INFLUENCE OF TEACHER IMPROVISED INSTRUCTIONAL RESOURCES ON LEARNERS, ACQUISITION OF PRE-READING SKILLS IN PUBLIC PRESCHOOLS IN HAMISI SUB-COUNTY, KENYA

LYANI HELLEN

RESEARCH PROJECT SUBMITTED IN PARTIAL FULFILLMENT FOR THE REQUIREMENTS FOR THE AWARD OF MASTER DEGREE IN EDUCATION IN EARLY CHILDHOOD DEVELOPMENT AND EDUCATION

OF

MOUNT KENYA UNIVERSITY

NOVEMBER 2024

DECLARATION

DECLARATION AND APPROVAL

Declaration

This thesis/project is my original work and has never been presented for any academic award in any institution.

Name: Lyani Hellen

Reg. No. MECS/2016/60993

Signature…… Date…4/11/2024……

Approval

This thesis/project is being submitted for examination with our approval as University supervisors

Name: Dr. Ayaga Godfrey

Institutional Affiliation: Mount Kenya University

Signature _____ Date…4/11/2024……

DEDICATION

This research proposal will be dedicated to my mother Fenike Asige and entire Aswani's family who had a direct impact on this body of work .

ACKNOWLEDGEMENT

My gratitude is due to the guidance, instruction, Patience and support I received from all relevant institutions special thanks is extended to my supervisor Dr. Ayaga Godfrey for his tireless guidance and advise in development and completion of this work through encouragement, insight, counsel, time, effort and constructive ideas. I further extend my sincere thanks to the county director of education Vihiga county for granting me permission to move round schools under his jurisdiction to collect data ,the County commissioner who also assured me of my own security and that in schools I collected data in and more importantly the respondents who responded accordingly. Not forgetting all scholars,researchers and authors whose materials I have used in the development of the document . .Most importantly thank the almighty God for granting me abundant grace,good health and understanding as I undertook the endeavour. May the good Lord bless all of us abundantly.

ABSTRACT

Language is a mother of all other learning activities, teachers need to provide adequate materials from the local environment for preschool learners as they learn best by doing activities and manipulating materials. Learning has been ineffective in most preschools with children having difficulties in mastering pre-reading skills despite studies on instructional resources. This calls for preschool teachers to improvise instructional resources on learners acquisition of pre-reading skills. The purpose of the study was to establish the influence of improvised instructional resources on learners acquisition of pre-reading skills in public preschools in Hamisi sub-county Vihiga county. The study was guided by the following objectives, (i) to establish the influence of improvised Visual instructional resources on learners of pre-reading skills, (ii) to investigate the influence of improvised Audio instructional resources on learners acquisition of pre-reading skills, (iii) to assess the influence of improvised Audio visual instructional resources on learners acquisition of pre-reading skills and (iv) to examine the influence of improvised kinesthetic instructional resources on learners acquisition of pre-reading skills in public preschools in Hamisi sub-county. The target population for the study was all the 625 preschool learners and 310 teachers in 155 public preschools in Hamisi sub-county. The researcher used a sample of 16 schools randomly sampled.The researcher used Questionnaires and,Observation checklist to collect data. The research instruments were validated using experts while their reliability was determined by the test-retest method. Data was analyzed by use of Pearson's correlation. It was established that a significant strong positive relationship existed on the use of improvised visual instructional resources by the sampled preschool teachers and their learners acquisition of pre-reading skills with a mean of 71.98, a significant strong positive relationship existed on the use of improvised audio instructional resources by the sampled preschool teachers and their learners acquisition of pre-reading skills with a mean of 72.07, a significant weak positive relationship existed on the use of improvised audio-visual instructional resources by the sampled preschool teachers and their learners acquisition of pre-reading skills with a mean of 61.52 and a significant moderate positive relationship exists between the use of improvised kinesthetic instructional resources by the sampled preschool teachers and their learners acquisition of pre-reading skills with a mean of 61.74 .Pre reading skills had a moderate mean of 30.86 and standard deviation of 9.471 which implied that the learners score were not spread out as the instructional resource use scores. It is recommended that the ministry of education should develop programs to train all preschool directors of education in all 47 counties who will in turn train preschool program officers incharge of sub counties in their counties then cascade the training to preschool teachers in their at least once per term on how to improvise there after be allowed to demonstrate the skills taught and acquired with adequate monitoring on their effective to teach preschool learners in acquisition of pre-reading skills.Educational policymakers should come on ground to gather information from preschool teachers that would enable them have workable strategies and plans.

TABLE OF CONTENTS

LIST OF TABLES

LIST OF FIGURES

ABBREVIATONS/ ACRONYMS

APHRC	Africa Population and Health Research Centre
ECDE	Early Childhood Development and Education
ERC	Ethics Review Committee
IJERE	International Journal of Evaluation and Research in Education
IRU	Instructional Resource Use
KHA	Kenya Headmistress Association
KICD	Kenya Institute of Curriculum Development
KNBS	Kenya National Bureau of Statistics
MOEST	Ministry of Education Science and Technology
NACOSTI	National Commission for Science Technology and Innovation
NETC	National Education Technology Centre
PPMCC	Pearson's Product Moment Correlation Coefficient
PRS	Prereading skills
RTI	Research Triangle Institute
SCED	Sub county Education Director
SPSS	Statistical Package for Social Sciences
UNESCO	United Nation's Educational, Scientific and Cultural Organization
USA	United states of America
WASCE	West Africa School Certificate Examination

CHAPTER ONE

INTRODUCTION TO THE STUDY

1.0 Introduction

This chapter will discuss background of the study, statement of the problem, purpose of the study, research objectives, research questions, significance of the study, scope of the study, limitations of the study, delimitation of the study, assumptions of the study, theoretical framework, conceptual framework, operational definition of key terms.

1.1 Background of the study

Experts from various education institutions came up with Early Reading Literacy that looked at the use of sounds, letters forming words, sentence and reading most often countries have difficulty in delivering adequate learning material for the education outlet(.Teale etal 2009) . As a result there is poor realization of educational goal and objectives go largely unmet. There are different factors behind this. These include low budget allocation for production and distribution of instructional resources, poor monitoring mechanism and weak political commitment thus becomes a compounded problem.

Most kinder gardens in USA encourage children to learn by doing through manipulating learning materials and interactions with their practices that builds their self-confidence, self-esteem and development of skills(Ezeasor M.E.N etal 2012).

Bassey (2012) who conducted his study in USA asserts that improvised instructional materials improve quality of teaching learning and encourage classroom participation on the same breath. Additionally instructions for pre -primary schools in USA observe the guideline by National

association for education of young children (NAEYC) on activities which are suitable for growth of preschoolers programs for early education to ensure that children has sufficient and appropriate resources from their environment to make learning simpler.

Young children learn well by interacting with the real material in their learning environment. UNESCO (2010) it is also clear that early exposure and use of appropriate educational materials encourage the general development of children in various areas .moreover the young children learn well by interacting with real materials in their learning environment.

Chinese preschool education has seen many changes during last 60 years as societal upheaval and transformations have influenced pedagogy. For several decades preschools were prohibited from instructing their children in literacy skills and as a result preschool teachers have had little pedagogical training in the area of literacy, however in the recent past preschools environment, as well as all China have developed enormously and in 2001 the Chinese Government approved teaching of early literacy skills. Children begin accumulating literacy skills very early in life and a preschool foundation in language and literacy development is essential for helping China early literacy activities were taught passively through imitation, recognition, reading or copying formally the Chinese characters and sentences appearing in their environment thus children had few opportunities to be exposed to print outside the literacy class they could do nothing but copy or recite what the teacher asked them .This is because preschool teachers had little training in literacy and not exposed to early literacy concepts.(China MOE 2006)

A researcher in India points out that instructional resources are very significant teaching learning tools therefore there is need for teachers to explore a wide variety of instructional resources to find the most suitable aids broaden acquisition of concepts and arouse interest of learners .This therefore calls on the need to emphasize teacher's innovativeness in the development of instructional resources in ECDE. During his research he discovered that teachers lack innovativeness about improvisation of instructional resources for use in teaching

and learning (Kochar 2002). Borick et al (2003) also observed that while some educators are fascinated by the potential instructional materials in enhancing teaching learning other teachers lagged behind in using instructional resources in teaching.

Weber (2004) call pre-reading skills enabling activities because they provide a reader with necessary background to organize activity and to comprehend the materials .These experiences involve understanding the purpose (s) for reading and building a knowledge base necessary for dealing with the content and the structure of the materials. They say that pre-reading skills elicit prior knowledge, build background and focus attention.

In Nigeria improvised instructional resources back in 1985 the Federal ministry of education organized an exhibition of improvised instructional resources by classroom teacher all over the Federal in four centers Lagos, Kaduna, Ibadan and Enugu during these exhibition participants displayed various types of instructional resources which they improvised to help learners concretive instruction in different subject areas. For people who participated in this exhibition they thought that follow up to this exhibition could have been comp odium of all improvised instructional resources with a view to encourage mass production. Unfortunately this follow up was not encouraged, despite the Federal ministry of Education in keeping with its realization of importance of instructional materials established at NETC in Kaduna. Also then state ministries of education have also established units responsible for instructional materials many colleges, polytechnics and universities have setup departments of Education Technology of training mechanics in the production of different soft and hard ware materials. But despite this increased awareness on the part of educationists ,an awareness that led to these establishments he discovered that Nigerian teacher still rely on traditional talk - chalk method of teaching which does not encourage acquisition of required skill in learners .

Ahmed (2011) says that improvised instructional resources are those teaching resources produced using locally available resources with the help of experts they are designed and used

in the absence of original or ideal objects to bring about same effect that the standard materials would have brought .The materials demand adventure, creativity, curiosity and perseverance on part of the teacher .They support learner learning and increase learner success and progress .Ideally ,the instructional resources will be tailored to the content in which they are being used and the teacher .Instructional resources come in many shapes and sizes but they all have in common the ability to support learner learning.(Amadioha 2018)

Akanbi (2011) did a survey in south Africa showing the use of improvised instructional material provide stimulating environment for instruction and increase learners' interest in learning .In addition Akanbi purported that materials also make learners become active, attentive and improves their transition smoothly from home to school ,as they help them connect what they learn in class with their daily experiences thus promoting children's learning achievements.

Larry (2010) affirms that the use of improvised instructional resources stimulate learners senses which facilitates smooth acquisition of knowledge and skills .Larry further emphasizes that improvised learning materials engage learners in the learning process enhance their interaction and enables them to grasp new concepts as well as the specific learning outcomes with regard to curriculum.

In Kenya EDCE policies stress the use of plenty relevant instructional resources to develop the totality of the child as the main aim of education at this level is to provide quality education to all children going to school regardless of background .Children ought to access education which is culturally relevant for easy transmission of values, attitudes, knowledge and skills.(MOE 2006)

KICD (2011) explains that improvised learning materials make learners to retain learnt content for long. To achieve this teachers ought to use improvised learning resources with local content which is relevant to learners local environment .This will enable children to access quality, relevant and affordable education. UWEZO (2016) study assessed learning outcomes of

learners in literacy and numeracy country wide. The study revealed that there is little learning that is taking place in early grade in most schools and counties including Vihiga county. The study established that many pupils proceed to lower primary without acquiring the basic pre-primary skills. In addition most pre-primary schools in Kenya lacked adequate instructional resources.

Waigera (2010) states that improvisation requires the collection, development training and learning resources to meet the early years' program's demand, priorities and strategies.

Tayari (a swahili word meaning 'ready') is an early childhood development and education program that is being piloted by research Triangle institute (RTI) in partnership with ministry of Education science and technology (MOEST) in four counties in Kenya (Laikipia Nairobi, Siaya and Uasin Gishu) The pilot program runs between 2016 and 2018 with plans to scale up to other countries if found to be impactful. The African population and Health Research Centre (APHRC) is conducting an independent evaluation to measure the impact and cost effectiveness of the Tayari program. Moreover about 10% of the classroom time was spent on activities where the teacher was not focused on learners. This was the case regardless of the type of pre-school. Teachers may however be challenged in varying classroom activities due to lack of adequate play and instructional resources to vary teaching styles.

A lot of research has been done on learning resources but there is a gap on the influence of teacher improvised instructional resources on learner's acquisition of pre-reading skills in public preschools.

1.2 Statement of the problem

Instructional resources are vital in helping learners acquire concepts and skills among pre-school children since it encourages learning by doing.

Brittant et al (2014) notes that early pre-reading abilities (oral language, listening, comprehension, phonological awareness, print skills and alphabetical knowledge) provide foundation for learning to read and thus future academic success.

A rich environment with relevant learning materials offers rich experiences and knowledge which will help the child act on the worlds change it to fit with his/her own experience and understanding. This calls for preschool teachers to embrace improvisation of instructional resources on learner's acquisition of pre-reading skills (print motivation, print awareness, phonological awareness, vocabulary, narrative skills and letter knowledge). The study is motivated by the fact that learners do not retain for long or understand what they are taught without instructional resources .such learning does not encourage participation ,lack of interest or stimulation.(Joshua 2011)

Pre-reading skills have demonstrated the facilitative effects of activating readers prior knowledge as relevant to understanding of new text. Pre-reading skills do not only prepare readers for the concepts that follow but also make the reading task easier and connecting the new concepts more meaningful to prior knowledge with the help of using relevant instructional resources. Pre-reading skills open an avenue for preschoolers do develop reading skills through the help of instructional resources. (Langer 2010, Johnson 2011)In Hamisi sub county preschool teachers lack exposure on improvisation, lack of functional workshops, poor motivation, time constraints lack of regular supervision and lack of skill in improvising instructional resources in teaching learning of pre-reading skills borrow from other preschool teachers who have tried to improvise a few for their own use or buy from business persons who need money for their own survival without putting into consideration the necessary factors required in constructing suitable instructional resources that can guide in acquiring pre-reading skills.

The data below was accessed by the researcher fro some Preschoolscentres in Hamisi sub county ,Vihiga county

Table 1: Achievement Grid Part A

Preschools where teachers use improvised instructional resources to facilitate acquisition of prereading skills to learners in public preschools in Hamisi sub county ,Vihiga county

Preschools	Prereading skills score
E	92.2
M	91.7
T	89.5
Y	86.7

Table 2 : Achievement Grid Part B

Preschools where teachers do not use improvised instructional resources to facilitate acquisition of prereading skills to learners in public preschools in Hamisi subcounty ,Vihiga county

Preschools	Pre-reading skills score
S	74.1
J	63.11
F	56.4
R	49.1

Pre-reading skills are still low in Hamisi sub-county since some preschool teachers do and others do not improvised a variety of instructional resources to use while teaching learners pre-reading skills. This calls a research in influence of teacher improvised instructional resources on learners, acquisition of pre-reading skills in public preschools in Hamisi sub county, Vihiga County Kenya.

1.3 Purpose of the study

The purpose of the study is to establish the influence of improvised of instructional resources on learner's acquisition of pre- reading skills in Hamisi sub-county Vihiga County.

