

# Physical facilities and strategies used by teachers to improve pupils' performance in social studies in Makueni County, Kenya

## Abstract

The purpose of this study was to find out the classroom learning environment on lower primary school pupils' performance in social studies in lower primary schools in Kibwezi zone in Makueni County, Kenya. The study aimed at determining the availability and use of physical facilities on pupils' performance in social studies in lower primary schools in Kibwezi zone, Makueni County, Kenya and further determines the strategies used by teachers to improve pupils' performance in social studies in the same study area. The study was guided by ecological model by Urie Brofenbrenner which focuses on child development within context of systems of relationship that form the child environment into five layers. The study employed descriptive survey design. The independent variable was classroom learning environment while dependent variable was pupils' academic performance in social studies. The study targeted all pupils and teachers in lower primary schools in Kibwezi zone. Purposive sampling was used to select location of the study while stratified random sampling and simple random techniques were used to select categories of schools and lower primary school teachers to be involved in the study. The sample comprised of all lower primary school pupils in the sampled schools. Data was collected using questionnaires and observation schedules. Content validity was used to ensure validity of the instruments. Test-retest method was used to evaluate reliability of the instruments. Data was analyzed using descriptive statistics. