CORRELATION BETWEEN READING COMPREHENSION PRACTICES AND ACADEMIC PERFORMANCE: A CASE STUDY OF CLASS THREE PUPILS IN WESTLANDS SUB-COUNTY, KENYA

BY

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A RESEARCH PROJECT SUBMITTED IN PARTIAL FULFILLMENT OF THE REQUIREMENTS FOR THE AWARD OF THE DEGREE OF MASTER OF ARTS IN LINGUISTICS AT THE UNIVERSITY OF NAIROBI

NOVEMBER, 2014
DECLARATION

This project is my original work and has not been submitted for any award of a degree in any university

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This dissertation has been submitted for examination with our approval as university supervisors.

__________________________________________  ________________________________
Dr. Jefwa Mweri                               Date

__________________________________________  ________________________________
Dr. Wachira Alice                             Date
DEDICATION

To my husband and friend Justin Mabeya

For his love and patience

To our children

John, Grace and Joy

Your inspiration keeps the light shining
ACKNOWLEDGEMENT

First and foremost I would like to thank the Almighty God for His sufficient grace and strength that has seen me through the two years of study. My sincere gratitude and appreciation goes to my two supervisors Dr. Jefwa Mweri and Dr. Wachira Alice for their support in the conceptualization of the research problem, presentation and analysis of the data and organization of my argumentation.

I thank my linguistics lecturer's advice encouragement and nurture throughout the M.A course which culminated to the production of the project. This far I am indebted to Prof. Okoth Okombo, Prof. Lucia Omondi, Dr. Helga Schroeder, Dr. Marete Gideon, Dr. Oduor Jane, Mr. Mungania, Dr. Ayub Mukhwana and Dr. Michira. I also appreciate my M.A. 2014 classmates for the time we spent together in class, group discussions, socializing and sundry. I must extend my heartfelt appreciation to all my colleagues in the MA class, Terry Mutua, Josephat Maore, Jacob Njagi, Martin Situma, Thomas Mulumba, Daniel Kibwage, Annete Aromo, Rosalind Wambui, Caroline Njura, Bervely Malesi, Catherine Otunga, Caroline Kagwiria, Kinya Kinyua, Robert Gesicho, Geoffrey Moseti and Rose Auma. They lifted my spirit at a time of need. Our collegial relationship and resilient support to one another during our studies cannot be overemphasized.

My sincere thanks are further extended to all my research respondents in Westlands primary schools whose input has been invaluable in this study. I must mention Mrs. Florence Kioko my principal for her continuous encouragement and understanding during the course of my studies. She accorded me time and days off whenever my academic requirements called for.
My heartfelt gratitude go to my husband Justin Mabeya, and my little angels Grace and Joy and my prince John for their understanding, patience and encouragement even when my assignments and project took much of their time. I am grateful to Judy my typist for faithfully typing this work.

I am grateful to my dad Naftal Onkoba (late) and mum Anne Moraa who treasured education, taught me the value of hard work, prayer and determination.
ABSTRACT

The aim of this study was to investigate the relationship between reading comprehension practices and academic performance. For data collection an interview guide, classroom observation schedule, comprehension passage and academic performance reports were used. Data collected was analysed qualitatively and quantitatively. A group of class three pupils from Westlands Primary School were selected randomly and a comprehension passage administered to them to assess their reading ability. Data from their school academic performance reports was used to find the relationship between reading comprehension practices and academic performance. An interview guide and class observation schedule was used by the researcher to find out about reading comprehension practices. The study findings confirmed that reading comprehension practices have an influence on academic performance and therefore there is a significant correlation between reading comprehension practices and academic performance. The findings also confirmed that there is a relationship between reading difficulties and academic performance.
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CHAPTER ONE

INTRODUCTION

1.1. Introduction

1.1.1. Background to the study

Researchers on reading have come up with different views on reading. According to Widdowson (1979) reading is an interactive process that goes on between the reader and the text, resulting in comprehension. Reading is therefore seen as the combination of textual information with the information the reader brings to the text resulting to comprehension of the text. Anderson (2000) notes out that reading is a mental process, not getting from print but engaging the reader’s mind to decode meaning. Reading requires thinking, it is not just speaking the words and symbols but rather thinking and speaking.

Vocabulary instructions play a major role in improving comprehension, Laflamme (1997) points out that comprehension is impossible if meaning of words is not known. It is important to teach children to find meaning of words in dictionaries and by use of contextual clue skills. A large vocabulary is critical not only for reading but also for academic performance and for related background knowledge.

It is argued that poor performance in the academics is due to poor mastery of the subject skills. Dalton, Glussman, Guthrie and Rees (1996) noted that pupils taken through reading comprehension skills over a period of time were successful in their academics in comparison to those trained in the study skills in the relevant subjects over the same period of time. The poor performance could be attributed to lack of language skills rather than lack of mastery of different subjects.

1
Secada (1992) found sufficient evidence to conclude that “language proficiency no matter how it is measured, is related to mathematics achievement” (p.639). Bohlmann and Pretorius (2002) carried out a research among a group of students enrolled for a mathematics bridging course. The results showed that reading proficiency was a strong indicator of academic performance. Lack of reading ability serves as a barrier to effective mathematics performance. They found that “weak readers only achieve reading comprehension levels of 50% or less which effectively means that half of what they read is not properly comprehended with dire consequences for their academic performance”.

Mberia (2002) carried out her research in Gatundu division in rural Thika Sub-County, Kenya where she focused on decoding abilities of the learners. She examined whether reading in English was taught effectively from class one to three in primary school system in Kenya. She observed that intensive reading is not done thoroughly with thoughtful guiding questions to challenge and arouse the pupils’ interest to interpret what is read in the light of their own experience.

1.1.2. Statement of the Problem
Research findings in applied linguistics and reading consistently show a strong positive correlation between reading proficiency and academic success at all ages from primary right through to university level. Students who read a lot and who understand what they read usually attain good grades (Pretorius, 2000).

According to 2012 KCPE examination results in Nairobi County, Westlands Sub-County emerged the overall best in the County. Some schools in the Sub-County performed poorly and others very well not only in English but also in all other subjects. The question is why do some schools perform very well while others poorly in the same Sub-
County? A study conducted by Chege E. W. (1999) in rural Machakos indicate that learners with problems in reading comprehension have problems in performance which is an indicator that there is a correlation between reading comprehension difficulties and academic performance, a factor that may be contributing to the discrepancy in results in Westlands Sub-County.

As a response to this study, a study was conducted to find the correlation between reading comprehension practices and academic performance among class three pupils in Westlands Primary School in Westlands Sub-County. The performance in the school was above average according Kenya National Examination Council (KNEC, 2012). The study further identified types of reading comprehension difficulties and focused also on the appropriateness of the instruction methods used to teach reading comprehension.

1.1.3. Objectives of the study

i) To investigate the correlation between reading comprehension practices and academic performance of class three pupils in Westlands Sub-County.

ii) To identify the types of comprehension difficulties experienced by the learners.

iii) To establish the appropriateness of the instructional methods in reading comprehension.

1.1.4. Research Hypotheses

i) Reading comprehension ability has an effect on academic performance.

ii) Decoding deficits and retention difficulties are some of the comprehension difficulties experienced at this level.

iii) The instructional methods used in reading are appropriate for optimum comprehension.
1.1.5. **Rationale for the study**

The results of this study will be valuable in one way or another to stakeholders in the education sector including parents, managers of educational institutions, non-governmental organizations (NGOs) and policy makers.

Parents will learn powerful lessons on how reading comprehension practices would contribute to overall academic performance in a school. From this knowledge they can devise plans and activities which could positively influence their children’s reading habits. For example enjoying reading story books with a child at home can make a significant positive difference in reading comprehension.

The results from the study can be used by educational managers, planners and policy makers in planning for teachers’ refresher and in-service courses to enhance their skills in dealing with reading difficulties and how to improve on teaching methods when handling reading comprehension which will lead to the improvement of academic performance.

Reading is an important skill in helping pupils understands various concepts. The outcome of this study will give insight to the teachers, on what teaching approaches they can put in place to contribute towards improved reading abilities among pupils.

1.1.6. **Scope of the study**

Westlands Sub-County has got 26 public primary schools one of which—Westlands Primary School—was the focus of this study. The performance of the school was above average in the Sub-County that emerged top in Nairobi County in 2012 in K.C.P.E. The school obtained a mean of 317.25 out of 500 marks. The study concentrated on the correlation between reading comprehension practices and academic performance in the selected school. The study subjects were drawn from lower primary specifically class
three. This is the level where the foundation for reading skills needs to be laid well before moving to upper primary and it is the level where pupils learn to read and write. According to the primary education syllabus (2002) one of the general objectives states that by the end of the first three years the learner should acquire reading skills to be able to read and understand instructions, to read for information and for pleasure and to develop vocabulary and sentence structure.

1.1.7. Theoretical framework
The theory which is relevant to this study is the “Schemata Theory” which specifically focuses on reading comprehension. It plays an important role in achieving the objectives of the study.

According to Piaget (1972) and Craig (1989, pg. 36), Schemata is a term for mental structures that process information, perceptions and experiences. Schema theory has as one of its fundamental tenets that, any text either spoken or written does not by itself carry meaning. According to Schema theory, a text only provides directions for listeners or readers on how they should retrieve or construct meaning from their own previously acquired knowledge. The previously acquired knowledge structures are called schemata.

Readers activate existing knowledge structures (schemata) to interpret text. Comprehension involves the matching of what the reader already knows to a new message. Anderson and Pearson (1984) state that it is our schemata that contains the “old information which we use to interact with new information.
Schema Theory proposes that when individuals obtain knowledge, they attempt to fit that knowledge into some structure in the memory that makes them to make sense of that knowledge. Schema Theory is an active coding technique necessary for facilitating the recall of knowledge. When new knowledge is perceived, it is coded into either pre-existing schema or organized into new script. Schemata are therefore organized mental structures that aid the learners’ ability to understand and associate with what is being presented to them. Therefore the way people learn is by relating new information and experience to what they already know.

Yule (1985) observes that the concept of coherence does not exist in language but in people this means that it is people who make sense of what they read and hear. People try to arrive at an interpretation which is in line with their worldview. According to the Schema Theory, the process of interpretation is guided by the principle that every input is mapped against some existing schema and that all aspects of that schema must be compatible with the input information.

Researchers over time have emphasized the need for schema activation before reading (Carrel 1989). If a person does not know anything about the subject, then getting the words of the text into the mind can be a waste of time. The way we learn is by relating new information and experiences to what we already know. When reading the building of bridges between the known and unknown involves making predictions, or guesses, about what will come next on the basis of what we already know.
A reader may fail to activate an appropriate schema during reading which results in various degrees of non-comprehension. This inability to activate an appropriate schema may either be due to the writer’s or speaker’s not having provided sufficient clues in the text for the reader to effectively utilize. An appropriate schemata must exist and must be activated during text processing. Johnson (1982) observes that a text on a familiar topic is better recalled by English as Second Language (ESL) readers than a similar text on unfamiliar topic.

Prior knowledge can be activated through reciprocal questioning or request (Manzo, 1969). This is a technique that can be used to help students formulate their own questions about the material they are reading, develop an active attitude toward reading and develop independent comprehension abilities. Teachers can use pre-reading plan (PreP) to help students access prior knowledge, elaborate on and evaluate this knowledge (Langer, 1982).

Nichols (1983) suggested a number of formal and informal instructional activities to help students activate prior knowledge and make predictions, which is the prediction guide designed to enhance comprehension by encouraging students to make predictions about concepts to be covered in the text (Moore et al., 1982).

In the light of Schema Theory, reading can be thought of as comprehension process that involves three stages: - pre-reading, while reading and post reading stages. The main importance of pre-reading activities involves seeking students’ involvement, interest and motivation and also provides language preparation. These pre-reading activities prepare the learners for what they will read and set the task for the second phase. During reading
phase the aims are skill practice, helping learner to put together what he has read and relate that information to his own experience, opinions and knowledge. These activities during reading provide a purpose for reading and enable the teacher to monitor the learners. Post reading activities can involve other skills such as writing, speaking and vocabulary development (Lindsay and Knight, 2006).

Researchers such as Barnet (1989) have proposed different activities which contribute to integration of reading with language skills such as discussions, writing compositions, summarizing and listing facts. The theory supports such activities as activating prior knowledge and it recognizes the importance of the three reading stages; pre-reading, while reading and post reading.

Researchers argue that comprehension is achieved through the interaction of bottom-up and top down processes. (Carell, 1983, 1991; Eskey and Grabe 1988; Eskey, 2005; Sarella and Oxford, 1992). During reading the readers combine their bottom up-processes, for example the ability to decode and organize words and grammatical forms with their top-down processes like the ability to using background knowledge to predict and confirm meaning (Grabe, 2004). Comprehension is not just transmission of the graphic information to the reader’s mind but the result of meaning construction. According to the interactive reading model, readers interact with the text to create its meaning as their mental processes work together at different levels (Carrell, Devine and Eskey 1988: Rumelhart, 1977).
Interactive model theory lays emphasis on ‘schemata’ the previously acquired knowledge. The reader has pre-existing framework about the text he is to read and the world and what the reader finds in the text fits it into this framework. There are two types of schemata: content and formal schemata.

According to Pearson and Fielding (1991), schemata is usually associated to knowledge of topics, themes and concepts. Dickson, Simmons and Kameenui (1995) are in support of the importance of activating knowledge of the conventions of well-presented text and organizational patterns of text structures. Instruction in physical text structures can be viewed as building background knowledge which will later form the frame for helping readers organize and integrate new knowledge.

1.2. Literature Review

1.2.1. Introduction

Under literature review, the following aspects are highlighted as per the set objectives; reading comprehension and academic performance, reading comprehension difficulties and instruction methods in reading comprehension.

1.2.2. Reading comprehension and academic performance

Researchers have over time conducted research on reading comprehension and academic performance in Kenya and across the world to find out the role of language in academic performance in different subjects.
Cummins (1979) in studies of language skills of bilinguals concluded that a certain level of linguistic proficiency seemed to be necessary for academic achievement because language competence allows one to use it as an organizer of knowledge and as a tool for reasoning.

In investigating the relationship between reading comprehension and academic performance MacGregor and Price (1999), noted that vocabulary, number and symbol sense, as well as the ability to read and comprehend, word problems are important factors affecting achievement in mathematics. They argued that the cognitive ability that drive symbol processing is the connection between language and mathematics. The ability of symbol processing is the basis for both language proficiency and mathematics achievement. MacGregor and Price (1999) noted that poor language skills do correlate with poor math skill suggesting that both require a basic level of competency in symbol processing i.e. deriving meaning from symbols.

Dawe (1983) noted that bilingual students who performed poorly in mathematics tended to have low levels of competence. Dawe argues that the students had not acquired the level of language proficiency that is a necessary foundation for academic learning.

Linvile (1970) observed that both syntactic structure and vocabulary level were important variables in solving arithmetic problems. He noted that pupils of higher general intelligence ability or higher reading comprehension ability made significantly higher scores than pupils of lower intellectual ability.
Muhandiki (1984) carried out research surveys among pupils and teachers in primary schools in Nairobi. He observed that lack of mastery of English language was identified as a factor contributing to poor performance in mathematics.

Studies show a correlation between social studies and reading comprehension. Krantez (1957) cited in Kopiyio (1982) pointed out that the best two predictors of social studies achievement were reading vocabulary and comprehension. Hinkelmann (1956) reported that a significant correlation existed between reading comprehension and social studies by 8th grade students.

In investigating the relationship between science performance and reading comprehension Sochor (1958) noted that reading comprehension was related to comprehension of science texts. He emphasized the fact that it is important in science reading for students to be able to remember symbols, formulas, specific vocabulary terms and procedure for conducting experiments if they are to be efficient as well as proficient in the application of science.

Sandy Ming – San Chang (2013) conducted research on academic language knowledge and comprehension science text for English language and fluent English speaking students. The results indicated that vocabulary not grammar discourse features was significantly related to students comprehension scores.

According to the studies conducted by researchers mentioned above there is a correlation between school subjects’ performance with reading ability, though Ombra (2010) has contrary findings. He conducted research on deteriorating performance of Filipino in the national and international tests and the findings showed that the overall students’ reading
skills were not significantly correlated to mathematics performance. Hence the poor mathematics performance could be explained by other factors not related to reading comprehension skills. This notwithstanding, the overall position of majority of the researchers relate academic performance to the ability of the pupils to comprehend what they read. In this context therefore, this study seeks to establish the extent to which this observation is true in Westlands Sub-county, Nairobi.

1.2.3. Reading comprehension teaching methods

A teacher’s knowledge on how to teach reading to learners is very crucial. To improve in reading comprehension teachers need to teach meaning. The rationale of teaching meaning is to help the learners develop their reading skills and enhance comprehension power. Meaning is not found in the text but the reader brings meaning with him.

Meaning can be brought out by associating the text with experience. For reading comprehension word knowledge is very important. When teaching meaning, learners should be taught literal meaning of words and how they can be used in a particular contexts. Laflamme (1997) affirms that comprehension is impossible if meaning of words is not known. A reader will have a limited understanding of the concepts and content if he does not know the meaning of words. Educational Researchers Raphael, Pardo and Highfield (2002) found a strong correlation between reading and vocabulary knowledge which meant that readers with a large vocabulary are usually good readers. Research shows that when teachers provide explicit comprehension instruction to children reading improves. According to the National Reading Panel (2000) there is a correlation between direct instruction and enhancement in comprehension.
Researchers have indicated over time that reading can be taught in phases for improved comprehension. William (1987) argues that for teaching of reading to be successful a reading lesson can be divided into three phases and they are; the pre-reading, while reading and post reading phases. The literature does not present the Kenyan scenario with regards to teaching comprehension methods and academic performance.

This study delves into understanding how classroom situation and teaching methods used by teachers in Westlands Sub-County, would contribute to the academic performance observed.

1.2.4. Reading difficulties
Reading difficulty is an issue of concern in any society. The reading problems are found among every age group in primary school classroom although some children are at greater risk of reading difficulties than others. How and why precisely this happens has not been fully understood (Snow, Burns and Griffin 1998). According to Snow, Burns and Griffin (1998), reading is considered to be a basic need in the modern world of science and technology. Reading ability is valued and important for social and economic advancement.

Reading difficulties refers to the problems associated with reading. The problems could be decoding or comprehension of what is read. Snow, Burns and Griffin (1998, P3) define reading difficulties as the lower tail of normal distribution of reading ability in a population. In other words, individuals with reading difficulties are those whose achievement levels are lower than those of the rest of the population in the distribution.
Snow, Burns and Griffin (1998) noted that the factors that contribute to these reading difficulties include biological deficits that make the processing of sound, symbols relationship difficult, factors within the individual, factor at home, social and cultural environment and factors in the school environment such as school curriculum and teaching methods.

Snow, Burns and Griffin (1998) observe that there are three potential stumbling blocks that are known to throw children off course on the journey to skilled reading. The obstacle are; difficulty in understanding, failure to transfer the comprehension skills of spoken language to reading, to acquire new strategies that may be specifically needed for reading and lastly the loss of an initial motivation to read or failure to develop a mature appreciation of rewards.

Carell et al (1989) observes that one potential source of reading difficulties may be that the reader has a consistent interpretation for the text which may not be the one intended by the author. Much of the meaning understood from a text is really not actually in the text per-se but in the readers’ background knowledge. A reader’s failure to activate an appropriate schema during reading results in various degrees on non-comprehension. Failure to activate an appropriate scheme may either be due to writers not having provided sufficient clues in the text for the reader to effectively utilize a bottom-up processing mode to activate the schemata the reader already possesses.

Pearson and Spiro (1982) notes that there are several schema-related reasons why we might not comprehend what we read; we might not have the schema available to help us understand or we might have the schema available but fail to access it. Teachers should
therefore assist learners to activate background knowledge or to create new schema to help them in reading comprehension.

Research by Targesen, Wagner and Rashottee (1977), brings out clearly that learners who get off to a poor start in reading rarely catch up. Class one readers are likely to continue being poor readers even at the higher levels of their learning and this may bring problem in reading comprehension even as learners progress through the classes.

Cornoldi and Oakhill (1996) observed that decoding and comprehension are positively correlated. The skilled decoder is also a skilled comprehender and a reader who is poor at decoding is also poor at comprehension. A poor reader is poor either in comprehension or decoding or both. This shows that among poor readers decoding skill and comprehension are negatively correlated.

Teachers can also be a contributing factor to difficulties experienced by learners. Ojanen (2007) posits that reading problems can be a result of inadequate teaching. For children to become fluent readers, teachers have a lot of work in teaching literary skills. Readers may become disabled in reading when effective methods of teaching are not used.

Learners with serious decoding problems are hindered from text comprehension. Many words will be misidentified or read slowly until what was read is forgotten. Smith (1991) notes that decoding has been cited as a serious factor affecting reading ability.

Mando (2008) indicates that reading difficulties are mainly caused by failure to acquire phonological awareness and the skills in alphabetical coding. Some research work shows that phonological awareness as a predictor of reading success at all levels (Bader 1980 and Smith 1991).
Reading difficulties are the most frequent learning problems among students and the main reason for academic failure (Chall, 1996; Dickson and McCabe 2001; Kuhn & Stahl 2004; Rasinski & Hoffman 2003).

It can be noted from the above findings that there is some relationship between reading difficulties and academic performance. However, there are studies showing contrary findings as shown in the literature below;

Bronwen Oberholzer (2005) did research on the relationship between reading difficulties and academic performance among a group of Foundation phase learners. Using data from academic progress report and from a scholastic assessment carried out by an educational psychologist, correlations were calculated between the learners reading ability and academic performance. Research findings showed no significant correlation. The results were not in line with the general opinion in that the children’s reading difficulties did not appear to be impacting negatively on their academic potential.

Strauss (1992) did research among undergraduate students in first year at the University of Orange Free State. Her results indicate that there is no relationship between reading difficulties and academic performance. In her study, an experiment group was exposed to a reading development while a control group was not. Before and after comparison of academic results of both groups showed no improvement on the results of the experiment group.

The studies referenced above have related reading difficulties and reading comprehension among different levels of learners. This study goes further to establish the relationship between the two variables (reading difficulties and reading comprehension) on one hand
and academic performance on the other among class three pupils in Westlands Sub-County, Kenya. This may inform the effect on academic performance as learning progresses to higher levels.

1.3. **Research methodology**

1.3.1. **Introduction**

The purpose of this study was to investigate the correlation between reading comprehension practices and academic performance. This section highlights the research design, population, sample and sampling procedures, research instruments, data collection and data analysis procedures that will be used to gather information from the participants.

1.3.2. **Research design**

A research design is the “glue” that holds all of the elements in a research project together. It is used to structure the research. Orodho (2003) defines it as the scheme, outline or plan that is used to generate answers to research problems. It is the research design that determines the research methods and procedures to be applied as determined by the nature of the research problem. Research design is the overall research methodology such as qualitative, quantitative, case study or a combination of these. Research design relates to the general approach adopted in executing the study. The researcher has to specify the type of the design followed in the study (Oyedele, 2003).

This study used case study research design and quantitative and qualitative approaches for data collection and analysis. Case study was appropriate for the study because it is an in-depth investigation of an individual, group of individuals, school community or institution. The case study allowed the researcher to learn as much as possible about the
population or phenomenon under investigation and also helped the researcher to organize data for the purpose of reviewing the social reality in the classroom (Babbie, 1992 & Shank, 2006). The case study approach helped the researcher to address the research objectives (Johnson and Christensen, 2004 & Shank, 2006).

The qualitative research approach relies on the collection of non-numerical data such as words and pictures. The qualitative research design was appropriate for this study because the data collected was in form of words and behaviors as they occur in the natural environment (Gay, 1998, Johnson and Christensen, 2004 and Shank, 2006).

Qualitative research design implies the use of methods such as interviews and tests for collecting and analyzing data. This allowed the researcher to interpret the results in different ways. Specifically the case study was used for executing this study.

1.3.3. Location of the study
The location of the study was in Westlands Sub-County in Nairobi County in Kenya. The study was carried out in Westlands Primary School.

1.3.4. Target population
Powers (1995) in De Vos et al (2005 p.193), defines a population as a set of entities in which all the measurements of interest to the researcher are presented while Seaberg (1988), defines population as the total set from which the individuals of the study are chosen. The target population consisted of teachers teaching class three and the class three learners in the Sub-County.
1.3.5. Sample and Sampling procedure

Seaberg (1998) defines a sample as a small portion of the total set of objects, events or persons which together comprise the subjects of the study, while sampling according to Kerlinger (1986) means taking any portion of the population as representative of that population. One school was selected based on accessibility and performance.

Westlands Primary School was selected by means of convenience sampling from the 26 public primary schools within Westlands Sub-County. According to Mcmillan and Schumacher (2001), convenience sampling is used when a group of subjects are selected on the basis of being accessible. The researcher chose the convenience sampling method because the cases were available and easily accessible (Borg and Gall, 1996). The researcher selected particular elements from the population that were informative about the topic of interest. The researcher did not deal with all the one hundred and sixty eight class three learners, but randomly selected fifty seven learners from the three streams. The sample size of fifty seven learners was determined by time and financial constraints. The reason why the researcher decided on fewer learners in the sample was that she wanted to have more test(s). Increasing the learners in the sample would have necessitated a reduction in the number of tests administered. More tests were required to measure aspects which helped the study to achieve the objectives.

1.3.6. Data collection and procedures

Data refers to all the information a researcher gathers for his or her study. This section describes data collection procedures. The instruments used in data collection for purposes of getting the required information were an interview guide (Appendix A), a classroom
observation schedule (Appendix B), a comprehension passage (Appendix C) and examination performance scores (Appendix D).

1.3.7. Data analysis

Mugenda and Mugenda (1999) stated that, “Data obtained from the field in raw form is difficult to interpret…” Data analysis is all about examining what was collected in a survey or experiment and making deductions and inference. Data was sorted out according to objectives in this study. Each research instrument belongs to an area under investigation in line with the research objectives. The responses were tabulated according to the type of response made. From the analysis the researcher was able to come up with suggestions.
CHAPTER TWO
READING COMPREHENSION

2.1. Introduction

This chapter deals with the concept of reading and reading comprehension. The chapter is aimed at giving the study basic background information. The following is discussed: reading in general, comprehension process, components of reading comprehension, levels of reading comprehension, cognitive model of reading comprehension and instruction method in reading comprehension.

2.2. Reading in general

The Penguin Dictionary of Psychology (Preber 1995; 638) defines reading as ‘...the process by which information is extracted from written or printed text.’ It continuous to say that the process is extremely complex and is dependent on two critical aspects that is;

i) The written format of the words and the readers ability to decode the phonetic relationship between the letters on the page and the sounds of the spoken language and

ii) Semantic/syntactic process that has to do with the meaning of the words which are being pronounced.

Seyler (1997) defines reading as a process of obtaining or constructing meaning from a word or cluster of words. Reading means understanding the ideas or information of the words put together in a particular pattern chosen by the writer. If we are not getting meaning then we are not reading. It is a cognitive activity. You read with your brain.
Reading is a psycholinguistic process in that it starts with a linguistic surface representation encoded by a writer and ends with the meaning which the readers construct. There is an essential interaction between language and thought. Brielby (1999) observes that reading means the way we make sense of print translating black marks on the page into meaning.

Reading is a means of learning a language, of communicating and of sharing information and ideas. It is a complex interaction between the text and the reader which is shaped by the reader’s prior knowledge, experiences, attitude and the reader’s language community which is culturally and socially situated. The reading process requires continuous practices, development and refinement.

Walter (1982) refers to reading as an active thinking process of identifying important ideas, comparing, evaluating and applying them. Clarke (1988) suggests that language problems seem to be the most frequent source of reading difficulties to ESL learners which leads to lack of comprehension.

Grellent (1981) observes that for students to read efficiently they must adapt their reading speed and techniques to their aim of reading. Fluent reading must occur rapidly in almost any purposeful context, and the more rapidly a text is read, the better the various processing components are likely to operate.

Reading is an interactive process. Widdowson (1997) has discussed reading in this light as the process of combining textual information with the information the reader brings to the text. In this view, reading process is not simply a matter of extracting information from the text. Rather, it is the one in which reading activates a range of knowledge in the
readers mind that he or she uses and that in turn may be refined and extended by the new information supplied by the text. Reading is thus viewed as a kind of dialogue between the reader and the text. The process of reading consists of two main components which are word recognition or decoding and reading comprehension.

2.2.1. Decoding

Carpenter and Just (1981) defines decoding as the process whereby the written letters and words are translated into language. Emphasis is usually on decoding skills when the learner is taught to read. It is generally agreed among researchers that comprehension cannot occur without the necessary decoding skills. (Just and Carpenter, 1987, Vauras, Kinnunen and Kuusela, 1994, Grove & Hauptfleisch, 1982). For successful reading, decoding skills are the building blocks. A learner with good decoding skills can manage to read with speed, accuracy and fluency.

Reading fluency improves reading comprehension since the children are no longer struggling with decoding words, they can devote their attention to making meaning from the text. If children have to devote much time decoding words, their reading will be slow and will result in comprehension difficulties.

Readers skilled in decoding comprehend text better than the poor decoders. Children who are good decoders read more words than the poor ones (Joel, 1988) which leads to greater reading growth. Cornoldi and Oakhill (1996) note that decoding and comprehension are correlated. Skilled reading clearly requires skill in both decoding and comprehension.
2.2.2. Reading comprehension

Comprehension is what reading is all about. It is meaning gained from reading. Anderson et al (1997; 369) observes that every act of comprehension involves ones knowledge of the word as well. Comprehending a text is an interactive process between the reader’s background knowledge and the text. Efficient comprehension requires the ability to relate textual material to one’s knowledge. Comprehending words, sentences and entire text involves more than just relying on one’s linguistic knowledge. What we remember of a text is not wording of the text itself but the meaning we make of it including the inferences we have made in a single integrated whole.

Machet and Pretorius (2003) point out the different skills and knowledge that a reader needs so as to develop reading comprehension. The skills include the ability to link information in a text, the ability to use background knowledge, the ability to read in between the lines and make connections between the things described in a text, the ability to differentiate between main ideas and those that are of secondary importance, ability to make predictions about what is being read and ability to draw conclusions about what has been read. Pretorius (2000) notes that “students need to be good at reading to be able to read to learn.” In her research amongst undergraduate students in UNISA, the findings showed evidence for difference in reading ability in relation to academic performance.

2.3. Reading comprehension process

The main goal and heart of reading is comprehension. Reading comprehension as a process involves three stages which are pre-reading, while reading and post reading stage (Aubersold and Field, 2003, Urquhart and Weir, 1998).
2.3.1. Pre-reading stage

The main purpose of pre-reading stage is to prepare the readers for the text that they are going to read. This is a stage for warm up activities which engage readers in preparation for reading task. This stage also provides an overview that can increase reading speed and efficiency. Williams (1987) observes that the reasons for pre-reading is to stimulate interest in the text, have a reason for reading and to prepare the learner for the language of the text.

The activities carried out at this stage allow students to think about what they already know about a given topic and predict what they will read. Readers are taught unfamiliar vocabulary or other concepts, search for the main idea and be provided with a purpose for reading (Danny and Ransink, 2008). This stage prepares learners to read and activate their prior knowledge about the topic of the text. Tierney and Cunningham (1984) claim that pre-reading activities act as a way to access the readers’ former knowledge “and provide a bridge between his knowledge and that of the text” (P. 610).

Many researchers observe that this stage aids learners comprehend a text better. Schema theory researchers show greater importance of background knowledge without which readers cannot understand a text. Carell and Eisterhold (1983) show the importance of text pre-viewing activities for ESL readers because of the potential of cultural specificity of the text. Hudson (1982) observed that readers taken through this stage are able to predict what to find in the reading text. Urquhart and Weir (1998: 184), suggested the following as some of the pre-reading activities:
i) thinking about the title;

ii) reading the preface, the foreword and blurb carefully and;

iii) reading appendices quickly.

2.3.2. Reading stage

The aim of this stage is to assist the learner put together what he is reading, relate the information to own experience, opinions and knowledge, follow the order of ideas in the text, to understand and infer the information contained the text and confirm background knowledge (Aubersold and Field, 2003).

At this stage learners are required to practice and apply comprehension strategies such as stopping to summarize, asking questions, making connections and monitoring comprehension (Adler, 2001). Proficient readers during reading use cognitive and metacognitive strategies on what they read. Strategies help them understand what they read. Shahidullah, (1995 – 1996) suggested the following while reading activities:

i) guessing meaning from context;

ii) answering preset questions;

iii) guessing meaning of unfamiliar words;

iv) matching text with picture or diagrams;

v) analyzing sentences;

vi) extracting specific information and;

vii) getting detailed information.
2.3.3. **Post reading stage**

Actively engaging with the text does not end after reading the text. To carry the readers to academic excellence in all areas active reading skills need to be fostered. As the readers process the information read they need to exercise their ability to summarize, clarify, connect and evaluate as an indicator that they have understood what they have read (Marzano and Robert 2001).

2.4. **Components of reading comprehension**

The components of reading comprehension play a vital role in comprehension process. They are vocabulary, background knowledge, strategies, inference and word reading.

**Background knowledge:** Alexander and Judy (1988) define background knowledge as all the world knowledge that the reader brings to the act of reading which includes facts, personal knowledge and school based knowledge. Schema theorists postulate that background knowledge is crucial in comprehension process. This is old information against which new information is mapped which eventually leads to text comprehension.

**Word reading:** This component includes the reader’s word attack skills and sight words stored in the long term memory. Word attack skills include decoding and morphological strategies using suffixes and prefixes (Naggy et al 1993). Word reading is different from vocabulary knowledge because a reader can read a word but does not know its meaning or may know the meaning when it is spoken but cannot pronounce the word in its written form.
Word reading fluency plays an important role in comprehension for it draws attentional resources away from effortful process such as the comprehension strategies (Samuel, 1994). Readers with word reading problems will definitely have problems with background, inference, vocabulary and strategy problems.

**Vocabulary**: Has been defined as the knowledge of a word’s meaning. There are many aspects of word knowledge. Vocabulary has proved to be one of the strongest predictors of reading comprehension in both EL1 and ESL learners (Anderson and Freebody, 1981). Anderson and Freebody (1981) made the distinction between two dimensions of vocabulary knowledge; breadth and depth. According to them vocabulary breadth refers to the number of words for which a person knows at least some of the significant aspects of meaning” (P.93) while vocabulary depth is the quality or depth of understanding” (p. 93).

Some researchers have suggested that morphological information is an aspect of depth of vocabulary. Knowledge of affixes and roots can help readers in the formation of word depth (Bowers and Kirby, 2010). Knowledge of vocabulary includes understanding the relation between words called morphological knowledge and strategies for working out new words (Naggy, Diakidoy and Anderson 1993).

