaires. The researcher wrote letters to the principals explaining the details of the research to be conducted. After collection of the filled questionnaires and some follow-up, a total of 100 teachers had fully-filled the questionnaires. The researcher conducted the interviews with the learners with physical disabilities, which was done on one-to-one basis. A total of 11 learners with physical disabilities were interviewed. The duration of the interviews took 10-15 minutes. The researcher also conducted focus group discussion with the non-disabled students, which lasted between 20-35 minutes.

3.11 Data Analysis

Both qualitative and quantitative data collected from the selected secondary schools was analysed. Qualitative analysis was done using an interpretive naturalistic approach as pointed out by Johnson and Christensen (2008).

3.11.1 Quantitative Data Analysis

Quantitative analysis is based of numerical measurements of a specific aspect of the population. In the data analysis process, the raw data gathered from the questionnaires was keyed into SPSS version 20 in order to make inferences about the population using the information provided by the sample. Descriptive statistics tables, bar graphs and pie charts were used to analyse quantitative data using frequencies and percentages. Hypothesis testing was carried out via the Analysis of Variance (ANOVA) and t-tests. The t-test was used to test the significance of the quantitative data to determine whether to reject or to accept the postulated null hypotheses. The null hypothesis specifies that there is no relationship between the two variables and was to be accepted if the p-value exceeded the 0.05 level of significance. The alternative hypothesis specifies that there is a significant relationship between the two variables and was to be accepted if the p-value was less than the 0.05 criterion. A linear regression analysis model revealed that all the independent variables (school guiding principles, stakeholders' involvement, school resources and school strategies) predicted the implementation of inclusive education in schools.

3.11.2 Qualitative Data Analysis

Qualitative analyses involve obtaining detailed information about phenomenon being studied and establishing patterns and trends from the information collected (Frankfort-Nachmias & Nachmias, 2008). The researcher transcribed all interviews and organized them into meaningful categories and grouped them into related codes. The coded information was organized into themes and presented in a narrative form. The data facilitated the making of conclusions and recommendations, including recommendations for further research.

3.12 Logistical and Ethical Considerations

3.12.1 Logistical Considerations

The permit to conduct research was obtained from the National Council of Science, Technology and Innovation (NACOSTI) Nairobi and permission from the Pwani University Ethical Review Committee because the study involved interviewing the learners with physical disabilities. The researcher also got permission from the County Education Office for clearance to conduct research in the public secondary schools in Tharaka-Nithi County.

3.12.2 Ethical Considerations

Prior to the administration of the research instruments, the researcher wrote to the participants to request them to participate in the study and to explain the nature of the research. The letter pointed out to the selected respondents, that their participation was completely voluntary and that it could be terminated any time without penalty. The researcher emphasized in the letter that; the information provided would to be treated with total confidentiality. The participants were instructed not to indicate their names on the questionnaires to safeguard confidentiality and this ensured anonymity of the participants. The participants were also asked to choose the location of the interviews where they would feel secure and comfortable. The researcher was the only person who had access to the information collected from each participant. All these measures were meant to secure participant's anonymity and confidentiality of the records.

CHAPTER FOUR

RESULTS, INTERPRETATION AND DISCUSSION

4.1 Introduction

This study investigated the practices of policy towards the implementation of inclusive education in public secondary schools in Tharaka-Nithi County, Kenya. The research findings are presented according to the four research objectives. The objectives addressed the school guiding principles, stakeholder involvement, the school resources and the effects of school strategies in overcoming physical barriers that hinder the implementation of inclusive education. Derived from the objectives, the study had four hypotheses, which were tested at a significant of 0.05. The research findings were organized according to the responses derived from the questionnaires, interviews and focus group discussions. Descriptive results from the teachers' questionnaires were presented first, whereas the interviews of the learners with physical disabilities and focus group discussions from non-disabled students were included to supplement the quantitative findings.

4.1.1 Instrument Return Rate

A total of 100 out of 120 teachers, constituting 83.3% response rate, completed and returned the questionnaires. On the other hand, 11 out of 13 learners with physical disabilities were interviewed, which was an 84.6% response rate. Similarly, 5 focus group discussions, each with 10 non-disabled students participated in the study. The return rate of 75% and above is considered sufficient to provide information about a given population (Fowler, 2007). Best and Kahn (2006) suggest that a 50% response rate is adequate, while 60% and 70% is good and very good respectively. The researcher made follow up telephone calls with the school principals to establish whether the questionnaires were ready for collection. Best and Kahn (2006) support the use of vigorous follow-up measures to increase the questionnaire return rate.

4.1.2 Characteristics of the Schools in the Study

The schools selected were county and extra-county public secondary schools, as they are generally viewed as having more finances for resources modification towards the

implementation of inclusive education without major constraints. Sixteen schools out of 56 extra-county and county secondary schools were found to have admitted learners with physical disabilities.

4.1.3 Distribution of Teachers by Gender

The gender distribution of teachers from the sixteen schools who participated in the study comprised of 59% male and 41% female teachers. This distribution was found to be consistent with a normal gender distribution commonly observed in the Kenyan secondary schools. This result coincided with a report by TSC (2005) which indicated that 65.5% of secondary school teachers were male and 34.5% were female. Thus, the secondary school teaching profession in Kenya is male dominated. The gender disparity as explained by Wamukuru (2016) may be as a result of subject specialization where male dominate almost all subjects except Home Science and Religion while female teachers dominate the Languages and Social Sciences

4.1.4 Distribution of Teachers by Age

The data on the age bracket of teachers is shown in Table 4.1

TABLE 4. 1: *Age Distribution*

Teachers' Age	Frequency	Percentage%
20-29 years	21	21.0
30-39 years	35	35.0
40-49 years	26	26.0
50 and above	18	18.0
Total	100	100.0

Table 4.1 represents the age-brackets of teachers who participated in the study. As illustrated above, majority (61%) of teachers ranged between 30 and 50 years. The teachers who aged between 20 and 29 years were 21% and those between the ages 30 and 39 years were 35% while those whose ages ranged between 40-49 years were 26% and 18% of teachers aged 50 years and above. It is evident from the study that the largest

group of teachers teaching in secondary schools were aged below 40 years, while a small percentage (18%) of teachers were 50 years and above. The study assumed that this difference may be due to the teacher-employment age limit currently at 45 years and below. The low percentages of teachers aged above 50 may be due to early retirements resulting from the current delocalization, deaths and deployments to the other sectors.

4.1.5 Distribution of Teachers by Positions

As reflected in the information presented in Table 4.2, there were variations in teachers' positions in the study schools, as measured by their roles appointed by the Teachers Service Commission or by the school principals.

TABLE 4. 2: Distribution of Teacher by Positions

Current Positions	Frequency	Percent
Principal	12	12.0
Deputy Principal	10	10.0
H.O.D.	18	18.0
Class Teacher	49	49.0
HOD and Class Teacher	11	11.0
Total	100	100.0

Results in Table 4.2, show that 49% of the respondents were class teachers, while 18% were teachers who headed guidance and counselling department. Further, 12% and 10% of teacher-positions respectively were held by principals and deputy principals. According to the table, 11% of the respondents held two responsibilities; that is being HOD and class teachers. It is worth noting that some teachers provided more than one response, indicating multiple responsibilities.

4.1.6 Additional Teacher-Training on Special Education Needs

The data on teachers' additional qualification specifically on special needs education is represented in Table 4.3

TABLE 4.3: Teachers' Additional Training on Special Needs Education

Special Education Training	Frequency	Percentage
Short courses	11	11%
In-service Training	5	5%
Diploma	3	3%
Degree	0	0%
Masters	0	0%
Other Qualifications	0	0%
None	81	81%
Total	100	100%

The results in Table 4.3, indicate that the majority of teachers (81%) had not been trained in any special needs education apart from the teacher's professional qualification, while 11% had taken short courses on special education. A small proportion of 5% and 3% of teachers respectively had in-service and diploma certificates. It is evident from the teachers' perspectives, that majority of the teaching staff lacked skills that would assist them in the implementation of inclusive education. This view was shared by other researchers in this field who agreed that teacher training programmes do not appear to be sufficient in addressing students with various learning needs and this has resulted to a hindrance to inclusive education implementation (Engelbrecht, Swart & Eloff, 2001; Engelbrecht, 2006; Chaitaika, et. al., 2012). In confirmation, Wachira (2012) asserts that factors' influencing the implementation of inclusive education policy in Kenya was largely lack of the skills and knowledge among teachers in handling learners with disabilities in an inclusive setting.

Another study conducted by Waldron (2007) concurred with the participants' views that most general education teachers lacked the expertise to address the needs of students with disabilities in an inclusive classroom. Lack of teachers' skills on inclusive education practices is in line with a study done by Desimone (2011), who posits that most of the professional development provided by teacher training colleges is not sufficiently intensive or focused on individual teachers to meet the needs of all learners. To handle

the issues related to teachers' lack of training, McLeskey and Waldron (2011) suggest that the schools should develop their own intensive professional development programs to support teachers. Such specialized training is teacher-directed, often involves collective participation and actively occupies teachers in learning through such opportunities.

4.1.7 Learners with Physical Disabilities Enrolled Schools

The study sought to establish from the teachers, the number of learners with physical disabilities that were admitted in public secondary schools. The information was presented in Tables 4.4 and 4.5

TABLE 4.4 Total Number of Learners with Physical Disabilities Enrolled in the Schools Currently as Reported by the Teachers

Number of physically challenged	Frequency	Percentage
1-2	70	70
3-5	16	16
None	14	14
Total	100	100

TABLE 4.5 Total Number of Learners with Physical Disabilities Previously Enrolled in the Schools as Reported by Teachers

No. of PC enrolled in the past in the schools	Frequency	Percentage
1-5	59	59.0
6-10	5	5.0
10+	4	4.0
None	32	32.0
Total	100	100.0

According to the results in Table 4.4, majority of teachers (70%) indicated that most of the schools had admitted 1 or 2 learners with physical disabilities currently. Further, 16% of participants reported that the schools had admitted between 3 and 5 students while

14% of participants indicated that all the other schools did not have learners with physical challenges. This report implies that there are few learners with physical disabilities, who are enrolled currently in public secondary schools in Kenya.

Majority (59%) of the teachers in Table 4.5 revealed that most of the study schools had previously enrolled between 1 and 5 learners with physical disabilities, while, 5% of the participants indicated that schools had admitted between 6 and 10 such students in the past. Further, 4% of the respondents felt that even a small number of schools had admitted more than 10 such students in the past. A significant number of teachers (32%) indicated that several schools had never admitted learners with physical disabilities in the past. This information was crucial because the study could only have been possible amongst schools that had currently or previously admitted learners with disabilities

4.2 School Guiding Principles and Inclusive Education

The study sought to examine the effects of school guiding principles in addressing the needs of learners with special needs in Tharaka-Nithi County. The instruments that were used contained selected school guiding principles namely; school core values, mission statements, admission policies and practices, orientation programs, pro-social behaviour programs and co-curriculum programs. The results are presented in Table 4.6

TABLE 4.6 Teachers' Opinion of the Effectiveness of School Guiding Principles in Addressing Special Needs of Learners with Physical Disabilities

	Adequately effective (%)	Not sure (%)	Not effective at all (%)
School Core Values	26	62	12
Mission Statement	24	70	06
Admission policy and practice	05	63	32
Orientation programs	08	45	47
Pro-social behaviour programs	33	54	13
Co-curricular activities	03	19	78

Overall Means: Adequately effective – 17%; Not Sure- 52%; Not effective at all-33%

Data presented in Table 4.6 shows that 26% of the participants cited core values as adequately effective in addressing special needs of learners with physical disabilities while 62% of teachers indicated that they were not sure. Further, 12% of teachers indicated that core values were not effective at all. The implication is that core values did not give a clear picture on matters related to implementation of inclusive education and this had a negative impact in addressing the needs of learners with physical disabilities. This also implies that there was some laxity in making the core values a driving force behind schools' decision and action plans. The schools' character must be founded on a set of core values and beliefs that inform all decision making, policies and practices to achieve inclusive education; hence, they must be clearly understood and practised by every stakeholder in the school community. Consistent with this, Mcleckey and Waldron, (2014) assert that commitment to a set of core values by teachers and school managers becomes part of what creates inclusive schools whose mission is to improve the achievement of all students, including those with disabilities.

Accordingly, 24% of the participants indicated that school mission statements were adequately effective in addressing special needs of learners with physical disabilities, while 70% of the teachers indicated that they were not sure. Further, only 6% of the respondents cited mission statements as not effective at all in addressing the needs of learners with special education needs. This implies that the school mission statements were not clearly informing the decisions and strategies for learners with diverse needs. In contrast, Heir and Katzmann, (2012) assert that for an effective inclusive school, mission statements must be clear about the school fundamental mission in addressing the needs of every learner. Frattura and Capper (2007) argue that when the school goals are developed from unclear mission statements, the goals and action plans become vague and the mission may not address the needs of all students. The implication is that in developing inclusive schools, a collective mission statement ought to shape the school culture that values all learners and nurtures cohesive learning opportunities for all students to prosper. Similarly, the educators and other stakeholders are called upon to build a school mission that embraces diversity and fosters the development of a vision for all. In this way, all

stakeholders understand the importance of developing a mission statement that can set the pace in addressing the needs of all learners without discrimination.

According to 10% of sampled teachers, admission policies and practices were adequately effective regarding the admission of learners with special education needs. A significant 63% of teachers indicated that they were not sure, while 27% of the participants indicated that school's admission policies and practices were not effective at all. This implies that the school admission policies and practices were not clear regarding the admissions of learners with disabilities and this gave schools a chance to deny these learners a chance of being admitted in the schools. Consistent with this, Maina (2014) asserts that many schools cite a myriad of reasons for not admitting learners with physical disabilities, such as inadequate physical resources, lack of special education teachers and inadequate funding. The Basic Education Act No. 14 of 2013 mandates that 'no school should discriminate any learner, seeking admission on any ground and no child should be denied admission in a public school (Republic of Kenya, 2013)'. This means that the schools should not reject any learner seeking admission regardless of their status.

From the findings, 8% of the teachers stated that orientation programs were adequately effective in guiding learners with special education needs. Further, 45% of the respondents indicated that they were not sure, while 47% of the teachers cited orientation programs as not effective at all. This implies that during the orientation process, issues addressing learners with physical disabilities were not effectively handled. In contrast, Cook et al. (2006), assert that orientation programs enable learners with disabilities to be aware of the support programs provided by the schools or by disability organizations. Therefore, orientation programs serve a significance purpose not only for learners with special education needs but also for all new students in a school.

According to Table 4.6, 33% of the teachers indicated that pro-social behaviour programs were adequately effective in imparting positive values to non-disabled learners, to support students with special education needs. Further, 54% of teachers indicated that they were not sure at all. Only 13% of the sampled teachers revealed that such programs

were not effective at all. Notably, the results showed that several schools treat pro-social programs as a priority where non-disabled students are taught to offer voluntary services, driven by sympathy, moral values and a sense of personal responsibility. The implication is that teachers have a great opportunity to introduce pro-social behaviour initiatives for the purpose of supporting learners with special education needs. In confirmation, Köster, Schuhmacher and Kärtner (2015) assert that inculcating the positive behaviour values, make learners to realize the need to offer voluntary help without being coerced.

