

**TEACHER'S ATTITUDE AND THE PERFORMANCE OF LEARNERS IN  
CHEMISTRY. A CASE STUDY OF SELECTED SCHOOLS IN  
HABASWEIN ZONE ,HABASWEIN DIVISION, OF  
HABASWEIN VILLAGEIN IN WAJIR SOUTH  
DISTRICT-KENYA**

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### DECLARATION

I, Abdirahman Farah Aden hereby declare that this research project is my own original work; it is not a duplication of any scholar for academic purpose nor has it been submitted to any other institution of higher learning for the award of certificate, diploma or degree in education. I also declare that all materials cited in this paper have been duly acknowledged.

SIGNATURE. ....

ABDIRAHMAN FARAH ADEN

DATE ....18/12/2010.....

## **DEDICATION**

I Abdirahman Farah Aden Dedicate this work to my father Mr. Farah my sisters and Brothers, Hothan, Abdiwel, Hibo, Rabile Gai i and Iftin for their moral and material support they have provided to me till the end of my studies.

### **APPROVAL**

This research project has been submitted to the Institute of Continuing and Distance Learning (IODL) Kampala International University for approval as a university supervisor

**SIGNATURE.....**

**MR. DERICK**

**DATE -----**

## **ACKNOWLEDGEMENT**

I would like to sincerely appreciate the valuable contributions made by various stakeholders who assisted in the process of this research project. I am faced with this task, which I fulfill with pleasure, but by no means easy. I do this to appreciate the help of those without whom I would not have accomplished this noble obligation.

At the onset, the entire staff at the Institute of continuing and Distance Learning (IODL) of Kampala International University, notably both teaching and non-teaching staff, my supervisor, he dedicated a lot of his time to ensure that I did the right thing. Other lecturers in the Research Department were very resourceful.

## TABLE OF CONTENT

DECLARATION .....	ii
DEDICATION .....	iii
APPROVAL.....	iv
ACKNOWLEDGEMENT .....	v
TABLE OF CONTENT .....	vi
ABSTRACT.....	viii
 CHAPTER ONE:GENERAL INTRODUCTION .....	 1
1.0 Introduction .....	1
1.1. Background of the study .....	1
1.2. Statement of the problem .....	2
1.3. Purpose of the study .....	2
1.5 Specific objectives .....	2
1.6.Scope of the study .....	2
1.6.1 Geographical scope .....	2
1.6.2 Content scope .....	3
1.7. Significance of the study.....	3
 CHAPTER TWO:LITERATURE REVIEW .....	 5
2.1. Academic performance .....	5
2.2. Attitudes towards Chemistry.....	6
2.3. Teaching approaches.....	7
2.4. Language and Chemistry.....	8
2. 5 .Teaching and learning resources .....	9
 CHAPTER THREE:RESEARCH METHODOLOGY.....	 12
3.0 Introduction .....	12
3.1 Research design.....	12

3.2. Sampling procedure .....	12
3.3. Samples .....	12
3.4. Instruments .....	13
3.5. Procedure.....	14
3.6.Data Analysis .....	14
CHAPTER FOUR:DATA PRESENTATION, ANALYSIS AND INTERPRETATION.....	15
4. 1. OVERVIEW .....	15
4.16. REVIEW .....	23
CHAPTER FIVE:SUMMARY, CONCLUSION AND RECOMMENDATIONS.....	24
5.0 DISCUSSION .....	24
5.1 CONCLUSION .....	25
5.2.RECOMMENDATIONS .....	25
REFERENCES.....	27
APPENDICES.....	29
APPENDIXQUESTIONNAIRE FOR THE TEACHERS.....	29



## **ABSTRACT**

Guidance and counseling has been adapted as measure to stem indiscipline in Secondary Schools in Kenya . This proposed research attempts to highlight on the effectiveness of this strategy and examine other alternatives for stemming the teething problem.

The proposed research problem is "Guidance and Counseling and discipline in Secondary Schools in Habaswein Division, Wajir South District, Kenya.

This study investigates the effectiveness of Guidance and Counseling in Secondary Schools in Habaswein Division, Wajir South District Kenya, examine other alternative ways of curbing indiscipline rather than Guidance and Counseling and attempt to identify solutions to the problems related to discipline.

The study will answer the following questions:

Is Guidance and conselling effective in stemming/curbing indiscipline in Secondary schools in Habaswein Division?

Apart from Guidance and counseling, which other strategies will curb indiscipline? What are the solutions to the problems related to Indiscipline?



## **CHAPTER ONE**

### **GENERAL INTRODUCTION**

#### **1.0 Introduction**

This chapter looks at the background, statement of the problem, purpose of the study; research objectives research questions, scope, significance of the study and the review.