1.4 Objectives of the study

The study will be guided by the following objectives.

i. To establish the influence of teacher improvised visual instructional resources on learner's acquisition of pre-reading skills in public Preschools.
ii. To investigate the influence of teacher improvised audio instructional on learner's acquisition of pre-reading skills in public Preschools.

iii. To assess the influence of teacher improvised audio-visual instructional resources on learner's acquisition of pre-reading skills in public Preschools.

iv. To examine the influence of teacher improvised kinesthetic instructional resources on learner's acquisition of pre-reading skills in public Preschools.

1.5 Hypotheses

H_{O1}: Teacher improvised visual instructional resources have no significant influence on learner's acquisition of pre-reading skills in public Preschools

H_{O2}: Teacher improvised audio instructional resources have no significant influence on learner's acquisition of pre-reading skills in public Preschools

H_{O3}: Teacher improvised audio-visual instructional resources have no significant influence on learner's acquisition of pre-reading skills in public Preschools

H_{O4}: Teacher improvised kinesthetic instructional resources have no significant influence on learner's acquisition of pre-reading skills in public Preschools

1.6 Rationale of the study

The study was needed because it might address poor acquisition of pre reading skills of learners achievement and recommend possible solutions towards bridging the gap of acquisition of prereading skills in pre schools which use teacher improvised instructional resources and those that do not use them.

The findings of the study might be used to bridge the gap between the achievement of preschools which use teacher improvised instructional resources in facilitating acquisition of prereading skills to learners.

1.7 Significance of the study

The findings of the study might provide vital information on utilization of improvised instructional resources to different individuals in various ways :MOEST might involve themselves in ensuring improvised instructional resources are used by teachers through continuous monitoring and provision of advice and support, the study might further benefit the sub county director (SCED) on the need to organize seminars and exhibitions for preschool teachers so as to encourage them to improvise instructional resources. Moreover preschool teachers might benefit from the findings of the study where they might see the need and how to use improvised instructional resources in teaching and learning process. Finally the research might also pave way for research into other areas of concern and interest and might give researchers insight into this topic of investigation.

1.8 Scope of the study

The study sought to find out the influence of teacher improvised instructional resources on learners acquisition of pre reading skills in Hamisi sub-county Vihiga county Kenya.the set period of time was used as the reseacher used selected preschools within Hamisi subcounty. The researcher focused on preschools in Hamisi sub county .The second part was preschool teachers and learners in those preschools.

1.9 Limitations of the Study

The study had the following limitations:

Some respondents did not respond to all the items in the questionnaires. Such incomplete responses were excluded during data analysis and consequently in the final report which affected sample the sample size for those particular response.

Management of participants was a bit challenging due to wide geographical are coverage and rugged terrain in the sub county especially the western part which is hilly and rocky as well as the detailed data gathering tools .The researcher will ensure that there is proper appointment with the schools will be done.

During observation the researcher ensured that the respondents were not aware of her intentions of observing by being natural and neutral so as to get the intended information.

1.10 Delimitation of the study

The researcher anticipated to meet the following delimitations in the study:

The study was delimited to respondents from public pre- schools in Hamisi sub county, Vihiga county representing rural set up.

Participants were delimited to preschool teachers and preschool learners. The study focused on influence of teacher improvised instructional resources on learners acquisition of pre-reading skills in public preschools in Hamisi sub county, Vihiga county

Data collection tools were questionnaires and, observation checklists

1.11 Assumption of the study

The researcher made several assumptions which guided the study.

Teacher improvised instructional resources were available and utilized in Preschools for acquisition of pre-reading skills.

Preschool teachers were trained on how to develop improvised instructional resources for acquisition of pre-reading skills.

1.12 Operational definition of terms

Audio instructional resource - Any gadget which by sight and sound expand Individuals practice as in the use of radio, songs,stories

Audio visual resource - Are materials that appeal simultenously to both the sense of hearing and sight and are meant for educational, pedagogical purposes to enable preschool learners acquire pre-reading skills such as television,resource person,drama,study tour,smartphone recorded videos.

Instructional resources - Teaching learning materials used during learning of Pre-Reading Skills

Improvised - Items collected and constructed from local environment for teaching and learning

Improvised instructional - Are materials used in the absence of real, original or

Resources - Delicate objects to bring about the same effects that the real materials would have brought sourced from the local environment

Kinesthetic resource - An instructional aid that involve use of actions and movements in the learning room to support learning of prereading skills making it simpler example dance, drama, role play.

Pre-reading skills	-	Initial activities a preschool learner is exposed to in preparation to acquiring reading skills which include phonological awareness,print motivation, letter knowledge,print awareness,vocabulary and narrative skills.
Preschools	-	Learning institutions that provide basic educational foundation to children between ages three - six.
Preschool learners	-	Learners aged three – six in preschools
Teachers training level	-	Refer to different training levels a teacher undergo such as certificate, diploma, degree and masters.
Visual resource	-	Is an instructional gadget which by sight is utilized in the study room to support learning and make it simpler and spurring example textbooks, charts,pictures,realia models,posters

CHAPTER TWO

LITERATURE REVIEW

2.0 Introduction

This chapter highlighted previous studies that had been carried out in relation to the current problem that necessitated the study. The chapter therefore covered literature about the independent variable which was teacher improvised instructional resources,dependent variable which was pre reading skills.literature review on four objectives was also reviewed influence of audio, visual , audiovisual and kinesthetic improvised instructional resources and how they have influenced pre-reading skills of pupils from different parts of the world, theoretical framework,conceptual frame work recap of literature review then followed by the existing knowledge gaps in the existing literature. .

2.1 Empirical Literature Review

2.1.1 Improvised Instructional Resources

Teachers need instructional resources daily, in order to teach effectively, but provision of such instructional resources is grossly inadequate or non-existent. Reason been that the Government are not providing for instruction and most teaches are not vast or didn't know much on improvisation .Improvisation of such model becomes necessary to the teacher if he/she cannot obtain the commercially or factory provided ones. In the classroom situation since the authorities can no longer provide the teacher with the needed instructional resources and are direct replica, image or copy of real, original or natural object (Olumorin & Yusuf 2010)

Instructional materials have been defined by various authors. For example, Obanya (1989) viewed them as didactic materials thing which are supposed to make learning and teaching possible.

According to Abdullahi (1982), instructional materials are materials or tools locally made or imported that could made tremendous enhancement of lesson impact if intelligently used. Ikerionwu (Isola, 2010) referred to them as objects or devices, which help the teacher to make a lesson much clearer to the learner. Instructional materials are also described as concrete or physical objects which provide sound, visual or both to the sense organs during teaching (Agina-obu, 2005). Instructional materials are in various classes, such as audio or aural, visual or audiovisual. Thus, audio instructional materials refer to those devices that make use of the sense of hearing only, like radio, audio tape recording, and television. Visual instructional materials on the other hand, are those devices that appeal to the sense of sight only such as the chalkboard, chart, slide, and filmstrip. An audio-visual instructional material however, is a combination of devices which appeal to the sense of both hearing and seeing such as television, motion picture and the computer. Among the instructional materials the classroom teacher uses, the visuals out-numbered the combination of the audio and audio-visual (Masinde 2020) therefore improvised instructional resources can be valuable in educational setting as they provide flexibility ,adaptability and cost effectiveness allowing teaches to create engaging and relevant experiences.

Improvised instructional resources encourage creative expression and foster experimentation and sensitivity to tactile and visual experience which improve creativity in classroom environment as it communicates to teachers and learners what is expected of them and what is happening in the classroom.Locally produced instructional resources give teacher /learner the pride of using their talent allowing teacher to produce his/her potentials in concrete form thus

increase teacher's knowledge of the subject matter easing its facilitation and enhancing acquisition of intended skill.(Balogun 2012)

Improvisation of instructional resources for teaching and learning contributes to the achievement of stated educational objectives by proving opportunities developing necessary skills,attitudinal and practical skills needed to function effectively in society (Shodemde 2015)

The Kenya new curriculum stresses on competencies that learners need to derive from their learning such as self-efficacy, learning to learn creativity and imagination, critical thinking and problem solving which are enhanced during improvisation. The power of improvisation lies in teachers and learners being active at all times. A major concept of improvisation is that the point of concentration requires attention to the problem rather than individuals addressing the problem. This implies that preschool teachers need to use improvised instructional resources when teaching pre-reading skills to preschool learners since they have been found to be effective in achieving instructional objectives as they make teaching a reality.

2.1.2 Pre Reading Skills

Pre - reading skills have four goals to activate , develop or provide general background knowledge ,to introduce key vocabulary and to establish a purpose for reading .This can be achieved unless the teacher is in a position to activate learners background knowledge or provide background information before reading a text in cases where the learner lacks the necessary background knowledge. Pre reading skills such as: Vocabulary, letter knowledge, phonological awareness should prepare learners to read the text and contribute to their ability to recognize and read texts effectively .It should start at an early age in order to achieve the objectives (Aebersold et al 2003).

Pre reading skills unearth and elicit prior knowledge,the purpose (s)for reading and building a knowledge base necessary for dealing with the context and structure of materials.additionally pre-reading skills prepare and build learners foundation pertaining to reading resource also determine comprehensive terms of understanding subject taught to children and form cardinal foundation for their later reading abilities.(suggate 2013)

2.2 Influence of Improvised Visual Instruction Resources on Learners' Acquisition of Pre reading Skills

Visual instructional materials according to Kasper et al, (2017) are as mostly Concrete objects. These types of instructional materials include objects and phenomena such as minerals, rocks, raw materials, semi-finished and finished manufactured articles, and plant and animal specimens. Included among these materials are reagents and apparatus for producing chemical and other reactions and for demonstrating and studying such reactions during laboratory sessions. Also included in the first group are materials and equipment for students' expeditions and other travel, as well as supplies, instruments, and equipment for production training and for courses in drafting and the representational arts. Among such supplies, instruments, and equipment are wood, metal, plastic, and glass objects, measuring and monitoring instruments and equipment, equipment for the assembling and finishing of various products, and machines and machine tools.

Written descriptions also form part of visual instructional materials. Examples includes scientific, scholarly, reference, and methodological teaching aids, as well as textbooks, books of problems and exercises, books for recording scientific observations, laboratory manuals, manuals for production training, and programmed textbooks (Kasper et al, 2017). Teachers vary considerably in the way they use visual instructional resources like textbooks, teacher's guides, and assessment materials, with some teaching strictly to-the-book and others exercising considerable flexibility (Donald *et al.*, 1989).

Despite such individual variability, in general, teachers are much more likely to cover topics presented in the materials selected by their school or district than to cover topics not included; they are likely to follow the sequence of topics in the selected materials; and their pedagogical approach is influenced by the instructional design of the materials (Robert *et. al.*, 2003). The evidence is clear that instructional interactions between students and teachers are framed by the visual instructional materials that teachers are improvised and used effectively by teachers in their schools and districts. That instructional materials exercise their influence on learning directly as well as by influencing teachers' instructional choices and behavior makes instructional materials all the more important (Matthew and Grovers, 2012).

According to Wardhani (2012) the instructional resources to be used should not be expensive,the cost should be such that either the teacher or school can afford it.it is in no use to say that something is available but not affordable due to high cost.The teacher using the instructional resources should ensure the appropriateness of the resources for his/her intended learners.The resources should be suitable for their age,experience and intelligence .The legality ,safety and ethical aspects of the resources to be used should equally be considered .The resources should not portray any anti-social attitude .They should also be free from any bias ,distortion or prejudice .In language teaching realia provide language learners with multi sensory impressions of language through seeing ,hearing ,touching and manipulating items.Moreover the use of realia can enhance linguistic and cultural understanding appreciation which are both prerequisites for real language learning.

2.3 Influence of Improvised Audio Instructional Resources on Learners' Acquisition of Pre reading Skills

O'Neill (2000) described that audio instructional resources impact positively on student achievement, attendance and reading skills. Adequate and quality audio facilities are basic therefore key ingredients for quality education and to achieve the intended goal of the school

program (Khan and Iqbal, 2012). They also strengthen the idea by emphasizing that learning is a complex activity that requires students and teachers' motivation, adequate school facilities such as audio instructional materials and equipment for child's development of pre-reading skills.

There have been several studies on audio instructional materials and various aspects of academic achievement. For instance, Momoh (Isola, 2018), conducted a research on the effects of instructional resources on students' performance in West Africa School Certificate Examinations (WASCE) in Kwara State. He correlated material resources with academic achievements of students in ten subjects. Data were collected from the subject teachers in relation to the resources employed in the teaching. The achievements of students in WASCE for the past five years were related to the resources available for teaching each of the subjects. He concluded that material resources have a significant effect on student's achievement in each of the subjects.

Similarly, Moronfola (1982) carried out a research in Ilorin Local Government Area of Kwara State. She used questionnaires to collect data on the material resources available for the teaching of some selected subjects in ten secondary schools and related these to students' achievements in each of the selected subjects and to the amount of resources available for the teaching of the subjects. Finding showed a significant effect of material resources on the students' academic performance in these subjects.

In the same vein, Popoola (1990) investigated the effect of instructional resources on the academic achievements of students in Ogun State. Five secondary schools in Abeokuta were used for this study. Questionnaires were designed to elicit responses on instructional materials

that were available for the teaching and learning of each of the three school subjects he examined. He collected WASCE examination results for five years and compared achievements of students in schools with adequate material resources and achievements of students in schools with inadequate material resources. He found a significant difference in the achievements of the two sets of students. The schools with adequate instructional materials performed better than those with inadequate instructional materials.

Balogun (2019) identified two main constraints militating against the successful improvisation of audio instructional facilities. These are the technical and the human factors respectively. While the technical factors relate to the question of degree of accuracy and precision that is possible with the improvised equipment, the human factor relates to the teachers' skill in developing the resources while providing the appropriate learning experience to the learners.

Moreover, Maduabunmi (2016) reported in his study that lack of adequate professional training as a major problem militating against the improvisation and effective use of audio instructional materials for teaching science. There revelations were reiterated by Oyediran (Isola, 2010), who stressed the need for a definite well planned training programme of improvisation of audio instructional resources for teachers, where he suggested holding of regular workshops and seminars on the latest improvisation techniques for teachers to impart pre-reading skills among their learners.

2.4 Influence of Improvised Audio-Visual Instructional Resources on Learners' Acquisition of Pre-reading Skills

(Makori and Onderi, 2013) point out several factors affecting the pre-reading skills of pupils in

Nigeria and among them is availability and effective use of audio-visual instructional materials. Poor quality and inadequate audio-visual instructional materials and other educational facilities in schools are problems the parents, teachers, schools, school administrators, government at all levels and policy makers are responsible for. The resultant effects have been unfolding over the years in Nigeria in terms of continuous poor academic performance of pupils without prompt intervention by the stakeholders. Facilities provided in schools at all levels are rather inadequate to cater for the need of the ever increasing number of students, a situation that has called for improvisation of audio-visual instructional resources. Poor training of teachers and lack of constant training on how to effectively improvise and use audio-visual resources is adding to this woe.

Examples of audiovisual materials include motion pictures, film clips, filmstrips, slide sequences, diapositives, transparencies, records and tape recordings, and radio and television broadcasts etc. Other Audiovisual materials like films, radio, and television, help acquaint students with the achievements of modern science, technology, industry, and culture and with phenomena that are inaccessible to direct observation. Audiovisual materials also acquaint students with early periods of history and with distant places in the world and in space. Such materials elucidate natural and social phenomena and enable students to study the inner world of matter and the internal motion of waves, elementary particles, atoms, molecules, and living cells (Robert *et al.*, 2003).

Bassey (2002) opined that art of teaching is resource intensive, and in a period of economic recession in Nigeria, it may be very difficult to find some of the electronic gadgets and equipment for the teaching of reading skills in English language in schools adequately. A situation that is further compounded by the galloping inflation in the country and many at times, some of the imported sophisticated materials and equipment are found expensive and irrelevant; hence the need to produce materials locally.

Obioha (2006) and Ogunleye (2002) reported that there were inadequate audiovisual instructional resources in most secondary schools in Nigeria. They further stated that the available ones are not usually in good conditions. There was the need therefore, for improvisation. However, Daramola, (2008) noted that improvisation demands adventure, creativity, curiosity and perseverance on the part of the teacher, such skills are only realizable through well-planned training programme on improvisation.

Technological instructional media also form part of audiovisual instructional resources. These are equipment for the transmission and assimilation of information recorded on film or on phonograph recordings; film projectors, tape recorders, phonographs, and television sets. Monitoring devices include punched cards and various types of automatic apparatus. Teaching machines include language-laboratory machines, closed-circuit television systems, and computers. Such are crucial in the teaching and learning of pre-reading skills among learners. Research reveals that teachers across the globe differ in the way they improvise and use audio instructional resources like radios (Donald *et al.,* 1989). Despite these individual capabilities, most researchers generally agree that teachers are much more likely to cover topics presented using the audio materials than when no such materials are used (Robert *et. al.*, 2003). This gives clear evidence is clear that instructional interactions between students and teachers are enhanced by the use of improvised audio instructional materials. Such instructional materials exercise their influence on learning directly as well as by influencing leaners' pre-reading skills (Matthew and Grovers, 2012).

Audio-visual instructional resources are generally regarded as materials (persons and objects)used in the instructional courses to facilitate effective learning, retention and transfer of knowledge. There is available evidence in literature that support the fact that no matter how

promising an instructional strategy is, it must be effectively combined with instructional resources before learning occur (Ofudu and Oso, 2015)

Audio-visual resources provide learners with oral and visual advantages in learning and through use of audio-visual resources in teaching instruction becomes participatory by use of multi-sensory approach enhancing quick acquisition of pre-reading skills among preschool learners (Okwara,Shiundu and Indoshi, 2009)

Shuell and Farber (2001) say that the evolution of audio-visual resources has made it very possible for learners to become more involved in learning activity. The increase in learners involvement is capable of improving their interest and making the learners become active participants in the learning process rather than mere passive participants of the content.

2.5 Influence of improvised kinesthetic instructional resources on learners' acquisition of pre-reading skills

Kinesthetic learning, which is also known as tactile learning, as a form of active learning involving classroom exercises that engage learners physically .This definition implies that learners have to get out of their seats and be active throughout the learning process. Hence, learning involves movements and trial and errors, among others, to enable learners retain and remember information, which is ideal for preschool learners who are coming across concepts for the first time.(Erickson 2017)

Tranquillo (2008) agrees with this perspective by indicating that as children join preschool, they are tactual learners who like to touch and move things during the learning process. Although some learners progress as visual and audio learners, adults (mainly male) remain with the kinesthetic characteristic forever .Since preschool children are kinesthetic learners, improving kinesthetic instructional resources, such as organizing skits and dance and other active related activities, will enhance faster acquisition of information .Statistically, the need for improvised kinesthetic instructional resources in public preschools is long overdue because visual, audio and kinesthetic learners constitute 30%, 25% and 45% of the population ,respectively, justifying

the need to support the 45% of the learners using improvised kinesthetic instructional resources. Friedman (2022) indicates that preschool learners with Attention Deficit Hyperactive Disorder (ADHD), or those with characteristics associated with this disorder, are likely to benefit from improvised kinesthetic learning resources. According to him, ADHD, which is associated with challenges in maintaining attention, is a common disorder among children that 5-7% of children portrayed in the learning environment hence these learners have limited self-control, poor study skills among other struggles ,meaning that such learners cannot sit down and study through the normal learning environment. Therefore teachers have to accommodate such in preschool by improvising kinesthetic instructional resources to enhance active learning so that ADHD learners can grasp concepts like their normal counterparts .Although researchers such as Tranquillo (2008)warn that such learners can transition from an active learning activity to something unproductive ,teachers have to ensure that learners remain focused on the exact goal identified .Additionally ,since a kinesthetic activity is concept -associated, learners are likely to remember the activity and link it to a concept .Hence any successfully improvised kinesthetic instructional resource has to be appropriately designed to achieve the intended purpose particularly for special preschool children with ADHD.

Baidoo (2016) examined the adoption of kinesthetic activities as pre-reading and writing performance-enhancing tools among kindergarten learners .According to the study's finding, the existing teaching approaches focus mainly on songs as well as patterns, meaning that they have no variety .When other art-related activities, such as shells, beans and clay were brought on board these interventions enhanced pre-reading and writing abilities. Based on these findings, it can be concluded that kinesthetic art therapy strategies implemented by adequately trained teachers are capable of transforming learners' performance .Hence teachers need to be adequately trained to be in the position to implement such strategies .Even though Baidoo's (2016) study targeted KG1 and KG2 pupils and teachers at the nursery school ,the same can work for preschools in Hamisi sub county if implemented effectively, particularly in schools

where implementation is yet to happen.

Lozy's (2022) study findings also agreed with the above researchers who found that indeed kinesthetic enhances learning outcomes among preschoolers .He sought to find out how paired kinesthetic movements coupled with embedded pictures impact preschoolers literacy levels, In the study, Lozy (2022) put together a traditional drill with an embedded picture and another traditional drill with kinesthetic movements. Findings showed that the paired letters with kinesthetic movements resulted in more effective skill acquisition than one without movements. Therefore ,when pre-reading instructions are used together with movements, preschoolers are more likely to learn pre-reading skills than when such interventions are not used ,meaning that such kinesthetic are critical to preschoolers' acquisition of pre-reading skills.

Provision of pre reading skills geared towards kinesthetic games for learners on their early years are very necessary for acquiring critical reading skills by encouraging and motivating language learners to directing their energy and attention towards language learning and activities to promote higher achievement language acquisition of prereading skills .Morever games with clear beginning and ending ,governed by rules and regulations are extremely important language teaching tools for pre reading skills such that they facilitate the education and provide learners the environment to compete while maintaining enthusiasm the feeling and expression of energy and eagerness to do more with focus to answer the question who wins or loses when it comes to acquiring the needed pre reading skills.(Kashinath S et al 2006)

Kinesthetic activities which support multi-sensory phonic instructions are particularly effective for all children. Manipulative activities using magnetic letters, making and breaking words, using 'sound boxes' support children in looking for patterns in words and also to see that in changing one letter the whole word is changed. Other activities which support a multi-sensory approach include word study (Bear, Invernizzi, Templeton and Johnston 2004) or making words (Cunningham and Moore, 2000) and involving sorting words (Example letter sound correspondence sorts, same vowel words, vowel digraph words) and/ or building word

families based on the child's developmental level, multi-sensory activities features strongly in high quality phonic work and often encompasses visual,auditory tactile and kinesthetic activities. This activities can involve movement to copy letter shapes and sounds and manipulation of magnetic letters to build words (Ellis, 2006)

2.6 Theoretical Framework of the Study

There will be two theories in the Theories literature namely: Cognitive Load theory and Constructive theory .These theories will deal with the independent variable and dependent variable. Independent variable is Teacher improvised instructional resources and dependent variable is learner's acquisition of pre-reading skills.

1. Cognitive load theory

The theory shows that teachers can improvise instructional resources being the independent variable as guided by John Sweller's Cognitive load Theory (1988).Cognitive load theory is an instructional theory based on our knowledge of human cognition .since its inception in 1980's the theory has had aspects of human cognitive architecture to generate experimental ,instructional effects.These effects are demonstrated when novel instructional procedures are compared with the traditional procedures as part of randomized controlled experiments .if novel procedure facilitates learning based on test performance ,a new effect may have been demonstrated ,an effect generate by our knowledge of human cognition .The new instructional procedures that follow from the effect become candidates for relevant professional such as Teachers therefore this theory strongly supports the study influence of teacher improvised instructional resources on learners acquisition of prereading skills in preschools in Hamisi

subcounty ,Vihiga county.

Moreover this theory states that the ability to learn or the mental capacity of a learner is limited to the to the learner's age and mental ability and that learners may receive overwhelming information in terms of too much content or complex concepts and when the instructional materials are not properly utilized this will result in over-load where learners are provided with more content than they can learn or handle .This impairs the schema or outline the planned lesson objectives for acquisition resulting in lower performance or less learning on the part of learner.(sweller 2005)

Sweller (1988) this theory suggests that learning happens best under conditions are aligned with human cognitive architecture or mental structures, pictures or images that learners build from what they learn through visual and auditory perception with the aid of instructional resources. Learning is limited in the numbers of elements it can contain simultaneously unless enhanced by use of instructional resources .The cognitive load theory helps in understanding the combination of elements as the cognitive structures that make up an individual 's knowledge base.

When teachers use instructional resources ,they intentionally choose a means of presenting information (Levic, 1993)instructional strategies may vary depending on content but range from organizational strategies sequencing cues, feedback , orienting or questions techniques and this should involve different types of media and this will result in enhanced learning .This theory is important in instructional resources use. For example where a text is to be well understood, a diagram, print or video screen has reduced the complexity of its meaning and this enhance learning when the selected medium aided the learners understanding of the presented concept. The absence of media in an integral part of whole teaching and learning process provided great difficulty on the part of the learner to effectively learn. The interrelationship between instructional resources and enhanced learning become therefore a matter of central

concern of researchers (Blamires 1991).

2.Constructivism theory

Constructivism theory based in the work of Jean Piaget .Constructivism is a principle in Preschoolswhich views learners as active participants in the process of constructing knowledge and meaning rather than more recipients of knowledge. The child experiences the physical environment through interaction with concrete objects which help the child to conceptualize, develop creative thinking and problem solving skills. The child therefore acquires skills that help complex ideas. Jean Piaget's cognitive development theory of learning indicates that the mental abilities increase with age following an innate maturational schedule. There are two mental processes that help in promoting cognitive development in children, the cognitive processes that complement each other and they include assimilation, learners use what they already know as a framework of assimilating new experiences through use of instructional resources from the local environment on the other hand accommodation involves the modification of what we already know so that the new knowledge can fit in better therefore for children to assimilate new information they should be encouraged to carry out hands on activities and actively explore the environment .This implies that children should be given a variety of instructional resources to enable them acquire pre-reading skills on their own. The theory comprises of four stages of cognitive development:

i. Sensory motor (0-2 years)

ii. Pre operational (2-7 years)

iii. Concrete operational (7-11 years)

iv. Formal operational (12 and older)

This implies that preschool teachers should use instructional resources which are developmental appropriate for the learners .Learners at pre operational stage are self-centred that is they have difficulties with sharing materials during teaching and learning therefore teachers should provide adequate instructional resources during instruction to minimize conflicts as the children fight for the insufficient instructional resources and this hinder them from developing pre-reading skills during learning.

Connection between theoretical frame work and conceptual frame work

The sited theories in the study support learning and since preschool learners are supposed to acquire prereading skills by use of teacher improvised instructional resources the need active involvement in the learning process which is elicited by exposure and manipulation of various improvised instructional resources thus supporting strongly the study objectives.

2.7 Conceptual framework

A conceptual framework on which this study is based appears as shown.

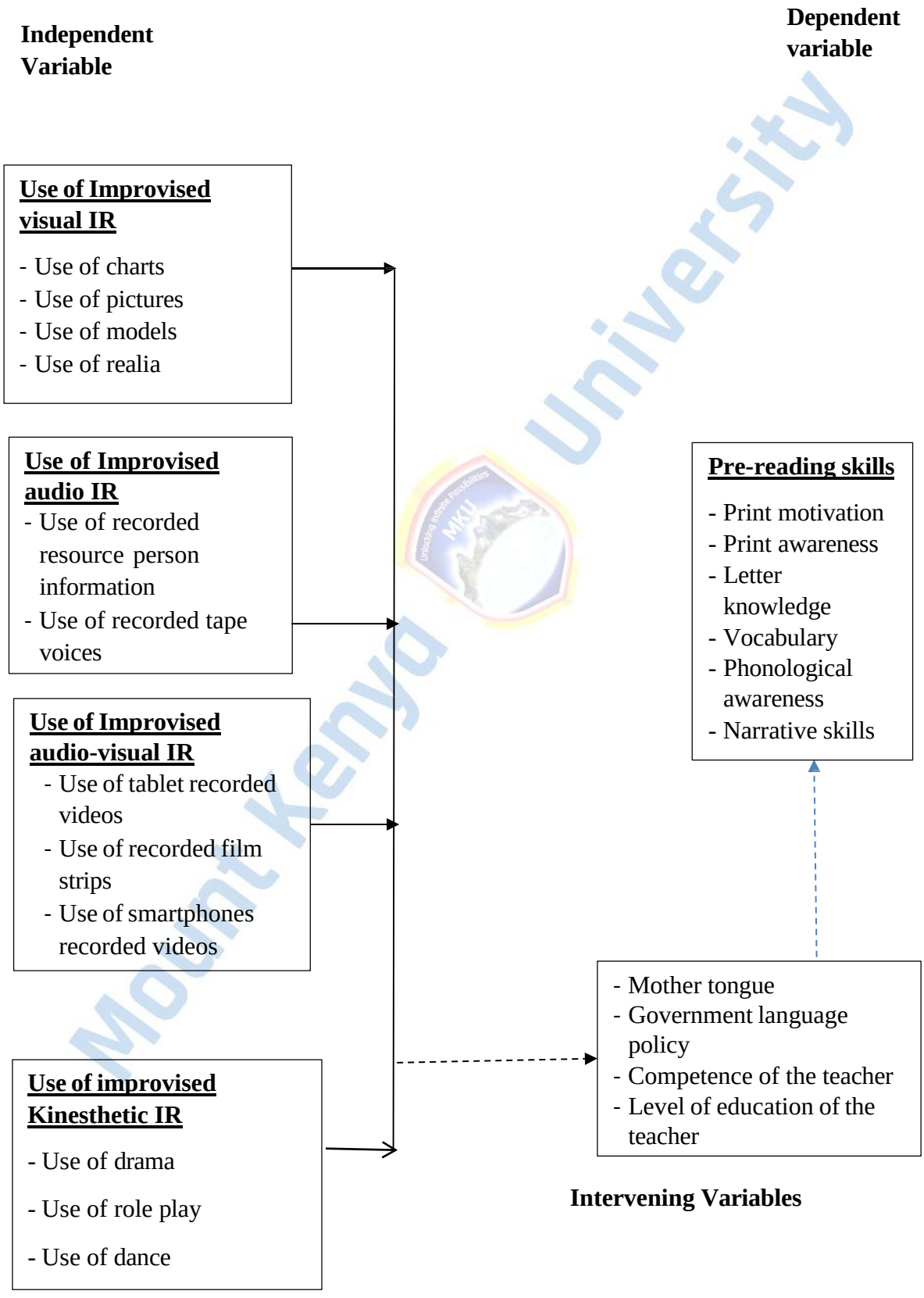
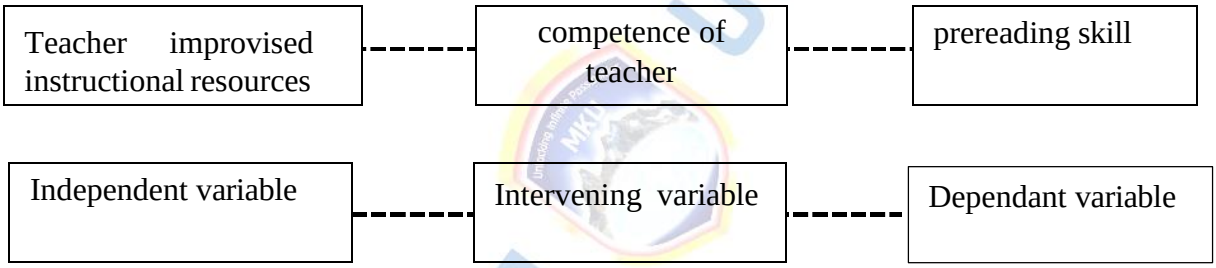


Figure 1 : Conceptual framework

Intervening variables affect the relationship an independent variable and dependent variable .for example Teacher improvised instructional resources (independent variable) and prereading skills (dependent variable).After collecting data on use of teacher improvised instructional resources and on acquisition of pre reading skills it is found that there is a strong positive correlation between the two variables .In particular the researcher found that teachers who oftenly use more teacher improvised instructional resources their learners easily acquire pre-reading skills without realizing that have failed to take note of the intervening variable competence of the teacher .It turns out that the teacher who use teacher improvised instructional resources tend to achieve more when if comes to learner acquisition of pre-reading skills.