Finally, a significant majority, 78% of the teachers felt that co-curricular programs were not effective at all in addressing the needs related to physical activities for learners with physical disabilities. Further, 19% of the participants cited such programs as moderately effective and only 3% of the respondents indicated that co-curricular activities were adequately effective. This implies that majority of the learners with disabilities were not allowed to take part in co-curricular activities. In contrast, a few researchers have shown the positive effects of physical activities for learners living with disabilities. These include; improvements in general health, physical fitness, bone metabolism and increased functional independence, which lead to higher self-confidence, better body images and higher rates of academic success (Jeffrey, 2013; Jooyeon et al., 2017).

4.3 Stakeholders' Involvement and the Implementation of Inclusive Education

The study sought to analyse the influence of stakeholders' involvement on the implementation of inclusive education in public secondary schools. The findings are presented in Table 4.7.

TABLE 4.7: Teachers’ Opinions on the Involvement of Key Stakeholder on the Implementation of Inclusive Education

	Adequately done (%)	Not Sure (%)	Not done at all (%)
Stakeholders’ involvement in planning and strategizing for LWD	01	34	65
Provision of orientation courses to stakeholders on issues related to learners with disabilities	02	50	48
The schools involve disability associations to provide services for learners with disabilities	03	30	67
Consultations among PTA members about learners with special education needs	10	46	44
School provision of feedback to parents about their children’s academic and social issues	46	28	26

Overall mean: Adequately involved-10%; Not Sure- 40%; Not done at all - 50%

According to Table 4.7 above, 65% of the teachers indicated that stakeholders’ involvement in planning and strategizing for learners with physical challenges was not done at all. Further, 34% of the teachers reported that they were not sure of the stakeholders’ involvement and only 1% of the respondents showed that stakeholders were adequately involved. The implication is that most of the study schools were not involving stakeholders. This implies that implementation of inclusive education could not be successful in schools due to poor rate of involving stakeholders. Lack of involvement of stakeholders implies that learners with physical disabilities may not have been supported and their issues are not prioritized. In contrast, Doyle and Giangrec (2013) assert that successful implementation of inclusive educational programs requires the involvement and the support from all the stakeholders. The implication is that schools have a great challenge to create a culture where all stakeholders play a significant role in the implementation of inclusive education policy. The involvement of key stakeholders in handling the matters of education, improves the value of educational system and is an essential contributing factor that guarantees educational quality for all learners.

Further, data from the Table 4.7 revealed that 2% of the teachers felt that the study schools were adequately providing orientation courses to key stakeholders on learners' academic and non-academic needs, while 48% of the respondents indicated that such strategies were not provided at all. A significant, 50% of teachers indicated that they were not sure whether they were done. The fact that most teachers were not sure whether orientation programs to key stakeholders were provided implies that orientation issues related to learners with disabilities were not effectively addressed. Conversely, Jannie, (2010) points out that orientation programs enable the key stakeholders to identify support programs within the schools and those services that can be found elsewhere. In addition, orientation programs empower parents/guardians and provide an opportunity to counsel those who may not have accepted the challenge of having a learner with disabilities.

Similarly, 67% of the teachers indicated the study schools did not involve the disability associations to provide services for learners with disabilities, while 30% of the participants indicated that they were not sure. Further, 3% of the respondents indicated that the disability associations were adequately involved. The implication is that learners with disabilities were not able to get free services provided by disability associations in majority of the study schools. For the purpose of providing more services to people with disabilities, the Kenyan government formed the National Council of Persons with Disabilities (NCPWD) in 2013 to supervise their welfare. The NCPWD is mandated to formulate and implement policies that are geared towards mainstreaming and to create opportunities that empower and care for the students with disabilities. The services provided are significantly needed as they include: the provision of standardized mobility devices, organized training from trained physiotherapists, facilitate the payments of school fees for learners from poor backgrounds and deals with referrals for those who need further management (NCPWD, 2013).

Further, 10% of teachers reported that the parents and teachers' consultation about the needs of the learners with special education needs was adequately done, while 46% of the

participants indicated that they were not sure whether such consultations were done. A significant 44% of the teachers indicated that the parents/teacher consultations about the learners with special education needs were not done at all. This indicates that both academic and social needs for a significant number of students living with disabilities were fairly met while others were not met at all. In affirmation, Theoharis and Causton (2014) assert that such consultations back up the learning provided by teachers because during the consultations, the parents, the teachers and the learner, discuss and strategize on how the student can be helped to improve academically. For the purpose of enhancing such consultations, Van Hover et al. (2012) suggest that factors that engage teachers and parents in a collaborative partnership should be clearly defined for inclusive education implementation.

Remarkably, 46% of teachers reported that schools were adequately providing feedbacks to parents about their children's academic and non-academic needs, while 28% indicated that they were not sure whether feedback to the parents was provided by the schools. Further, 26% of the teachers reported that provision of feedback to parents was not done at all. Notably, the results indicated that most study schools provided feedbacks to parents about their children's progress. Feedback to parents signify to the learner the level of their achievement against specific learning objectives and push them towards higher performances. Empowering parents contributes to the learning outcomes of their children (KICD, 2017).

4.4 4.4 School Resources and the Implementation of Inclusive Education

Objective three of the study sought to analyse the effects of school resources towards the implementation of inclusive education in Tharaka-Nithi County. Access to school resources is one of the key elements in ensuring equality of opportunities and quality of education for learners with physical disabilities. The researcher classified resources to three categories namely; human, physical and financial resources. The findings are presented under the following sub-headings:

4.4.1 Human Resources and the Inclusive Education Implementation

The study sought to examine teachers' views on the adequacy of human resources on the implementation of inclusive education in public secondary schools. Table 4.8 presents the findings

TABLE 4.8 Teachers' Opinions on the Adequacy of Human Resource and Implementation of Inclusive Education

	Adequately Done (%)	Not Sure (%)	Not done at all (%)
Employment of a specialized teacher in every school to cater for special education needs including physically challenged students	0.0	5.0	95.0
Provision of refresher courses to the teaching staff on the basic principles on inclusive education by the Government	0.0	13.0	87.0

Overall mean: Adequately done - 0%; Not Sure - 9%; Not done at all -91%

In the data presented in Table 4.8 above, a significant 95% of teachers reported that employment of a specialized teacher with special educational skills to cater for learners with special education needs in secondary schools was not done at all and only 5% of the participants indicated that they were not sure. The implication is that teachers do not know how to handle issues related to learners with special education needs or they do not feel obliged to do so. In order to address the issue, Ainscow and Sandill (2010) suggest that, educational leaders ought to encourage inclusive learning processes and foster greater capacity among their staff towards responding to learner diversity in an inclusive context. It is important that at least one teacher in a school is equipped with skills to cater for learner diversity. Thus, it is imperative for teachers to be equipped with skills to cater for special education needs.

Finally, 87% of teachers revealed that staff-refresher courses to teachers on basic principles of inclusive education by the government were not provided at all. Further, 13% of the respondents indicated that they were not sure. It is apparent from results that

teacher-refresher courses on inclusive skills may not have been a priority of the government. The implication is that teachers feel incompetent to handle issues related to learners with special education needs. The Ministry of Education Frameworks of 2009, asserts that inadequate capacity among teachers to manage learners with special educational needs in regular schools remains an impediment to the implementation of inclusive education.

4.4.2 Physical Resources and Inclusive Education Implementation

For successful inclusion of learners with physical disabilities, there is a need to establish a barrier-free environment. The study sought to examine the teachers' perceptions on the adequacy of physical resources on the implementation of inclusive education in public secondary schools in Tharaka-Nithi County. The results are summarized in Table 4.9

TABLE 4.9 Teachers' Opinion on the Adequacy of Physical Resources towards the Implementation of Inclusive Education

	Adequately Done (%)	Not sure (%)	Not done at all (%)
Provision of mobility devices for learners with physical disabilities	07	35	58
Equipping of resource rooms with modified furniture	00	38	62
Modification of toilets/latrines for students with physical disabilities	01	23	76
Modification of staircases into ramps in the school	01	47	52

Overall Mean: Adequately done - 2%; Not sure - 36%; Not done at all - 62%

According to the findings in Table 4.9, 7% of teachers indicated that provision of mobility devices for learners with physical disabilities were adequately provided, while 35% of the respondents indicated that they were not sure. Further, 58% of the teachers reported that mobility devices were to not provided at all. The implication is that most learners with physical challenges in the study schools were not provided with mobility devices because they had mild disabilities; hence, they did not require the mobility devices. The researcher observed that out of 11 learners interviewed, only 3 students

(27.2%) had serious cases of physical disabilities and all of them had mobility devices. The other 8 (72.7%) out of 11 learners with physical disabilities lacked mobility devices. Providing mobility devices to learners with serious physical disabilities are known to improve their self-reliance and results in improving their learning opportunities (Heller, Forney, Alberto, Schawatzman & Goeckel, 2000). The implication is that when mobility devices are not provided to learners with serious forms of physical disabilities, they perform tasks less efficiently than their potential performance afforded by device use. To live an independent life within the school, learners with serious disabilities ought to be provided with devices that enable them to access the environment. The study established from a few interviewed learners with serious disabilities that they struggle to walk with mobility devices because they are made using locally available materials and by unprofessional people.

Excerpt 1.

Are you comfortable with the type of mobility device you use? What problems have you experienced using it? Probe

One student with prosthesis described how it got broken three times.

‘The artificial leg I use is very uncomfortable and I use it because I have nothing to use. When I was in form one the leg got broken and my other normal leg got broken on the process, as I was climbing down some steep staircases. The one that replaced it dislodged once and got broken once when I was in form two. The current leg has never broken’.

One student with one short leg which failed to grow on the femur said the following;

‘After every six months, I take the shoe to a local shoe maker to keep on adding small pieces of rubber to balance with my other growing leg. When it rains the shoe becomes very slippery on mud’.

In the cause of the interviewing, the researcher found out that 9 (82%) of the learners with disabilities came from poor family backgrounds. The implication is that some of the parents were not able to purchase standard modified devices for their children and relied on locally cheap devices. Poverty is an important aspect which influences parents’ ability

to send their children to school. Poverty and disability strongly correlate; for instance, poverty may intensify the probability of a disability and is one of the key barriers to education especially in developing countries. In affirmation, Mukobe (2013) points out that the effects of poverty on people with disabilities are great as poverty denies them the basic necessities of life.

From the Table 4.9, on page 102, majority of the teachers (62%) indicated that resource rooms were not equipped with modified furniture at all while 38% indicated that they were not sure. None of the teachers reported that the schools had adequately equipped resource rooms with modified furniture. This implies that, with lack of modified furniture, the learners with disabilities are struggling while using the furniture meant for non-disabled students and this impacted negatively on their academic performance. This is affirmed by Moraa (2013) who posits that quality and adequate modified resources have a direct bearing on the quality of education because they determine the effectiveness of learning quality for learners with physical disabilities.

A majority, 76% of respondents indicated that the study schools had no modified toilets/latrines while 23% of the teachers indicated that they were not sure whether schools had modified latrines. Only 1% of the participants indicated that toilets were adequately modified. This implies that learners living with physical disabilities may be experiencing a lot of challenges using toilets/latrines meant for non-disabled learners. In affirmation, Berhanu and Gebremedhin (2016) assert that latrine access is one of the major challenges faced by students with physical disabilities both at home and school. According to UNICEF (2008), the design for toilets/latrines in schools should be redesigned to ensure improved accessibility for such learners and to ensure that the latrines are more user-friendly and spacious for all the learners in the school. This implies that several school buildings may be inaccessible or exposing learners with physical disabilities to real dangers when they try to access them.

From the findings, 1% of the respondents showed that the study schools had adequately modified staircases into ramps, while 47% of the respondents indicated that they were not

sure. Another 52% indicated that most study schools had not modified staircases into ramps. This implies that in most schools where learners with disabilities were enrolled, staircases were not modified into ramps. The implication is that learners with disabilities were accessing such buildings with a lot difficult or were not able to access the buildings at all. Accessing buildings through ramps is important for learners with physical disabilities especially those with wheelchairs. Learners with walkers, canes, prosthesis and crutches may also find that ramps provide easier access than staircases. In Kenya, the Persons with Disability Act of 2003 requires that all public buildings be retrofitted with ramps to ease access to services offered within them to persons with physical disability and the elderly (Republic of Kenya, 2003). This is also mandated by the Kenyan Constitution (2010) part 3; subsections 54, that individuals with any disability are entitled to access any facilities that are integrated into the society to get the services needed (Republic of Kenya, 2010). This then indicates that all students should have equal opportunity to access any building within the school for the purpose of learning and leisure and to participate in the wider community. However, these findings reveal that many students with physical disabilities face barriers related to physical movement in the schools and classrooms.

4.4.3 Financial Resources and the Implementation of Inclusive Education

The study sought the teachers' opinions on financial efficiency by various stakeholders towards the implementation of inclusive education. The findings are presented in Table 4.10 below

TABLE 4.10 Teachers' Opinions of Provision of Financial Resources towards the Implementation of Inclusive Education

	Adequately provided (%)	Not sure (%)	Not provided (%)
Finances by parents for mobility devices	3.0	37.0	60.0
Finances by Government for inclusion	1.0	21.0	78.0
Donations from Funding agencies/NGOs for school restructuring	6.0	27.0	67.0
Setting aside some funds by the school to restructure the physical environment	0.0	38.0	62.0

Overall mean: Adequately done -3%; Not sure - 28%; not done at all - 69%

According to the responses in Table 4.10 above, only 3.0% of teachers reported that parents adequately provided the finances for mobility devices while 37% of the respondents stated that they were not sure. The majority (60%) of the participants felt that the funds for mobility devices were not provided. The implication is that the funds for mobility devices possibly were not necessary as most learners had mild disabilities. The researcher observed that 8 out of 11 interviewed learners making a massive 72.7% were not having mobile devices because they had mild disabilities and did not need the devices. The three learners who possessed mobility devices testified that they were all locally made. This further shows that the parents were not able to purchase standardized mobility devices as they are expensive. Pinilla-Roncancio (2015) concurs with this finding by noting that disability is not only associated with poverty, but also long-lasting poverty. The negative repercussion of disability is that it controls persons living with disabilities and their families.

Accordingly, 78% reported that the government had not allocated any funds to restructure the physical environment for the learners with physical disabilities. Further, 21% of the respondents indicated that they were not sure whether the government gave any funds and only 1% of the teachers reported that funding was adequately done. The finding appears to confirm the assertion by UNICEF (2014) that funding is a key issue for

governments to consider when implementing inclusive education. As a result, teachers experience challenges when implementing inclusive education programmes.

In order to confirm whether there are donations given by funding agencies for physical restructuring of the schools; the teachers were asked to indicate the adequacy of these donations. The results revealed that majority of teachers (67%) indicated that such donations were not given at all, while 27% of participants reported that they were not sure whether the schools got any funds. Only 6% of the sampled teachers revealed that provision of such donations was adequate. From the participants' responses, it implied that insufficient funding seemed to be a major challenge and this hindered the implementation of inclusive education programmes. In explaining why donor countries stopped assisting the developing countries with funds, Eurydice (2013) points out that the impact of the economic crisis in European Union countries resulted to the financial crisis of 2007-2008. This had massive repercussions on public finances in all the countries in Europe. This crisis impacted negatively on the funds given by educational donors / funding agencies whose funds were drastically reduced. Subsequently, the affected developing countries that depend on developed countries for donations and loans were severely affected. Therefore, there is a need for African countries to strategically plan on ways of adequately funding learning institutions so that the challenges faced by the schools relating to inclusive education may be addressed.

From the data, 62% of teachers reported that the study schools were not setting aside funds to restructure the physical environment; while 38% of the participants were not sure whether schools were setting aside any funds to restructure the schools. None of the respondents indicated that schools were adequately setting aside funds for the implementation of inclusive education. This implies that majority of the study schools were not setting aside any funds to implement inclusive education. According to Save the Children (2008), the shortage of financial resources should certainly not be perceived as a total obstacle to making schools more inclusive because it can be done without extra money. Although finances matter, implementing inclusive education is not exclusively a

matter of extra financial resources. This argument was echoed by focus groups asserting that extra-county and county secondary schools are capable of providing for the learners with physical disabilities without extra funding from the parents or the government.

4.5 School Strategies and Overcoming Physical Barriers

Objective four sought to analyse the influence of school strategies in overcoming physical barriers that hinder the implementation of inclusive education. The findings are given in Table 4.11

TABLE 4.11: Adequacy of School Strategies in Overcoming Physical Barriers that Hinder the Implementation of Inclusive Education

	Adequately done %	Not sure %	Not done at all%
Regular inspection of physical resources	3.0	21.0	76.0
Updating school compound/landscaping	0.0	52.0	48.0
Establishing accessible physical environment	2.0	48.0	50.0
Re-adjusting key access features in resource rooms	3.0	50.0	47.0

Overall mean: Adequately done -2%; Not sure -43%; Not done at all-55%

According to the results shown in Table 4.11, 76% of the teachers reported that regular inspection on the physical resources to enhance safety for learners with physical disabilities in the study schools was not done at all. Further, 21% of participants indicated that they were not sure and only 3% of sampled teachers responded that it was adequately done. This implies that the study schools have several unmodified and un-restructured physical resources that enhance safety for learners with physical disabilities. Devoid of physical resource inspection, shows that no tangible action plans had been put in place to aid in the resource modification in schools. On the contrary, Friend (2008) suggests that students with disabilities require intensive and sustainable support systems to ensure their effective learning. Moreover, modified physical resources are needed for the success of students with disabilities in an inclusive learning environment (Kirk et al., 2009; Smith & Tyler, 2010)

The data further revealed that 48% of the teachers indicated that updating compound/landscaping to accommodate learners with disabilities was not done at all while 52% of teachers indicated that they were not sure. This implies that students with physical disabilities still encounter physical barriers during their learning process. Consistent with these findings, Tugli et al. (2013) assert that the physical environment creates a real barrier to access and participation in learning.

On establishing accessible physical environment including buildings, playgrounds and car parking to accommodate learners with physical challenges, 50% of teachers indicated that it was not done at all. On the other hand, 48% noted that they were not sure whether schools were establishing accessible physical environment and only 2% of the participants revealed that it was adequately done. Regarding readjusting key access features in resource rooms with modified furniture to make learning space for learners with physical challenges, 52% of the sampled teachers indicated that it was not done at all. On the other hand, 48% of the participants indicated that they were not sure. These results hint that the great part of the schools' environment may be inaccessible or are unsafe to learners with disability. This was attested by some students who had encountered bad experiences in the unsafe environment within the schools.

Excerpt 2

Researcher: What barriers have you encountered since you came to this school?

Share your personal experience

A form IV student who had an artificial lower limb had a bad experience when he was in the lower classes. He shared the following traumatizing experience.

I was climbing down from the school library located in the second floor when I slipped off a steep staircase. I lost balance and fell down. My prosthesis which is connected at the knee got dislodged. As I tried to stand up with the help of handrails, I felt some sharp pain near the ankle of the other leg. The other students carried me to the school nurse. Upon examination, my normal leg had a small crack. I became frustrated and contemplated discontinuing my studies. That marked the end of attending library classes.

Form I student who had a crippled right leg with no mobility device gave his bad experience. He shared the following.

I had just reported in form one. Just before the classes started, I went for a short call in the toilet which was not clean and the floor was wet. Hardly had I closed the door than I slipped off and fell on that filth floor. My pair of trousers became dirty and smelly. I never got physically hurt but I was very annoyed, devastated and disgusted. The toilets were connected to the bathrooms. Someone had left a piece of soap on the sinks. I picked it, got into the bathroom washed my trousers and worn them while they were wet. I got my other trousers from the cloth lines and changed. Thereafter, I went to class but very frustrated

Such traumatizing real experiences made the students living with disabilities depressed and vulnerable. One focus group shared on how some students dropped out of school and others were withdrawn by their parents who felt that the schools were not prepared to cater for the needs of their children. A feeling of powerlessness may come into play when such students feel that there is nothing, they can do to change the situation of their vulnerable colleagues. Learners with physical disabilities continue to struggle to participate in education despite the inclusive education policy. There is need for a strengthened system and a strong legal framework to protect learners living with disabilities from discrimination.

Physical barriers have always been known to have damaging effects on learners living with physical disabilities. Failure to freely move around in a given environment makes these learners to become frustrated and depressed. This state may be very contagious to other students. In order to address the situation, UNESCO (2015) suggests that all school buildings should offer alternative pathways to access. Ramps should therefore be added on to all existing school buildings. When new school buildings are being designed, ramps and walkways should be incorporated into the design to ensure that they are accessible to all learners. In this regard, Emanueleson et al. (2005) argue that it is indeed easier to formulate policies on inclusive education than to practise them. It is therefore imperative for schools to create supportive environments, a significant factor for all-inclusive

schools. This perspective is mandated by the Kenyan Constitution: Section 54(1) (c) authorizing that; persons with any disability are entitled to reasonable access to all places including education, public transport and information. This means that every educational building must be suitably located, with good infrastructural connections and in proximity to each other as well as to the external facilities such as playgrounds (Republic of Kenya, 2010).

Regarding readjusting key access features in resource rooms with modified furniture to make learning space for learners with physical challenges, 52% of the sampled teachers indicated that it was not done at all. On the other hand, 48% of the participants reported that it was moderately done. This implies that several schools may be lacking modified furniture in key resource rooms. Readjusting key areas with modified furniture is crucial for the purpose of facilitating students with disabilities to take part in educational activities alongside their peers. This stance is mirrored by UNESCO (2015) which asserts that school designed furniture should be made available to those who need chairs and tables that differ from standard classroom furniture. Learners with physical impairments may sometimes need to use their own furniture, such as modified chairs and sloped writing tables which can be more accommodative.

Excerpt 3

Question: Are you happy with the school? How has the school helped you fit in the system?

A Form I student shared the following experience: ‘Yes I love the school. The school has really supported me and especially the guidance and counselling department has really made me feel comfortable. A few students are not very friendly in the way they treat me. Sometimes they call me handicap which really hurts me. (probe) I respond badly by calling them nasty words to hurt them too.’

A Form IV student shared the following experience: ‘I am very happy with the school; teachers are very friendly and I receive a lot of support from the other students. I came here as a result of passing very well. The school has been supportive in a few ways. Like,

when I reported, I was given a room to respect my privacy. I was also elected as one of the prefects at the end of Form I. Since I could not cope up with the speed, I was demoted in Form II. But I have no grudges with the students. They are very supportive too’

A Form I student shared the following experience: ‘I am very happy with the school. It was the school I chose in class eight and I like the school. The teachers and other students have been very supportive. Due to my height I could not fit any of the uniforms, even the smallest blazer and sweater were too big for me and they struggled to make for me fitting uniforms. A desk and chair were also made and the teachers made sure I sat in front to avoid being overshadowed by other students from seeing the white board’

A Form I student shared the following experience: ‘I am very happy with the school and the school tries to help me. With one arm cut I had a big challenge of writing when I was in primary but in high school it isn’t a big deal because I use my other hand to do most of the work for myself. Academically I am good. The only challenge is that a few students still ridicule me especially when I am fighting for my right.’

A Form IV student shared the following experience: ‘I love the school because I am always top 20 out of 260. This has given me strength to continue despite my disability. Other students help me when I need it but most of the time, I take care of myself’

4.6 Focus Groups Findings

There were five focus groups discussions each comprising ten non-disabled learners. Focus groups consisted of voluntary students who were either learning in the same classes with students living with disabilities. The main themes that were discussed included;

- i) Promotion of equal opportunities for learners with disabilities
- ii) Help given to learners with disabilities
- iii) How do you assist them to fight for their rights in school?
- iv) Working together to uplift their academic progress

4.6.1 Promotion of Equal Opportunities for Learners with Disabilities

Group 1: We allowed them in our study groups and we encouraged them to share their knowledge. We even play indoor games with them

Group 3: We defend them from indisciplined students who want to harass them and misuse their shopping. When they do well in class, we organize to buy for them some presents. This makes them very happy

Group 2: By not ignoring them when they ask you a question and moving at their pace especially when they are not getting what you are trying show them academically

Group 5: Using my leisure time with them. Some of them have very good stories to share with us when given a chance.

Group 3: I really campaign for them to be elected as prefects and when they are elected, we celebrate with them. We appreciate their talents and encourage them to use them.

4.6.2 Help Given to Students with Disabilities

Group 5: Yes, we like helping these learners living with disabilities. I remember one student who fell while climbing down the stairs. We carried him quickly to the nurse and we used to take him food until he got well.

Group 3: Yes, we help them especially in times of danger. I remember our dorm once caught fire; we carried the boxes and other possessions out of the burning dormitory.

Group 2: I have always helped one of them to wash her clothes. One of her arms is crippled and I also help her carry water and get food for her.

4.6.3 How do you Help them Fight for their Rights in School

Group 1: I talked to the principal on building ramps because of the way I saw one of the students with physically disabilities suffer due to the steep staircases. A school like this one can do some modification for the students with disabilities but they always say that they are no funds.

Group 2: With co-curricular activities, students with disabilities are really side-lined. They are spectators during games. We should fund raise to come up with modified facilities that will help them do physical activities.

Group 5: The school should modify the laboratory stools and tables used for experiments, to enable learners with disabilities to do their experiments without difficult.

4.6.4 Working Together to Uplift their Academic Progress

Students shared how they help the weak students to uplift their academic performance

Group 2: In our school there is a lot of peer teaching to uplift the academic performance of weak students.

Group 4: Yes, in our school all the students belong to an academic group to improve their performance. Everyone benefits from this type of discussions.

Non-disabled students seemed accommodative to learners with physical disabilities and were ready to assist them socially. For example, in taking part in co-curricular activities and academically for their personal growth. Members of the focus groups felt that unmodified physical resources and equipment remain a major challenge to access and participation for learners with disabilities. In contrast, Booth, Ainscow and Kingston, (2006) indicate that features of an inclusive school are meant to meet the needs of disabled and non-disabled students through appropriate school and teacher responses.

4.7 Challenges Facing Practices of Policy towards Inclusive Education

The general objective sought to examine the challenges facing practices of policy towards the implementation of inclusive education in study schools. The findings are discussed under the following sub-headings:

4.7.1 Challenges Facing School Guiding Principles

The researcher sought to establish from the teachers the challenges facing the school guiding principles towards the implementation of inclusive education in their schools. The information was relayed in Figure 4.1 below.

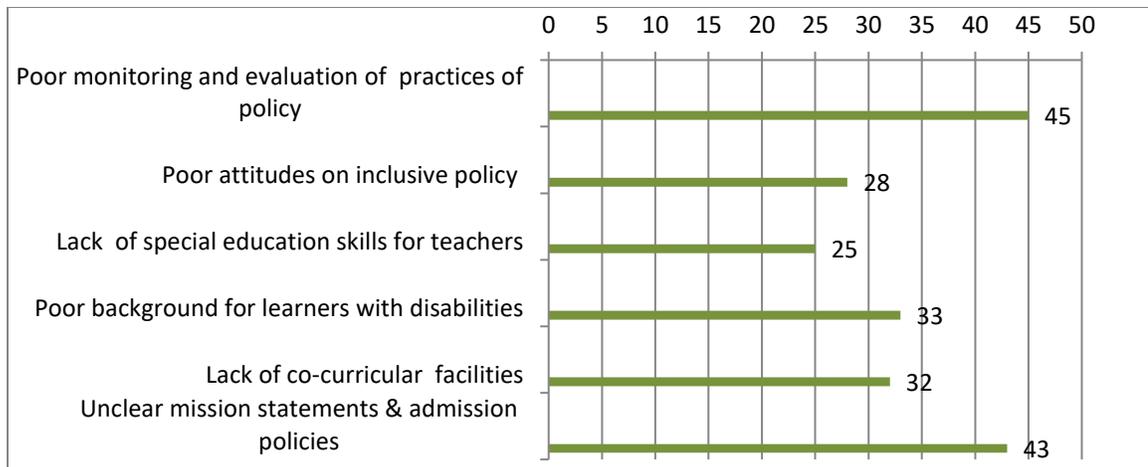


FIGURE 4.1: Challenges Facing School Guiding Principles towards Inclusive Education

According to the Figure 4.1, a significant, 43 (66%) teachers felt that unclear school mission statements and admission policies and practices regarding inclusive education was major challenge to inclusion, while 32 (49%) of them cited insufficient co-curricular facilities for learners with disabilities. Poor background among the learners with disabilities was reported by 33 (51%) respondents, while 25 (38%) teachers indicated that lack of special education skills among teachers was a real challenge. Poor attitudes towards the implementation of inclusive education were referenced by 28 (43%) teachers. According to 45 (69%) teachers, poor monitoring and evaluation of practices of policy was a key challenge affecting the implementation of inclusive education.

4.7.2 Suggestions for Overcoming Challenges Facing Schools Guiding Principles

Teachers made several suggestions on ways of overcoming challenges facing guiding principles towards the implementation of the inclusive education policy. Their suggestions are outlined in Figure 4.2.

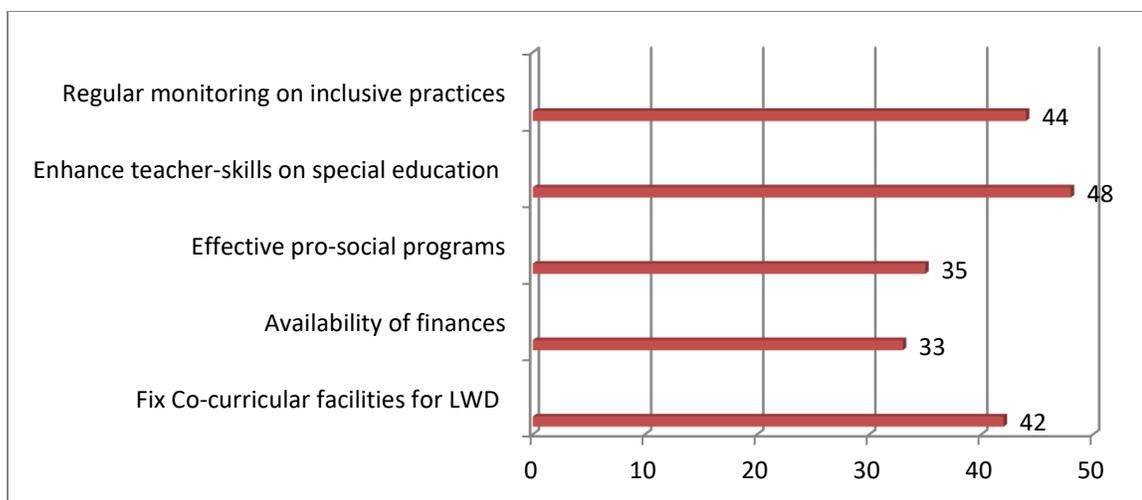


FIGURE 4.2: Suggestions for Overcoming the Challenges Facing Guiding Principles

According to the Figure 4.2, a significant 42(65%) teachers suggested that the schools needed to strategize on co-curricular resources for learners with disabilities, while 33 (51%) of them indicated that availability of finances was paramount for the implementation of inclusive education. Effective pro-social programs for non-disabled students were cited by 35 (54%) participants, while 48 (74%) teachers felt that they required professional skills on special education so that they can facilitate the implementation of inclusive education policy. Furthermore, a significant 44 (68%) teachers indicated that regular monitoring of inclusive education practices is significantly necessary for school modification. Notably, the above-mentioned results suggest that teachers had viable plans in addressing guiding principles on challenges facing implementation of inclusive education. Moreover, Munk and Dempsey (2010) assert that effective inclusive guiding principles maximize access to and success in general education and school culture.