This chapter is normally a brief justification of need for the research. The researcher decided to carry out this study after comparing results of the other subjects and that of Chemistry in various classes in upper Secondary in zonal test analysis and K.C.S.E. results. The purpose of the study was to find out problems facing learners with specific learning difficulties in Chemistry in Habaswein Zone of Wajir South District The study attempted to answer various questions.

#### **1.1. Background of the study**

Chemistry is one of the major science subjects that is emphasized in the implementation of the curriculum development countries have based their education on science subjects and this has greatly contributed to their industrialization and economic development in our developing nation. Chemistry is a compulsory science subject that is emphasized and recognized, today in our schools learners have negative attitude towards Chemistry hence referring to it as hard subject. 'These kinds of learners are found in our schools with different characteristics and abilities.

After comparing results of other subjects and Chemistry in various classes in upper Secondary, Chemistry is poorly performed in many schools of Habaswein Zone. Many suggestions have been given as to why Chemistry is poorly performed.

With that in mind the researcher decided to find out the problems facing learners with specific learning difficulties in Chemistry In Habaswein Zone of Wajir South District

## **1.2. Statement of the problem**

Many learners in Secondary schools take Chemistry as a difficult subject to tackle. This has made many learners have negative attitude towards Chemistry as a subject. The Ministry of Education Science and Technology has set more time for Chemistry by allocating 5 lessons per week in upper Secondary and 4 lessons in lower Secondary. Although all these lessons are taught effectively, there is still low performance in Chemistry. Teachers have various methods instructional and use of teachings resources to avail. Books and other learning resources have been provided programmes which help teachers give homework yet the results are not encouraging. . It is on this background that the researcher carried out the study to find out the problem facing learners with learning difficulties in Chemistry.

## **1.3. Purpose of the study**

The purpose of the study was to examine the impact of teacher's attitude on the performance of learners in Chemistry.

## **1.5 Specific objectives**

To examine the impact of teacher's attitude on performance of learners in Chemistry.

To establish the relationship between teacher's attitude and performance of learners in Chemistry.

To examine the attitudes of learners towards Chemistry.

## **1.6.Scope of the study**

### **1.6.1 Geographical scope**

The study was carried out in Habaswein Zone of Wajir South District. The schools selected were Habaswein Secondary School,, Habaswein Mixed Secondary School, and Wajir High School. These schools are found within the Wajir South District.

### **1.6.2 Content scope**

The studies examined the impact of teacher's attitude and performance of learners in Chemistry.

### **1.7. Significance of the study**

This study will benefit various disciplines who inclusive the Ministry of Education, District supervisors, teachers, parents, learners and future researchers.

The Ministry of Education will be able to plan in advance for specific needs education on training of more teachers in specific needs, education to cater for learners with special needs in the inclusive setting. At the same time allocate more funds to cater for learners with specific needs.

The district supervisors and teachers will gain knowledge on specific that need remedial work in Chemistry for learners with specific learning difficulties and how to handle the learners best.

The parents and learners will develop positive attitude towards Chemistry when teachers use appropriate teachings methods and resources hence the fragrance of Chemistry will improve.

The parents will encourage their children to work hard in Chemistry as one of the major subjects. The learners will be able to note the technical areas in Chemistry. The study will add more knowledge to the existing one on how to handle learners with specific learning difficulties in Chemistry; it will help future researchers to have more source of literature review from their research findings of this research study. The study would form a basis for further research and add to existing knowledge.

Some constraints that the researcher encountered in carrying out this study were time, transport, weather and money. The time was too short due to other duties as the student was also teaching.



Money was limited because of other home commitments as the study had to meet all her fees since the course is self-sponsored. Distance and transport were also limitations as schools that were addressed were far away and needed some money for transport.

Some respondents were un co-operative in returning the questionnaires and it was too time consuming for the researcher to follow them up in the limited time. Reference materials were not available and the weather was dusty and hot

## **CHAPTER TWO**

### **LITERATURE REVIEW**

This chapter will review related literature on teacher's attitude and performance of learners. Children have arithmetic problems as a result of problems with cognitive processes states Lerner (1976). Those with problems of ordering or sequencing knowing quantity concepts, forms and counting also experience problems in arithmetic.

Lerner (1976) laments that such children receive little attention and especially when it comes to assisting those with arithmetic problems. This chapter addresses the academic performance teaching approaches attitudes towards Chemistry and teaching and learning resources.

#### **2.1. Academic performance**

According to Ovitt (19781) a learning disability is retardation discovers or delayed development in one or more of the processes of speech, language, reading, spelling, writing or arithmetic resulting from a possible cerebral dysfunction and or emotional disturbances and not from mental retardation. Sensory deprivation or cultural or instructional factors.

Wallace and Mc Loughlin (1975) states that educational systems tend to take certain subject for granted, assuming that they are not necessary or part of the academic curriculum. According to Gearheart (1985) learners have problems in distinguishing the meaning of big from . title close from far, heavy from light. In relation to the time concept these children may arrive at school late and have problems in completing an assignment on time.

Most learners who have problems with the cognitive process experience problems in Chemistry. Some have problems in ordering and sequencing numbers, problems in quantity concepts, differentiating numbers shapes like 6 and 9 with reference to Wallace and Mc Laughlin (1975). These learners are not able to differentiate a square from a rectangle. They also experience problems in concepts associated with telling time. Gear Heart (1985) states

that in relation to time concept, these children may arrive at school late or have problems in completing assignments in time.

Hyperactivity also affects children's performance in Chemistry. This is because they do their work hurriedly. 'They have short attention span and they have no time for analytical thinking or solving problems Gear Heart (1985) states that hyperactive children are always "on the go" and behave as though "driven by a motor". As a result they are not able to form arithmetic concepts. These children are constantly' motion restless and are unable to still in one place and are unable to sit in one place.

## **2.2. Attitudes towards Chemistry**

Many learners have social and emotional problems. Wallace and Mc Laughlin (1975) noted that those children have poor self-concepts and speak negatively of themselves. They use terms such as worthless, stupid "dump" when compared to their classmates. 'They view themselves as incapable of doing superior work and depend on others for their success. Such learners have a habit of copying the other learners work when given assignments and depend on others for their success since they view themselves as in capable of doing superior these have negative effect on the children education performance, their self-concepts and interaction with other behaviours that have bee observed are' tolerance or frustration, lack of motivation, and insecurity according to Wallace and Mc Loughlin (1975).

These children are also unable to discern non-verbal messages such as those conveyed through facial expressions, some of which are a form of reprimand admonition, or rejection. Thus their in ability to read non-verbal messages may cause other children to quietly reject them or to openly tell them off Have and have (1979) p.268) states that these children have a rapid mood variation from hour to hour.

The moods then affect the understanding of what the teacher delivers in class. Learners should be encouraged and motivated to have positive attitude towards all subjects and mostly Chemistry, which is referred to as hard at the same time teachers lack confidence in the



teaching of the subject due to various factors. Some of these factors are lack of appropriate resources, lack of up-to-date information and lack of proper mastery Chemistry. This is caused by negative attitudes towards the subject. Lack of approximate resources could come about as a result of limited funds in the school or little support from the heads teacher reduce the teachers and pupils morale and affect the school performance in Chemistry. Hughes M (1995) states that lack of up-to-date information and exposure in Chemistry, teachers may also develop poor attitudes. He further asses 15 that another factor that affects teachers' confidence is lack of mastery of the subject. Secondary school teachers are all trained in the teaching of Chemistry regardless of whether they performed well in Chemistry or that they ay not gave mastered the necessary Chemistry concepts.

### **2.3. Teaching approaches**

Koppiz (1973) stated that learning disabilities cannot be corrected or cured by a specific teaching method or training technique. It is imperative that teachers have a wide of instructional materials and techniques at their disposal and that they are imaginative and flexible enough to adopt these to the specific needs of their pupils.

Even though teachers may have the necessary skills, techniques, and a wide experience in training and intervention procedures at times they will fail in remediation. This can be caused by the complexity of the learning disability itself or a lack of co-operation from the child.

I.W. Learner (1976) noted that despite the frequent observation that the teacher is the key ingredient for successful remediation without a clear answer as to what qualities make a good teaching in neighbours. Teachers could use a variety of teaching approaches which enhance memory and understanding. Children with learning disabilities are heterogeneous population a characteristic common to all children on a learning problem i a specific area Say writing g, reading, speaking, computing arithmetic, social in sensitivity or imperfection, balance problems and other areas.



Teaching methods is one of the areas affecting performance of Chemistry in our education system. Wallace and Mc Laughlin (1975) and Hursch (1970) noted that inappropriate teaching methods are used by some teachers to teach some subjects of which case Chemistry is included. This makes the learner not to master the subject matter adequately or may show little or no understanding inappropriate methods of teaching may be attributed to the teachers' lack of necessary teaching skills or foundation in the subject matter.

Livitt (1978) for instance, observed inadequate instruction prevents children mastering the subject matter. This is caused by lack of preparation by the teacher before entering the class. Even though the teachers may have the necessary skills, techniques and a wide experience in training and intervention procedures at time they will fail in remediation or learners may fail to co-operate.

#### **2.4. Language and Chemistry**

Chelmsom (1994), states Chemistry is a language while others view it as a kind of condensed language with international currency. Mathematical language is used to mean a language which conveys mathematical concepts and messages through the use of symbols which all understand, just like alphabets in some other languages. Mathematical language is used to mean a language which conveys mathematical concepts and messages through the use of symbols which all understand, just like alphabets in some other languages. Mathematical language is more than its symbols which use everyday words in a mathematical sense. Learners experience difficulties learning Chemistry through the English language which is their second, or even a third language. The major role of language in Chemistry is to communicate mathematical concepts and ideas. Learners experience difficulties in Chemistry when they fail to interpret and apply to everyday activities e.g.  $2+3=5$  meaningless to a learner unless he/she can physically do the operation. When learners do not understand the meaning of symbols or the English, this becomes a barrier to their learning of Chemistry which includes reading and comprehension of words and symbols and transforming problems into mathematical operations according to Clement (1980).