Mother toungue as an intervening variable also has a strong positive mediation between the improvised instrumental resources(independent variable) and pre-reading skills (dependant variable) in that learners at pre-school level are supposed to be given instructions in their first language which gives foundation and links them to the development of second language which will be used throughout their learning period.

2.8 Recap of Literature Review

The various studies reviewed in this chapter focused on the influence of visual, audio and audiovisual instructional resources on various aspects learners' academic performance, among them being acquisition of pre-reading skills. The literature review has highlighted studies from different parts of the world, given that the issue of improvisation of instructional resources is a

challenge that affects many teachers worldwide. The review has featured previous studies done in America, Europe, Asia and Africa. Majority of the studies reviewed adopted a descriptive approach and revealed that instructional resources have positively impacted on various aspects of learne4ts academic performance.

2.9 Knowledge Gaps in Literature Review

It is apparent from related literature reviewed, instructional resources has been and is still an area of great interest to many educational researchers across the world. However, in as much as these resources have been extensively studied, many gaps still exist, some of which this study hopes to fill. First, there is no study known to the researcher so far, which has investigated the influence of improvised instructional resources among public schools in Vihiga County. This study the will therefore will provide useful facts that will hopefully fill this gap.

Majority of the previous studies were mainly qualitative, however, this study will adopt a mixed methods approach, where quantitative data will be collected to supplement the qualitative findings. This is because by combining qualitative and quantitative research methods, the weaknesses of one method can always be taken care of by strengths of the other, going by the words of Creswell and Plano, (2011) who explained:

> *"A problem exists when the quantitative results are inadequate to provide explanations of outcomes, and the problem can best be understood by using qualitative data to enrich and explain the quantitative results in the words of the participants. In other words, mixed methods research helps answer questions that cannot be answered using only qualitative or quantitative methods alone. Mixed methods provide a more complete picture by noting trends and generalizations, as well as in-depth knowledge of participants' perspectives." (Page 33)*

For this reason, mixed methods approach will be used in this study to obtain both quantitative and qualitative findings. Research data will be collected sequentially, because this approach demands integration of the data in one or more stages of a research process (Guest, 2013). In this regard, quantitative data will be collected first, followed by qualitative data in quick succession. Quantitative data will provide the study's primary findings, which will be collaborated by the qualitative findings.

CHAPTER THREE

RESEARCH METHODOLOGY AND DESIGN

3.0 Introduction

This chapter contained detailed outlines of the methodology that was applied in the study. These include Research design, location of the study, target population, sampling procedures and sample size. The chapter further highlighted the research instruments used, the piloting of the research instruments, testing for validity and reliability of the instruments, data collection procedures, proposed data analysis procedures and ethical considerations.

3.1 Research Design

A research design is a plan and structure of investigating in order to obtain answers to research questions (Kothari 2009). The study adopted descriptive survey research design .The researcher used both qualitative and quantitative data which was collected through self administered questionnaires to preschool teachers while qualitative data was obtained through observation checklists that were used for learners to more accurately define relationship among variables on interest Creswell et al (2003) Descriptive survey design will be preferred because the study will gather data from a large number of participants in public Preschools in Hamisi sub-county using questionnaires. Mugenda and Mugenda (2012) affirms that descriptive research is a plan that sets out the broad outline and key features of the work to be carried out in a research study. By using this methods, attitudes, opinions and views on influence of improvised instructional resources on learner's acquisition of pre-reading skills in public Preschools can be collected .The results will be used to make generalizations on the entire population. In the study the data to be collected will be both qualitative and quantitative.

3.2 Location of study

This research will be conducted in Hamisi Sub County in Vihiga County Kenya. It is among the five sub counties in Vihiga County. According to 2019 Kenya population census report Hamisi had a population of 159,241 people and occupied an area of 159.2 square kilometers(KNBS 2019) .The subcounty consists of 6 educational zones :Tambua,Banja,Jepkoyai,Gisambai,Shamakhokho and Shaviringa .Vihiga county was purposely sampled out of 47 counties due to low reading uptake as noted by Uwezo (2014).The researcher choose this sub county for the study because it has low levels in comparison to other sub counties according to the uwezo2014 report. Most people are peasants who plant tea as the main cash crop grown at higher altitude of the region other crops like maize, millet, bananas, beans, cassava, sweet potatoes among others.Water sources in the area are rivers,springs,boreholes and piped water.Social amenities found in the area are ;entertainment in open fields such as games and sports such as football .Social organizations found in the area churches,mosques and clubs .The inhabitants also rear cattle, goats, sheep and poultry. Literacy rates in Hamisi Sub County are above Kenya rural average. Hamisi Sub County is inhabited by Tiriki people who are termed as the major tribe, Maragoli, Terik and some Luo's are also in Hamisi Sub County. Hamisi is located 15 Km from main Kisumu- Kakamega road. According to international journal of novel research in humanity and social sciences vol.3 issue 6 (2016) Hamisi sub-county lies at latitude 0^0 Longitude 33^0 58'East and 35^0 0^0 East and between Longitude 0^0 and 0^0 15^0 North. The area receives rainfall ranging between 1800mm to 2000mm with distinct long and short rainfall seasons. The temperature ranges between 14^0c to 32^0c with a mean of 23^0c.

3.3 Target Population

Target population refers to all members who meet the particular criterion specified for research investigation (Alvi 2016). The target population for the study was all the 625 preschool learners and 310 preschool teachers in 155 public preschools in Hamisi sub-county.

Table 3 : Target Population

Target population	Male	Female	Total
Preschool teachers	31	279	310
Preschooll learners	302	323	625
Total	333	602	935

3.4 Sampling Procedures and Techniques

The study used probability and non-probability sampling procedures and techniques in selecting respondents. The techniques used were simple random sampling, purposive sampling and stratified random sampling .The study targeted drew a representative sample from preschools teachers trained in the same program and preschool learners. Simple random sampling was used to select preschools. After selecting preschools teachers were also selected thereafter using purposive sampling technique. Lastly i adopted stratified random sampling for preschool learners from the sampled schools.

3.5 Sample population

Mouton (1996) a sample is an element selected with intention of finding out something about the total population from which they are taken.

Mugenda and Mugenda (2003) adviced that a sample size of 10% was adequate for descriptive study. In the study, the population in the study comprises of 310 preschools teachers and 625 preschool learners. Since the target population was too large, 10% of the target population for preschool teachers and learners were selected to act as the study sample size. Therefore the sample size for the study was 31 preschool teachers and 625 learners.

3.6 Research instruments

The researcher constructed the following research instruments for use during the study. Questionnaire and, observational checklist .

3.6.1 The Improvised Resource Use Questionnaire

This was a close ended questionnaire that was administered to the sample preschool teachers to measure the extent to which they improvised and used instructional resources to teach their pupils various pre-reading skills. The questionnaire had four sections, each with 5-10 statements on a five-point likert scale. Section A had statements on the use of visual instructional resources while sections B, C and D had statements on audio, audio-visual and kinesthetic resources respectively.

3.6.2 The Pre-Reading Skills Observation Checklist.

This instrument was administered to the sampled preschool pupils on how they exhibited the various pre-reading skills. The instruments were filled by the sampled preschool teachers, who were playing the role of research assistants. The teachers were pre-trained on the skills to observe and how to score each item in the checklist as exhibited by the sampled learners in their natural setting.

3.6 Piloting of research instruments

The questionnaires and observation checklist were administered to respondents in one preschool in Hamisi sub-county. The school from which piloting was done should not be included in the study. The participants included 2 preschool teachers and all preschool learners in the centre. Questionnaires were administered to preschool teachers, and observation checklists to preschool learners. The process was repeated after one week with the same respondents. This was done to determine whether the instruments could yield the data needed, identify the problems that the respondents might encounter to clear ambiguities and make improvements.

3.7 Testing for validity and reliability

3.7.1 Validity

According to IJERE (2016) Validity is a measure of the extent to which an instrument accurately measures a theoretical construct that is designed to measure. In this study the validity of the research instrument was established through expert judgement based on critical assessment by one lecturers specialized in Early childhood development and education from Mount Kenya University.

3.7.2 Reliability

IJERE (2016) notes that reliability is the extent to which test scores are free from measurement error. More over reliability is important for study. It is not sufficient unless combined with validity that is for a test to be reliable. In this study the reliability of research instruments will be assessed using Test- Retest method. This method involved administration of the same instrument twice at an interval of one week in the same school and then looked at the correlation between the two sets of scores. The calculation of the test- retest reliability coefficient of

instrument was done using the Pearson's product moment correlation coefficient. (r) formula as shown below.

$$r = \frac{N€X - 1 - (€X)(€Y)}{\sqrt{[n€X2 - (€x)2\,][\,N€Y2 - (€Y)2]}}$$

Where €X=Sum of scores in the X test.

€Y=Sum of scores in the Y test.

€X2 = The sum of the squared score in the X test.

€Y2 = The sum of the squared score in the Y test

N = The number of paired X and Y scores.

According to Kothari (2004) Pearson's correlation coefficient shows the linear relationship between the two variables meaning one of the variables is independent and the other is dependent and that a large number of independent causes are operating in both variables so as to produce a normal distribution.

3.8 Data collection methods and procedures

Pasick etal (2009) data collection methods and procedures is a process of gathering and measuring information on variables of interest in an established systematic fashion that enables ones to answer stated research questions, test hypothesis and evaluate outcomes. The researcher obtained a permit to conduct study from National commission for science ,technology and innovation (NACOSTI) through an introduction letter and ERC certificate from Mount Kenya University . sShe also sought Clearance to conduct the research from county director of education and county commissioner of Vihiga county to be allowed to carry out study in selected schools. The researcher visited sampled schools and sought permission from teachers to conduct research. Teachers were given consent forms to go through and signed to show their willingness to participate and parents too to signed consent forms on behalf of their children.

The researcher familiarized herself with the teachers and set aside a date of collecting data that was convenient before noon. Data was collected in two stages as follows.

Stage one: Administration of questionnaires

The researcher administered the questionnaire personally and assistants to preschool teachers in the respective schools during break time for them to have ample time to fill the questionnaire then collected then before the next lesson.

Stage two: Conducting observation

On collecting questionnaires from the teachers the researcher conducted a classroom observation with assistance from preschool teacher who had been trained on how to collect data from learners to check influence of improvised instructional resources on learner's acquisition of pre-reading skills.

3.9 Data analysis techniques and procedures.

Singh (2006) data analysis means studying the tabulated material in order to determine the inherent facts of meanings.. (Kombo$ Trump 2006) Data analysis involve inspection of data, cleaning, transforming and modelling data so that useful information is discovered. It is also through data analysis that conclusions are suggested and supporting decision made. The raw data gathered was be analyzed qualitatively and quantitatively. The qualitative data was sorted and categorized according to the research objectives and findings were presented in percentages, tables statistical test to helped make predictions and drew conclusions about the whole group based from small sample .. The quantitative data was analyzed using descriptive statistics and qualitative data was analyzed using inferential statistics. The findings were presented in tables for interpretation.

3.10 Ethical considerations

Ethical consideration are perceived to be all processes, activities that the researcher must address in order to ensure successful completion of the research project (Orodha 2005). The researcher sought permission in advance from the Vihiga county office, teachers of sampled preschools from which research will be conducted. Consent was also sought from all the respondents before data collection and assurance was given to guarantee confidentiality at all time by not revealing the identities of respondents and also storing of data in password secured devices which can only be accessed by the researcher , protect the identity of respondents by using numbers,pseudo names and not disclose names of respondents. Participants were informed about study purpose through an oral brief by the researcher before commencement of data collection and reveal finding (de-brief) them afterwards,there right to withdraw at any time without consequences as their participation is voluntary and were provided with contact information for the researcher for any questions.Additionally the researcher accepted individual responsibility for the conduct of the research and its consequences,did not use a population that is disadvantaged such a mentally challenged,street children without their consent or parents consent All the authors quoted in the study were acknowledged through citations and referencing. The privacy of the disclosing information gathered from them without their express permission.

CHAPTER FOUR:

RESEARCH FINDINGS AND DISCUSSIONS

4.1 Overview

This chapter presents the results of statistical analyses that were done on the research data, together with their interpretation, followed by a discussion of these results with respect to all research objectives. Data were used to meet the three objectives of the study as outlined in chapter one, which were; (i) To establish the influence of teacher improvised visual instructional resources on learner's acquisition of pre-reading skills in public Preschools (ii) to investigate the influence of teacher improvised audio instructional on learner's acquisition of pre-reading skills in public Preschools (iii) to assess the influence of teacher improvised audio-visual instructional resources on learner's acquisition of pre-reading skills in public Preschools and (iv) to examine the influence of teacher improvised kinesthetic instructional resources on learner's acquisition of pre-reading skills in public Preschools..