4.7.3 Challenges Facing the Rate of Stakeholders' Involvement

The researcher sought the teachers' perceptions on the stakeholders' involvement challenges towards the implementation of inclusive education. The results are presented in Figure 4.3.

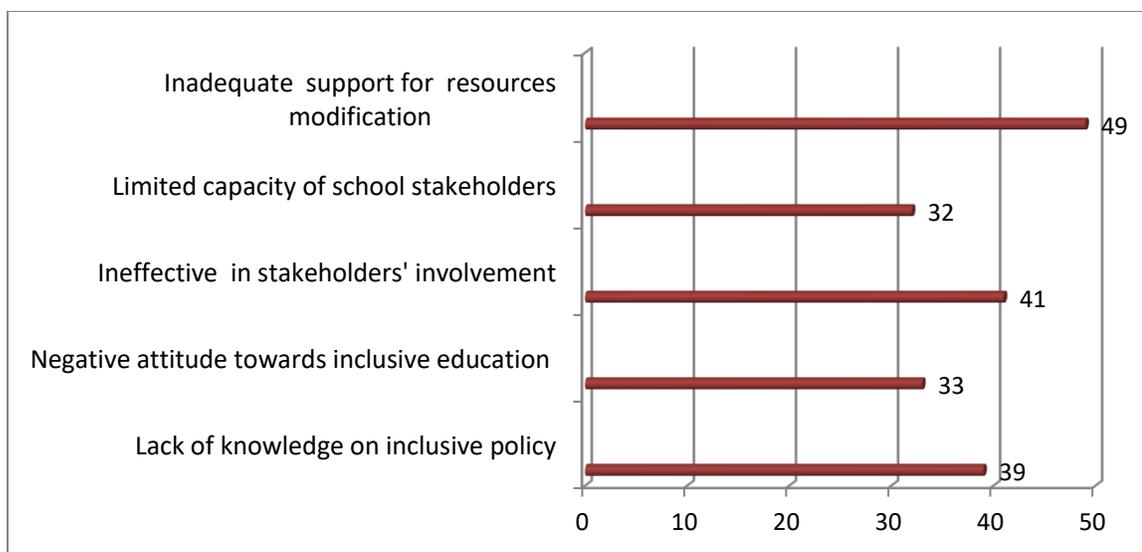


FIGURE 4.3: The Challenges Facing the Rate of Stakeholders' Involvement

The data presented in Figure 4.3 shows a vast majority, 49 (75%) teachers cited inadequate support by stakeholders in modifying physical resources in schools, while 32 (49%) identified limited capacities among school stakeholders on inclusive education implementation. Further, 41 (65%) teachers indicated ineffective stakeholder involvement, while 33 (51%) of respondents identified negative attitude towards inclusive education implementation. According to 39 (60%) teachers, lack of knowledge on inclusive education policy was a challenge to inclusion. Matusznyi, et al. (2007) observe that parents support inclusion and they are more positive when schools involve them in the decisions involving the educational services that their children receive. This implies that inclusive values can be nurtured simply by engaging in a dialogue and encouraging equal participation among key stakeholders in schools.

4.7.4 Suggestions for Overcoming Challenges Facing Stakeholder Involvement

The researcher sought the teachers' perceptions on the challenges facing the rate of stakeholder involvement towards the implementation of inclusive education. The results are presented in Figure 4.4 below.



FIGURE 4.4: Suggestions for Overcoming Challenges Facing Stakeholder Involvement

Data presented in Figure 4.4 show that 46 (71%) teachers felt that having regular meetings with stakeholders will help overcome challenges of inclusion, while 47 (72%) of them indicated that sensitization on inclusive education policy as a strategy could overcome stakeholders' involvement challenge. A significant 44 (68%) teachers cited giving roles and responsibilities to stakeholders while, building team spirit was cited by 42 (65%) teachers. Further, 35 (54%) participants noted support for guidance and counselling as the strategy to improve stakeholder involvement. In affirmation, Lenshie (2013) asserts that the role played by education stakeholders is unavoidable as it contributes to the development, success and realization of the educational goals and objectives.

4.7.5 Challenges Facing the School Resource towards Inclusive Education

The researcher sought the teachers' perceptions on the challenges facing school resource towards inclusive education implementation. The results are presented in Figure 4.5

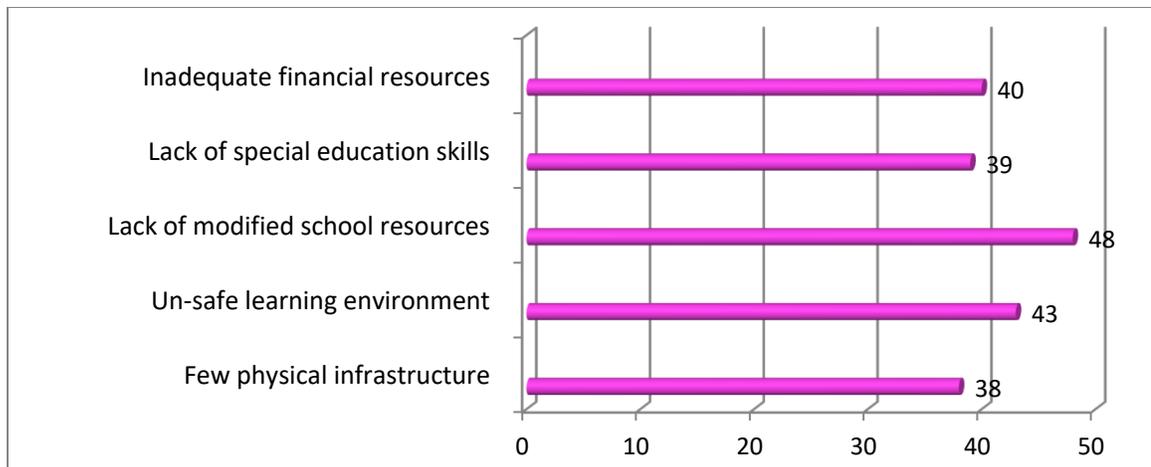


FIGURE 4.5: Challenges Facing the School Resource towards Inclusive Education

Data presented in Figure 4.5 shows that, 38 (58%) teachers cited few physical infrastructure and resources as a major challenge affecting the implementation of inclusive education. Further, un-safe learning environment was cited by 43 (66%) respondents, while 48 (74%) teachers cited lack of modified facilities within the schools. 39 (60%) teachers cited lack of training among teachers with special education skills, while 40 (62%) teachers indicated inadequate financial resources as real challenges to implementation of inclusive education. Since inclusive education is a new phenomenon, there is a serious shortage of resources in terms of modified facilities, qualified staff, learning materials and absence of support by stakeholders. In order to address the situation, Landsberg (2005) suggests that teachers need efficient and rigorous training by competent and experienced people to boost their skills on special needs education. This way, the educators feel confident to handle issues related to learners with physical disabilities.

4.7.6 Suggestions for Overcoming Challenges Facing the School Resource

Teachers made several suggestions on ways of overcoming challenges facing school resource towards the implementation of inclusive education. Their suggestions are presented in Table 4.12.

TABLE 4.12: Suggestions for Overcoming Challenges Facing School Resource

Suggestions for Overcoming Resource Challenges	
Adequate modified school infrastructure	41
Availability of finances	45
Effective refreshers courses for teachers on inclusive education	46
Continuous professional development and support	48
Effective coordination mechanisms	35

The data presented in Table 4.12 shows that 35 (54%) teachers suggested that effective and well-coordinated mechanisms among the key stakeholders could enhance the implementation of inclusive education in schools, while 48 (74%) respondents indicated that a continuous professional development and support for teachers to help them to have confidence when handling issues related to learners with special education needs could help. Further, 46 (71%) teachers cited a need for effective refreshers courses on inclusive education policy to enable teachers support inclusion. A significant, 45 (69%) teachers called for availability of finances while 41 (63%) teachers cited a need to modify and restructure the school environment and infrastructure. It is remarkable from the results that the teachers in the study had realistic suggestions that could address issues related to the implementation of inclusive education in schools. Hence, the top managers in the schools, in collaboration with key stakeholders, have an integral role to strategize for the purpose of implementing inclusive education policy.

4.7.7 Challenges Facing School Strategies in Overcoming Physical Barriers

The researcher sought to identify from the teachers, the challenges facing school strategies to overcome physical barriers. Their suggestions are outlined in Figure 4.6 below.

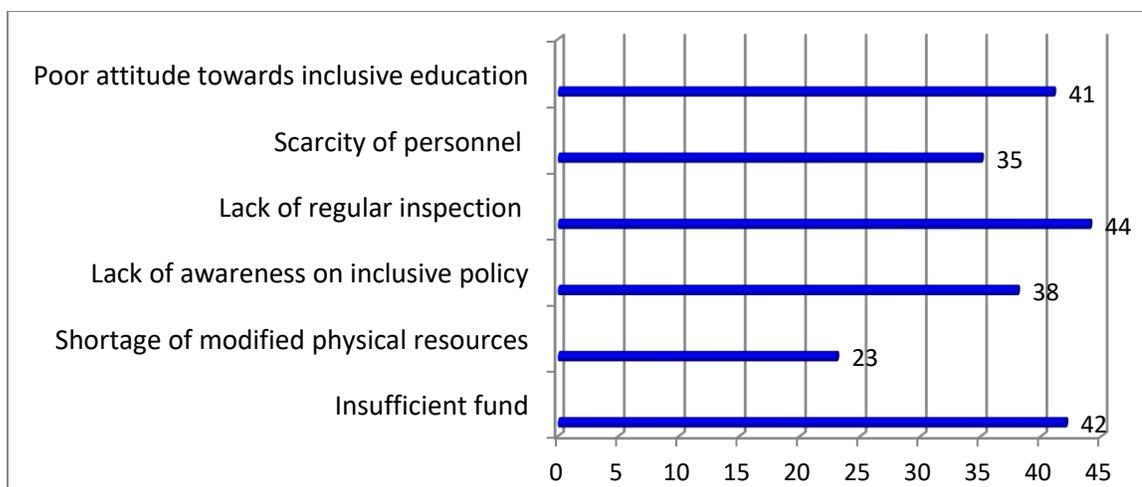


FIGURE 4.6: Challenges Affecting School Strategies

According to the Figure 4.6, a significant 44 (68%) teachers identified lack of regular inspection on physical resources as a major challenge affecting school strategies to overcoming physical barriers that hinder the implementation of inclusive education in schools. Further, 42 (65%) teachers identified insufficient funds to restructure the schools. Lack of awareness on inclusive education policy was cited by 38 (58%) teachers, while shortage of modified physical resources to enhance safety for learners with physical disabilities was reported by 23 (35%) teachers. The other challenge identified by 35 (54%) teachers was scarcity of personnel, while 41 (63%) teachers cited poor attitudes towards the implementation of inclusive education. Many countries in the developing countries have not been able to effectively implement inclusive education policy framework. This is mainly due to poor policy implementation and the prevailing challenges that become a hindrance to inclusive education. Thus, lack of proper strategies on how to minimize or eradicate the aforementioned challenges negatively affect the success of inclusive education.

4.7.8 Suggestions for Overcoming Challenges Facing School Strategies

The researcher examined teachers' views on ways of overcoming challenges facing school strategies in order to overcome physical barriers hindering the implementation of inclusive education as perceived by teachers. The findings are illustrated in Figure 4.7

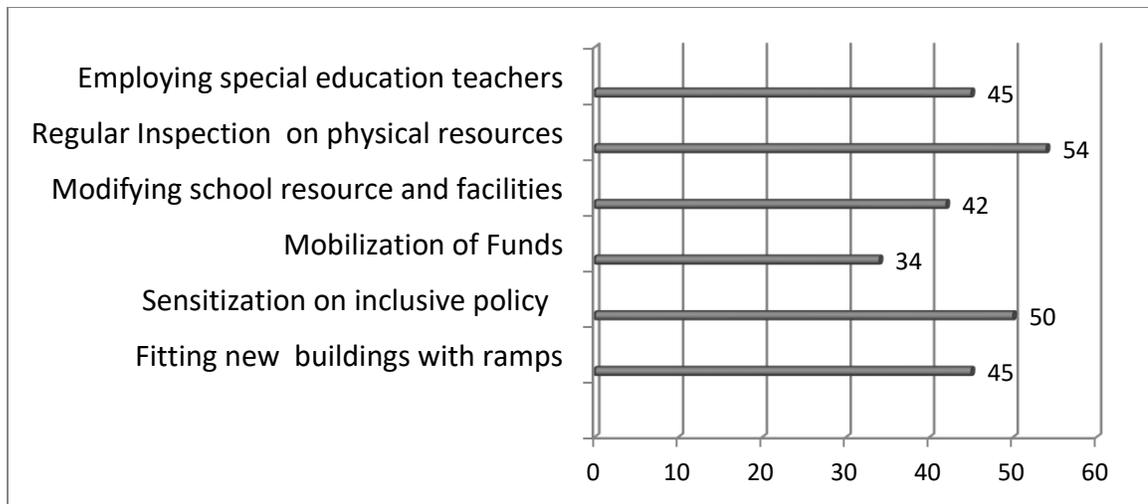


FIGURE 4.7: Suggestions for Overcoming Challenges Facing School Strategies

Figure 4.7 reveals that, 45 (69%) teachers cited employment of teachers with special education skills as a strategy to overcoming physical barriers that hinder the implementation of inclusive education. A significant 54 (83%) participants cited regular inspection on physical resources to meet the needs of learners with physical disabilities. According to 42 (63%) respondents, modifying of school resource and facilities was identified as an inclusive strategy that can work in schools. Further, mobilization of funds was cited by 34 (52%) respondents. Sensitization of key stakeholders on inclusive education policy was identified by 50 (77%) teachers, while 45 (69%) respondents cited the fitting of new school buildings with ramps. In this regard, the above-mention strategies imply that the schools need to make crucial changes to provide opportunities and support for learners with special education needs. The willingness to accept and to take an active role in the lives of learners with disabilities, largely depend on a profound change of school culture, beliefs, and practices that unfavourably affect inclusive education.