Dickson (1980), states that words which have the same meaning can equally confuse children. Sometimes children may think that an ordinary word takes on a different meaning when used in a mathematical setting, or may be they do not fully understand its everyday meaning in any case. He further states that to make CHEMISTRY easily understood and enjoyable there is need to discuss the meaning of words with your pupils. Dechant (1981) asserts that a person with a reading disability differs from other readers such as slow learners, reluctant readers, disadvantaged readers and under achievers in several respects including arithmetical problems. Wallace and Coughlin (1975) noted that learners may lack skills to interpret and comprehend information. Their reading therefore does not go beyond what they see in print. Thus they are limited in their ability to make critical judgments, inferences, predict outcomes or form opinions. Word problems are mathematical problems presented almost entirely in ordinary English words. It has been seen that a major source of difficulty experienced by children is interpreting these written problems. Children may make errors in reading words such as 'angel' for 'angle' and; 'minutes' for 'minus' asserts (Clement (1980)).

Other words are the same but depending upon the context on the use of the definite and indefinite articles can mean very different things e.g. 'it is tenth', 'it is the tenth', and 'it is a tenth' all these can mean different things.

## **2.5 .Teaching and learning resources**

Chemistry teaching and learning is improved by proper use of resources. These resources could be informed of money, books, teaching aids and human resources.

Teaching and learning resources are essential in the learning process for better understanding of the content matter. Jacinta and Regina (1981) confirms that resources enable children to experience real life and also maximize their abilities as they manipulate them. Learners with special needs and those in lower Secondary are concrete learners, which means that they learn better when manipulating real subjects. Jacinta and Regina (1981) indicate that resources promote the learner's imagination, thinking process and reasoning power. Learners who are exposed to resources understand better and remember ideas easily. Farant (1986) asserts that



resources based learning, help learners to recognize that the only place where learning takes place. He also complains that some teachers who not understand that teaching aids are for making teaching ore effective and teaching life easier.

Teaching aids should be used to arouse interest and also maintain it throughout the lesson. Mutie and dambuki (1999) suggest that learning materials should be displayed neatly and artistically if they have to serve the purpose.

These resources should be enough for learners to manipulate as they earn. The teacher could ensure that safety of the resources and also store them safely when not in use. For learners to understand Chemistry, teachers should use various resources such as abacus, ruler, pencils, mathematical sets, charts and tables. All these will assist the learner to master the concepts. The main purpose of using a teaching resource is to give visual or co create support in teaching asserts Dr. Kaleyaiye AO. (1985).

He further states that the materials should be adequate to give each child an opportunity to practice the mathematical skills such as measuring and drawing. There is also need to consider a variety in the materials you use which helps children to widen their understanding of the concept. Materials collected should be relevant to the needs of the pupils capable to solving pupils' mathematical problems, helpful in the achievement of the objectives of the lesson and suitable to the age and level of the pupils. Mr. Ben (2002) states that educational resources should provide significant gains in formal learning by improving the learners abilities in retention, remembering~ thinking, reasoning, interest, imagination, better understanding and personal growth and development. When resources are used, there is great opportunity for learners to move about, talk, laugh and interact freely" Under such a condition the learners work independently and collaboratively. Educational resources reduce barriers to learning and development by meeting earners special individual needs as learners are able to learn and function independently. Resources allow for the smooth flow of the content It helps pupils to earn from known to unknown from the easier to more difficult concept.

Most learners have problems with cognitive process experiencing problem in Chemistry. In appropriate children mastering the subjects matter. Even though teachers may have the necessary skills and interrupt procedure at times they may fail in remembering on learners may lose hope in Chemistry hence cannot even calculate the simplest sum. For learners to understand.

Chemistry teachers should such as abacus, ruler, pencils, mathematical set, charts and tables. All these will assist the learner to master the concept. The next chapter discusses the methodology that was employed in the study.

## **CHAPTER THREE**

### **RESEARCH METHODOLOGY**

#### **3.0 Introduction**

The researcher used qualitative method where the data collected was tabulated and analyzed and presented using tables and percentage. Surveys methods was used since questionnaire were cheap and could reach many respondents.

#### **3.1 Research design**

The researcher used qualitative method where the data collected was tabulated analysis and presented using tables and percentage. The researcher used questionnaires since they were cheap and could reach many respondents who were free to say their feelings.