4.2 Data Screening

Several steps were taken to screen for accuracy and quality of the research data. The Missing Value Analysis program from SPSS version 23 was used to assess missing values. Data were also screened by running descriptive statistics and examining the range of values on all variables. This process revealed some erroneous data entry. Given this, all values in the data sets were compared to the values on the hard copy instruments. That is, any case in the data set that had a value beyond the allowable range for a given variable was reviewed in its entirety to pinpoint the errors. After the data screening, no cases remained in the programme for further analyses. Finally, data were examined for consistency checks to ensure logical relationships among variables. Variables with questionable values were chosen for closer examination by

reviewing the instruments' filled hard copies. The values on the hard copies of the instruments were compared to the values entered in the data file. This revealed that some of the questionable values were also due to erroneous data entry. All inconsistent values were eventually located and rectified accordingly hence prior to analysis; all the cases were available and logically consistent, with no missing values.

4.3 Preliminary Data Analyses

Prior to the actual data analyses, several preliminary analyses were performed to establish all the requisite demographic information about the respondents of this study. Results of this analysis were as displayed in Table 4.

Table 4: Demographic Details of Respondents (Frequencies and Percentages)

Respondent Group	Male	%	Female	%	Total	%
Preschools teachers	31	10	279	90	310	33.16
Preschools learners	302	48.32	323	51.68	625	66.84
Total	333	35.61	602	64.39	935	100

Source: Researcher data, (2024)

As Table 1 reveals, the only 31 (10%) of the sampled Preschools teachers were male while 279 (90%) were female. As for the Preschoolslearners, 302 (48.32%) were male while 323 (51.68%) were female.

Return rates of all the research instruments were calculated to determine the whether there was any wastage of research instruments or inefficiency on the part of research assistants. Results were as presented in table 4, which indicates that no instruments were uncollected by the end of the data collection exercise. This is especially so because all administered copies of the two

research instruments had maximum possible return rates of 100%. This important milestone was achieved as a result of several measures that were put in place by the researcher. These included (i) supervision of the whole data collection exercise, where both the researcher and his research assistants were physically present to supervise and take care of issues that demanded immediate attention, (ii) sensitization of respondents about the importance of their responses and explanation of how future policy action might depend on the information they were about to give(iii) production of colored copies of these instruments, (iv) use of a sufficient number of effective research assistants and (v) careful packaging and safe custody of all the hard copies of the research materials.

Completion rates for the two research instruments that were administered and returned were also calculated prior to actual data analysis to determine whether any significant amounts of data were lost in the course of the study. This was done by dividing the number of items fully responded to in each instrument by the corresponding total number of items therein and multiplying the quotient by 100. Table 5 presents the completion rates that were obtained for each of the research instruments used in this study;

Table 5: Completion Rates

Instrument	No. of copies administered	No. of copies Returned	Return rate (%)	No. Of Items	Avg. No. Fully Respondent To	Completion Rate (%)
IRQ	31	31	100	27	25.3	93.7
PROC	302	302	100	23	19.7	85.7
TOTAL	333	333	100	50	45	90.0

Source: Researcher data, (2024)

The table reveals that the completion rate was highest in the Instructional Resources Questionnaire at 93.7%, followed by the Pre-Reading Skills Observation Checklist at 85.7%. These relatively high completion rates imply that very small hence insignificant amounts of data were lost in the course of data collection. This is a very important milestone in research (Masinde, 2023), which was achieved because of a raft of measures that the researcher put in place to guard against any loss of significant amounts of data. These included; (i) assurance of anonymity of the respondents, through the use of pseudo names instead of actual names, (ii) assurance of confidentiality of information given prior to administration, (iii) production of colored copies of these instruments, (iv) allocation of sufficient amounts of time needed for most respondents to respond to all items in each instrument. This decision was informed by the researcher's observations from the pilot study, (vi) clear articulation of the importance of this study beforehand, (vii) provision of simple and clear instructions on how each instrument was

to be filled and (viii) avoiding jargon and instead, using language commensurate to the respondents' level of education, which was form two.

4.4 Statistical Assumptions

All hypotheses of this study were tested inferentially using Pearson's Product Moment Correlation Coefficient (PPMCC), a parametric test, which relies on several assumptions. These assumptions if violated, may lead to commission of type I or type II errors in the course of hypothesis testing (Masinde, 2023; Cox, 2006). For this reason, all statistical assumptions of PPMCC were assessed beforehand, so as to leave no room for committing any of the two previously mentioned statistical errors, both of which cannot be ignored, because doing so is tantamount to disseminating misleading findings.

The assumptions assessed included normality, homogeneity of variances, homoscedasticity, presence of outliers and independence of observations. The data used was deemed fit for analysis using PPMCC as none of the said assumptions were violated.

4.5 Descriptive Statistics

Several descriptive measures were computed on data that were collected by the two research instruments, with the intention of establishing trends and patterns that would give explanations to some of the observations made in the analysis of quantitative data.

4.5.1 Descriptive Analysis of IRU and PRS Scores

The scores of the sampled Preschools teachers' Instructional Resource Use (IRU) and their respective learners' Pre-Reading Skills (PRS) as measured by the Instructional Resources Questionnaire IRQ) and Pre-Reading Skills (PRS) Observation Checklist respectively were analyzed descriptively to generate Means and Standard Deviations (S.D) of each variable and the outcome was as presented in Table 6 thus:

Table 6 : Means and Standard Deviations of IRU and PRS

Variable	N	Mean	Std. Deviation
Preschools teachers' Visual IRU Score	310	71.98	12.361
Preschools teachers' Audio IRU Score	310	72.07	13.161
Preschools teachers' Audio-Visual IRU Score	310	61.52	7.364
Preschools teachers' Kinesthetic IRU Score	310	61.74	11.038
Preschools Learners' Pre-Reading Skills Score	625	30.86	9.471

Source: Researcher data, (2024)

It can be observed from the table that with respect to the sampled teachers' use of instructional resources, the highest mean score was in visual resources, closely followed by audio resources with mean scores of 72.07 and 71.98 respectively. Kinesthetic resources followed with a mean score of 61.74 while audio-visual resources had the lowest mean score at 61.52 marks.

Moreover, it can be seen from the table that learners' pre-reading skills had moderate mean score of 30.86 and a standard deviation of 9.471 which implies that the learners scores were not as spread out as the instructional resource use scores.

4.6 Inferential Statistics

To establish the influence of improvised of instructional resources on learner's acquisition of pre- reading skills in the research area, inferential statistics were employed on data that were collected by the research instruments. To this end, Pearson's Product Moment Correlation

Coefficient (PPMCC) was carried out at the 0.05 alpha level of statistical significance to test the four null hypotheses that were derived from each of the four research objectives.

4.6.1 Influence of Visual Instructional Resources on Learners' Pre-Reading Skills

The first objective of this study as outlined in Chapter one was to establish the influence of teacher improvised visual instructional resources on learner's acquisition of pre-reading skills in public Preschools. Data with respect to this objective were collected using section A of the IRU questionnaire and the PRS observation checklist. The first null hypothesis of this study was formulated from this objective as follows:

H_{O1}: Teacher improvised visual instructional resources have no significant influence on learner's acquisition of pre-reading skills in public Preschools

To test this hypothesis, PPMCC was performed on the scores for all the sampled Preschools teachers in section A of the IRU questionnaire and the PRS scores as captured by the PRS observation checklist and the results were as presented in Table 4 thus:

Table 7: Correlation between Teachers' Visual IRU and Learners' PRS Scores

		Preschools teachers' Visual IRU Score	Preschools Learners' Pre-Reading Skills Score
Preschools teachers' Visual IRU Score	r	1	.502**
	p	-	.000
	N	310	310
Preschools Learners' Pre-Reading Skills Score	r	.502**	1
	p	.000	-
	N	310	310

Source: Researcher data, (2024)

The table reveals that there was a significant moderate positive association between the sampled teachers' visual IRU scores and their respective learners' pre-reading skills score *[r =.505, p=.000 at α=.05]*. This association is significant because the p-value obtained is less than 0.05, the stipulated alpha. The association is moderate because it is midway between 0 and 1. This implies that teachers who had high scores in the use of improvised visual instructional resources also had their learners obtaining higher scores in pre-reading skills as compared to the teachers with lower scores in the use of improvised visual instructional resources and vice versa.

4.6.2 Discussion of Findings from the First Objective

It was established that a significant moderate positive relationship exists the use of improvised visual instructional resources by the sampled Preschools teachers and their learners pre-reading skills. This relationship was deemed significant at 0.05 alpha level of statistical significance because the p-value obtained with respect to the calculated r- value was less than 0.05, the set alpha value. This revelation was contrary to the assertions of the first null hypothesis (Ho1). For this reason, the first null hypothesis was rejected. It can alternately be stated that there is a significant moderate positive relationship between the use of visual instructional resources and learners pre-reading skills among public Preschools in Hamisi sub-county, Kenya.

These findings are in unison with those of a study by Matthew and Grovers, (2012) who revealed that teachers who used improvised instructional resources were likely to inculcate pre-reading skills to their learners more effectively than those who did not.

The findings are also similar to those of Karanja (2023) whose descriptive survey revealed that teachers in Kirinyaga county who used improvised visual instructional resources produced learners with pre-reading skills that were significantly better than those whose teachers used improvised visual instructional resources less frequently.

Kasper et al (2017) also revealed in his study that visual instructional materials. which include scientific, scholarly, reference, and methodological teaching aids, as well as textbooks, books of problems and exercises, books for recording scientific observations, laboratory manuals, manuals for production training, and programmed textbooks vary considerably in the way they use visual instructional resources like textbooks, teacher's guides, and assessment materials, with some teaching strictly to-the-book and others exercising considerable flexibility. They however positively affect the pre-reading skills of learners.

4.6.3 Influence of Audio Instructional Resources on Learners' Pre-Reading Skills

The second objective of this study as outlined in Chapter one was to establish the influence of teacher improvised audio instructional resources on learner's acquisition of pre-reading skills in public Preschools. Data with respect to this objective were collected using section B of the IRU questionnaire and the PRS observation checklist. The second null hypothesis of this study was formulated from this objective as follows:

H_{O2}: Teacher improvised audio instructional resources have no significant influence on learner's acquisition of pre-reading skills in public Preschools

To test this hypothesis, PPMCC was performed on the scores for all the sampled Preschools teachers in section B of the IRU questionnaire and the PRS scores as captured by the PRS observation checklist and the results were as presented in Table 4 thus:

Table 8: Correlation between Teachers' audio IRU and Learners' PRS Scores

		Preschools teachers' Audio IRU Score	Preschools Learners' Pre-Reading Skills Score
Preschools teachers' Audio IRU Score	r	1	.785
	p	-	.000
	N	310	310
PreschoolsLearners' Pre-Reading Skills Score	r	.785	1
	p	.000	-
	N	310	310

Source: Researcher data, (2024)

The table 4 reveals that there was a significant strong positive association between the sampled teachers' audio IRU scores and their respective learners' pre-reading skills score *[r =.785, p=.000 at α=.05].* This association is significant because the p-value obtained is less than 0.05, the stipulated alpha. The association is deemed strong because it it closer to 1 than to zero. This implies that teachers who had high scores in the use of improvised audio instructional resources also had their learners obtaining higher scores in pre-reading skills as compared to the teachers with lower scores in the use of improvised visual instructional resources and vice versa.

4.6.4 Discussion of Findings from the Second Objective

It was established that a significant strong positive relationship exists the use of improvised audio instructional resources by the sampled Preschools teachers and their learners' pre-reading skills. This relationship was deemed significant at 0.05 alpha level of statistical significance because the p-value obtained with respect to the calculated r- value was less than 0.05, the set alpha value. This revelation was contrary to the assertions of the second null hypothesis (Ho2). For this reason, the second null hypothesis was rejected. It can alternately be stated that there is a significant strong positive relationship between the use of audio instructional resources and learners pre-reading skills among public Preschools in Hamisi sub-county, Kenya.

These results are similar unison with those of Isola, (2018), who conducted a research on the effects of instructional resources on students' performance in West Africa School Certificate Examinations (WASCE) in Kwara State. In his study, he correlated audion material resources with academic achievements of students in ten subjects. Data were collected from the subject teachers in relation to the resources employed in the teaching. The achievements of students in WASCE for the past five years were related to the resources available for teaching each of the

subjects. He concluded that audio material resources have a significant effect on student's achievement in each of the subjects.

Also in support of findings of this study are findings of a Nigerian study by Moronfola (1982) who carried out a research in Ilorin Local Government Area of Kwara State. She used questionnaires to collect data on the audio material resources available for the teaching of some selected subjects in ten secondary schools and related these to students' achievements in each of the selected subjects and to the amount of resources available for the teaching of the subjects. Finding showed a significant effect of audio material resources on the students' academic performance in these subjects.

Donald et al (2017) also revealed in his study that audio instructional materials. which include radio, cassette recorders, songs and speakers vary considerably in the way they use audio instructional resources like programmed textbooks, and compact disks, with some teaching strictly to-the-book and others exercising considerable flexibility. They however positively affect the pre-reading skills of learners.

4.6.5 Influence of Audio-Visual Instructional Resources on Learners' PRS

The third objective of this study as outlined in Chapter one was to assess the influence of teacher improvised audio-visual instructional resources on learner's acquisition of pre-reading skills in public Preschools. Data with respect to this objective were collected using section C of the IRU questionnaire and the PRS observation checklist. The third null hypothesis of this study was formulated from this objective as follows:

HO3: Teacher improvised audio-visual instructional resources have no significant influence on learner's acquisition of pre-reading skills in public Preschools

To test this hypothesis, PPMCC was performed on the scores for all the sampled Preschools teachers in section C of the IRU questionnaire and the PRS scores as captured by the PRS observation checklist and the results were as presented in Table 5 thus:

Table 9: Correlation between Teachers' Audio-Visual IRU and Learners' PRS Scores

		Preschools teachers' Audio-Visual IRU Score	Preschools Learners' Pre-Reading Skills Score
Preschools teachers' Audio-Visual IRU Score	R	1	0.702
	P	-	0.000
	N	310	310
Preschools Learners' Pre-Reading Skills Score	r	0.702	1
	p	0.000	-
	N	310	310

Source: Researcher data, (2024)

The table 5 reveals that there was a significant strong positive association between the sampled teachers' audio-visual IRU scores and their respective learners' pre-reading skills score *[r =.702, p=.000 at α=.05]*. This association is significant because the p-value obtained is less than 0.05, the stipulated alpha. The association is strong because it is closer to 1 than to 0. This implies that teachers who had high scores in the use of improvised audio-visual instructional resources also had their learners obtaining higher scores in pre-reading skills as compared to the teachers with lower scores in the use of improvised audio-visual instructional resources and vice versa.

4.6.6 Discussion of Findings from the Third Objective

It was established that a significant strong positive relationship exists the use of improvised audio-visual instructional resources by the sampled Preschools teachers and their leaners' pre-reading skills. This relationship was deemed significant at 0.05 alpha level of statistical significance because the p-value obtained with respect to the calculated r- value was less than 0.05, the set alpha value. This revelation was contrary to the assertions of the third null hypothesis (Ho3). For this reason, the third null hypothesis was rejected. It can alternately be stated that there is a significant strong positive relationship between the use of audio-visual instructional resources and learners' pre-reading skills among public Preschools in Hamisi sub-county, Kenya.