4.8 Regression Diagnostics

Regression diagnostics involved testing linear regression model assumptions: Normality, Linearity, Homoscedasticity and Multicollinearity. For the linear regression model to be valid, there has to be an inherent linear relationship between independent and the dependent variables, the regression-standardized residuals have to be normally

distributed, there should be constant variance of the standardized residuals along the corresponding predicted values and the independent variables should not be significantly correlated with each other. Prior to testing the four regression assumptions, the study removed outliers in order to remove extreme biased data.

4.8.1 Outliers

Mahalanobis distance, Centered Leverage distance and Cook’s Distance statistics were used to check for outliers. An initial regression run in SPSS was used to generate the three distance values. The cut-off value for Mahalanobis statistics was from the chi-square distribution, χ (5%, six variables) = 12.592; cut-off for Leverage distance values was $2*k/n$ where ‘k’ was number of independent variables and n was 100 cases, $2*4/100 = 0.08$; cut off value for Cooks distance value was $4/(n-k-1) = 4/(100-5-1) = 0.043$

Using ‘**Select Cases**’ command in SPSS, the cases which had distance values above the aforementioned cut-off points were not selected for further linear regression analysis. Therefore, these outliers were not selected for testing of assumptions and for the final regression run.

4.8.2 Normality

TABLE 4.13: Tests of Normality

	Kolmogorov-Smirnov ^a			Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
Inclusive Education	0.104	100	0.009	0.971	100	0.027
Lilliefors Significance Correction						

Table 4.15 shows the inferential statistics from testing the normality using Shapiro-Wilk test of normality. It tests the null hypothesis that the data is normally distributed against the alternate hypothesis that there is absence of normality in the data. From the observed p-value of Shapiro-Wilk, $p = 0.027$, it was less than 5% significance level; hence, the data was not normally distributed. However, at 1% significance level, the data is normally distributed. According to Ghasemi and Zahedias (2012), a statistic approaching

unity indicates sufficient normality in a data set for carrying out a linear regression assumption. In this study, the Shapiro-Wilk statistic was 0.971, which is near unity; hence, it indicates that the data was sufficiently normal.

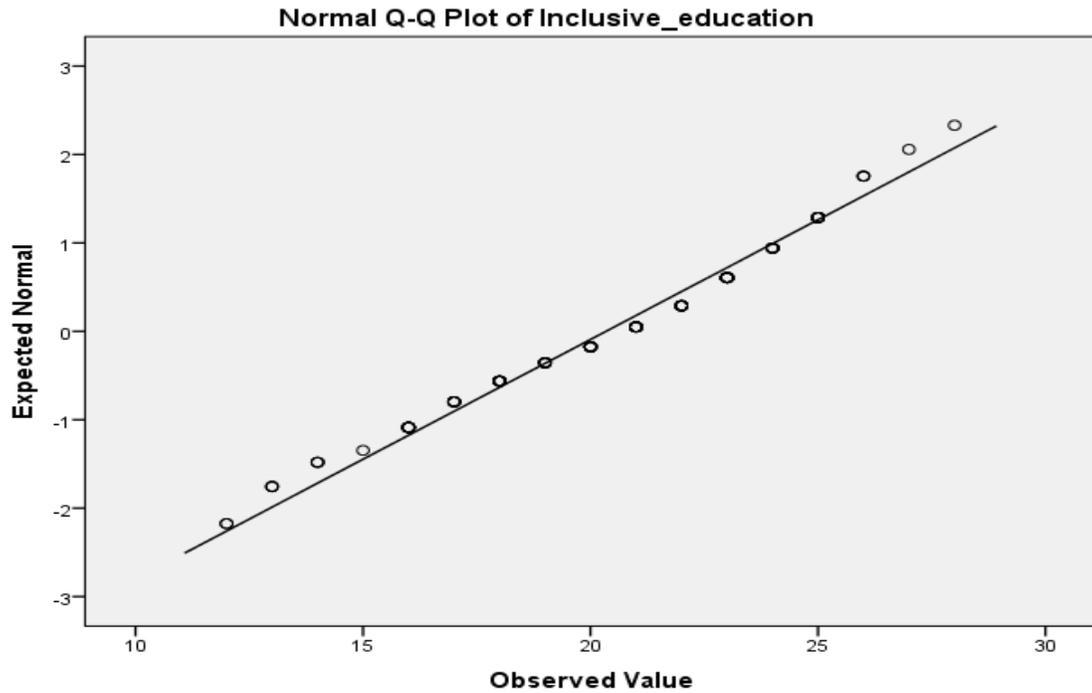


FIGURE 4.8: Normal Q-Q Plot for Inclusive Education

Figure 4.8 shows that the observed values fitted well along the expected normal curve in the Normal Q-Q plot. Therefore, the data was normally distributed as confirmed through visual inspection of all the normal plots and by inferring from the Shapiro-Wilk Normality test.

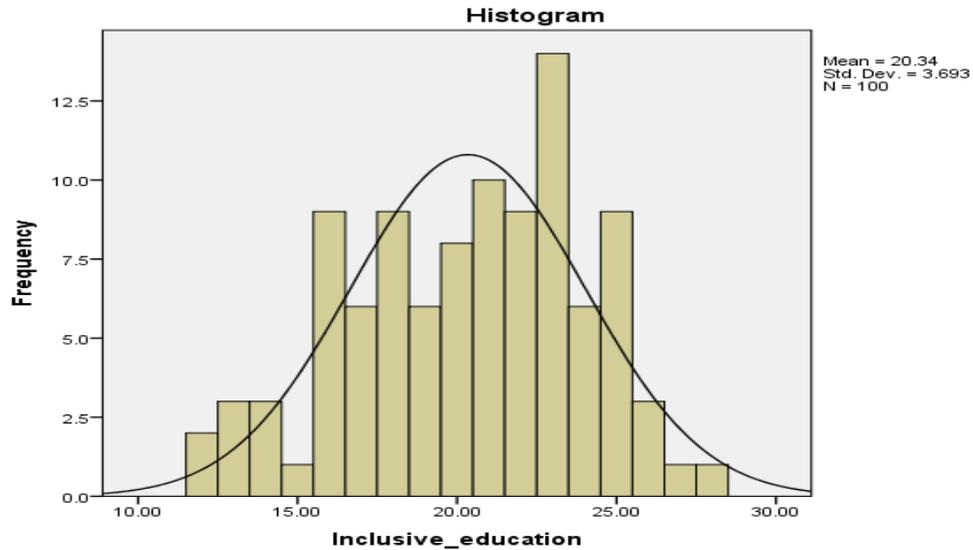


FIGURE 4.9: Histogram with Normal Curve for Inclusive Education

Figure 4.9, which shows the histogram of the dependent variable (inclusive education), corroborates the findings in Table 4.15 which inferred normality in the data. Furthermore, Figure 4.9 also shows the distribution of the regression standardized residuals. The standardized residuals are normally distributed across the standard-normal value range albeit minutely skewed to the left.

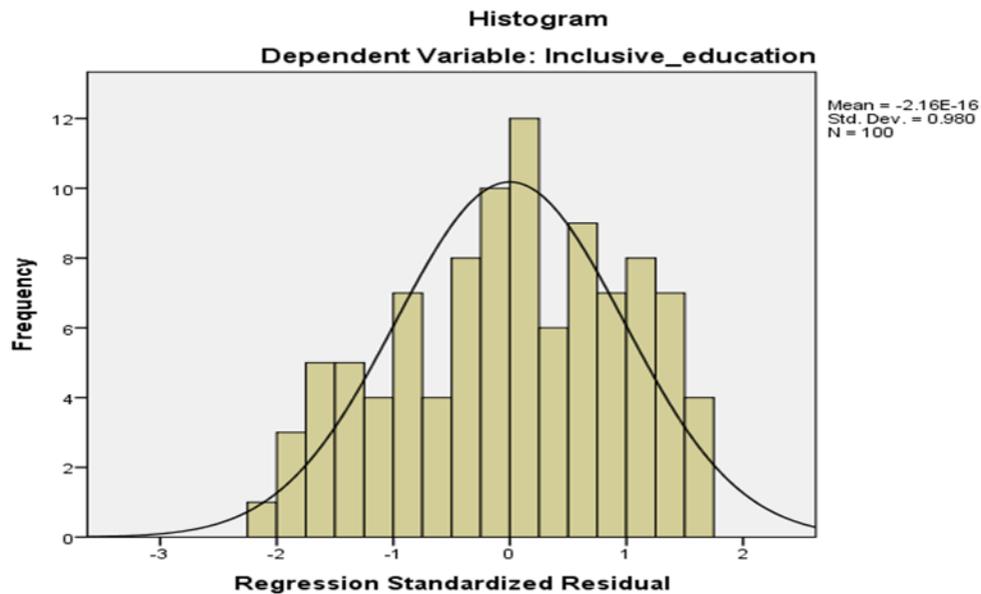


FIGURE 4.10: Regression Standardized Coefficients

Finally, Figure 4.10 shows the Normal P-P Plot of the regression standardized residuals. Observed cumulative probability of the field data was approximately within the expected cumulative probability indicating normality in the regression standardized residuals.

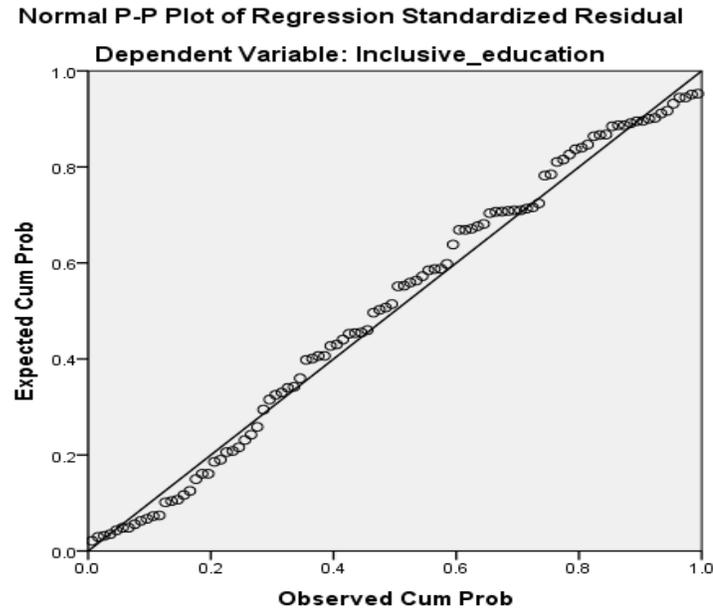


FIGURE 4 11: Normal P-P Plot for Regression Standardized Residuals

4.8.3 Homoscedasticity

TABLE 4.14: Breusch-Pagan and Koenker Test Statistics

Statistic	LM	P-value
BP	5.916	0.315
Koenker	7.105	0.213

Table 4.14 shows Breusch-Pagan (BP) and Koenker test that tests the null hypothesis that heteroscedasticity is not present (homoscedasticity). The observed p-value of BP and Koenker tests are 0.315 and 0.213 respectively both of which are less than 5%; hence, there is no heteroscedasticity. Figure 4.12 also depicts approximately constant variance of the regression-standardized residuals around the regression standardized predicted values. Therefore, the assumptions of homoscedasticity have been met.

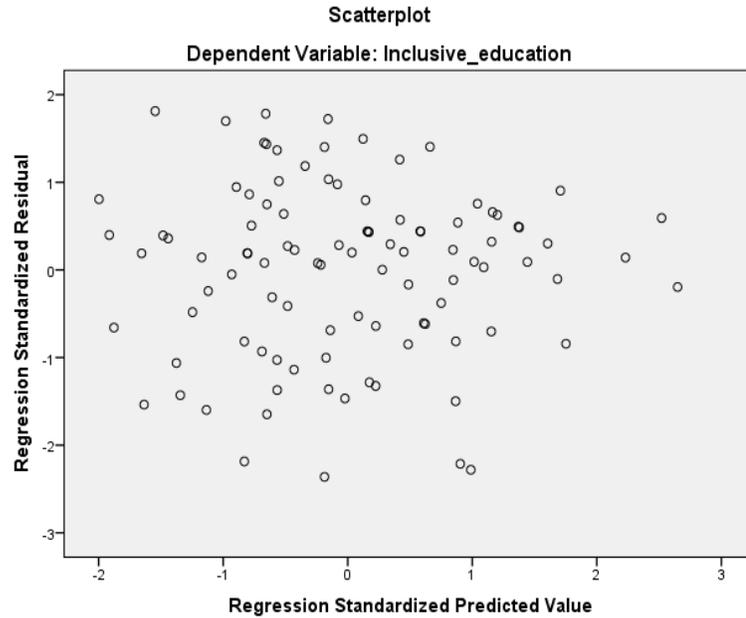


FIGURE 4.12: Plot of Regression Standardized Residuals against Regression Standardized Predicted Values

4.8.4 Linearity

TABLE 4.15: Model Summary

R	R Square	Adjusted R Square	Std. Error of the Estimate
0.637 ^a	0.406	0.374	2.92200

a. Predictors: (Constant), Administrative support, School Guiding Principles, Techniques, School resources, Stakeholder involvement

b. Dependent Variable: Inclusive education

The plot of regression-standardized residuals against regression standardized predicted values in Figure 4.12 also shows linearity between the independent and the dependent variable. This can be observed by observing that the residuals spread constantly (constant variance) along the predicted values with no significant deviation. If there was no linear relationship, the scatter plot would have had a pattern away from the zero-horizontal line with continued observations. Therefore, the assumptions of linearity have been met.

TABLE 4.16: ANOVA Table

Model	Sum of Squares	df	Mean Square	F	Sig.
Regression	547.861	5	109.572	12.833	0.000 ^b
Residual	802.579	94	8.538		
Total	1350.440	99			

a. Dependent Variable: Inclusive education

b. Predictors: (Constant), Administrative support, School Guiding Principles, School strategies, School resources, Stakeholder involvement

Table 4.16 also shows that the p-value was 0.000, less than 0.05; thus, indicating that there was a significant linear relationship between the predictors (Administrative support, School Guiding Principles, School strategies, School resources, Stakeholder involvement) and the criterion variable (Inclusive education).

4.8.5 Multicollinearity

TABLE 4.17: Tolerance and VIF Values

Model	Collinearity Statistics	
	Tolerance	VIF
School Guiding Principles	0.760	1.317
Stakeholder involvement	0.598	1.671
School resources	0.663	1.508
School strategies	0.767	1.303
Administrative support	0.500	2.002

In Table 4.17, the VIF values are less five indicating no collinearity among the independent variables. According to Ranjit (2005), a tolerance of more than 0.5 indicates lack of collinearity amongst the independent variables. The study therefore found that there was no multicollinearity amongst the independent variables.

4.9 Hypothesis Testing

Hypothesis testing was guided by the four specific objectives of the study, which were;

- 1) To determine the effects of school guiding principles on the implementation of inclusive education policy in public secondary schools in Tharaka-Nithi County.
- 2) To determine the influences of stakeholders' involvement the implementation of inclusive education in secondary schools.
- 3) To determine the effects to which school resources influence the implementation of inclusive education.
- 4) To determine the effects of school strategies in overcoming physical barriers that hinder the implementation of inclusive education.

Consequently, the four specific hypotheses were:

HO₁: There is no significant relationship between school guiding principles and the implementation of inclusive education in public secondary schools.

HO₂: There is no significant relationship between stakeholders' involvement and the implementation of inclusive education.