#### **Population of the study**

The target population was teacher and learners of Habaswein Zone of Wajir South District. The sample led schools were Habaswein secondary school, and Habaswein Mixed and Wajir high school from teachers and form learners were choose through random sampling from each school.

#### **3.2. Sampling procedure**

The target population was teachers and learners of Habaswein Zone of Wajir South District. The sample schools were Habaswein Secondary School and Wajir High school and Habaswein. Mixed Secondary school. From teachers were chosen through random sampling basing on gender two male and two female teachers were sampled from each school, similarly few members were sampled from each school. The learners were chosen from Form one to four, one learner in each class through random sampling.

#### **3.3. Samples**

The subjects were teachers and learners of Sabunley Secondary school and Wajir High school and Habaswein Secondary school in Habaswein Zone. The teachers were four teachers who



teach in upper Secondary classes in each school There were 21 teachers' eight men teachers and 13 women teachers.

The teachers were all Graduate, teachers except one male teacher who was a Diploma teacher, all teachers had a teaching experience of over seven years though not in the same school. All teachers were married but two male teachers were bachelors. The ages of the teachers ranged between twenty-nine to forty nine years of age. The learners were twenty-one in total from the: five schools.

The learners were chosen one learner from each class. From each school the sample was made up of eighteen 2 girls and 3 boys or 3 girls and two boys. The number of boys was 10 while the girls were 11. The learners were aged between 14 to 20 years of age.

The school are found along the main various roads that connect Habaswein Zone. The schools have all average of about two hundred learners in each school.

The schools have a high enrolment in lower classes that is from Form one to Form Two. The upper classes have a lower enrolment of about eighteen to twenty learners in each class. The schools are close to one another hence the low enrolment.

### **3.4. Instruments**

The researcher used questionnaire to gather information from the sample population. The questionnaire was first piloted at Sabunley Secondary School and Wajir High school Secondary school who's the researcher works: five teachers and five learners were randomly supplied with questionnaires and filled them with ease after the explanation on how to go about it. Learners needed class explanation for each question. Teacher's questions were designed to find out which subject learners performed poorly in the school

Areas of Chemistry where learners experience problems in Chemistry syllabus coverage in the schools and whether teachers used teaching learning resources in the pupils questionnaires

was designed to find out learners attitude, areas of difficulties, in Chemistry, whether they are given assignment in Chemistry and what other materials they used in learning of Chemistry other than textbooks.

The respondent format of the questionnaires for the teachers was two yes/no. Responses and the others were open-ended responses. The pupil's questionnaires format was Yes/No. Responses and the other four were open-ended responses. The researcher explained the instructions of the pupils questionnaires to the selected learners in similar simple language.

The researcher then explained each question on the questionnaire. And afterwards asked the learner's to go and fill the questionnaire on their own.

The researcher then explained the instruction to the teachers and asked the teacher to fill the questionnaire to collect them after two days. The learner's questionnaires were filled and collected the same day.

### **3.5. Procedure**

The researcher prepared areas search proposal to act a guide during the study which was presented to the lecturers for approval. After the approach the researcher embarked on the actual study. The researcher used questionnaires to gather information from the subjects. The questionnaires were first piloted at Habaswein Secondary and Wajir High school

### **3.6.Data Analysis**

The results of the study were recorded and the raw data gathered taken on meaning. The raw data for questionnaires was analyses interpolated presented using frequency distribution tables.



## CHAPTER FOUR

### DATA PRESENTATION, ANALYSIS AND INTERPRETATION.

#### 4. 1. OVERVIEW

Data was collected using questionnaires. It was analyzed and presented according to research questions. Each question was analyzed and interpreted separately.

**TABLE 4.1. DISTRIBUTION AND RETURN OF QUESTIONNAIRES**

Number sent	Number Returned	Percentage	Received
Teachers 21	21	100%	100%
Learners 21	21	100%	100%
Total	42	100%	100%

The number of questionnaires sent to teachers was 21 and the number returned was 100%.

The number of questionnaires sent to learners was 21 and the number returned was 100%.

The information from the table above show that the response to questionnaires was good.

The teacher questions were first analyzed.

**TABLE 4.2: TEACHERS VIEW ON SUBJECT THAT LEARNERS PERFORM POORLY**

Subject	Frequency	%
Chemistry	13	61.90
English	4	19.05
Kiswahili	0	0
History	4	19.05
Geography	0	0
TOTAL	21	100

Teachers view on learners who perform poorly in Chemistry the frequency was 13 and the percentage is 61.90%. The number of others who perform poorly in English was 4 and the Percentage was 19.05. The number of those who perform poorly Kiswahili was 0 and percentage is 0% hence nobody fails in Kiswahili.

The number of those who perform poorly in History was 40 and the percentage was 19.05%. The number of those who perform poorly in Geography was 0 and percentage was 0 hence nobody fails in Geography. The data indicates that many schools have learners who have problems in Chemistry.