**Inference**: (Baumann et al, 2003) defines inference as a logical process of combining information within sentence in a text, between sentences in a text or prior knowledge and a text. Readers’ inference making skills improve their comprehension (Cain and Oakhill, 1999).
Inferring leads to better overall comprehension, more engagement with the text, enables readers to look beyond the events of a story and the text on the page and helps them to be metacognitive. (Thinking about their own thinking- how to apply background knowledge and experience to draw reasonable conclusion in specific situations).

**Strategy:** Alexander and Judy (1988) define strategies as “goal directed procedures that are plainly or intentionally evoked... (that) aid in the regulation, execution or evaluation of task.” Adler (2012) defines comprehension strategies as plans and sets of steps that good readers use to make sense of a text. The strategies form the foundation for improving text comprehension. Research has shown that improving reader’s strategy skills lead to substantial reading comprehension benefits (Kendeou, Rapp and Van den Broek, 2003). Strategies such as making connections, inferring, summarising, monitoring comprehension, visualizing, questioning, synthesizing information and predictions enable readers to understand a text.

2.5. **Cognitive model of reading comprehension**

This model by Walter Kintsch is a model of reading comprehension which incorporates the five different components involved in reading comprehension. There is an interrelationship among the comprehension components as represented in the construction – integration model (Walter Kintsch 1988, 1999).
The Construction Integration (CI) by Walter (1988) is a connectionist theory which proposes two phases in text comprehension which are construction phase and an integration phase. In the construction phase when a reader reads a word (decoding) it straight way activates that word plus all its meaning (vocabulary) in the long term memory (Graesser, Mills and Zwaan, 1997). The Semantic associates of the word (from background knowledge) are activated, in the readers mind a literal version of the text is constructed from the three components vocabulary, background knowledge and decoding. At the integration phase there are two roles played by background knowledge. First, connections among nodes from long-term memory depend on background knowledge (Whitney, Budd, Bramucci and Crane, 1995) second background knowledge is used to make inferences, elaborations and in text interpretation (using domain-specific knowledge about texts, (Kintsch 1994).
Background knowledge has a strong impact on comprehension “All text structures require domain specific strategies and knowledge (Kintsch 1998). In familiar domains strategies are not necessary. Kintsch argues that no special strategies are required to make spatial inferences.

From Figure 1 each arrow is a representation of a theoretical statement which states that there is a direct effect (path.) from the variable at the tail of the arrow to the variable at the head of the tail. A curved double – headed arrow is a representation of a theoretical statement that the two statements are correlated. Absent arrows between a pair of variable is a representation of a theoretical statement that there is no direct effect between them.

Strategies have a direct effect on reading comprehension and an indirect effect on reading comprehension via background knowledge and inference (Kintsch, 1998). He argues that vocabulary has no direct effect on comprehension but an indirect one via inference. According to Kintsch in the construction integration model (CI) strongly emphasizes on the role of background knowledge in inference.

2.6. Levels of reading comprehension

Reading as a thoughtful process embraces the idea of levels of comprehension. Herber (1978) argues that levels construct is a simple treatment of comprehension. Readers respond to meaning at various levels. The levels are the literal, interpretive and applied levels.
Below is a familiar narrative used to explain the levels of comprehension. The narrative tells of a fairy tale about a girl called Cinderella. Her evil step mother could not let her go to the ball. Cinderella’s fairly grandmother magically enables her to attend the ball and finally happily married to her charming princess.

**Literal level:** At this level reading is done to recall, understand and remember the information as it is in the passage. Words are used in their usual meanings. It is simple, surface reading and what is actually stated has to do with facts and details, rote learning and memorization and surface understanding only. Literal meaning is important and should be given the attention it deserves. If the reader knows the meaning of the individual words and when put together will know what the sentence means the reader can read the print to get the authors gist of the message (Herber, 1978). Teachers ask learners to find information and ideas that are explicitly stated in the text. Questions asked to show this kind of thinking are WH – Questions like what, who, when and where.

Kerlin (1971) notes that being able to read for literal meaning i.e. stated ideas is influenced by one’s mastery of word meanings in context.

Example:

- Who is the girl who had a wicked stepmother?
- What happened at midnight when the clock struck twelve?
- Who waved a fairly wand?
- Where did the glass slipper get lost?
**Interpretive level:** constructing meaning from print does not solely depend on knowing what the author says for the fact is not sufficient. Good readers search for conceptual complexity in material. They “read between the lines” they not only focus on what the author says but also on what the author means by what he says. Herber (1978) made a clear difference between literal and interpretive levels this way “At the literal level readers identify the important information. At the interpretive level readers perceive the relationship that exists in that information, conceptualizing the ideas formulated by those relationships.....” (p.45). The reader should read critically and analyse carefully what they have read. They should see relationships among ideas and see the implied meaning of the ideas.

The reader has to make inferences about the author’s intended meaning. Reading is an interpretive process, so part of this interpretive process is how the reader conceptualizes implied ideas by integrating information, in light of what they already know by tapping into prior knowledge, experience, attaching new learning to old information and making logical leaps and educated guesses. The reader makes inferences that are implicit in the material.

**Example**

- How did the rats turn into horses?
- What could have happened if Cinderella did not have a godmother?
- Had Cinderella not lost the glass slipper what could have happened?
Applied level: At this level reading is a kin to the act of discovery. Bruner (1961) explained that discovery is in its essence a matter of rearranging or transforming evidence in such a way that the reader goes beyond the assembled evidence to additional insights” P.21). The reader takes what was said (literal) and then what was meant by what was said (interpretive) and then extend (apply) the concepts or ideas beyond the situation. Readers synthesize the information and relate it to what they know which enables them to draw additional insights and fresh ideas from contact material and express opinions. Readers not only read the lines to get what the author says but also between the lines to elaborate the message.

Example

- Was Cinderella right to go to the ball after her step mother told her that she shouldn’t?

2.7. Instructional method in reading comprehension

In reading, teachers have to teach learners on how to read by moving beyond the surface level of reading (finding meaning in the text) into a more critical perspective that of assigning meaning to what is read. There is a need for concrete connection between text and the real world for reading to be effective and purposeful for teachers and learners. Learners need to be taught not only to understand what is in a text (comprehension) but to activate their prior knowledge, make connections and comparisons (analysis) and create new knowledge (synthesis) to develop the ability to read (Naiditch, 2009). Research has shown that reading comprehension improves most when teachers provide explicit comprehension instruction to children.
2.7.1. Explicit instruction and reading comprehension

The National Reading Panel (2000) noted that there is a correlation between direct instruction and improvement in comprehension by claiming that the rationale for explicit teaching of comprehension skills is that comprehension can be improved by teaching learners specific cognitive strategies. Duffy (2000) argues that the strategies benefit struggling learners since reading comprehension is complicated so the strategies can be taught directly to the learners.

Bauman (1983, P. 287) supports explicit instruction by claiming that in direct instruction, the teacher is in face to face with the learner where he/she tells, shows, models, demonstrates and teaches the skill to be learned. The key word is teacher for the teacher is in command of the learning situation and leads the lesson as opposed to having instructions directed by a workbook or kit. Pressley (2000) notes that it requires a complicated educational strategy to meet the goal of improving readers’ comprehension skills.

Berliner (1981) observes that in direct instruction, teachers are associated with effective classroom instruction which involves opportunity to learn, content coverage, allocated time and academic engaged time. At the heart of direct instructions lies the teacher a fact that may not be accepted by learner centered theorists.
CHAPTER THREE

READING COMPREHENSION AND SCHEMA

3.1. Introduction
This chapter is a discussion of reading comprehension and schema theory. The following are discussed: schema theory, content schema, formal schema, bottom-up reading process and top-down reading process.

3.2. Schema theory
Schemata are the background knowledge that readers bring to text which aid in text comprehension. Background knowledge is also referred to as world knowledge, is all the knowledge on individual possesses. It is all the knowledge that an individual has stored in the mind as a result of innate capabilities that the human mind is endowed with to organize the experiences that the individual has been exposed to (Kant 1981, cited in Sowa 1984, Chomsky 1976 and Piaget 1951, cited in Clark 1975). Background knowledge could also be referred to as all the knowledge contained in what Tulving (1972) calls ‘schematic memory’ and episodic memory’ roughly all the particular and generalized knowledge stored in the mind. There are two types of schemata: content and formal schemata.

Schemata constitute a powerful means used by readers in comprehending a text with both implicit (indirect) and explicit (direct) Brewer (1977:3). Sowa, (1984:43) posts that patterns stored in the mind are imposed on texts, thus determining processing and understanding of discourses.
According to Adams and Bruce (1983:37) a more correct statements of the role of background knowledge would be that comprehension is the use of prior knowledge to create new knowledge. Without prior knowledge, a complex object, such as a text, is not just difficult to interpret: strictly speaking, it is meaningless.

3.2.1. Content schemata

Content schemata are background knowledge about content of a text or cultural orientation. It relates to the knowledge readers have of the semantic content of texts (Carrel 1983b). Activation of content schemata is very crucial to comprehension. Harberlands (1988) notes that readers do not construct meaning of a text in a vacuum but do so on a background of relevant facts and information presented in text. Comprehension is easily achieved if the reader associates text content with appropriate knowledge sources – which is made possible when the reader is familiar with the topic/content. Studies show that readers who are familiar with the topic recall more than those who are not familiar with the content/topic. (Alderson and Orquhart, 1988 and Johnson, 1982)

3.2.2. Formal Schemata

This type of prior knowledge relates to the knowledge that readers have of the ways different genres are rhetorically organized (Carell 1983b). Formal schemata refers to background knowledge about organizational forms and rhetorical structures of various types like study notes, academic texts and newspaper articles (Carell and Eisterhoo 1983, Carell, 1987, Aebersold and Field, 1987). Reader’s expectations in formal schemata is defined about how pieces of textual information will relate to each other and in what order it will appear (Carell, 1987). Formal schemata have been studied in narratives. A
result of the exploration in narratives was the creation of grammars Rumelhart 1975, Mandler and Johnson 1977, Thorndike 1977, Stein and Glenn 1978, Stein and Nercworsky 1978). The rhetorical structure of narratives contains slots for setting, theme, plot, outcome and resolution. Readers understand stories not only because of the content of the stories but because they have developed formal schemata which enable the content to be assimilated under specific structure slots.

Schema theorists believe that meaning neither exists in the text but in the reader’s mind – depending on the activation of the brain schemata whose controlling structure goes through bottom-up data – driven processing and top down concept driven processing.

3.3. Bottom – up reading process

Bottom-up processing is data driven. This process starts with the printed symbols and derives meaning from individual words, phrases, clauses, sentences, paragraphs and entire texts. This bottom-up movement goes from specific to general.

Gough (1972) developed this model and argues that reading is a process of decoding letter by letter. Readers build textual meaning when they start to decrease the letters of a word and syntactic features of a text. When readers become familiar with the word with time they will automatically recognize the words which will help them to read fluently. Decoding and construction of meaning finally leads to text comprehension.

The bottom up reading process has been criticized as having covered only unilateral aspects of the reading process but it still has a great contribution to reading (National Reading Panel 2000). The role of bottom up ability is very crucial to comprehension.
3.4. **Top – down reading process**

Top-down reading processing is also referred to as conceptually driven processing which as from general to specific lays emphasis from “brain to text” (Eskey, 2005, p.264) and what readers bring to the text is more important than what is brought by the text. Characteristics to this model is that the reader relies more on existing knowledge and minimal use to text information (Hayes, 1991 & Smith 2004).

Background knowledge plays a very important role in reading. Readers’ fit the text information into their existing prior knowledge as they read (Carell and Eisterhold, 1983).