HO₃: There is no significant relationship between school resources and the implementation of inclusive education.

HO₄: There is no significant relationship between school strategies and overcoming physical barriers that hinder the implementation of inclusive education.

In addition to the latter hypotheses, the study sought to determine the mediating and the moderating effect of administrative support on the relationship between the predictors (School Guiding Principles, Stakeholders' Involvement, School Resources and School Strategies) and the criterion variable (Inclusive Education).

4.9.1 School Guiding Principle and Implementation of Inclusive Education

TABLE 4.18: Model Summary for School Guiding Principle and Implementation of Inclusive Education

R	R Square	Adjusted R Square	Std. Error of the Estimate
0.367	0.135	0.126	3.45276

Table 4.18 shows a weak positive correlation between School Guiding Principle and Implementation of Inclusive Education with a correlation of 0.367. The coefficient of determination (R Square) shows that 13.5 percent variations in Implementation of Inclusive Education are due to variations in the School Guiding Principles. Hence, the model has a poor fit. This indicates that there are also some more factors that apart from school guiding principles influence implementation of inclusive education.

TABLE 4.19: ANOVA for School Guiding Principle and Implementation of Inclusive Education

Model	Sum of Squares	df	Mean Square	F	p-value
Regression	182.128	1	182.128	15.277	0.000 ^b
Residual	1168.312	98	11.922		
Total	1350.440	99			

Table 4.19, also shows that, there is a significant linear relationship between the predictor (School Guiding Principles) and the criterion variable (Inclusive education).

TABLE 4.20: Regression Coefficients for School Guiding Principle and Implementation of Inclusive Education

Model	Unstandardized		Standardized	t	P-value	95.0% Confidence	
	Coefficients		Coefficients			Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
(Constant)	12.898	1.935		6.666	0.000	9.058	16.738
School Guiding Principles	0.660	0.169	0.367	3.909	0.000	0.325	0.996

Table 4.20 indicates the results from the regression analysis where School Guiding Principles was the independent variable while Implementation of Inclusive Education was the dependent variable. The t-statistic and corresponding p-values formed the basis of concluding on the study's hypothesis. The unstandardized beta coefficient shows the

increment of Implementation of Inclusive Education with respect to the marginal increment of School Guiding Principles.

4.9.2 Stakeholder Involvement and Implementation of Inclusive Education

TABLE 4.21: Model Summary for Stakeholder Involvement and Implementation of Inclusive Education

R	R Square	Adjusted R Square	Std. Error of the Estimate
0.421	0.177	0.169	3.36767

Table 4.21 shows moderate positive correlation between Stakeholder Involvement and Implementation of Inclusive Education with a correlation of 0.421. The coefficient of determination (R Square) shows that 17.7 percent variations in Implementation of Inclusive Education are due to variations in the Stakeholder Involvement. The model has a poor fit indicating that there are also some more factors that influence inclusive education apart from stakeholder involvement.

TABLE 4.22: ANOVA for Stakeholder Involvement and Implementation of Inclusive Education

Model	Sum of Squares	df	Mean Square	F	P-value
Regression	239.005	1	239.005	21.074	0.000
Residual	1111.435	98	11.341		
Total	1350.440	99			

Table 4.22 concludes that although the model has poor fit as shown on Table 4.21, there is a significant linear relationship between the predictors (Stakeholder involvement) and the criterion variable (Inclusive education).

TABLE 4.23: Regression Coefficients for Stakeholder Involvement and Implementation of Inclusive Education

Model	Unstandardized		Standardized	T	P-value	95.0% Confidence	
	Coefficients		Coefficients				
	B	Std. Error	Beta			Lower Bound	Upper Bound
(Constant)	12.798	1.677		7.631	0.000	9.470	16.126
Stakeholder involvement	0.737	0.161	0.421	4.591	0.000	0.419	1.056

Table 4.23 shows the results from regression analysis where stakeholder involvement was the independent variable while implementation of inclusive education was the dependent variable. The unstandardized beta coefficient shows the increment of implementation of inclusive education with respect to the marginal increment in stakeholder involvement.

4.9.3 School Resources and Implementation of Inclusive Education

TABLE 4.24: Model Summary for School Resources and Implementation of Inclusive Education

R	R Square	Adjusted R Square	Std. Error of the Estimate
0.335	0.112	0.103	3.49778

Table 4.24 shows weak positive correlation between School Resources and Implementation of Inclusive Education with a correlation of 0.335 percent. The coefficient of determination (R Square) shows that 11.2 percent variations in implementation of inclusive education are due to variations in the resources. This again shows a poor fit indicating that there are other factors that affect inclusive education other than school resources alone.

TABLE 4. 25: ANOVA for School Resources and Implementation of Inclusive Education

Model	Sum of Squares	df	Mean Square	F	p-value
Regression	151.459	1	151.459	12.380	0.001
Residual	1198.981	98	12.234		
Total	1350.440	99			

Table 4.25 also concluding that there is a significant linear relationship between the predictors (Resources) and the criterion variable (Inclusive education).

TABLE 4.26: Regression Coefficients for Resources and Implementation of Inclusive Education

Model	Unstandardized		Standardized	t	P- value	95.0% Confidence	
	Coefficients		Coefficients			Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
(Constant)	14.122	1.802		7.839	0.000	10.547	17.697
School resources	0.365	0.104	0.335	3.518	0.001	0.159	0.570

Table 4.26 shows the results from regression analysis where resources were the independent variable while Implementation of Inclusive Education was the dependent variable. The unstandardized beta coefficient shows the increment of implementation of inclusive education with respect to the marginal increment in school resources.

4.9.4 School Strategies and the Implementation of Inclusive Education

TABLE 4.27: Model Summary for School Strategies and Inclusive Education

R	R Square	Adjusted R Square	Std. Error of the Estimate
0.223	0.050	0.040	3.61869

Table 4.27 shows a weak positive correlation between school strategies and overcoming physical barriers that hinder the Implementation of Inclusive Education with a correlation of 0.223. The coefficient of determination (R Square) shows that 5.0 percent variation in Implementation of Inclusive Education is due to variations in the school strategies. The model has a poor fit indicating that there are other factors that influence inclusive education apart from school strategies.

TABLE 4.28: ANOVA for School Strategies and Implementation of Inclusive Education

Model	Sum of Squares	df	Mean Square	F	p-value
Regression	67.139	1	67.139	5.127	0.026
Residual	1283.301	98	13.095		
Total	1350.440	99			

Table 4.28 also shows that there is a significant linear relationship between the predictors (school strategies) and the criterion variable (overcoming of physical barriers that hinder the implementation of Inclusive education).

TABLE 4.29: Regression Coefficients for School Strategies and the Implementation of Inclusive Education

Model	Unstandardized		Standardized	t	p-value	95.0% Confidence	
	Coefficients		Coefficients			Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
(Constant)	16.586	1.697		9.775	0.000	13.219	19.954
Strategies	0.506	0.223	0.223	2.264	0.026	0.063	0.949

Table 4.29 shows the results from regression analysis where school strategies were the independent variable while overcoming physical barriers that hinder the implementation of inclusive education was the dependent variable. The unstandardized beta coefficient shows the increment in overcoming physical barriers that hinder the implementation of inclusive education with respect to the marginal increment in school strategies.

4.10 Mediation Effects

To test the mediating effect of Administrative Support, the study used Baron and Kenny's (1986) approach in Hsu, Wang and Hsu (2012). The approach involves testing the following conditions.

- i) The independent variable has an effect on the dependent variable. This step establishes that there is an effect that may be mediated.

- ii) The independent variable has an effect on the mediator. This step essentially involves treating the mediator as if it were an outcome variable.
- iii) The mediator has an effect on the dependent variable.
- iv) The effect of the independent variable on the dependent variable is diminished after controlling for the effects of the mediator.

Baron and Kenny's (1986) state that if all these conditions are satisfied and the influence of the dependent variable becomes insignificant in the presence of the mediator, the effect of the independent variable is 'fully' mediated. If the influence of the independent variable remains significant in the presence of the mediator, the independent variable is said to be 'partially' mediated.

4.10.1 Mediation Effects of Administrative Support on the Relationship between School Guiding Principles and Inclusive Education

Condition 1: Relationship between School Guiding Principles and Inclusive Education

From Table 4.19, the p-value was 0.000, which is less than 0.05 meaning that the relationship between School Guiding Principles and Inclusive Education was significant; hence, fulfilling the first condition of Baron and Kenny's (1986).

Condition 2: Relationship between School Guiding Principles and Administrative Support

From Table 4.30, the relationship between School Guiding Principles and Administrative Support was significant because the p-value was 0.000, which was less than 5% significance level. This therefore it fulfils the second condition for the test of mediation.

TABLE 4.30: Regression Coefficients for Guiding Principles and Administrative Support

Model	Unstandardized		Standardized	t	P-	95.0% Confidence		
	Coefficients		Coefficients			value.	Interval for B	
	B	Std. Error	Beta				Lower Bound	Upper Bound
(Constant)	3.952	0.934		4.233	0.000	2.099	5.804	
Guiding Principles	0.406	0.082	0.450	4.984	0.000	0.244	0.568	

Condition 3: Relationship between Administrative Support and Inclusive Education

In Table 4.31, the p-value of Administrative Support is 0.14 which is more than 0.05; hence, there was no significant relationship between Administrative Support and Inclusive Education. This means that the third condition in testing for mediation was not met. Therefore, there is no need to test the fourth condition and it is thus, concluded that there is no mediation effect of Administrative Support on the relationship between School Guiding Principles and Implementation of Inclusive Education.

TABLE 4.31: Regression Coefficients for Administrative Support and Implementation of Inclusive Education

Model	Unstandardized		Standardized	t	p-value	95.0% Confidence	
	Coefficients		Coefficients			Interval for B	
	B	Std. Error	Beta				Lower Bound
(Constant)	17.562	1.901		9.236	0.000	13.788	21.335
Administrative support	0.355	0.239	0.149	1.489	0.140	-0.118	0.829

4.10.2 Mediation Effects of Administrative Support on the Relationship between Stakeholders Involvement and Inclusive Education

Condition 1: Relationship between Stakeholder Involvement and Inclusive Education

From Table 4.22, the p-value was 0.000, which is less than 0.05 meaning that the relationship between Stakeholder Involvement and Inclusive Education was significant; hence, fulfilling the first condition of Baron and Kenny's (1986).

Condition 2: Relationship between Stakeholder Involvement and Administrative Support

From Table 4.32, the relationship between Stakeholder Involvement and Administrative Support was significant because the p-value was 0.000, which was less than 5% significance level. This therefore fulfils the second condition for the test of mediation.

TABLE 4.32: Regression Coefficients for Stakeholder Involvement and Administrative Support

Model	Unstandardized		Standardized	t	p-value	95.0% Confidence	
	Coefficients		Coefficients			Lower Bound	Upper Bound
	B	Std. Error	Beta				
(Constant)	3.625	0.779		4.654	0.000	2.079	5.171
Stakeholder involvement	0.479	0.075	0.544	6.426	0.000	0.331	0.627

Condition 3: Relationship between Administrative Support and Inclusive Education

From Table 4.31, the observed p-value of Administrative Support is 0.14 that is more than 0.05; hence, there was no significant relationship between Administrative Support and Inclusive Education. This means that the third condition in testing for mediation was not met. Therefore, there is no need to test the fourth condition and it is thus, concluded that there is no mediation effect of Administrative Support on the relationship between Stakeholder Involvement and Implementation of Inclusive Education.

4.10.3 Mediation Effects of Administrative Support on the Relationship between School Resources and Inclusive Education

Condition 1: Relationship between School Resources and Inclusive Education

From Table 4.25, the p-value was 0.001, which is less than 0.05 meaning that the relationship between School Resources and Inclusive Education was significant; hence, fulfilling the first condition of Baron and Kenny's (1986).

Condition 2: Relationship between School Resources and Administrative Support

From Table 4.33, the relationship between School Resources and Administrative Support was significant because the p-value was 0.000, which was less than 5% significance level. This therefore fulfils the second condition for the test of mediation.

TABLE 4.33: Regression Coefficients for Resources and Administrative Support

Model	Unstandardized		Standardized	T	p-value	95.0% Confidence	
	Coefficients		Coefficients			Interval for B	
	B	Std. Error	Beta			Lower Bound	Upper Bound
(Constant)	3.868	0.832		4.649	0.000	2.217	5.520
School resources	0.273	0.048	0.500	5.711	0.000	0.178	0.368

Condition 3: Relationship between Administrative Support and Inclusive Education

From Table 4.31, the observed p-value of Administrative Support is 0.14 that is more than 0.05; hence, there was no significant relationship between Administrative Support and Inclusive Education. This means that the third condition in testing for mediation was not met. Therefore, there is no need to test the fourth condition and it is concluded that there is no mediation effect of Administrative Support on the relationship between School Resources and Implementation of Inclusive Education.

4.10.4 Mediation Effects of Administrative Support on the Relationship between School Strategies and Inclusive Education

Condition 1: Relationship between School Strategies and Inclusive Education

From Table 4.28, the p-value was 0.026, which less than 0.05 meaning that the relationship between techniques and Inclusive education was significant; hence, fulfilling the first condition of Baron and Kenny's (1986).

Condition 2: Relationship between School Strategies and Administrative Support

From Table 4.34, the relationship between school strategies and administrative support was significant because the p-value was 0.000, which was less than 5% significance level. This therefore fulfils the second condition for the test of mediation

TABLE 4.34: Regression Coefficients for School Strategies and Administrative Support

Model	Unstandardized		Standardized	t	p-	95.0% Confidence	
	Coefficients					value	Interval for B
	B	Std. Error	Beta				Lower Bound
(Constant)	3.999	0.688		5.813	0.000	2.634	5.364
School Strategies	0.401	0.079	0.457	5.089	0.000	0.245	0.558

Condition 3: Relationship between Administrative Support and Inclusive Education

From Table 4.31, the observed p-value of Administrative Support is 0.14 that is more than 0.05; hence, there was no significant relationship between Administrative Support and Inclusive Education. This means that the third condition in testing for mediation was not met. Therefore, there is no need to test the fourth condition and it is hence concluded that there is no mediation effect of administrative support on the relationship between school strategies and Implementation of Inclusive Education

4.11 Moderation Test

To test for moderation, it involved using Administrative support as an additional variable. Statistically, moderation is examined as the interaction effect of the independent variable and the moderator, that is, independent variable*moderator. Therefore, it is the product of the latter two variables (the moderator and the independent variable).

4.11.1 Moderation of Administrative Support on the Relationship between School Guiding Principle and Inclusive Education

TABLE 4.35: Model Summary for Moderation of Administrative Support on the Relationship between School Guiding Principle and Inclusive Education

R	R Square	Adjusted R Square	Std. Error of the Estimate
0.617	0.381	0.368	2.93618

a. Predictors: (Constant), Administrative Support*School Guiding Principles, School Guiding Practices. b. Dependent Variables

Table 4.35 shows strong positive correlation between stakeholder involvement and implementation of inclusive education with a correlation of 0.617. The coefficient of determination (R Square) shows that 38.1 percent variations in implementation of inclusive education is due to variations in the administrative support*school guiding principles and school guiding principles

TABLE 4.36: ANOVA Table for Moderation of Administrative Support on the Relationship between Guiding Principle and Inclusive Education

Model	Sum of Squares	df	Mean Square	F	P-value
Regression	514.190	2	257.095	29.821	0.000
Residual	836.250	97	8.621		
Total	1350.440	99			

a. Dependent Variable: Inclusive education

b. Predictors: (Constant), Administrative Support*School Guiding Principles, School Guiding Principles

Table 4.36 concludes that there is a significant linear relationship between the predictors (Administrative support*School guiding principles, School guiding principles) and the criterion variable (inclusive education). This shows that with the presence of administrative support, the fitness of the model of school guiding principles with inclusive education improves as was suggested in section 4.9.