**TABLE 4.3: MEAN SCORE ATTAINED BY LEARNERS IN CHEMISTRY AT THE ENDOF TERM**

Form	Range	Frequency	%
1	30-40	18	85.7
	40-50	3	14.26
2	30-40	21	100
	40-50	0	0
3	30-40	17	80.95
	40-50	4	19.05
4	30-40	17	80.95
	40-50	4	19.05

In Form I the learners who attain marks at range of 30-40 their frequency was 18 and percentage 86.7 and those who in the range of 40 their frequency is 3 and percentage was 14.26%. In class 6 the learners who attain marks at range of 30 -40 their frequency was 21 and percentage 100% and those who in the range of 40-50 their frequency is 0 and

percentage was 0%. In Form 3 the learners who attained marks at range of 30-40 their frequency was 17 and percentage 80.95% and those who in the range of 40-50 their frequency was 4 and percentage 19.05%. In Form 4 the learners who attain marks at range of 30-40 their frequency was 80.95 and those who in the range of 40-50 their frequency was 4 and percentage is 19.05.

The data collected show that many schools got a mean score of 30% -40% in almost all classes showing the performance is not good.

**TABLE 4.4: AREAS PUPILS EXPERIENCE PROBLEMS**

Area	Frequency	%
Organic chemistry	0	0
Mole concept	5	23.81
Electro chemistry	16	76.81
Rate of reaction	0	0
TOTAL	21	100

The table shows that learners have no problems in areas of addition. In multiplication the frequency of those who have experienced problem is 5 and the percentage was 23.81. In division the frequency of those who have experience problems was 16 and the percentage was 76.81. In subtraction the learners that have no problem since the frequency was 0 and percentage is 0

**TABLE 4.5: REASON FOR THE PROBLEMS IN THE ABOVE-MENTIONED AREAS**

Response	Frequency	%
Attitude	8	38.06
Lack of concept	5	23.81
Teaching methods	2	9.52
Other	6	28.57
Total	21	100

The attitude towards the above mentioned areas show that the frequency was 8 and the percentage 38.06. In lack of concept the frequency was 5 and the percentage was 23.81. In teaching methods the frequency was 2 and the percentage was 9.52. The others had a frequency of 6 and the percentage was 28.57. The others had a frequency of 6 and the percentage was 28.57.

The data shows that many have negative towards Chemistry and: others have various problems that are related to Chemistry like lack of mathematical concepts lack of teaching resources, poor methods of teaching and lack of interest

**TABLE 4.6: RESPONSES TOWARDS THE USE OF TEACHING LEARNING RESPONSES**

RESPONSES	FREQUENCY	%
YES	16	76.19
NO	2	9.52
RARELY	3	14.29
TOTALS	21	100

The data collected shows that the Yes frequency of teaching and learning resources use was 16 and the percentage was 76.19. It shows that the frequency for No was 2 and the percentage was 76.19. The data also indicate that the frequency for rarely was 3 and the percentage was 14.29. The data collected indicates that most of the teaching and learning resources were used in the teaching of Chemistry.

**TABLE 4.7: RESPONSES TOWARDS COVERAGE OF THE CHEMISTRY SYLLABUS**

RESPONSES	FREQUENCY	%
YES	18	85.71
NO	3	14.29
TOTA	21	100

In the coverage of the Chemistry syllabus that data shows that the frequency for yes was 18 and the percentage was 85.71. In No, the frequency was 3 and the percentage was 14.29. The data collected shows that majority of the teachers cover the syllables for Chemistry.

**TABLE 4.8: ATTITUDE TOWARDS CHEMISTRY**

RESPONSE	FREQUENCY	%
YES	8	38.09
NO	13	61.90
TOTAL	21	100

The data indicates that the frequency for the yes towards the attitude of chemistry was 8 and the percentage was 38.09. In No the frequency was 13 and percentage was 61.90. The data indicates that most learners do not like chemistry.



**TABLE 4.9: LANGUAGE AND CHEMISTRY**

RESPONSE	FREQUENCY	PERCENTAGE (%)
AFFECTS	18	85.71
DOESN'T	3	14.29
TOTAL	21	100

The data indicates that many learners experience problems in interpreting and understanding the language used in Chemistry. The frequency for language affect teaching and learning of Chemistry is 18 and the percentage was 14.29.

**TABLE 4.10: REASONS OF DISLIKING MATHEMATICS**

RESPONSE	FREQUENCY	%
EASY	6	28.57
HARD	9	42.86
NO REASON	2	9.52
OTHERS	4	19.05
TOTAL	21	100

The data shows that the frequency for those who take it easy was 6 and the percentage was 28.57. The data indicates that the frequency for those who take it hard was 9 and the percentage was 42.86. The data shows that the frequency for those who take it with no reason was 2 and the percentage was 9.52. The data collected indicates that Chemistry is referred to as a hard subject by learners.