These findings are in unison with those of a study by Matthew and Grovers, (2012) who revealed that teachers who used improvised instructional resources were likely to inculcate pre-reading skills to their learners more effectively than those who did not.

The findings are also similar to those of Makori and Onderi, (2013) whose study pointed out several factors affecting the pre-reading skills of pupils in Nigeria and among them is availability and effective use of teacher improvised audio-visual instructional resources. They revealed that poor quality and inadequate audio-visual instructional materials and other educational facilities in schools are problems the parents, teachers, schools, school administrators, government at all levels and policy makers are responsible for. The resultant effects have been unfolding over the years in Nigeria in terms of continuous poor academic performance of pupils without prompt intervention by the stakeholders. Facilities provided in schools at all levels are rather inadequate to cater for the need of the ever increasing number of students, a situation that has called for improvisation of audio-visual instructional resources. Poor training of teachers and lack of constant training on how to effectively improvise and use audio-visual resources is adding to this woe.

Findings of this study with respect to the third objective are also supported by Obioha (2006) and Ogunleye (2002) whose Nigerian study reported that there were inadequate audiovisual instructional resources in most secondary schools in Nigeria, which resulted in leaners having poor pre-reading skills in the affected areas, noting that the available ones were not in good working conditions hence the need for improvisation.

Similarly, Robert et al (200) gave examples of audiovisual materials that significantly affected pre-reading skills of learners. These included motion pictures, film clips, filmstrips, slide sequences, diapositives, transparencies, records and tape recordings, and radio and television broadcasts etc. Just like the present study, his study revealed that other audiovisual materials like films, radio, and television, help acquaint students with the achievements of modern science, technology, industry, and culture and with phenomena that are inaccessible to direct observation. Audiovisual materials also acquaint students with early periods of history and with distant places in the world and in space. Such materials elucidate natural and social phenomena and enable students to study the inner world of matter and the internal motion of waves, elementary particles, atoms, molecules, and living cells.

4.6.7 Influence of Kinesthetic Instructional Resources on Learners' PRS

The third objective of this study as outlined in Chapter one was to examine the influence of teacher improvised kinesthetic instructional resources on learner's acquisition of pre-reading skills in public Preschools. Data with respect to this objective were collected using section D of the IRU questionnaire and the PRS observation checklist. The fourth null hypothesis of this study was formulated from this objective as follows:

HO4: Teacher improvised kinesthetic instructional resources have no significant influence on learner's acquisition of pre-reading skills in public Preschools

To test this hypothesis, PPMCC was performed on the scores for all the sampled Preschools teachers in section D of the IRU questionnaire and the PRS scores as captured by the PRS observation checklist and the results were as presented in Table 6 thus:

Table 10: Correlation between Teachers' Kinesthetic IRU and Learners' PRS Scores

		Preschools teachers' Kinesthetic IRU Score	Preschools Learners' Pre-Reading Skills Score
Preschools teachers' Kinesthetic IRU Score	r	1	0.305
	p	-	0.008
	N	310	310
Preschools Learners' Pre-Reading Skills Score	r	0.305	1
	p	0.008	-
	N	310	310

Source: Researcher data, (2024)

The table 6 reveals that there was a significant weak positive association between the sampled teachers' kinesthetic IRU scores and their respective learners' pre-reading skills score *[r =.305, p=.008 at α=.05]*. This association is significant because the p-value obtained is less than 0.05, the stipulated alpha. The association is moderate because it is closer to 0 than to 1. This implies that teachers who had high scores in the use of improvised kinesthetic instructional resources also had their learners obtaining higher scores in pre-reading skills as compared to the teachers with lower scores in the use of improvised kinesthetic instructional resources and vice versa.

4.6.8 Discussion of Findings from the Fourth Objective

It was established that a significant weak positive relationship exists the use of improvised kinesthetic instructional resources by the sampled Preschools teachers and their leaners' pre-

reading skills. This relationship was deemed significant at 0.05 alpha level of statistical significance because the p-value obtained with respect to the calculated r- value was less than 0.05, the set alpha value. This revelation was contrary to the assertions of the fourth null hypothesis (Ho4). For this reason, the fourth null hypothesis was rejected. It can alternately be stated that there is a significant weak positive relationship between the use of kinesthetic instructional resources and learners' pre-reading skills among public Preschools in Hamisi sub-county, Kenya.

These findings are in unison with those of a study by Matthew and Grovers, (2012) who revealed that teachers who used improvised instructional resources were likely to inculcate pre-reading skills to their learners more effectively than those who did not.

The findings are also similar to those of Karanja (2023) whose descriptive survey revealed that teachers in Kirinyaga county who used improvised visual instructional resources produced learners with pre-reading skills that were significantly better than those whose teachers used improvised visual instructional resources less frequently.

Lozy (2022) study findings also agreed with findings of this study with respect to the fourth objective as he found that indeed kinesthetic enhances learning outcomes among preschoolers. He sought to find out how paired kinesthetic movements coupled with embedded pictures impact preschoolers' literacy levels, In the study, Lozy (2022) put together a traditional drill with an embedded picture and another traditional drill with kinesthetic movements. Findings showed that the paired letters with kinesthetic movements resulted in more effective skill acquisition than one without movements. Therefore, when pre-reading instructions are used together with movements, preschoolers are more likely to learn pre-reading skills than when such interventions are not used, meaning that such kinesthetic are critical to preschoolers' acquisition of pre-reading skills.

CHAPTER FIVE:

SUMMARY, CONCLUSION AND RECOMMENDATIONS

5.1 Overview

This chapter presents a brief summary of the entire study, a summary of the findings, conclusions made from the research findings, the researcher's recommendations and finally, the suggestions for further research.

5.2 Summary of the Study

This study established the influence of improvised of instructional resources on learner's acquisition of pre- reading skills in Hamisi sub-county Vihiga County. The study was guided four objectives; (i) to establish the influence of teacher improvised visual instructional resources on learner's acquisition of pre-reading skills in public Preschools (ii) to investigate the influence of teacher improvised audio instructional on learner's acquisition of pre-reading skills in public Preschools (iii) to assess the influence of teacher improvised audio-visual instructional resources on learner's acquisition of pre-reading skills in public Preschools and (iv) to examine the influence of teacher improvised kinesthetic instructional resources on learner's acquisition of pre-reading skills in public Preschools. The study was anchored on Cognitive Load theory and Constructive theory and was implemented using the descriptive research design. The study will be guided by the following objectives, establish the influence of improvised Visual instructional resources on learners of pre- reading skills, investigate the influence of improvised Audio instructional resources on learners acquisition of pre-reading skills , assess the influence of improvised Audio visual instructional resources on learners acquisition of pre-reading skills and examine the influence of improvised kinesthetic instructional resources on learners acquisition of pre-reading skills in public preschools in Hamisi sub-county. The target

population for the study was all the 6256 preschool learners and 310 teachers in 155 public preschools in Hamisi sub-county. The researcher used a sample of 16 schools which was 10% of 155 schools, used purposive sampling for 31 preschool teachers and adopted saturated sampling for preschools learners which gave approximately 391 learners. The research instruments were presented to the experts in the department of early childhood development and education ascertained their validity and adjusted based on the recommendations of this experts. Reliability was determined by the test-retest method. The researcher visited sampled out preschools in Hamisi sub county and collected data by use of questionnaires for teachers, observation schedules and oral test for preschool learners. Methods of collecting data were both qualitative and quantitative. In qualitative the data shall be analyzed by use of descriptive statistics like mean and standard deviation while quantitative data were analyzed by use of Pearson's correlation.

5.3 Summary of the Findings

From the four research objectives of this study, it was found out that;

i. It was established that a significant moderate positive relationship exists the use of improvised visual instructional resources by the sampled Preschools teachers and their learner's pre-reading skills [r=.502, p=.000]

ii. It was established that a significant strong positive relationship exists the use of improvised audio instructional resources by the sampled Preschools teachers and their learners' pre-reading skills [r=.785, p=.000]

iii. It was established that a significant strong positive relationship exists the use of improvised audio-visual instructional resources by the sampled Preschools teachers and their learners' pre-reading skills [r=.702, p=.000]

iv. It was established that a significant weak positive relationship exists the use of improvised kinesthetic instructional resources by the sampled Preschools teachers and their learners' pre-reading skills [r=.305, p=.008].

5.4 Conclusions From the Main Research Findings

On the basis of empirical evidence arising from data that were collected in this study's descriptive survey and the subsequent oral interviews, three major conclusions have been arrived at: -

First, Preschools learners whose teachers use of improvised visual instructional resources have significantly better pre-reading skills than those whose teachers do not [r=.502, p=.000].

Secondly, Preschools learners whose teachers use of improvised audio instructional resources have significantly better pre-reading skills than those whose teachers do not [r=.785, p=.008].

Thirdly, Preschoolslearners whose teachers use of improvised audio-visual instructional resources have significantly better pre-reading skills than those whose teachers do not [r=.702, p=.000].

Lastly, Preschoolslearners whose teachers use of improvised kinesthetic instructional resources have significantly better pre-reading skills than those whose teachers do not [r=.305, p=.008].

From these findings, it can generally be concluded that IRU has positive influence on pre-reading skills, which is new knowledge in the field of instruction, which partially reduces the knowledge gaps that existed hitherto.

5.5 Recommendations from the Study

The following recommendations are made to key stakeholders for purposes of policy action;

Findings from this study have implications for policy makers in the Ministry of Education. For policy action, the ministry, through the state department for early childhood education should come up programmes to train all Preschools teachers in the country on how improvise visual instructional resources and effectively use them to teach pre-reading skills to pupils in all Preschools in the country.

Also for policy action, the county government of Vihiga, through the ministry of education should allocate more resources towards training all Preschools teachers in the country on how to develop audio instructional resources and effectively use them to teach pre-reading skills to pupils in all Preschools therein.

For practice purposes, all parents of pupils in Preschool throughout the country should be sensitized on how to complement teachers' efforts in improvising audio-visual instructional resources and how to use the same to reinforce what Preschools teachers have taught the pupils in school, especially in the wake of the Competency-Based Curriculum (CBC).

For practice also, the Kenya Institute of Curriculum Development (KICD) should develop content to be aired on national radio and television to sensitize all Kenyan citizens on the importance of kinesthetic instructional resources in enhancing learners pre-reading skills.

5.6 Suggestions for Further Research

It was not possible to investigate all variables surrounding the issue of teacher improvised instructional resources because of several limitations like time, resources and scope of the study. However, with regard to research on the influence of these resources on Preschoolslearners pre-reading skills, many gaps will still exist, even after adoption of all recommendations of the present study. For this reason, the following suggestions are hereby made for further research, with the hope of bridging some, if not all the gaps that this study leaves behind;

i. For technical reasons, this study was done only in Hamisi sub-county in Vihiga County. Generalizing the findings of this study to the whole of Vihiga county would therefore be a far-fetched idea. It is therefore suggested that a similar study be replicated in other sub-counties within Vihiga county, so as to ascertain if findings of this study are applicable to the entire county,

ii. This study only investigated the audio, visual, audio-visual and kinesthetic resources improvised by teachers. The study should be expanded to capture the same in non-improvised resources to determine if there is any correlation in the findings with those obtained in this study with respect to the improvised resources.

iii. The study only focused on pre-reading skills. The study could be replicated to encompass a wider range of skills like writing skills, which are also important at the basic stage of learning.

REFERENCES

Abdullahi, R. A. (1982); *Design of instructional materials*; Journal of the Royal research society; series A General,111 (3),181-211.

Aebersold,J.A et al (2003).From reader to reading teacher :issues and strategies for second hand language classrooms .Newyork :Cambrigde ISSN:2501-1111 Available online at:www.oapub.org/edu

Amadioha, W.S. (2018); *New Era Research journal of Human Educational and sustainable development*; Vol. 2, Nos 3 & 4 March 2009.

Agina-Obu, J. (2010); *Audio –Visual instructional aids and their influence on Nigerian pupils language acquisition* .Academic Journal of inter-disciplinary studies 2(2),475-484,ISSN:2281-3993

Ahmed, A. M. (2011); *Improvisation of instructional materials for the teaching of biology: An important innovation in Nigeria Education System*. Journal of science education 1, 2-7

Akanbi , G.O.(2010) From traditions to letters ,impact of the challenging faces on childhood education in Africa :The case of precolonial and post colonial Nigeria.InternationalJournal of Research in education .2(8)pp.126-134

Alvi M. H (2016); *A manual for selecting sampling techniques in research*; University of Karachi, Icra University Science and Education Publishing.

Azikiwe O. (1998); *School types ,Facilities and Academic performance of students in senior secondary schools in Ondo state* ,Nigeria International Education Studies ,5 (3),44-48

Baidoo,G.S. (2016) The use of kinesthetic Activities as art therapy tools to improve performance in pre-reading and pre-writing among kindergarten pupils(Doctoral dissertation)

Balogun ,D(2012) Itroduction to instructional materials.Ibadan:Macmillan

Balogun, W. (2019); *Constraints militating successful improvisation of audio instruction facilities*; Computers and Education,56 (2011),604-615

Barany, I. & Van .V (2007). *Central Limits Theorems for Gaussian polytopes* ".Annals of probability ,35(4),1593-1621

Bassey, C.(2002); *The Comparative Effect of Computer –Assisted and paper –and- pencil concept mapping on Language Learning Motivation and Achievement* .International Journal of Information and Education Technology ,5(9),668-690

Bassey (2012)Education technology :The teaching learning process and failing standards of education in Nigeria in 35th inaugural lecture series of University of Uyo.

Bear, D,R, Inverrnizzi M, Templeton S, & Johnson, F (2004) Words their way. Word study for phonics, vocabulary and spelling instruction (3rd Ed.) Upper Saddler River, NJ. Pearson Prentice Hall

Blamires, A. (1991); *Traditional Teaching aids Vs improvised instructional resources* .European scientific Journal ,9(28),73-101

Blamires (1991). *A history of literacy criticism London*: The Macmillan Press Ltd.

Bolick et al (2003); Technology applications in social studies teacher education. A survey of social studies methods contemporary issues in technology and teacher education 3(3): *European journal of educational studies* Vol, 7, ISS 4/2020

China MOE (2006); *Early childhood curriculum guidelines;* Beijing Normal; University press

Creswel et al (2003):Handbook of mixed methods in social and behavioral research .SAGE Thousands oaks ,CA:PP.209-240

Creswell, J. W & Plano, C (2011); *Designing and conducting mixed methods research* .Los Angeles, C A : Sage

Cunning P.M Moore S.A, Cunningham, J.W and Moore; D.W (2000) Reading and Writing elementary classrooms. Research based K.4 Instruction (5th Ed.), Boston: Allyn and Bacon

Daramola, C. (2008); *Improvisation of visual learning aids* .Los Angeles ,C A:Sage

Dawson (2019) Introduction to research methods (TIFFIN MAIN)Q180.55,M4036 2019 (Fifth edition).Robison

Donald, M. Bates, R. & Khasawneh, S. (1989); *Improvised Visual instructional resources and Academic achievement of pre-school pupils.* International Journal Education and Social Science Research,3 (4),258-265

Elli's, N (2006) language acquisition as rational contingency learning. Applied Linguistic,27,1- 24

Erickson,H.C. (2017).Elementary teacher perception regarding the use of kinesthetic learning strategies(Doctoral dissertation ,Walden university)

Eseasor. M et al (2012) Assessing teacher's use of improvised instructional materials in science education .International researchers ,1(3),107-114

Fleming M. L et al (1993); *Instructional message design*: Principles from the behavioural and cognitive sciences (2nd ed) Englewood cliffs NJ: Educational technology publications.