TABLE 4.37: Regression Coefficients for Moderation of Administrative Support on the Relationship between School Guiding Principle and Inclusive Education

Model	Unstandardized		Standardized	t	p-value	95.0% Confidence Interval for B	
	Coefficients		Coefficients				
	B	Std. Error	Beta			Lower Bound	Upper Bound
(Constant)	17.229	1.787		9.640	0.000	13.682	20.777
School Guiding Principles	-0.548	0.242	-0.305	-2.265	0.026	-1.029	-0.068
Admin*Principles	0.095	0.015	0.835	6.206	0.000	0.065	0.125

Where; Admin*Principles - Administrative Support*School Guiding Principles

The result in Table 4.37 indicates that administrative support has a significant influence in positively moderating the relationship between school guiding principles and implementation of inclusive education. This can be observed because the interaction variable Administrative Support*School guiding principles has a p-value of 0.000 that is less than 5 percent significance level.

4.11.2 Moderation of Administrative Support on the Relationship between Stakeholder Involvement and Implementation of Inclusive Education

TABLE 4.38: Model Summary for Moderation of Administrative Support on the Relationship between Stakeholder Involvement and Implementation of Inclusive Education

R	R Square	Adjusted R Square	Std. Error of the Estimate
0.603 ^a	.364	.351	2.97520

a. Predictors: (Constant), Administrative Support* Stakeholder Involvement, Stakeholder Involvement

b. Dependent Variable: Inclusive Education

Table 4.38 shows high positive correlation between Stakeholder Involvement and Implementation of Inclusive Education with a correlation of 0.603. The coefficient of determination (R Square) shows that 36.4 percent variations in Implementation of Inclusive Education is due to variations in the Administrative Support* Stakeholder Involvement and Stakeholder Involvement.

TABLE 4.39: Model Summary for Moderation of Administrative Support on the Relationship between Stakeholder Involvement and Inclusive Education

Model	Sum of Squares	df	Mean Square	F	p-value
Regression	491.816	2	245.908	27.781	.000 ^b
Residual	858.624	97	8.852		
Total	1350.440	99			

a. Dependent Variable: Inclusive education

b. Predictors: (Constant), Administrative Support* Stakeholder Involvement, Stakeholder Involvement

Table 4.39 also concludes that there was a significant linear relationship between the predictors (Administrative Support* Stakeholder Involvement, Stakeholder Involvement) and the criterion variable (Inclusive education).

TABLE 4.40: Regression Coefficients for Moderation of Administrative Support on the Relationship between Stakeholder Involvement and Inclusive Education

Model	Unstandardized		Standardized	t	p-value	95.0% Confidence	
	Coefficients					Coefficients	Bound
	B	Std. Error	Beta				Lower
(Constant)	17.581	1.731		10.157	0.000	14.146	21.017
Stakeholder Involvement	-0.568	0.282	-0.324	-2.011	0.047	-1.129	-0.007
Admin*Stakeholder Inv.	0.096	0.018	0.861	5.344	0.000	0.060	0.131

Where; Admin*Stakeholder Inv. - Administrative Support* Stakeholder Involvement

The result in Table 4.40 indicates that administrative support has a significant influence in positively moderating the relationship between stakeholder involvement and implementation of inclusive education. This can be observed because the interaction variable Administrative Support* Stakeholder Involvement has a p-value of 0.000 that is less than 5 percent significance level.

4.11.3 Moderation of Administrative Support on the Relationship between School Resources and Implementation of Inclusive Education

TABLE 4.41: Model Summary for Moderation of Administrative Support on the Relationship between School Resources and Inclusive Education

R	R Square	Adjusted R Square	Std. Error of the Estimate
0.616	0.379	0.360	2.95469

a. Predictors: (Constant), Administrative Support*School resources, School resources,

b. Dependent Variable: Inclusive education

Table 4.41 shows high positive correlation between school resources and implementation of inclusive education with a correlation of 0.616 percent. The coefficient of determination (R Square) shows that 37.9 percent variations in implementation of inclusive education is due to variations in the Administrative Support* School Resources and School Resources.

TABLE 4.42: ANOVA Table for Moderation of Administrative Support on the Relationship between School Resources and Inclusive Education

Model	Sum of Squares	Df	Mean Square	F	p-value
Regression	512.344	3	170.781	19.562	0.000 ^b
Residual	838.096	96	8.730		
Total	1350.440	99			

a. Dependent Variable: Inclusive education

b. Predictors: (Constant), Administrative Support*Resources, School resources,

Table 4.42 also shows that the p-value was 0.000, less than 0.05; hence, concluding that there was a significant linear relationship between the predictors (administrative support * school resources and school resources) and the criterion variable (inclusive education).

TABLE 4.43: Regression Coefficients for Moderation of Administrative Support on the Relationship between School Resources and Inclusive Education

Model	Unstandardized Coefficients		Standardized Coefficients	t	p-value	95.0% Confidence Interval for B	
	B	Std. Error				Lower Bound	Upper Bound
	(Constant)	14.218	7.782				1.827
Administrative support	0.650	0.885	0.327	0.734	0.464	-1.107	2.408
School resources	-0.246	0.478	-0.225	-0.514	0.608	-1.194	0.703
Admin*Resources	0.032	0.052	0.462	0.615	0.540	-0.071	0.136

Where; Admin*Resources - Administrative Support* School resources

Table 4.43 indicates that administrative support is an insignificant positive moderator in the relationship between school resources and implementation of inclusive education. This can be observed because the interaction variable administrative support* school resources have a p-value of 0.54 that is more than 5 percent significance level.

4.11.4 Moderation of Administrative Support on the Relationship between School Strategies and Implementation of Inclusive Education

TABLE 4.44: Model Summary for Moderation of Administrative Support on the Relationship between School Strategies and Inclusive Education

R	R Square	Adjusted R Square	Std. Error of the Estimate
0.624 ^a	0.390	0.371	2.92963

- a. Predictors: (Constant), Administrative support*School strategies, School strategies
 b. Dependent Variable: Inclusive education

Table 4.44 shows high positive correlation between school strategies and implementation of inclusive education with a correlation of 62.4 percent. The coefficient of determination (R Square) shows that 39 percent variations in implementation of inclusive education is due to variations in the Administrative support* School strategies and School strategies.

TABLE 4.45: ANOVA Table for Moderation of Administrative Support on the Relationship between School Strategies and Inclusive Education

Model	Sum of Squares	df	Mean Square	F	p-value
Regression	526.496	3	175.499	20.448	0.000 ^b
Residual	823.944	96	8.583		
Total	1350.440	99			

a. Dependent Variable: Inclusive education

b. Predictors: (Constant), Administrative support*School strategies, School strategies

Table 4.45 also shows that the p-value was 0.000, less than 0.05; hence, concluding that there was a significant linear relationship between the predictors (Administrative Support* School strategies and School strategies) and the criterion variable (Inclusive education).

TABLE 4.46: Regression Coefficients for Moderation of Administrative Support on the Relationship between School Strategies and Inclusive Education

Model	Unstandardized Coefficients		Standardized Coefficients	t	p-value	95.0% Confidence Interval for B	
	B	Std. Error				Lower Bound	Upper Bound
			Beta				
(Constant)	6.547	6.583		0.995	0.322	-6.520	19.614
School strategies	0.361	0.926	0.160	0.390	0.698	-1.477	2.199
Administrative support	1.856	0.779	0.933	2.385	0.019	0.311	3.402
Admin_x_Strategies	-0.073	0.105	-0.468	-0.695	0.489	-0.281	0.135

Where; Administrative support _x_ strategies - Administrative support* School strategies

The result in Table 4.46 indicates that administrative support is an insignificant moderator in the relationship between school strategies and implementation of inclusive education. This can be observed because the interaction variable administrative support* school strategies has a p-value of 0.489 that is more than 5 percent significance level.

CHAPTER FIVE

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

5.1 Introduction

This chapter begins with a summary of the major findings in relation to practices of policy and the implementation of inclusive education in public secondary schools in Tharaka-Nithi County, Kenya. The next section covers the conclusions, which are drawn from the study findings. Finally, the study made recommendations from the conclusions which can lead to interventions needed to modify and restructure the schools to enable more access and participation of learners living with disabilities. Recommendations for further research have also been made. The study sought to achieve the following research objectives, which formed the basis of this study:

- 1) To determine the effects of school guiding principles on the implementation of inclusive education policy in public secondary schools.
- 2) To determine the extent to which stakeholder's involvement influences the implementation of inclusive education.
- 3) To determine the effects of school resources on the implementation of inclusive education.
- 4) To determine the influence of school strategies in overcoming physical barriers that hinder the implementation of inclusive education.

5.2.1 School Guiding Principles and Inclusive Education Implementation

The schools had guiding principles namely; core values, mission statements, admission policies and practices, orientation programs, pro-social behaviour programs and co-curricular programs. The majority (52%) of respondents acknowledged that they were not sure whether school guiding principles were addressing the concerns of learners with physical disabilities. This implies that the guiding principles were not concretely and tangibly informing school decisions and action plans related to learners with disabilities. It also implied that the principles did not give a clear picture on matters related to implementation of inclusive education. In contrast, Abawi and Oliver (2013) argue that for the school to be truly inclusive; it should have clear guiding principles that guide educators to remove barriers that hinder learning opportunities.

5.2.2 Stakeholders Involvement and Inclusive Education Implementation

The rate of stakeholders' involvement by the schools in strategizing and planning for learners with physical disabilities was poorly done in most of the study schools. Due to poor stakeholders' involvement, learners with disabilities were poorly supported and their issues were not prioritized. This was evident from the teachers' suggestions that stakeholders' involvement should be increased to strategize more for learners with special education needs. Doyle Giangrec (2013) emphasize that successful implementation of inclusive educational programs requires the involvement and the support from key stakeholders. Lack of support to a great extent is contributed by negative attitudes towards inclusion as a result of poor consultations between parents and teachers. For the purpose of enhancing such consultations, Van Hover et al. (2012) suggest that factors that engage teachers and parents in a collaborative partnership should be clearly defined for inclusive education implementation.

5.2.3 The School Resources and Inclusive Education Implementation

The study categorized the schools' resources into human resource, physical and financial resources.

5.2.3.1 Human Resources and Inclusive Education Implementation

Majority of the teachers lacked training on special education needs and the skills to handle issues related to learners with special education needs. The government has not been employing special education teachers and so issues related to learners with disabilities were left to be handled by teachers in charge of guidance and counselling. Due to lack of skills, teachers were not only hesitant to implement modified approaches of inclusion, but they also did not know how to deal with such cases. Consistent with the findings, Hardin and Hardin (2013) affirm that teachers play a fundamental role in supporting learners with diverse needs through modified teaching approaches. It is significant for teachers to be equipped with skills to cater for learner diversity.

5.2.3.2 The Physical Resources and Inclusive Education Implementation

Several study schools' resource rooms and other facilities lacked modified facilities for learners with disabilities. In addition, several study schools lacked modified toilets and staircases for learners with physical disabilities. Such unfriendly surroundings made students with disabilities to learn with a lot of difficulty. In contrast, Moraa (2013) affirms that the quality and adequacy of resources such as modified physical facilities, equipment, teaching and learning materials have a direct bearing on the quality of education because they determine the effectiveness of learning value in the school. In view of the aforementioned, UNICEF (2008) suggested that the school latrines should be redesigned to ensure improved accessibility for learners with disabilities. The implication is that schools should ensure that the latrines are more user-friendly and spacious for all the learners.

5.2.3.3 Financial Resources and Inclusive Education Implementation

The study findings revealed that the schools were not getting finances specifically for restructuring their physical environment either from the governments or from the donor agencies. Equally, the schools were not setting aside any funds for the implementation of inclusive education. This implies that insufficient funding seemed to be a major challenge towards the implementation of inclusive education programmes. In sharp contrast, Peters (2004) argues that schools ought to set aside and allocate financial resources to meet the needs of learners with special education needs. To address the marginalization of learners with disabilities and its limiting outcomes, the Kenyan government committed itself to inclusive education and to facilitate schools to set up a flexible budget that will cater for the implementation of inclusive education (Republic of Kenya, 2009; 2012; 2018).

5.2.4 School Strategies and Overcoming Physical Barriers

The majority of study schools lacked inclusive education strategies such as regular inspection of physical resources, updating school compounds, establishing accessible physical environment and re-adjusting key access features to enhance safety for learners with physical disabilities. Devoid of physical resource inspection, implies that no tangible action plans were in place in relation to resource modification in schools. Smith and

Tyler (2010) suggest that students with disabilities require intensive and sustainable support systems to ensure their effective learning. Moreover, modified physical resources are needed for the success of students with disabilities in an inclusive learning environment (Friend, 2008; Kirk et al., 2009). The Kenyan Constitution: Section 54(1) (c) mandates that individuals with disabilities are entitled to access any facilities that are integrated within the society to get the services needed.

5.3.0 Challenges Affecting Practices of Policy

The study established several challenges affecting practices of policy towards the implementation of inclusive education in the study schools.

5.3.1 Challenges Facing School Guiding Principles

Poor monitoring and evaluation of practices of policy was identified as a key challenge to inclusion. Further, unclear mission and admission policies and practices were also identified as challenges hindering the implementation of inclusive education. In order to address the above-mentioned, the study established that, improving teachers' skills on special education and regular monitoring on inclusive practices were key solutions to minimizing challenges to school guiding principles. Moreover, Munk and Dempsey (2010) assert that effective inclusive guiding principles maximize access to and success in general education and school culture.

5.3.2 Challenges Affecting Stakeholders Involvement

Inadequate support for resource modification by key stakeholders and lack of knowledge on inclusive education policy were identified as major challenges towards the implementation of inclusive education. The implication is that inclusive education programs in schools may not be successful due to the failure to involve stakeholders. Doyle and Giangreco (2013) opine that building a team spirit where all members of the school are involved and working together for all learners to prosper is very crucial. Consistence with this, Leyser and Kirk (2011) reveal that a high correlation between stakeholder involvement brings about the effectiveness of educational programs.

5.3.3 Challenges Affecting School Resources

Lack of modified facilities and unsafe learning environment were identified as major resource challenges facing implementation of inclusive education. Further, the study schools had few physical resources, un-safe learning environment, lacked training on special education needs among teachers and inadequate financial resources. This implies that the implementation of inclusive education in secondary schools is marred by a serious shortage of resources making a challenge. UNESCO (2003) affirms that the approaches, channels and criteria for provision of resources embraced by schools and national authorities can either facilitate or inhibit the process of inclusion. Nonetheless, even a little amount of money can make learners with disabilities feel supported.