**TABLE 4.11: AREA THAT LEARNERS EXPERIENCE PROBLEM**

RESPONSE	FREQUENCY	%
ORGANIC CHEMISTRY	0	0
MOLE CONCEPT	6	28.57
ELECTRO CHEMISTRY	15	17.43
RATE OF REACTION	0	0
TOTAL	21	100

The data shows that the learners do not experience problems in organic chemistry. The data indicates that the frequency for learners who experience problems in Mole concept was 6 and the percentage was 28.57. In Electro chemistry the data shows that frequency for learners who experience problems in it was 15 and the percentage was 17.43. The data shows that the learners do not experience problems in rate of reaction. The data collected indicates that most learners find electro chemistry in Chemistry difficult.

**TABLE 4.12: RESPONSE TOWARDS CHEMISTRY ASSIGNMENTS**

RESPONSE	FREQUENCY	%
YES	21	100
NO	0	0
TOTAL	21	100

The data shows that the learners were given assignments by the teachers and every learner did the assignments. The data indicates that all learners are given assignments by their teachers.



**TABLE 4.13: HOW OFTEN LEARNERS ARE GIVEN ASSIGNMENT**

RESPONSE	FREQUENCY	%
DAILY	12	57.14
TWICE	3	14.29
THRICE	4	19.05
OTHERS	2	9.52
TOTAL	21	100

**TABLE 4.14: OTHER MATERIALS OTHER THAN TEXTBOOKS USED WHEN LEARNING CHEMISTRY**

RESPONSES	FREQUENCY	%
CHALKS	21	100
RULERS	21	100
MATHEMATICAL	21	100
TOTAL	21	100

The data show that the frequency of using other materials other than textbook: chalks, rulers, and mathematical sets were 21 and their percentage was 100%. The data indicates that most teachers use teaching aids in teaching.

**TABLE 4.15: GENDER AND CHEMISTRY**

RESPONSE	FREQUENCY	PERCENTAGE %
YES	2	9.52
NO	1	4.76
MORE FOR BOYS	16	76.19
MORE FOR GIRLS	2	9.52
TOTAL	21	100

The data shows that the frequency for more boys was 16 and their percentage was 76.19 the data indicates that most learners take Chemistry to be a boys' subject rather than a girls' subject.

#### **4.16. REVIEW**

Many learners have problem on Chemistry and most experience problem in Electro chemistry and a few in mole concept. Many learners take Chemistry to be a boys' subject rather than a subject for both girls and boys. Many learners have a negative attitude towards Chemistry and others have various problems that are related to Chemistry like lack of mathematical concept, lack of teaching resources, poor methods of teaching and lack of interests. Most teachers use teaching, learning resources in the teaching of Chemistry and cover their Chemistry syllabus. Learners do not like Chemistry and many refer it as a hard subject. And most learners find electro chemistry in Chemistry difficult. The next chapter discusses the findings, draws conclusion.

## **CHAPTER FIVE**

### **SUMMARY, CONCLUSION AND RECOMMENDATIONS**

#### **5.0 Discussion**

The data collected indicated that generally most learners perform poorly in Chemistry compared to other subjects. 61 % of learners perform poorly in Chemistry as compared to English with 19% and History with also 19%. Most classes in the upper Secondary get a mean score of between 30% - 40%, which indicates that it is below average. Most learners experience problems in Electro chemistry with 76% of learners while a few learners 23% have problems with negative attitudes toward Chemistry are 38% while others lack a basic Mole concept in Chemistry. Learners with negative attitudes towards Chemistry are 38% while others lack a basic multiplication fact that is 23% of the learners. Learners assume Chemistry to be a boys subject with 76.190 which is a higher percentage. The teaching methods used by teachers also affect the performance in Chemistry. 9-% of the teachers do not use the appropriate teaching methods and others do not use teaching/learning resources when teaching Chemistry. Most of the teaching aids are improvised and others are bought. Only 40% of teachers did not cover the syllabus. 85% of the teachers cover syllabus in the classes they teach. 61 % of the learners do not like Chemistry showing that they have a negative attitude towards Chemistry.

The researcher founded that learner with specific learning difficulties experiences many problems in regular schools especially where the teachers do not bother about their needs. According to Muchiri (1992) the disabled persons were seen as unproductive and their main work was to sit down and rest in their lifetime. In my observation, I agree with what Muchiri stated because learners with specific learning difficulties are not full involved in many activities. Learners with specific learning difficulties should be motivated and the learning should be pupil centered. The teacher should use learning resources and use the appropriate teaching method in order for the learner to gain knowledge and skills.