3.5. **Interactive / Compensatory Reading Model**

This model was developed by Stanovitsch (1980). According to this model the top-down and bottom up take place at the same time and this is what he calls ‘interactive.’ Further he notes that “compensatory” means that if there is a deficit in the process, this deficit will be compensated by heavier reliance on other knowledge source. For example if a reader faces difficulties in identifying graphic symbols he may rely on top-down strategies such as the use of context to compensate for the difficulty encountered. As they read readers combine their top-down processes with their bottom-up processes (Grabe 2004) which indicates that comprehension is the result of meaning construction. To create meaning they interact with the text.

The interactive modes lays emphasis on ‘schemata’ which is the reader’s knowledge about his world and the text. What he finds in the text he fits it into the framework. Remulhart (1977) notes that comprehension is the process of selecting the schema that
illustrates input information and variable constraints. In reading comprehension there is
the putting in some information and the search for the schema that illustrates the new
information, and the moment the schema is identified comprehension gets generated.

For reading comprehension proper schema needs to be activated during pre-reading
activities which aid in searching for old information in the memory. Pearson and Fielding
(1991) point out that schema is usually associated to knowledge of concepts themes and
topics. When readers lack background knowledge schema theorists encourage the
building of background knowledge which will form a framework to help the readers in
future for the organization and integration of new knowledge.

The guiding principles of the theory include the following.

i) Teachers should help learners build schemata and make connections between
   ideas;

ii) Schemata grow and change as new information is acquired;

iii) Deep seated schemata are hard to change and an individual may prefer to
    remain with consistencies rather than to change a deeply held value;

iv) Learners feel internal conflict if they are trying to assimilate schemata which
    contradicts their previous suppositions;

v) It is important to teach general knowledge and generic concepts.
In conclusion it can be said that without background knowledge it can be difficult to achieve the main goal of reading which comprehension is. It is very crucial for the concept of schemata be understood to help in understanding how readers acquire new knowledge and how to help readers realize this goal. Teachers should ensure that before reading, prior knowledge is activated to aid readers in the comprehension process.
CHAPTER FOUR
DATA PRESENTATION AND ANALYSIS

4.1. Introduction

This chapter highlights the presentation of the findings, data analysis and a discussion of the study in line with the set objectives. The chapter is divided into four main sections: reading comprehension and academic performance, reading difficulties and instruction in reading comprehension.

4.2. Reading comprehension

The main objective of the study was to find out the correlation between reading comprehension and academic performance among class three learners in Westlands Primary school.

4.3. Reasons for learners text comprehension

Class three teachers gave their views on learner’s text comprehension (Appendix C). The teachers argued that learners comprehend what they read because of the reasons identified below.

- Decoding ability
- Connecting new information to what they already know
- Good retention
- Attentive
- Use of contextual clue skills to get meaning of new words.
- Reading story books
- Good speaking skills
• Good listening skills
• Vocabulary learning

Decoding is one of the components of reading. It is defined as the process in which written letters and words are translated into language. Without this skill a reader cannot attain reading comprehension. One of the teachers said that readers who translate the written words into language will find it easier to comprehend.

The old information that readers possess is referred to as background knowledge against which readers map new information for reading comprehension. Teachers were of the opinion that readers who have an idea of the work they are reading easily understand the new information that they read. During classroom observation (Appendix E), the researcher was in agreement with this as they went through a passage about the post office. The learners looked familiar with the post office and all that goes on there.

Vocabulary knowledge enhances reading comprehension. When learners have an idea on the meaning of words will automatically comprehend what they read. Readers with a large knowledge of vocabulary are proficient readers.

The researcher observed that a high percentage of learners comprehended what they read from the way they answered written questions in the comprehension passage administered by the researcher (Appendix C). This not only requires comprehension skills but ultimately good thinking skills. The learners use high order thinking skills that means that they understand and can find connections between the many facts, manipulate them and put them together in many ways and most important apply them to find new
solution to problems as a sign of good retention. The proficient readers’ ability could be attributed to pre-reading activities that they are taken through.

The teachers said that learners comprehend what they read because of the decoding ability. It is generally agreed among researchers that comprehension cannot occur without the necessary decoding skills. Decoding skills are the building blocks for reading comprehension. Good decoding skills enables a learner to read with fluency, speed and accuracy. Just and Carpenter, (1987), Vauras, Kinnunen and Kuusela, (1994), Grove and Hauptfleisch, (1982), Cornoldi and Oakhili, (1996) note that decoding and comprehension are correlated. To work out meaning of words the teachers said the learners use context.

Matchet and Pretorius (2003) point out the different skills and knowledge that a reader needs so as to develop reading comprehension. The skills include the ability to link information in a text and ability to use background knowledge. I concur with Machet and Pretorius that background knowledge enhances comprehension.

Vocabulary has proved to be one of the strongest predictors of reading comprehension in both ELI and ESL learners (Anderson and Freebody, 1981). Teachers should assist learners to overcome such hindrances through vocabulary knowledge (Levy et al, 2006), phonic knowledge (Adams, 1990) and phonological awareness (Stanovich, 2000) which are some of the factors that assist learners in vocabulary reading. The learners’ vocabulary powers need to be developed so that they know what words mean which will make comprehension possible.
Readers with comprehension difficulties use too much of their processing capacity to read individual words which interferes with their ability to comprehend what they read. Learners with poor reading comprehension skills lack adequate ability to truly understand what they are reading. It is difficult for them to connect new ideas to previously learned facts and they haven’t learned to implement higher order thinking skills which is the ability to think beyond the rote memorization of facts or knowledge so they can analyse, synthesize and evaluate new knowledge.

Teachers need to activate learners’ background knowledge because the way we learn is by relating new information and experiences to what we already know. Researchers emphasize the need for schema activation before reading (Carrel 1989). If the subject is not known by the reader then getting the words of the text into mind can be a waste of time.

**Table 1: Frequency of reading comprehension**

<table>
<thead>
<tr>
<th>Frequency</th>
<th>No of teachers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Once a week</td>
<td>2</td>
</tr>
<tr>
<td>Thrice a week</td>
<td>0</td>
</tr>
<tr>
<td>Daily</td>
<td>1</td>
</tr>
</tbody>
</table>

The number of times for reading comprehension differed among the classes with two teachers having it once a week and one teacher having it daily (Appendix D). According to class three English syllabus for primary school there are five lessons for English per week. Four lessons are dedicated to pre-reading and post reading activities while one
lesson is for reading comprehension. One teacher does reading daily meaning that little time is dedicated to pre-reading and post reading activities.

The main goal and heart of reading is comprehension. Reading is viewed as a comprehension process that involves three stages which are the pre-reading, while reading and post reading stages which are accommodated in the five lessons as per class three English syllabus for primary schools.

4.4. **Pre-reading activities**

Teachers stated the pre-reading activities that they carryout in their classrooms (Appendix D), which are listed here below.

- Group discussions
- Brainstorming.
- Defining new words
- Observation:
- Visual aids
- Sharing experience
- Pre-teaching the concepts
- Teaching difficult to decode words

Pre-reading activities are meant to activate prior knowledge and capture the interest of the reader. At this level pre-teaching of vocabulary (decoding and meaning) and pre-teaching of concepts through concept diagrams is done. Learners need to know something about the topic before reading. The extent of preparation needed depends on the experience of the learners with the given text, the amount of knowledge the learners
have on the topic and the complexity of the material. These activities offer a great opportunity to introduce comprehension components such as compare and contrast, personification and main ideas.

Teachers said that they teach difficult to decode words with their meanings and they pre-teach the concepts unfamiliar key words need to be taught to learners before reading with the aim enhancing reading comprehension.

In brainstorming learners pool what they know about a topic and share their knowledge. The goal of brainstorming is to activate the learners’ expectations and help them identify what the text is all about. During brainstorming the title is examined and the learner list all the information that comes to mind about the topic which will be used to recall and understand the text.

The teachers said that they at times group the learners so that they share information of what they know about the topic. Group discussion help learners discover what they will bring to the reading and what others in class bring. Teachers argued that they use visual aids. Pictures and visual aids can activate prior knowledge. Learners observe the pictures and give their views.

The researcher observed during classroom observation (Appendix E) that two teachers involved learners in pre-reading activities, there was learning of the meaning of new words and discussing the topic as a way of activating their background knowledge. One of the teachers failed to involve the learners in pre-reading activities but went straight to reading the comprehension passage which was contrary with what the teacher gave during the interview. This means that the pupils read without proper preparation. As a
way of activating learners’ background knowledge they should be taken through pre-reading activities. Researchers have over time emphasized the need for schema activation before reading (Carell, 1989). Readers activate existing knowledge structures (schema) to interpret text.

Due to increased difficulty of words found in content area textbooks the teacher should ensure that students can decode and pronounce the words (Carnine, Jerry and Kammeenui, 1997). The teacher should pre-teach vocabulary because the number of word meaning that students know directly relates to their ability to comprehend a text. The teacher should introduce essential vocabulary within a passage to enhance comprehension (Carnine, Jerry and Kammeenui, 1997).

Carnine et al (1997, pg. 292) notes that in reading comprehension the first step in preparing learners for reading is meant to pre-teach significant variables within the material (difficult to decode words, new vocabulary) that will enhance comprehension.

The pre-reading stage prepares learners for reading. Greenwood (1998:15) observes that this stage can provide a “need to read, to complete an activity or confirm an idea, William (1996) notes that the aim of this stage is to arouse interest in the topic, to motivate the learners by giving a reason for reading and to provide language preparation for the text.

Tierney and Cunningham (1984) point out that pre-reading activities act as a way to access the readers’ former knowledge and provide a bridge between his knowledge and that of the text (p. 610). In conclusion it can be said that pre reading activities are essential in reading comprehension.
4.5. Reading activities

Teachers stated various activities that readers are exposed to (Appendix D) as listed below.

- Identifying new and difficulty to decode words
- Identifying words whose meaning they are not familiar with
- Predicting the next paragraphs explanations to enhance their thinking.
- Using contextual clue skills to work on meaning of new words
- Teacher stops them briefly to ensure that they have understood the bit read.
- Reading as individuals loudly as the rest of the class follow quietly in their books
- Reading on their own in groups.

While reading activities teachers noted that the students check their comprehensions as they read. As they read the reader needs to ask himself whether he has obtained the information he was looking for, understood the sequence of events and whether he understands main ideas. The readers check whether or not their predictions and guesses are confirmed.

To work out meaning of new words teachers teach and encourage leaners on how to use contextual clue skills. They get meaning from the context in which the word has been used. One of the teachers pointed out that she asked the readers to identify new and difficult to decode words so that as they read they learn how to pronounce and find their meaning to improve on their comprehension.
Teachers indicated that they involved their learners in the activities listed above. One teacher said that read on their own and explain to each other what they have read to build the spirit of competition as to who explains well and in the process learn from each other. At the individual level of reading the researcher noted during classroom observation that only good readers offered to read as the poor ones shield away and were not interest. The ratio of text books to learners was 1:1 a good indication that the learners are able to see the words well together with their spellings.

Since the goal of reading is comprehension lower primary teachers need to ensure that learners understand what they read. One of the teachers said that she stopped them briefly to ensure that they have understood the bit read by asking them questions.

At this stage the activities employed assist the learner put together what he is reading, relate the information to own experience, opinions and knowledge, follow the order of ideas in the text, to understand and infer the information contained in the text and confirm background knowledge (Aubersold and Field, 2003). As they read they try to see how the ideas are related and how the new information compare with prior knowledge. Adler (2012) notes that at this stage learners are required to practice and apply comprehension strategies such as asking questions, making connections and monitoring comprehension. Research has shown that improving reader’s strategy skills leads to substantial reading comprehension (Kendeou, Rapp and Van den Broek 2003).

While reading stage Greenwood (1998:59) points out that “students are taught to read and respond to books. At this stage learners should be involved in activities that will enable them to respond cognitively, emotionally and imaginatively to writing. Useful activities
should be carried out at this phase for better understanding in the next stage. The activities should cater for the level and standard of the learners.

While reading stage is very important because proper activities according to Williams (1996:38) will enable the reader to understand the text structure, clarify the text content and also to comprehend the aim of the writer. Greenwood (1998:59) notes that students must be taught how to read and respond to books.

In a reading lesson, learners need a lot of practice in reading. One of the teachers during observation missed out in step one and two where she was supposed to read as the learners listened and for learners to read silently. Two of the teachers discussed the topic as a way of making learners familiar with the text, but one did not. As a step in reading comprehension learners try to link prior knowledge to what they are reading but if this stage fails the learners be able to compare what they have read with background knowledge. I support schema proponents who argue that background enhances comprehension.

4.6. **Post reading activities**

The teachers gave the following views on what they do after reading with the learners (Appendix D)

- Discussions
- Questioning and answering, done by both teachers and learners;
- Summarizing, learners are asked to give a summary of what they have read
- Drawing, learners are asked to draw mental images created after reading;
- Composition writing based on what they read;
- Spelling/dictation of words;
- Checking meaning of new words and;
- Dictation, teacher dictates words as they (learners) write.

All the teachers used oral questions and pupils giving their views about the comprehension passage to assess the learner’s understanding of the passage. It was noted by the researcher in class that one teacher asked learners to write a composition on what they had just read as a way of assessing them.

One teacher said that she asks the learners to write a summary of what she/he has learnt from the text. The summary might include factual information or something learned about people in general. This activity is an effective strategy for those readers who have difficulty remembering what they have read. Summarizing requires readers to determine what is important in what they are reading and put it in their own words.

This activities offer the readers an opportunity to make connections with the text and their own experiences. The activities enable the readers to apply a more global understanding and interpretation of the text and integrate information from different parts of the text.

Discussion is one of the post reading activities that the teachers use. Discussion is a purposeful talk through which students explore their thinking, respond to ideas, process information and articulate their thoughts in verbal exchanges with classmates and their teacher.

After reading a text the readers are asked by their teachers to draw mental images created after reading to spell the words and check the meaning of the new words.
The aim of post reading activities is to integrate, synthesize and consolidate the information that has been read in the text. The activities at this stage encourage learners to reflect on what they have read. To carry the readers to academic excellence in all areas active reading skills need to be fostered. Marzano and Robert (2001) observe that as the readers process the information read they need to exercise, connect and clarify as an indicator that they have understood what they have read.

Post reading is an evaluation stage for what has been taught. The output and feedback from the learners is evaluated. According to Williams (1996:39) the post reading phase enables the learners to reflect upon what they have read and relate it to their own interest knowledge and experience. As they process the information read the readers need to exercise their ability to summarise, clarify, connect and evaluate as an indicator that they have understood (Marzano and Robert 2001).

Carnine et al (1997, pg.325) notes that of the many post reading activities two of them have particular merit (i) answering written questions and (ii) writing summary of the content and this helps learners have an opportunity to study and practice the main ideas. The activities provide students with a way of reinforcing what they have learnt. What the learners do after reading is as important as what they do before and during reading. It was however noted that the correct procedure was followed in the handling of post reading stage.
4.7. Reading comprehension and academic performance
This section deals with reading comprehension and academic performance to establish the correlation between the two.

4.7.1. Reading comprehension
Under this, the learners’ scores in reading comprehension are analysed. The scores are shown in (Appendix G).

Table 2: Reading comprehension scores

<table>
<thead>
<tr>
<th>Score</th>
<th>No. of children</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>0 – 10</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>1 – 20</td>
<td>1</td>
<td>1.8</td>
</tr>
<tr>
<td>21 – 30</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>31 – 40</td>
<td>1</td>
<td>1.8</td>
</tr>
<tr>
<td>41 – 50</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>51 – 60</td>
<td>8</td>
<td>14.0</td>
</tr>
<tr>
<td>61 – 70</td>
<td>2</td>
<td>3.5</td>
</tr>
<tr>
<td>71 – 80</td>
<td>10</td>
<td>17.5</td>
</tr>
<tr>
<td>81 – 90</td>
<td>10</td>
<td>17.5</td>
</tr>
<tr>
<td>91 – 100</td>
<td>25</td>
<td>43.9</td>
</tr>
<tr>
<td>Total</td>
<td>57</td>
<td>100</td>
</tr>
</tbody>
</table>
A comprehension passage was administered after post reading activities to find out the students reading ability. From the findings in figure 4.1, 43.9% of the total number under study scored between 91 – 100%. The lowest score was 20% with the highest score was 100%. Only 3.6% scored below average with 96% of the learners scored above average. The passage was performed well an indication that the reading ability of the majority of learners was good. A small percentage of the total learners under study scored below average. The good performance of the class can be attributed to the reading practices that learners are exposed to before, during and after reading.

During classroom observation (Appendix E), the researcher noted that majority of the learners did not have reading difficulties apart from a few for they had proper guidance from their teachers and were equipped with enough reading strategies which enabled them to succeed in reading comprehension. Background knowledge (schema) leads to
From the passage administered (Appendix G), it was noted that most of the learners are proficient readers and have learnt to implement higher order thinking skills which is the ability to think beyond rote memorization of facts or knowledge so that they analyze, synthesize and evaluate new knowledge. When they use higher order thinking skills means that they understand, can find connections between many facts, can manipulate them and put them together and apply them to find new solutions to problems.

McCarthy (1991) observes that good readers know that what they read should make sense. They use information they have about a topic in order to help them understand what they are reading. Proficient learners are effective and efficient. They are efficient in constructing a meaning that they can assimilate and which bears some level of agreement with the original meaning of the author. They are efficient in using the least amount of effort to achieve effectiveness. A reader’s knowledge, interests and attitude greatly affect any reading experience. According to schema theory reading is viewed as a comprehension process.

Laflammee (1997) observes that comprehension is difficult if meaning of words is known. Learners should be taught to find meaning by use of dictionaries and contextual clue skills.
4.7.2. Academic performance

The academic performance was measured using end of year exam results for class three. The average mean for each of the 57 pupils was used. (Appendix F) as shown in the table and graph below.

Table 3: Academic performance

<table>
<thead>
<tr>
<th>Score</th>
<th>Number of Children</th>
</tr>
</thead>
<tbody>
<tr>
<td>51 - 55</td>
<td>0</td>
</tr>
<tr>
<td>56 - 60</td>
<td>1</td>
</tr>
<tr>
<td>61 - 65</td>
<td>1</td>
</tr>
<tr>
<td>66 - 70</td>
<td>0</td>
</tr>
<tr>
<td>71 - 75</td>
<td>2</td>
</tr>
<tr>
<td>76 - 80</td>
<td>1</td>
</tr>
<tr>
<td>81 - 85</td>
<td>4</td>
</tr>
<tr>
<td>86. - 90</td>
<td>9</td>
</tr>
<tr>
<td>91 - 95</td>
<td>17</td>
</tr>
<tr>
<td>96 – 100</td>
<td>22</td>
</tr>
</tbody>
</table>

Figure 3: Academic performance
The highest pupils had an average score of 100% with the lowest scoring 60%. The average mean performance of reading comprehension recorded 85% and that of academic performance recording 92.2% indicating a close relationship between the two.

4.7.3. Correlations

The raw scores in reading comprehension and academic performance for each pupil was correlated. The analysis was carried out using Standard Package of Statistical Science (SPSS) to determine the correlation Pearson Product Moment Correlation was used. The summary of the correlations is shown in the table below:

Table 4: Correlation analysis

<table>
<thead>
<tr>
<th>Academic performance</th>
<th>Academic performance 1</th>
<th>Reading ability</th>
<th>Mcsds</th>
</tr>
</thead>
<tbody>
<tr>
<td>Reading ability</td>
<td>.911**</td>
<td>.699**</td>
<td></td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.001</td>
<td>.000</td>
<td></td>
</tr>
<tr>
<td>N</td>
<td>57</td>
<td>57</td>
<td></td>
</tr>
<tr>
<td>Pearson Correlation</td>
<td>.911**</td>
<td>1</td>
<td>.647**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.001</td>
<td></td>
<td>.002</td>
</tr>
<tr>
<td>N</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mcsds</td>
<td>.699**</td>
<td>.647**</td>
<td>1</td>
</tr>
<tr>
<td>Pearson Correlation</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.0134</td>
<td>.002</td>
<td></td>
</tr>
<tr>
<td>N</td>
<td>57</td>
<td>57</td>
<td></td>
</tr>
</tbody>
</table>

The data presented Table 4 was on reading comprehension and academic performance. Were computed into single variables per factor by obtaining the averages of each factor. Pearson’s correlations analysis was then conducted at 95% confidence interval and 5% confidence level 2-tailed. The table below indicates the correlation matrix between the
factors reading comprehension and academic performance of magnitude 0.699 and 0.911 respectively. The positive relationship indicates that there is a correlation between the factors and the examination results having the highest value and reading comprehension having the lower correlation value.

This notwithstanding, both factors had a significant p-value (p<0.05) at 95% confidence level. The significance values for relationship between reading comprehension and academic performance were 0.134 and 0.001 respectively. This implies reading comprehension was most significant factor.

Table 5: Correlation matrix

<table>
<thead>
<tr>
<th></th>
<th>Academic performance</th>
<th>Reading ability</th>
</tr>
</thead>
<tbody>
<tr>
<td>Academic</td>
<td>Pearson Correlation</td>
<td>1</td>
</tr>
<tr>
<td>performance</td>
<td>Sig. (2-tailed)</td>
<td></td>
</tr>
<tr>
<td>Reading ability</td>
<td>Pearson Correlation</td>
<td>.913**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td></td>
<td>.001</td>
</tr>
<tr>
<td>N</td>
<td>57</td>
<td>57</td>
</tr>
</tbody>
</table>

From Table 5 correlation matrix for between two variable of interest (reading comprehension and academic performance) not controlling for other variable in this case correlation is .913 a small increase in the strength of correlation i.e. (.911 to .913) the partial correlation used to explore the relationship between reading comprehension and academic performance. There was strong positive partial correlation between perceived academic performance and reading comprehension. \([r = .913, n = .001, p = <.005]\).
4.8. **Reading comprehension difficulties**

One of the objectives of this study was to investigate reading comprehension difficulties. From the interview (Appendix D), the classroom observation (Appendix E) reading comprehension difficulties were identified as listed below.

- Lack of adequate vocabulary
- Lack of prior knowledge
- Poor fluency
- Slow cognitive speed
- Difficulty of ideas presented
- Negative attitude
- Lack of interest
- Deficits in language ability
- Decoding deficits
- Retention difficulties

The teachers indicated that vocabulary deficit leads to non-comprehension. If learners have a limited vocabulary and do not know the meaning of the words, then reading comprehension cannot be attained. When teaching meaning, learners should be taught literal meaning of words.

Fluency is important in reading comprehension. Information can be inaccessible to reader if he has difficulties in word recognition, struggles with decoding and reads at a very slow pace. Reading at a fast pace contributes to reading comprehension.
Decoding deficits leads to comprehension difficulties. Readers skilled in decoding comprehend texts better than poor decoders (Joel, 1988). Readers should be able to translate written letters and words into language.

Reading comprehension is the outcome of decoding and linguistic comprehension. Learners with comprehension difficulties could be having deficits either in decoding or linguistic comprehension or both. Learners with decoding problems have trouble sounding and recognizing words, confusion of letters and sounds and slow rate of reading.

Learners with retention difficulties. Retention difficulties in learners can make them not to remember what they have read. Learners with this problem have trouble in connecting ideas in a text and what is read to background knowledge.