5.3.4 Challenges Affecting School Strategies

The majority of secondary schools lacked regular inspection and had unmodified physical resources both of which were key challenges hindering learners with disabilities from accessing key areas in the school. Both internal and external regular inspections on physical resources are crucial for school restructuring. Modifying physical resources was identified as key solution to enable learners with disabilities to access resource rooms. In affirmation, Schuelka, (2018) points out that implementation of inclusive education policy requires identification, reduction or elimination of obstacles within and around the school that may hinder learning.

5.4 Conclusions

The research investigated the practices of policy and the implementation of inclusive education in public secondary schools. The study focused on the effects of school guiding principles, stakeholders' involvement, school resources and strategies that overcome physical barriers that hinder the implementation of inclusive education. Based on the findings, the study made the following conclusions:

5.4.1 School Guiding Principles and Implementation of Inclusive Education

The study established that the school guiding principles were not effective in guiding the school decisions regarding issues related to learners with disabilities. The guiding

principles were unclear and not connected with the decisions made in the schools which affected learners living with physical disabilities. Mission statements and core values written on the school logos, bill boards and in the strategic plans had less impact on the school's daily activities and action plans. School admission policies and practices were selectively discriminating a few learners with disabilities. Co-curricular programs were also discriminative and did not address the physical-activity needs of the learners with disabilities. Therefore, the study concludes that the school guiding principles had little or no impact on the implementation of inclusive education.

5.4.2 Stakeholder Involvement and Implementation of Inclusive Education

The rate of involving stakeholders in planning and strategizing for learners with physical disabilities was lacking in schools. On the same note, the schools failed to create partnerships with disability service providers; hence, learners with disabilities did not benefit much from these services. Therefore, the study concludes that failure to adequately involve key stakeholders on matters related to learners living with disabilities adversely affected the implementation of inclusive education.

5.4.3 School Resources and the Implementation of Inclusive Education

Provision of school resources is crucial to the implementation of inclusive education programs. The human, physical and financial resources are significantly needed for school modification and restructuring.

5.4.3.1 Human Resources and Inclusive Education Implementation

The study established that teachers lacked the skills needed so as to support the learners with special education needs. On the other hand, the government has not been employing teachers with special education needs in secondary schools. Likewise, schools did not organize refresher courses to empower teachers on basic principles of handling learners with special education needs. Therefore, the study concludes that the implementation of inclusive education in schools, lacked a strong back up from the teachers to provide effective mentorship to learners living with physical disabilities

5.4.3.2 Physical Resources and Inclusive Education Implementation

For the successful inclusion of learners with disabilities, there is need to create a barrier free learning environment. The study established that schools lacked modified equipment and facilities in key resource rooms. The unmodified physical resources were quite disabling to the learners with disabilities. Thus, the learners were unable to interact with the physical environment and this curtailed their learning process. Therefore, study concludes that schools were not financially and physically prepared for inclusive education. To a greater extent, lack of an enabling environment had a negative effect on the implementation of inclusive education.

5.4.3.3 Financial Resources and Inclusive Education Implementation

The study established that the provision of finances for inclusive education by key groups was significantly lacking. The government, funding agencies and the schools were not setting aside funds to restructure the physical environment for learners with disabilities. Therefore, the study concludes that lack of finances adversely affected the schools to effectively meet the demands of inclusive education policy implementation.

5.4.4 School Strategies and the Implementation of Inclusive Education

The study established that there was a lack of regular inspection of physical resources to enhance safety for learners with disabilities in most schools. In the absence of regular inspection, most schools were unable to up-date their compounds, readjust key access features and establish accessible physical environment to enhance safety for learners with disabilities. Therefore, the study concludes that the school strategies were not anchored on efforts to overcome physical barriers that hindered the implementation of inclusive education. For this reason, learners with disabilities have to adjust to get the needed education or drop out of school.

5.4.5 Challenges Affecting Practices of Policy

Various challenges affecting practices of policy towards the implementation of inclusive education were prominent. The findings suggest a probable connection between the challenges and the weak practices of policy towards the implementation of inclusive

education in schools. Thus, the study concluded that lack of effective practices of inclusive education policy was a major obstacle to the implementation of inclusive education.

The study also established that the existing policy framework is weak. The conclusion drawn is that a weak policy framework weakens the development of effective practices of policy that positively influence the implementation of inclusive education. Furthermore, the weak policy atmosphere contributes to ineffective school guiding principles, insufficient funding, poor stakeholder support and ineffective school strategies to overcome physical barriers that hinder the implementation of inclusive education.

5.5 Recommendations

Well-coordinated action plans are needed to reform the school inclusive education programs in order to facilitate effective inclusive learning. When implemented, the plans should stimulate the necessary policy reforms, system arrangement and funding approaches that will ensure effective implementation and sustainable inclusive education. The Ministry of Education should design a clear policy framework with clear mandates for training and learning institutions. This would facilitate effective, consistent and coherent teacher training programmes on inclusive education implementation. The training will strengthen the effective inclusive education programs in secondary schools that will ensure quality and access to expand resources in the areas of research, training, and funding.

- 1) The County Education Office should develop a well-coordinated master plan for consistent school reforms founded on a clear inclusive education philosophy, policies, structures and practices. A committee to be formed should be mandated to foresee the implementation of inclusive education in schools.
- 2) The top school managements in collaboration with key stakeholders should work to identify and eliminate policy, structural, and systemic barriers. At the same time, it should uphold practices that support inclusive education. The school boards should boost

internal liability and support the value for diversity within the school system in order to establish inclusive reforms.

- 3) The County Quality Assurance and Standards Departments should effectively inspect, monitor and evaluate school resources to identify resource gaps for the purpose of inclusive education implementation. This will guarantee resource allocation, modification and restructurings that promotes a learner friendly environment to enable all learners to access and participate in learning processes.
- 4) For the acceleration of inclusive education implementation, the County Education Board should come up with implementation guidelines and mandate the schools to utilize the strategies in planning and implementing school achievement procedures and with clear timelines.

5.6 Recommendations for Further Research

- 1) A similar study should be conducted within and across other counties in Kenya to provide comparative research-based information on the practices of policy towards the inclusive education implementation.
- 2) A study should be conducted to evaluate the effectiveness of the managerial systems of public secondary schools on inclusive education implementation and sustainability.
- 3) A study should be conducted to evaluate the practices of policy and the implementation of inclusive education across different levels of the education system in Kenya

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TEACHERS QUESTIONNAIRES

Dear Sir/Madam,

You have been identified as one of the respondents in this study. Kindly provide the information that is being requested. Any information given will be used for this study only and will be treated with utmost confidentiality.

APPENDIX I

Section A. Demographic information

1. Gender
Male Female
2. What is the range of your age group? (Please tick relevant box)
20-29 30-39 40-49 50+
3. What is your current position? (Please tick the relevant box)
Principal
Deputy Principal
HOD
Class Teacher
4. Since your initial qualifications as a teacher, have you had any other training in special education?
Yes No

If yes, can you tick what additional training/qualifications you have received
Short courses
In-service training
Diploma
Degree
Masters
Other (please specify)
5. How many physically challenged learners are currently learning in your school
1-2 3-5
5-10 10+
6. How many physically challenged students previously were admitted in your school
1-5 5-10
10+ None

Sections: B-F

Using the scales given, indicate the level of adequacy for the following school practices on the implementation of inclusive education policy for learners with Special Education

Needs (SEN) including the physically challenged students in your school. Tick where appropriate using the scale given below

Section B: Use a (√) to indicate the effects of school guiding principles on learners with special education needs and disabilities

- 7. The school core values addressing the learning needs of learners with disabilities
 - Adequately Effective ()
 - Not Sure ()
 - Not inclusive at all ()

- 8. School mission regarding inclusive education of learners with disabilities
 - Adequately Effective ()
 - Not Sure ()
 - Not inclusive at all ()

- 9. School's admission policies and practices regarding admission of learners with disabilities
 - Adequately Effective ()
 - Not Sure ()
 - Not inclusive at all ()

- 10. The school's orientation programmes in guiding the learners with special education needs
 - Adequately Effective ()
 - Not Sure ()
 - Not inclusive at all ()

- 11. Pro-social behaviour programmes for imparting values to abled learners, to support the less fortunate students
 - Adequately Effective ()
 - Not Sure ()
 - Not inclusive at all ()

- 12. Inclusion of physically challenged students in co-curricular activities
 - Adequately Effective ()
 - Not Sure ()
 - Not inclusive at all ()

13. Identify the school guiding principles challenges that affect the implementation of inclusive education policy

- i.
- ii.
- iii.

14. Suggest ways of overcoming guiding principles challenges affecting inclusion

- i.
- ii.
- iii.

Section C: Use a (√) to indicate the adequacy of stakeholder involvement on the implementation of inclusive education in your school

15. Stakeholders’ involvement in planning and strategizing for learners with physical challenges
- Adequately done ()
 - Not Sure ()
 - Not done at all ()

16. The schools provide orientation courses to key stakeholders on academic and material necessities for students with disabilities
- Adequately done ()
 - Not Sure ()
 - Not done at all ()

17. The schools involves disability associations to provide services for learners with disabilities
- Adequately done ()
 - Not Sure ()
 - Not done at all ()

18. Consultations among PTA members about learners with special education needs
- Adequately done ()
 - Not Sure ()
 - Not done at all ()

19. Provision of feedback to parents about their children’s academic and non-academic aspects
- Adequately done ()
 - Not Sure ()
 - Not done at all ()

20. Identify stakeholders’ involvement challenges affecting the implementation of inclusive education in your school

- i.
- ii.
- iii.

21. Suggest ways the school is using in overcoming stakeholder involvement challenges towards the implementation of inclusive education

- i.
- ii.
- iii.

Section D: Use a (√) to indicate the adequacy of school resources (human, physical and financial) in the implementation of inclusive education

a) Human Resources

22. Employment of a specialized teacher in every school to cater for special education needs

- Adequately done ()
- Not Sure ()
- Not done at all ()

23. Provision of refresher courses to the teaching staff on the basic principles on inclusive education by the Government

- Adequately done ()
- Not Sure ()
- Not done at all ()

b) Physical Resources

24. Provision of mobility devices for students with physical disabilities

- Adequately done ()
- Not Sure ()
- Not done at all ()

25. Equipping of resource rooms (laboratories, classrooms and libraries) with modified furniture essential for learners with disabilities

- Adequately done ()
- Not Sure ()
- Not done at all ()

26. Modification of toilets (latrines) for students with physical disabilities in the school

- Adequately done ()
- Not Sure ()
- Not done at all ()

27. Modification of staircases into ramps in the school buildings to ease safety of the students with physical disabilities

- Adequately done ()
- Not Sure ()
- Not done at all ()

c) Financial Resources

28. Provision of finances by **parents** for mobility devices for the physically challenged learners in the school

- Adequately done ()
- Not Sure ()
- Not done at all ()

29. Allocation of finances by the **Government** to restructure the physical environment for the physically challenged learners in the school

- Adequately done ()
- Not Sure ()
- Not done at all ()

30. Provision of donations by **Funding Agencies/NGOs** to restructure the physical environment for the physically challenged learners in the school

- Adequately done ()
- Not Sure ()
- Not done at all ()

31. Setting aside some funds by the **school** to restructure the physical environment for physically challenged structures

- Adequately done ()
- Not Sure ()
- Not done at all ()

32. Identify resource challenges affecting the implementation of inclusive education

- i.
- ii.
- iii.

33. Suggest ways of overcoming resource challenges that affect inclusion

- i.
- ii.
- iii.

Section E: Use a (√) to indicate the adequacy of selected school strategies in overcoming physical barriers that hinder the implementation of inclusive education

34. Regular inspection of physical resources to enhance safety of learners with disabilities

- Adequately done ()
- Not Sure ()
- Not done at all ()

35. Updating school compound/landscaping for the accommodation of learners with disabilities

Adequately done ()

Not Sure ()

Not done at all ()

36. Establishing accessible physical environment including buildings and play grounds to accommodate learners with disabilities

Adequately done ()

Not Sure ()

Not done at all ()

37. Re-adjusting the key access features such as rooms with their furniture to make learning space accessible for physically challenged learners

Adequately done ()

Not Sure ()

Not done at all ()

38. Identify challenges affecting school strategies in overcoming physical barriers that hinder implementation of inclusive education

- i.
- ii.
- iii.

39. Suggest ways of overcoming challenges affecting school strategies to eliminate barriers that hinder the implementation of inclusive education

- i.
- ii.
- iii.

Section F: Use a (√) to indicate the adequacy of school administrative support in enabling the implementation of inclusive education

40. Promotion of core values that meet the diverse needs of every student,

Adequately done ()

Not sure ()

Not done at all ()

41. Facilitation of a collective commitment by various stakeholders to implement inclusive education

- Adequately done ()
- Not sure ()
- Not done at all ()

42. Influencing the modification and restructuring of physical environment for students with disabilities

- Adequately done ()
- Not sure ()
- Not done at all ()

43. Facilitating the provision of mobility services and devices to ease movement for learners with physical disabilities

- Adequately done ()
- Not sure ()
- Not done at all ()

44. Regular inspection of physical resources to meet the diverse needs of all learners

- Adequately done ()
- Not sure ()
- Not done at all ()

Section G: Use a (√) to indicate the adequacy of inclusive education for learners with special education needs

45. Learners with disabilities are able to overcome emotional and psychological trauma

- Strongly agree ()
- Agree ()
- Not sure ()
- Disagree ()
- Strongly disagree ()

46. Learners with special education needs realize their full potentiality

- Strongly agree ()
- Agree ()
- Not sure ()
- Disagree ()
- Strongly disagree ()

47. Students with physical disabilities participate more in school activities

- Strongly agree ()
- Agree ()
- Not sure ()
- Disagree ()
- Strongly disagree ()

48. Students with special education needs complete their schooling as stipulated

- Strongly agree ()
- Agree ()

Not sure ()
Disagree ()
Strongly disagree ()

49. Learners with disabilities feel a sense of belonging for personal growth and development

Strongly agree ()
Agree ()
Not sure ()
Disagree ()
Strongly disagree ()

50. Performance gap between the non-disabled students and learners with disabilities has been minimized

Strongly agree ()
Agree ()
Not sure ()
Disagree ()
Strongly disagree ()

51. More student with special education needs have been enrolled in the secondary schools

Strongly agree ()
Agree ()
Not sure ()
Disagree ()
Strongly disagree ()

APPENDIX II

FOCUS GROUP DISCUSSIONS GUIDE FOR NON-DISABLED STUDENTS

Areas of Discussion

1. As a student body, how do you promote equal opportunity for each other although you are different?
2. What help do you give to learners with physical disabilities? Suggestions to make it better?
3. How do you assist them to fight for their rights in school?
4. How do you work together with learners with special education needs to uplift their academic progress?

CONSENT FORM FOR PARTICIPANTS

CONSENT FORM

I, the undersigned..... Hereby accept to participate in the research project by which the contract of confidentiality is binding. I also declare that in case of any inconvenience or commitment that necessitates my withdrawal, I notify the researcher.

Signature:..... Date.....

APPENDIX III

Interview guides for learners with physically challenged students

1. Are you comfortable with the type of mobility device you are using? What problems have you experienced using it? Probe
2. What barriers have you encountered since you came to this school? Share your personal experience
3. Are you happy with the school? How has the school helped you fit in the system? What are the physical challenges or obstacles have you experienced since you joined the school? Any personal experience?
4. Do you participate in co-curricular activities?