## **5.1 CONCLUSION**

Children with learning disabilities are a heterogeneous population. A characteristic that is common to all children is learning problem in a specific area. Learning disabled children are unlike mentally retarded children whose learning problem are global and embraced nearly all areas of development. The researcher findings were evidence that for successful inclusive education for learners with learning disabilities various barriers have to be overcome. It calls for well coordinated net working and corroboration with stakeholders, educators, the government and other professionals. The media should also play the role of educating the public on people with disabilities. Those therefore charged with the responsibility should be complete in handling, caring and educating learners with learning difficulties. Those who like Chemistry are 38% and they say that Chemistry is easy. Those who do not like Chemistry claim that it is a difficult subject. Most learners experience problems in multiplication. All teachers give their learners Chemistry assignments to do. 57% of the teachers give assignments daily while 14% give twice per week and 19% of the teachers give the assignments three times per week. All teachers use teaching aids in teaching of Chemistry. Some of the teaching aids used are improvised while others are bought from the shops.

## **5.2. RECOMMENDATIONS**

The researcher recommends that:-

Teachers should set time either weekly or monthly at school level to guide and counsel learners.

Each school should have a resource room and common learning resources placed there so that teachers can use them when need be.

Teachers should organize self-help groups where they visit other teachers and learn from them.

Workshops and seminars should be organized regularly for teachers. During these seminars teachers are trained on how to handle various subjects of the curriculum.

School should have all subject panels including Chemistry that are functional and a teacher appointed to be in charge.

Teachers' advisory centers should be funded by the government so that teachers can receive better services.

The ministry of education should sponsor willing teachers in furthering of their education so that teachers can be able to handle even those with special needs.

Ministry of Education should fund schools in setting up a resource room to offer assistant to learners and provide consultation services to teachers who are not trained in special needs.

Ministry of Education should allocate itinerant teacher services at district level where the teacher is allocated several schools and his or her jurisdiction and attends to those children in a given school who are experiencing learning problems.

The data collected indicated that the generally most learners perform poorly in Chemistry as compared to other subjects.

The researcher finding were evidence that for successful inclusive education for learners with learning disabilities various barriers have to be overcome.

It calls for well coordinated networking and corroboration with stakeholders, educators, the governments and other profession

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## APPENDICES

### APPENDIX QUESTIONNAIRE FOR THE TEACHERS

#### I ABDIRAHMAN FARAH ADEN

I am a student at Kampala international university, conducting research on (impact teacher's attitude and performance of learners in Chemistry. Results will be kept confidential.

#### Part 1

##### Background information

Please tick in the most appropriate box

1. Department .....

1. Age .....

20 ☐

25 ☐

31 ☐

35 ☐

46 ☐

46 ☐

24 ☐

30 ☐

34 ☐

40 ☐

45 ☐

50 ☐

3. Gender

a. Male

☐

b. Female.

☐

4. Level of education

a. Ordinary level

☐

b. Diploma

☐

c. Advanced level

☐

d. Professional level

- e. Diploma ☐
- f. Degree ☐
- g. Postgraduate ☐

5 Length of service as a teacher

- a. less than a year ☐
- b. One - two years ☐
- c. Three – four years ☐
- d. Five – six years ☐
- e. Seven – eight years ☐
- f. Nine years and above ☐

6. Current class

- a. Form 1 ☐
- b. Form 2 ☐
- c. Form 3 ☐
- d. Form 4 ☐

7. Duration of stay in the school

- a) One year ☐
- b) Three years ☐
- c) Four years ☐
- d) Five years ☐
- e) Six years ☐
- f) Seven years ☐
- g) Eight years ☐

h) More than eight years ☐

8. Is there any feeding programme in your school?

Yes ☐

No ☐

Please explain your answer

.....

9. If yes what types of feeding programme exist in your school?

i. W.F.P ☐

ii. Community run ☐

iii. School run ☐

iv. Snacks ☐

10 What type of food is provided in the programme?

i. Posho ☐

ii. Porridge ☐

iii. A mixture of maize and beans ☐

iv. Snacks ☐

v. Tea and bread ☐

vi. Others ☐

11. Is the food provided a balanced diet or inadequate?

Balanced diet ☐

Inadequate ☐

Please explain your answer

.....

12. Does this programmes have an impact on the academic performance of the pupils?

Yeas ☐

No ☐

13. What do you think that might happen in case the sponsors of this programme withdraw their services?

- i. Pupils performance will drop
- ii. Pupils enrolment will drop
- iii. The number of dropout will increase
- iv. Everything will continue as usual.

14. What are the problems encountered in your school in the effort of providing effective feeding programme? (Please explain your answer).

15. Are these cases of deficiency diseases encountered in your school?

Yes	<input type="checkbox"/>
No	<input type="checkbox"/>

16. If your answer is yes, please list down the examples

- i. ....
- ii. ....
- iii. ....
- iv. ....
- v. ....

17. What advice can you give to the parents in order to prevent cases of deficiency diseases? (Please explain).....