Deficits in language ability can cripple readers reading comprehension. Readers with deficits in language ability have low abilities in language areas such as vocabulary knowledge, grammar and syntax. Negative attitude and lack of interest can negatively impact on reading comprehension. The teacher should motivate them and show them the importance of reading.

The goal of reading is comprehension and this calls for activation of background knowledge according to schema theory. Readers need to be taken through the decoding process for this leads to comprehension. If a reader can decode and comprehend the printed word he has attained a skill in reading that will lead to future success (Human Resource and Social Development Canada, 2003).
Knowledge of vocabulary includes understanding the relation between words called morphological knowledge and strategies for working out new words (Naggy, Diakidoy and Anderson, 1993). Prior knowledge is an important aspect to successful reading and studies show when the reader is familiar with the subject matter it is easier to recall information. Clarke (1988) points out that language problems seem to be the most frequent source of reading difficulties to ESL learners which leads to poor comprehension.

4.9. Appropriateness of the Instructional Methods in Reading

During the interview (Appendix D) and classroom observation (Appendix E) it was noted that various methods are used as indicated below.

- Demonstration
- Discussion
- Look and say
- Phonics
- Silent reading
- Listening and speaking

Many methods are used by the teachers as indicated above. They explained how the methods work as follows: Demonstration is when teachers show the learners how to apply a strategy as they observe who will later imitate what the teacher did. Silent reading learners are expected to read silently on their observing good reading habits.

In phonic learners learn the names of the letters of and later the sounds (phonics) they make. After learning the sounds they will blend the sounds (phonology), to form words.
In look and say learners learn to recognize whole words so they can pronounce and spell them. The picture and the word are shown at the same time so that with time they associate the word with the picture. The most frequently used methods as indicated by the teachers is look and say, phonics followed by silent reading. The methods recommended for teaching reading are phonics, look and say and the alphabet.

Runo (2010) notes that improved reading depends on teachers who employ appropriate methods in the teacher of reading which will enhance reading comprehension. Researchers support the fact that reading comprehension improves when teachers provide explicit comprehension instruction to children. Bauman (1983, p.287) points out that in direct instruction the teacher is in face to face with the learner. The teacher models, demonstrates and teaches the skill to be learned. The National Reading Panel (2000) noted that there is a correlation between direct instruction and improvement in comprehension.

The National Reading Panel (2000) observed that there is a correlation between direct instruction and improvement in comprehension. For learners to have a strong base for reading appropriate instructional methods in reading should be used.

4.10. Materials used in the teaching of reading

During classroom observation (Appendix E) and interviewing of the teachers (Appendix D), it was noted that the following teaching reading materials were used;

- New Primary English
- Success English
- Story Books
The teachers used New Primary English as a course book, Success English for Supplementary Work and there were story books for the learners. The researcher observed that there were no flash cards which was not in agreement with list of materials recorded.

There were enough copies for New Primary English at the ratio of 1:1 that is one text book of one pupil. There were many story books for pupils to read silently for pleasure or take home. Eskey (1986) emphasizes that development of more vocabulary structure and good reading habits are as a result of extensive reading. Text that is well organized has been shown by many researchers to have a positive impact on all students’ comprehension (Donovan and Smolkin, 2002; McKeown, Beck and Worthy, 1993; Seidenberg, 1989). Teachers should select quality texts that provide clear examples of text features and structures for learners to use so as to improve their comprehension.
CHAPTER FIVE

GENERAL SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

5.1. Introduction

The main objective of the study was to investigate the correlation between reading comprehension practices and academic performance. The other objectives were to identify types of comprehension difficulties experienced by the learners and to find out the effectiveness of instruction methods in reading comprehension.

5.2. Summary of the findings

The summary of the findings is in line with the set objectives. The section is divided into three: Reading comprehension practices and academic performance, reading comprehension difficulties and instructions in reading comprehension.

5.2.1. Reading comprehension practices and academic performance

The goal of reading is comprehension. Reading comprehension practices is how learners approach a text to get meaning. It was noted during class observation that majority of the learners did not struggle with their reading and seemed to get along well with what they were reading. This was an indication that they are fluent readers, exposed to large vocabulary of their level and have word attack skills.

It was also noted that the teachers took them through the three stages of reading that is the pre-reading, reading and post reading stage. The few poor readers struggled with their reading which interfered with their ability to comprehend.

The teaching methods employed by the teachers catered for the proficient readers’ needs but could not cater for the slow readers, which negatively impacts of the performance of
slow readers, as observed in this study. Overall, the performance in the academics and comprehension passage was excellent which can be attributed to the reading comprehension practices which the learners have adopted.

According to schema theory readers need to access prior knowledge to enable them understand and learn from the text. The teachers engaged the learners in pre-reading activities and build schemata, for example in one of the class three streams they had a comprehensive passage about the post office, before reading they were engaged in a discussion about the post office which made it easier for them to understand the passage. To be confident readers, the learners got engaged in activities like learning to decode difficult words, finding meaning of new words and proper pronunciation.

There are five lessons for English per week in lower primary which cater for pre-reading, while reading and post reading activities. Some teachers said that they carry out the reading lesson once per week while one said that she does reading twice in a week. As stipulated in the syllabus the reading lesson it is supposed to be once. If teachers do not follow the laid down procedures in reading comprehension learners might fail to read effectively.

The academic performance of the learners was excellent according to the results from Westlands sub county Education office for third term 2013. They had an average of 92.2%. The good performance can be attributed to reading comprehension practices. There was a strong positive correlation between perceived academic performance and reading comprehension ($r=.913, N=.001, P=<.005$)Although the learners are taken through the pre-reading activities it was observed that very little time is spent on these activities.
5.2.2. Reading comprehension difficulties

Comprehension difficulties are due to decoding deficits, poor retention, vocabulary deficiency and lack of inferences. A few learners experienced comprehension difficulties which were seen in slow reading rate, skipping words and letters. Due to this their performance was just average in the comprehension passage and the academic. There is a correlation between comprehension difficulties and academic performance.

5.2.3. Instruction in reading comprehension

Teaching methods are very important for the success of reading. It was observed that the teacher used methods like demonstration, discussion, observation in the teaching of reading comprehension. The methods used by the teachers addressed the needs of the proficient readers and slow readers. Methods used by teachers have an effect on reading comprehension. Teachers should use methods that enhance comprehension in academic performance.

5.3. Conclusion

Teachers should assist the learners in accessing prior knowledge and help them build schemata which will help in the comprehension process. Schema theory views reading as a process which involves three stages, namely the pre-reading, while reading and post reading stage. If teachers followed this stages learners will not experience problems in reading comprehension which will lead to academic excellence. Teachers to use appropriate methods in the teaching of reading comprehension and should embrace use of direct or explicit instruction in the reading comprehension. In direct instruction the teacher is in face with the learner where she models, shows, demonstrates and teaches the skill to be learned.
The main aim of the study was to find out the relationship between reading comprehension and academic performance. The study findings confirmed that reading comprehension practices have an influence on academic performance and therefore is a correlation between reading comprehension practices and academic performance.

5.4. Recommendations

Teachers should spend enough time in pre-reading activities because this stage leads to the success of the stages that follow which are the reading and post reading stage. When all this is done by the instructors it will lead to comprehension and eventually academic success. The Ministry of Education should hold workshops, focusing on reading comprehension practices to help teachers deal with reading comprehension.

Teachers to instruct the learners on how to monitor their comprehension which they will eventually apply as they sit for examination.

Teachers to pursue various methods in teaching reading process to enhance the learners reading comprehension.

The parents should have a strong positive influence on their children’s reading. Reading with their children can make a measurable difference in reading comprehension. For intensive reading parents to buy for the children story books to enable them improve on their pronunciation, comprehension abilities and fluency. When parents get involved in their children’s academic development will be aware of their reading difficulties and help them in time.

Instruction in reading is very important. A study can be done on the effects of instructional methods on reading comprehension.
REFERENCE


Perfetti, C.A. (1986). *Continuities in Reading Acquisition, Reading Skills and Reading Disability Remedial and Special Education 7, 11 – 21*


APPENDICES

APPENDIX A: INTERVIEW GUIDE FOR THE TEACHER

SECTION A: INFORMED CONSENT

My name is Mary Mabeya a Masters of Arts student at the University of Nairobi. This interview guide is intended to collect information on reading comprehension practices among class three pupils in your school. The information will be used solely for the study purposes and all information will be treated with utmost confidentiality. I therefore request you to allow me interview you.

COUNTY …………………………………………………………………………………

DISTRICT ………………………………………………………………………………

SCHOOL: …………………………………………………………………………………

CLASS: …………………………………………………………………………………

SECTION B: DEMOGRAPHICS

1. Could you please introduce yourself by telling us your name, education and current position and responsibilities

2. For how long have you been in this school and for how long have you taught class three?

3. How many pupils (boys and girls) do you have in this class? How has been their performance?

SECTION C: VIEWS ON READING COMPREHENSION

4. Do all the pupils in your class comprehend what they read? If not could you please explain why?
How do you take the pupils through learning to read?

What kind of learning materials do you use?

How many times in a week do the pupils participate in reading comprehension?

What are some of the pre-reading activities that you learners get engaged in?

Briefly explain what your pupils do during reading comprehension.

Which post-reading activities do you engage in?

What are the learners’ attitudes towards reading in general?

What part of reading lesson do learners enjoy most (pre, during or post reading)?
12. How is the performance of class three learners in other subjects like maths, social sciences and spelling?

………………………………………………………………………………………………
………………………………………………………………………………………………
………………………………………………………………………………………………

SECTION D: TEACHING METHODS

13. When teaching reading what methods do you often use?

………………………………………………………………………………………………
………………………………………………………………………………………………
………………………………………………………………………………………………

SECTION E: READING DIFFICULTIES

14. Do you have learners with reading difficulties in your class? ...............................................................................................................................

…..

15. How do you identify learners with reading difficulties in your class?

………………………………………………………………………………………………
………………………………………………………………………………………………
………………………………………………………………………………………………
………………………………………………………………………………………………

16. Explain the types of reading difficulties that learners experience when engaged in reading comprehension.

………………………………………………………………………………………………
………………………………………………………………………………………………
………………………………………………………………………………………………
………………………………………………………………………………………………

17. How is the attitude towards reading of the learners with reading difficulties. ...........................................................................................................................

………………………………………………………………………………………………
18. Do you have any non-readers in your class?........................................................................

SECTION F: CLOSING

19. Do you have any question which you would like me to address before we close the interview?
APPENDIX B: CLASS OBSERVATION SCHEDULE

NAME OF SCHOOL: ..........................................................................................

CLASS: ...........................................................................................................

NO OF PUPILS: ..............................................................................................

What the researcher will be observing during the reading of comprehension lesson

1. Pre-reading activities
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ................

2. What happens during the reading
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ................

3. Post reading activities
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ................

4. Materials available in class
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
   ..................................................................................................................
5. Reading difficulties

6. Methodology

7. How they approach the text
APPENDIX C: PASSAGE

Lion and Mouse

Once upon a time, a big lion was sleeping under an acacia tree. He was so big and so fierce that none of the other animals came near him. They were afraid he would them. One day, while he was sleeping, he felt something run under his nose. He woke up suddenly and opened his eyes. ‘What’s that? He roared. He looked and he saw a little mouse.

‘Do you know who I am, Mouse? I am a Lion. I would like to eat you although you are very small.’ He put his big foot over Mouse. ‘I know you are Lion. I am sorry I woke you up. Please don’t eat me. Let me go. Perhaps one day I will help you,’ Said Mouse. Lion laughed. ‘How can a little mouse like you help me? I am a big lion.’ But Lion was not hungry and so he let Mouse go. As Mouse ran away, she said, ‘Thank you, Lion, for letting me go. I will never forget. I promise to help you one day.’