Friedman,C.(2022) .Lessons Learned:Kinesthetic Learning and Engaging students with ADHD (in the time of COVID)

Goundar S(2012).Chapter 3.Research methodology and research methods.In S.Goundar cloud computing .Retrieved from https://www.research gate.net

Guest, G. (2013); Describing Mixed Methods Research :An Alternative to Topologies .Journal of Mixed Methods Research ,7(2),141-151

IJERE (International Journal of Evaluation and Research in Education) Vol 5, No2, June 2016 PP.148 – 159 ISSN: 2252 – 8822 *International journal of novel research in Humanity and social sciences* vol.3. Issue 6, pp: (20-36) month: November to December 2016, available at: www.noveltyjournals.com

Isola, J. (2010); Attitudes of Nigerian secondary school chemistry students towards concept mapping strategies in learning the mole concept .Academic Journal of Interdisplinary Studies,2(2)475-484,ISSN:2281-3993

Kasper, M. Bates, R. & Khasawneh, S. (2017); Improvised Visual Instructional resources and self-efficacy and college students perceptions and use of online learning systems.

Kashinath S,Woods J.$ Goldstein, H.(2006) Enhancing generalized teaching strategy use in daily routines by parents of children with autism Journal of speech ,language and hearing research:JSLHR,49(June)pp.466-485

Kenya national bureau of statistics (2019).2019 Kenya population and Housing census volume1:Population by county and subcounty ,Nairobi,*Kenya National Bureau of Statistics*

Kenya institute of curriculum development(2017) pre-primary curriculum Nairobi ,KICD

Khan, S. & Iqbal, M. (2012); The Effects of using improvised audio instructional resources on Achievement in language acquisition. *Eurasia Journal of mathematics ,science and*

Technology Education ,4(3)233-246

Kochar (1992); *Methods and Techniques of Teaching*, sterling publishers, private Ltd New Delhi: *European journal of education studies* Vol. 7 ISS 4/2020

Kombo & Trump (2006); *Proposal and Thesis writing*: An introduction Nairobi: Pauline's publication Africa.

Kothari (2004); *Research methodology: Methods and techniques* 2nd edition New age international (P) Limited publishers

Kothari (2009); Research methodology; methods and techniques second revised edition *new age International Publishers*.

Larry (2010) Journal of education practise .ISSN 2663-127X:VOL 4.ISS.1(2023)PP1-20 February 18 2023.www.retrieved journal.com@reviewed journal.

Levic, S. (1993); "A Quasi –Experimental study of After-Event Reviews". *Journal of Applied psychology*, 97(5)681-689

Lozy ,E.(2022).The effects of paired kinesthetic Movements and Embedded pictures on literacy skills with preschoolers.Louisiana state university and Agriculture&Mechanical college

Maduabunmi ,G.(2016); *Effects of using audio instruction facilities of achievement in language acquisition among IX Grader Girls* .International Journal of Informative and Futuristic Research ,3(3),1036-1044

Makori, T. S & Onderi, P.(2013); *The Effects of incorporating visual instruction resources in language learning*; A paper presented at the ERA/AARE Joint conference .Singapore polytechnic.27th November

Masinde, J. W (2020); *Effects of software –oriented concept mapping on Kenyan students 'Achievement in Electrochemistry*; International Journal Education and Social Science Research ,3(3),158-165

Masinde ,J.W (2023)Research methods in education.Nairobi:Kenpro publishers

Mathew, E. & Grovers ,R.(2012). *The Three R's plus* :What Today's schools are trying to do and why .Minnesota :University of Minnesota press.

MOE (2006) .*Early childhood development policy frame work*; Government printers, Nairobi

Moronfola, N. (1982).*A Summary of Literature pertaining to the use of Audio instructional resources for Education and performance suppor*t; The institute for Human and Machine Cognition .

Mouton.J.(1996)Understanding social research .Pretoria:JL Van schaik publishers

Mugenda and Mugenda (1999). *Research Methods*: Quantitative and qualitative approaches Nairobi Acts press

Mugenda and Mugenda (2003). *Research methods*, quantitative and qualitative approaches Nairobi: Acts press

Mugenda and Mugenda (2012); *Research methods dictionary Applied research* and training services Nairobi.

Obionha, T. K. (2006); *The influence of visual instructional resources on Achievement* ,self-efficacy in students of English as a second language .Contemporary Educational psychology ,29(3)248-263

Ofudu G.O and OSO S.O (2015) Technological resources and English Language Teaching in schools. Journal of literature Language and Linguistic's Vol.11 (4): (27-33)

Ogunleye, D. R. (2002); *Principles of visual instruction*. Cambridge; Cambridge University Press

Okwara M.O, Shiundu J.O and Indoshi F. (2009) Towards a model of Integrated English Language Curriculum for Secondary Schools in Kenya Educational Research and Review 4(5) : 301 - 309

Olumorin, C.O et al (2010):Development of insructional materials from local resources for art courses .Asian journal of information technology ,9(2)1007-110.Available online at www.medwelljournals.com /ref phd? Do:-ajit

O'neill. R. L (2017); *The Theory Audio instructional resources*; Charlottesville University of Virginia

Orodha J. A. (2005); *Techniques of writing Research proposals and reports in education and social sciences*; Nairobi; KenenzjaHp enterprises.

Pasick et al. (2009); *Behavioral theory in a diverse society*: Like a compass on mars health education & behavior 36 (Suppl 1):11S-35S

Popoola, V. (1990); The Role of instructional resources on academic achievement of students in Ogun state; *Journal of E-learning and knowledge society*, 9(3)95-106

Renandua, M. C. (2002). The Effects of natural language approach on Academic performance: A Mixed Method Study; *American Journal of Education Research*, 1(8), 334-343

Robert, A. B. & Mirza M. S. (2013); *Effects of using visual teaching aids on students' Academic Achievement*; Journal of Research and Reflection in Education,7(2)125-132.

Robert, M. Katrina R. & Munier, S. (2003); *Improvised visual instructional resources and academic motivation of pre-school pupils in southern Europe* .International Journal

Education and Social Science Research ,3(4),258-265

Shuell T.J and Farber, S.L (2001) students perception of technology use inn college courses. Journal of educational computing Vol. 24 (1) : 125 - 131

Shodemde,B,I.(2015)Effects of improvised instructional materials on academic performance of junior secondary school students in social studies in Kaduna state ,Nigeria .Retrived from google.com

Singh .Y K(2006) Fundamental of research methodology and statistics.New age international

Suggate ,S.P,Schaughany, E.A$ Reese E .(2013) ;Children learning to read later,catch up to children reading earlier .Early childhood research Quarterly,28(1)pp.33-48Available at http://dx.doj.org/10.1016/j.ecresq.2012.04.004

Sweller J. (1988).” *Cognitive load during problem solving*: Effects on learning” Cognitive science, 12(2), 257-285

Sweller. (2005); *Implication of cognitive load Theory for multimedia learning;* (Ed) New York Cambridge University press.

Teale etal. (2009); *Early literacy research a decades of measured progress*: American educational journal of early childhood literacy

Tranquillo ,J.(2008,June) Kinesthetic learning in classroom .In 2008 Annual conference &Exposition (pp.13-829)

Waigera J et al (2020)Relationship between teacher attitude and utilization of instructional materials in preprimary in kenya. East Africa journal of educational studies .2 (1),72-104 https://doi.org/10.37284/eajes.2.1.189

Wardhani,P.(2012) *A contribution of habit in watching cartoon films and lexical meaning mastery towards reading skills*.English education ,4(1),101-110

Weber etal. (1984); *A language Thinking approach to reading San Diego*; Harcourt Brace Jovanovich, ink: American journal of educational research 2014, Vol ,2, No 9 ,817-822

UNESCO (2010); *World conference on early childhood care and education*; Moscow; framework for action and cooperation.

Uwezo (2014) Are our children learning ?literacy and numeracy in Kenya 2014 Nairobi:Twaweza East Africa

APPENDICES

APPENDIX I : LETTER FOR SELF INTRODUCTION

Mount Kenya University

School of education

P. O. BOX 342 – 01000

Thika

Dear Sir/Madam/respondent

I am a post graduate student at Mount Kenya University .The purpose of the letter is to request you to provide information required in the study .The study is about "Influence of teacher improvised instructional resources on learners' acquisition of pre reading skills in Hamisi sub sub-county Vihiga county". As a respondent you have been selected to participate in the research. Participation will be by completing the questionnaires as per the instructions to be given at the beginning of the session. You are kindly requested to fill in the questionnaire freely the responses will be kept confidential and are purely for academic purposes. Please fill the questionnaires within one week and return them to the researcher.

Thank you

Yours sincerely

LYANI HELLEN

APPENDIX II : TEACHER'S QUESTIONNAIRE

This questionnaire will be filled by pre-school teachers at Hamisi sub-county

The information revealed will be treated with confidentiality. Please fill or tick where appropriate.

PART A

1. What is your duration of employment as a pre-school teacher?

   ……

   ……

2. Kindly select your age group

   25 and under ☐

   26 – 35 ☐

   36 – 55 ☐

   55 and above ☐

3. Kindly select your highest level of education

   O level ☐

   A level ☐

   None of above ☐

4. What level are you trained in ECE?

Degree ☐

Diploma ☐

Certificate ☐

Untrained ☐

5. How many learners are in your class?

10 – 30 ☐

31 – 40 ☐

41 – 50 ☐

51 and above ☐

PART B: IMPROVISED VISUAL INSTRUCTIONAL RESOURCE USE ITEMS

	STATEMENTS	Strongly Agree	Agree	Not Sure	Disagree	Strongly Disagree
1	I use word cards in my daily teaching of pre-reading skills					
2	I use charts in my daily teaching of pre-reading skills					
3	I use realia in my daily teaching of pre-reading skills					
4	I use models in my daily teaching of pre-reading skills					
5	I use pictures in my daily teaching of pre-reading skills					
6	I use letter cards in my daily teaching of pre-reading skills					
7	I use flip-charts in my daily teaching of pre-reading skills					
8	I use flashcards in my daily teaching of pre-reading skills					
9	i use picture puzzles in my daily teaching of prereading skills					
10	I use word picture matching in my daily teaching of pre reading skills					

PART C: IMPROVISED AUDIO INSTRUCTIONAL RESOURCE USE ITEMS

STATEMENTS		Strongly Agree	Agree	Not Sure	Disagree	Strongly Disagree
1	I use pre-recorded audio clips in my daily teaching of pre-reading skills					
2	I use resource person in my daily teaching of pre-reading skills					
3	I use recorded resource person information in my daily teaching of pre-reading skills					
4	I use songs in my daily teaching of pre-reading skills					
5	I use stories in my daily teaching of pre-reading skills					

PART D: IMPROVISED AUDIO-VISUAL INSTRUCTIONAL RESOURCE USE ITEMS

	STATEMENTS	Strongly Agree	Agree	Not Sure	Disagree	Strongly Disagree
1	I use pre-recorded video clips in my daily teaching of pre-reading skills					
2	I use drama in my daily teaching of pre-reading skills					
3	I use role-play in my daily teaching of pre-reading skills					
4	I use resources person in my daily teaching of pre-reading skills					
5	I use puppet in my daily teaching of pre-reading skills					
6	I use study tour in my daily teaching of pre-reading skills					
7	I use demonstration in my daily teaching of pre-reading skills					

PART E: IMPROVISED KINESTHETIC INSTRUCTIONAL RESOURCE USE ITEMS

STATEMENTS		Strongly Agree	Agree	Not Sure	Disagree	Strongly Disagree
1	I use dance in my daily teaching of pre-reading skills					
2	I use letter puzzles in my daily teaching of pre-reading skills					
3	I use word puzzles in my daily teaching of reading skills					
4	I use drama in my daily teaching of pre-reading skills					
5	I use role-play in my daily teaching of pre-reading skills					
6	I use project work in my daily teaching of pre-reading skills					
7	I use flash cards in my daily teaching of pre-reading skills					
8	I use matching and sorting pictures and words in my daily teaching of pre-reading skills					

APPENDIX III : PRE-READING SKILLS OBSERVATION CHECKLIST

Observation check-list for learners

Name of ECD pupil……..

school:……..

teachers' name……..

Topic to be covered

Part A – Print Motivation

1. Do learners show interest in books and reading?
2. Do learners ask you to read aloud?
3. Do learners pretend to read?

PART B: Narrative Skills

1. Can learners answer simple questions about a story?

   Yes ☐ No ☐

2. Can the learners recall a story in their own words?

   Yes ☐ No ☐

3. Are the learners able to describe elements in a story that is characters and setting?

   Yes ☐ No ☐

4. Can the learner narrate their own story?

   Yes ☐ No ☐

PART C: Letter Knowledge

1. Are the learners able to name the letters of the alphabet?

   Yes ☐ No ☐

2. Are the learners able to recognize lower case and capital letters?

   Yes ☐ No ☐

3. Can the learners name each letters sounds?

   Yes ☐ No ☐

PART D: Print Awareness

1. Can the learners hold a book correctly?

   Yes ☐ No ☐

2. Are the learners able to turn pages in the right direction?

   Yes ☐ No ☐

3. Can the learners read from left to right and top to bottom?

   Yes ☐ No ☐

4. Can the learners understand word present, spoken word and convey a message?

   Yes ☐ No ☐

PART E: Phonological Awareness

1. Can learners rhyme words and letters?

   Yes ☐ No ☐

2. Are learners able to count the syllables in a word?

   Yes ☐ No ☐

3. Can learners blend sounds together?

   Yes ☐ No ☐

4. Are learners able to segment words into individual sounds?

   Yes ☐ No ☐

5. Are the learners able to substitute one letter sound from another one to make a new word?

   Yes ☐ No ☐

Vocabulary oral test

1. Look at this word
2. Can you read the words?
3. Do you know the meaning of the word?
4. Can you construct a simple sentence with the word to illicit the meaning.

APPENDIX IV : INFORMED CONSENT FOR RESPONDENTS

My name is Lyani Hellen, a student of Mount Kenya University pursuing a Masters of Education Degree in Early Childhood Development and Education. I am conducting a study on 'influence of improvised instructional resources on learner's acquisition of pre reading skills in public schools in Hamisi sub-county'

I would like to invite you to take part in this study because I feel that your experience will contribute much to the understanding and knowledge of influence of improvised instructional resources on learner's acquisition of pre-reading skills in public preschools .The research is meant for Academic purpose only.

Before you decide to take part in the study, I will be ready to explain to you about the research so that you can feel comfortable to participate .This consent form may contain words that you do not understand .I will be willing to clarify /explain to you any information that may seem not clear. In case you have queries as far as ethical issues are concerned you can contact:

The Chairperson: Mount Kenya University ERC,

P.O. BOX 342-01000 Thika.

Your participation in this research is voluntary. It is your choice whether to participate or not. The data will be collected through questionnaires. You are kindly asked to respond to the questions honestly and accurately as possible. Any information provided will be strictly confidential and your identity will not be revealed to anybody. If you do not wish to answer any of the questions included in the research, you do not have to give any reason for not responding to any question, or for refusing to take part in the research.

There are no foreseeable discomforts or dangers to you in this study.

Having read this consent form, and after asking any questions that I have about the procedures, benefits and/or risks of this study, I hereby agree to participate in this study of 'influence of improvised instructional resources on learners acquisition of pre-reading skills in public preschools in Hamisi sub-county. I also understand that I may withdraw from participation at any time without penalty.

My signature also indicates that I have received a copy of this form

---------- ---------- ----------

Signature Date Name.

Having read this consent form and after asking any questions that I have about the procedures, benefits and /or risks of this study ,I have to decline to participate at this time. However, if I later decide to participate, I understand that I may contact Lyani Hellen to see if this study or related study is in progress. My signature also indicates that I have received a copy of this form.

---------- ---------- ----------

Signature Date Name

APPENDIX V: PARENTAL OR GUARDIAN PERMISSION FORM FOR RESEARCH INVOLVING A MINOR

Title of the study 'influence of improvised instructional resources on learner's acquisition of pre-reading skills in public preschools in Hamisi sub -county Kenya'

Researcher: Lyani Hellen

e-mail address : lyanihellen@gmail.com

Your permission is being sought to have your child / dependent participate in this study .Please read the following information carefully before you decide whether or not to give your permission.

Purpose of the research: The purpose of this study is to help me establish the influence of improvised instructional resources on learner's acquisition of pre-reading skills in public preschools.

Procedure to be followed: During data collection, your child will be observed and an observation checklist filled by the researcher and also be subject to an oral test as the results are stated down. Your child will not be required to reveal their identity and no way will the responses given be used to examine or test behavior of your child

Discomforts / risks: There are no foreseeable discomforts or dangers to either you or your child in this study.

Benefits for participation: Your child will benefit by being exposed to a technique of data collection which can be applied in other subjects they study concerning collecting data from respondents. The results of this study will increase my knowledge on the influence of improvised instructional resources on learner's acquisition of pre- reading skills in public preschools.

Time duration of participation: participation in the study will not exceed 30 minutes.

Statement of confidentiality: All records are kept confidential and will be available only to professional researchers. If the results of this study are published, the data will be presented in group form and individual children will not be identified.

Voluntary participation: Your child's participation is voluntary. If you feel your child has in anyway been coerced into participation, please inform:

The Chairperson MKU ERC,

P.O BOX 342-01000 Thika.

I also ask you to inform your child that participation is voluntary. At the time of the study, your child once again be reminded of this by the researcher.

Termination of participation: If at any point during the study you or your child wishes to terminate the session, I will do so in case you have queries as far as ethical issues in this research are concerned ,you can contact:

The Chairperson MKU ERC,

P.O BOX 342-01000 Thika.

SIGNING THE FORM BELOW WILL ALLOW YOUR CHILD TO PARTICIPATE IN THE STUDY DURING SCHOOL HOURS WITHOUT YOUR PRESENCE.

I, the parent /guardian of---------- a minor ,----------years of age ,permits his/her participation in a programme of research named above

---------- ---------- ----------

Signature of parent/guardian Date Name

I----------, agree to participate in the program of research named above and understand that my participation is voluntary.

----------	----------	----------
Signature of learner	Date	Name
----------	----------	----------
Signature of researcher	Date	Name

APPENDIX VI : ERC CERTIFICATE

Mount Kenya University

REF: **MKU/ISERC/4463** Date: 01 October 2024
TO: **LYANI HELLEN**

REG: **MECS/2016/60993**

Dear Sir/Madam,

RE: INFLUENCE OF TEACHER IMPROVISED INSTRUCTIONAL RESOURCES ON LEARNERS, ACQUISITION OF PRE-READING SKILLS IN PUBLIC PRE-SCHOOLS IN HAMISI SUB-COUNTY, KENYA

This is to inform you that **Mount Kenya University** has reviewed and approved your above research proposal. Your application approval number is **3185.** The approval period is **01/10/2024 - 30/09/2025.**

This approval is subject to compliance with the following requirements;

i. Only approved documents including informed consents, study instruments, MTA will be used
ii. All changes including amendments, deviations and violations are submitted for review and approval by **Mount Kenya University**
iii. Death and life-threatening problems and serious adverse events or unexpected adverse events whether related or unrelated to the study must be reported to **Mount Kenya University** within 72 hours of notification
iv. Any changes, anticipated or otherwise that may increase the risks or affect the safety or welfare of study participants and others or affect the integrity of the research must be reported to **Mount Kenya University** within 72 hours
v. Clearance for export of biological specimens must be obtained from relevant institutions
vi. Submission of a request for renewal of approval at least 60 days prior to expiry of the approval period. Attach a comprehensive progress report to support the renewal
vii. Submission of an executive summary report within 90 days upon completion of the study to **Mount Kenya University**

Prior to commencing your study, you will be expected to obtain a research license from National Commission for Science, Technology and Innovation (NACOSTI) https://research-portal.nacosti.go.ke and also obtain other clearances needed.

Yours sincerely,

Dr. Alfred Owino, PhD
Chairman, Mount Kenya University ISERC

MOUNT KENYA UNIVERSITY
ETHICS REVIEW COMMITTEE
P. O. Box 342 - 01000,
THIKA

Main Campus, General Kago Road, P.O. Box 342-01000 Thika.
Cell: +254 709 153 000 / +254 709 153 200
Email: info@mku.ac.ke, Web: www.mku.ac.ke

APPENDIX VII : UNIVERSITY INTRODUCTORY LETTER

Mount Kenya University

DIRECTORATE OF GRADUATE STUDIES

MECS/2016/60993

1st October, 2024

National Commission for Science Technology & Innovation (NACOSTI)
Off Waiyaki, Upper Kabete
P.O Box 30623- 00100
NAIROBI, KENYA

Dear Sir/Madam,

RE: LYANI HELLEN – REGISTRATION NO. MECS/2016/60993

The purpose of this letter is to introduce the above named student who is pursuing **Master of Education in Early Childhood Studies** in the **Department of Special Needs and Early Childhood Education** in the **School of Education.**

The title of the research is "**Influence of Teacher Improvised Instructional Resources on Learners, Acquisition of Pre-Reading Skills in Public Pre-Schools in Hamisi Sub-County, Kenya.**" It has been cleared by the University's Ethics Review Committee (Certificate attached) and now has to proceed to the field to collect data between **October, 2024 and December, 2024.**

Any assistance accorded to the student will be highly appreciated.

Thank you.

Mount Kenya University
P.O Box 342 - 01000, THIKA
Office of the Director,
Graduate Studies

Dr. Samuel M. Karenga, Ph.D
Director, Graduate Studies
Enc.

APPENDIX VIII : NACOSTI RESEARCH LICENSE

REPUBLIC OF KENYA

NATIONAL COMMISSION FOR SCIENCE,TECHNOLOGY & INNOVATION

Ref No: **576890**

Date of Issue: **14/October/2024**

RESEARCH LICENSE

This is to Certify that Ms.. HELLEN ASIGE LYANI of Mount Kenya University, has been licensed to conduct research as per the provision of the Science, Technology and Innovation Act, 2013 (Rev.2014) in Vihiga on the topic: INFLUENCE OF TEACHER IMPROVISED INSTRUCTIONAL RESOURCES ON LEARNERS ACQUISITION OF PRE-READING SKILLS IN PUBLIC PRE- SCHOOLS IN HAMISI SUB-COUNTY , KENYA for the period ending : 14/October/2025.

License No: **NACOSTI/P/24/40953**

576890

Applicant Identification Number

Director General
NATIONAL COMMISSION FOR SCIENCE,TECHNOLOGY & INNOVATION

Verification QR Code

NOTE: This is a computer generated License. To verify the authenticity of this document, Scan the QR Code using QR scanner application.

See overleaf for conditions

THE SCIENCE, TECHNOLOGY AND INNOVATION ACT, 2013 (Rev. 2014)

Legal Notice No. 108: The Science, Technology and Innovation (Research Licensing) Regulations, 2014

The National Commission for Science, Technology and Innovation, hereafter referred to as the Commission, was the established under the Science, Technology and Innovation Act 2013 (Revised 2014) herein after referred to as the Act. The objective of the Commission shall be to regulate and assure quality in the science, technology and innovation sector and advise the Government in matters related thereto.

CONDITIONS OF THE RESEARCH LICENSE

1. The License is granted subject to provisions of the Constitution of Kenya, the Science, Technology and Innovation Act, and other relevant laws, policies and regulations. Accordingly, the licensee shall adhere to such procedures, standards, code of ethics and guidelines as may be prescribed by regulations made under the Act, or prescribed by provisions of International treaties of which Kenya is a signatory to
2. The research and its related activities as well as outcomes shall be beneficial to the country and shall not in any way;
    i. Endanger national security
    ii. Adversely affect the lives of Kenyans
    iii. Be in contravention of Kenya's international obligations including Biological Weapons Convention (BWC), Comprehensive Nuclear-Test-Ban Treaty Organization (CTBTO), Chemical, Biological, Radiological and Nuclear (CBRN).
    iv. Result in exploitation of intellectual property rights of communities in Kenya
    v. Adversely affect the environment
    vi. Adversely affect the rights of communities
    vii. Endanger public safety and national cohesion
    viii. Plagiarize someone else's work
3. The License is valid for the proposed research, location and specified period.
4. The license any rights thereunder are non-transferable
5. The Commission reserves the right to cancel the research at any time during the research period if in the opinion of the Commission the research is not implemented in conformity with the provisions of the Act or any other written law.
6. The Licensee shall inform the relevant County Director of Education, County Commissioner and County Governor before commencement of the research.
7. Excavation, filming, movement, and collection of specimens are subject to further necessary clearance from relevant Government Agencies.
8. The License does not give authority to transfer research materials.
9. The Commission may monitor and evaluate the licensed research project for the purpose of assessing and evaluating compliance with the conditions of the License.
10. The Licensee shall submit one hard copy, and upload a soft copy of their final report (thesis) onto a platform designated by the Commission within one year of completion of the research.
11. The Commission reserves the right to modify the conditions of the License including cancellation without prior notice.
12. Research, findings and information regarding research systems shall be stored or disseminated, utilized or applied in such a manner as may be prescribed by the Commission from time to time.
13. The Licensee shall disclose to the Commission, the relevant Institutional Scientific and Ethical Review Committee, and the relevant national agencies any inventions and discoveries that are of National strategic importance.
14. The Commission shall have powers to acquire from any person the right in, or to, any scientific innovation, invention or patent of strategic importance to the country.
15. Relevant Institutional Scientific and Ethical Review Committee shall monitor and evaluate the research periodically, and make a report of its findings to the Commission for necessary action.

National Commission for Science, Technology and
Innovation(NACOSTI),
Off Waiyaki Way, Upper Kabete,
P. O. Box 30623 - 00100 Nairobi, KENYA
Telephone: 020 4007000, 0713788787, 0735404245
E-mail: dg@nacosti.go.ke
Website: www.nacosti.go.ke

APPENDIX IX : RESEARCH AUTHHORISATION FROM THE COUNTY COMMISSIONER

REPUBLIC OF KENYA

THE PRESIDENCY

MINISTRY OF INTERIOR AND NATIONAL GOVERNMENT ADMINISTRATION.

Email: vihigacc1992@gmail.com
Telephone:
When replying please quote

COUNTY COMMISSIONER
VIHIGA COUNTY
P.O BOX 75-50300
MARAGOLI

VC/ED./12/1 VOL.IV (77)

16th October, 2024

Deputy County Commissioner
HAMISI SUB COUNTY.

RE: RESEARCH AUTHORIZATION: MISS HELLEN ASIGE LYANI.

This is to introduce to you Miss Hellen Asige Lyani of Mount Kenya University to conduct research on "*Influence of teacher improvised instructional resources on Learners acquisition of Pre reading Skills in Public Pre-schools in Hamisi Sub County, Vihiga County*" for a period ending 14thOctober, 2025.

Kindly accord her the necessary assistance.

Mary stellah Chitechi
FOR: COUNTY COMMISSIONER
VIHIGA COUNTY

cc. Miss Hellen Asige Lyani

APPENDIX X : RESEARCH AUTHHORISATION FROM THE COUNTY DIRECTOR OF EDUCATION

MINISTRY OF EDUCATION
STATE DEPARTMENT OF EDUCATION

Telegrams: .....
Telephone: (056) 51450
When replying please quote

COUNTY EDUCATION OFFICE,
VIHIGA COUNTY,
P.O. BOX 640,
MARAGOLI.

REF: CDE/VC/ADM/VOL.3/100/74 **16th Oct., 2024**

TO WHOM IT MAY CONCERN

RE: AUTHORITY TO CONDUCT RESEARCH - MISS HELLEN ASIGE LYANI

Reference is made to your letter Ref No. **NACOSTI/P/24/40953** dated 14/10/2024.

Permission is hereby granted to the above-named person of Mount Kenya University conduct research on ***Influence of Teacher Improvised Instructional Resources on Learner Acquisition of Pre-Reading Skills in Public Pre Schools in Hamisi Sub County -in Vihiga County, Kenya*** to enable her complete the study as required by her institution.

Kindly note that in order for the office to be informed, a copy of the same should be shared with the County Education Office for intervention purposes upon completion of the research.

DAVID KOECH
COUNTY DIRECTOR OF EDUCATION
VIHIGA COUNTY

THE COUNTY DIRECTOR OF EDUCATION
16 OCT 2024
P.O. Box 640-50300, MARAGOLI
Sign:.....

Cc
County Commissioner
VIHIGA

APPENDIX XI : TURNITIN REPORT

Hellen LYANI

HELLEN ASIGE THESIS LATEST NEW

Masters2024

Masters2024

Mount Kenya University

Document Details

Submission ID
trn:oid:::1:3070344090

Submission Date
Nov 7, 2024, 12:01 PM GMT+3

Download Date
Nov 7, 2024, 2:14 PM GMT+3

File Name
HELLEN_ASIGE_THESIS_LATEST_NEW.docx

File Size
2.6 MB

120 Pages

20,503 Words

118,883 Characters

turnitin Page 1 of 123 - Cover Page Submission ID trn:oid:::1:3070344090

12% Overall Similarity

The combined total of all matches, including overlapping sources, for each database.

Filtered from the Report

- Bibliography
- Quoted Text

Exclusions

- 25 Excluded Matches

Match Groups

5 Not Cited or Quoted 11%
Matches with neither in-text citation nor quotation marks

4 Missing Quotations 1%
Matches that are still very similar to source material

0 Missing Citation 0%
Matches that have quotation marks, but no in-text citation

0 Cited and Quoted 0%
Matches with in-text citation present, but no quotation marks

Top Sources

5% Internet sources
1% Publications
11% Submitted works (Student Papers)

APPENDIX XII : HAMISI SUB-COUNTY MAP