Six months later, Lion was caught in a hunter’s trap in the forest. ‘Help! Help! Roared Lion to the animals in the forest. ‘I am in a trap. I cannot get out!’

The animals were very sad. ‘Poor Lion,’ they said. But they were too afraid to go and help him. Mouse heard Lion and went to help him. When she arrived at the trap, nobody saw her because she was so little. ‘Hello, Mouse. Aren’t you afraid?’ asked Lion.

‘Don’t worry,’ ‘I promised to help you one day. I can get you out of here.

Mouse had very sharp teeth. She bit through the ropes of the trap with her sharp little teeth. ‘Thank you, Mouse!’ said Lion, as he ran out of the trap.
Answer the questions

1. Why were the animals afraid to go near Lion?

__________________________________________________________________
__________________________________________________________________

2. Did Lion want to eat Mouse? Why?

__________________________________________________________________
__________________________________________________________________

3. Why did Lion let Mouse go?

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4. Why did Lion cry, ‘Help! Help!’?

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5. How did Mouse cut the ropes?

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6. What do you learn from the story?

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APPENDIX D: INTERVIEW RESULTS

INTERVIEW I

Date: 23rd July, 2013

Interviewer (R): Researcher

Interviewee (T): Teacher

Setting: The interview was carried on Tuesday morning at 9.30am at Westlands primary School.

Start of Interview: 9.30 – 10.30am

R: My name is Mary Onkoba a Masters of Arts student at the University of Nairobi. This interview is intended to collect information on reading comprehension practices among class three pupils in your school. The information will be used solely for the study purposes and all information will be treated with utmost confidentiality. I therefore request you to allow me interview you.

A. DEMOGRAPHIC

R: For how long have you been in this school and for how long have you taught class three?

T: I have been in this school for three years and all this time I have been teaching class three

R: How many pupils (boys and girls) do you have in this class? How has been their performance?

T: There are 59 pupils in this class and their performance is good

B. VIEWS ON READING COMPREHENSION

R: Do all the pupils in your class comprehend what they read? Could you please explain what leads to comprehension?
T: There are very few pupils who do not comprehend what they read but majority do. The comprehension difficulties could be due to poor retention. Those who comprehend is because they have decoding ability, can connect new information to what they already know and good retention.

R: How do you take the pupils through learning to read?

T: On learning how to read I take the learners through phonics which they use in the pronunciation of the new words and then they learn the meaning of the words.

R: What kind of learning materials do you use?

T: During learning the kind of materials that are used are: story books, reference books like success in English book three, course book which is Primary English charts, pictures and real objects.

R: How many times in a week do the pupils participate in reading comprehension?

T: Within a period of one week reading comprehension is done once.

R: What are some of the pre-reading activities that you learners get engaged in?

T: The learners get involved in different pre-reading activities as follows: Discussions, sharing experiences, observing visual aids and I pre-teach the concepts.

R: Briefly explain what your pupils do during reading comprehension.

T: While reading in class there is the reading as a class (loudly) and at the individual level, identifying new and difficult to decode words and use of contextual clue skills to work out meaning.

R: Which post-reading activities do you engage in?
T: After reading I can ask the learners to retell the passage briefly, write a composition and ask oral questions from what they have read and drawing the mental images they could be having about the passage

R: What are the learners’ attitudes towards reading in general?

T: The pupils’ attitude towards reading is positive because they seem to enjoy what they read

R: What part of reading lesson do learners enjoy most (pre, during or post reading)?

T: The learners enjoy all the activities before reading, during reading and after reading

R: How is the performance of class three learners in other subjects like maths, social sciences and spelling?

T: The performance of the class in other subjects is good. This is so because of the comprehension ability

C. TEACHING METHODS

R: When teaching reading what methods do you often use?

T: The methods I often use when teaching reading are: look and say, dramatizing and visual expressions

D. READING DIFFICULTIES

R: Do you have learners with reading difficulties in your class?

T: There are very few learners who have comprehension problems.

R: How do you identify learners with reading difficulties in your class?

T: I get to know learners with reading difficulties for they cannot identify sounds and cannot remember what they have read.
R: Explain the types of reading difficulties that learners experience when engaged in reading comprehension.

T: They could be experiencing comprehension difficulties which could be due to being not familiar with the topic. Comprehension difficulties are brought about by the poor reader’s lack of phonic knowledge and lack of adequate vocabulary.

R: How is the attitude towards reading of the learners with reading difficulties?

T: Some have a positive attitude because they always want to read (graphemes) despite the comprehension challenge where the other poor readers have no interest in reading.

R: Do you have any non-readers in your class?

T: Not really

R: Do you have any question which you would like me to address before we close the interview?

T: No.
INTERVIEW II

Date: 23rd July, 2013

Interviewer (R): Researcher

Interviewee (T): Teacher

Setting: The interview was carried on Tuesday morning at 9.30am at Westlands primary School.

Start of Interview: 11.00am – 12pm

R: My name is Mary Onkoba a Masters of Arts student at the University of Nairobi. This interview guide is intended to collect information on reading comprehension practices among class three pupils in your school. The information will be used solely for the study purposes and all information will be treated with utmost confidentiality. I therefore request you to allow me interview you.

A. DEMOGRAPHICS

R: For how long have you been in this school and for how long have you taught class three?

T: I have been in this school for fifteen years and taught class three for five years.

R: How many pupils (boys and girls) do you have in this class? How has been their performance?

T: There are 63 pupils and their performance is above average

B. VIEWS ON READING COMPREHENSION

R: Do all the pupils in your class comprehend what they read? Could you please explain what leads to comprehension?
T: Good readers in the class comprehend what they read but poor ones have comprehension difficulties. Good readers comprehend because they read story books and have good speaking skills.

R: How do you take the pupils through learning to read?

T: In teaching them on how to read for those words which cannot be read phonetically I use look and say.

R: What kind of learning materials do you use?

T: The learning materials we use in class are: flash cards, charts, supplementary books, course books

R: How many times in a week do the pupils participate in reading comprehension?

T: Reading comprehension is done twice a week

R: What are some of the pre-reading activities that you learners get engaged in?

T: This is what we do in class before reading; observing pictures in the text book defining, meaning of new words and teaching difficult to decode words.

R: Briefly explain what your pupils do during reading comprehension.

T: As the class read, they need to identify new words, predict and monitor their comprehension, identifying words whose meaning they are not familiar with and I at times ask them to predict what will come next to enhance their thinking

R: Which post-reading activities do you engage in?

T: The teacher asks oral questions and involved in the class discussion, spelling games – and give a brief oral summary of what they have read

R: What are the learners’ attitudes towards reading in general?
Positive. They have an interest in reading. For poor readers it is negative for they fear reading

What part of reading lesson do learners enjoy most (pre, during or post reading)?

During reading

How is the performance of class three learners in other subjects like maths, social sciences and spelling?

It is good for they score a mean of 90% and above in all subjects.

C. TEACHING METHODS

When teaching reading what methods do you often use?

The methods that I often use in teaching reading are: discussion, demonstration, questioning

D. READING DIFFICULTIES

Do you have learners with reading difficulties in your class?

Yes, though they are not many, about few

How do you identify learners with reading difficulties in your class?

When doing individual reading they cannot read simple words or if they do they do not know the meaning.

Explain the types of reading difficulties that learners experience when engaged in reading comprehension.

The poor readers cannot understand what they read which is due to deficit in decoding and poor retention, lack of background knowledge and difficulty of ideas presented.

How is the attitude towards reading of the learners with reading difficulties?
T: Negative. They hide so that they do not read or answer questions or get involved in a discussion.

R: Do you have any non-readers in your class?

T: A few

E. CLOSING

R: Before I close the interview, do you have any question?

T: How will this study help me?
INTERVIEW III

Date: 23rd July, 2013

Interviewer (R): Researcher

Interviewee (T): Teacher

Setting: The interview was carried on Tuesday afternoon at Westlands primary School.

Start of Interview: 2.00pm – 3.00pm

R: My name is Mary Onkoba a Masters of Arts student at the University of Nairobi. This interview guide is intended to collect information on reading comprehension practices among class three pupils in your school. The information will be used solely for the study purposes and all information will be treated with utmost confidentiality. I therefore request you to allow me interview you.

A. DEMOGRAPHICS

R: For how long have you been in this school and for how long have you taught class three?

T: I have been in this school for eleven years and out of eleven, I have taught class three for eight years.

R: How many pupils (boys and girls) do you have in this class? How has been their performance?

T: The pupils are 59 and their performance is excellent

B. VIEWS ON READING COMPREHENSION

R: Do all the pupils in your class comprehend what they read? Could you please explain what leads to comprehension?

T: Majority can read and understand what they read but there are a few (about ten) who can read but have a challenge in comprehension. The ones who
understand what they read could be due to use of contextual clue skills to meaning of words and good listening skills.

R: How do you take the pupils through learning to read?

I: When it comes to learning to read, I first introduce the phonics to enable them read some words using the sounds and use look and say for other words after which they learn the meaning of the words.

R: What kind of learning materials do you use?

T: Flashcards and course books

R: How many times in a week do the pupils participate in reading comprehension?

T: Reading is done once a week

R: What are some of the pre-reading activities that you learners get engaged in?

T: Learning meaning of new words, discuss interesting pictures in the book and the topic and brainstorming.

R: Briefly explain what your pupils do during reading comprehension.

T: The class stops reading mid-way and discuss about what has been read, guide them on proper punctuation, pronunciation and intonation.

R: Which post-reading activities do you engage in?

T: Questioning and answering of questions by both the teacher and the learners, do an exercise, re-tell the passage briefly in own words and check meaning of words in their dictionaries.

R: What are the learners’ attitudes towards reading in general?

T: They like reading

R: What part of reading lesson do learners enjoy most (pre, during or post reading)?

T: During reading for they get excited especially when it is a narrative.

R: How is the performance of class three learners in other subjects like maths, social sciences and spelling?
T: The performance is good with a mean score of between 90% - 96%.

C. TEACHING METHODS

R: When teaching reading what methods do you often use?

T: Questioning and answer, discussion

D. READING DIFFICULTIES

R: Do you have learners with reading difficulties in your class?

T: Yes, there are a few

R: How do you identify learners with reading difficulties in your class?

T: They have a reading comprehension problem and cannot remember what they have read which is manifested when answering oral questions and have a slow cognitive speed.

R: Explain the types of reading difficulties that learners experience when engaged in reading comprehension.

T: Retention difficulties which means they cannot remember what they have read and they are poor in fluency which affects their reading.

R: How is the attitude towards reading of the learners with reading difficulties?

T: Most of them have a positive attitude which is influenced by the proficient readers.

R: Do you have any non-readers in your class?

T: Not really because they can read the words but understanding is the problem

E. CLOSING

R: Before I close the interview, do you have any question?

T: How can I help the poor readers?
APPENDIX E: CLASS OBSERVATION SCHEDULE

What the researcher will be observing during the reading of comprehension lesson

8. Pre-reading activities
   - Learning meaning of new words
   - Review of words learnt in previous lesson
   - Observing pictures and discussing them

9. What happens during the reading
   While reading activities:
   - Teacher corrected pronunciation mistakes, punctuation and intonation
   - Identifying new words

10. Post reading activities
    - Questioning and answering
    - Discussed what was happening in the passage
    - Learning meaning of new/difficult words identified during reading
    - Wrote a guided composition
    - Wrote a summary of the story read
    - Pupils told what they learnt from the story

11. Materials available in class
    - Course book – Primary English
    - Supplementary books – Success in English
    - Story books
    - Charts

12. Reading difficulties
    - Lack of fluency
    - Poor pronunciation
    - Poor retention
Methodology
- Questioning and answering
- Discussion
- Demonstration
- Observation
## APPENDIX F: EXAMINATION RESULTS

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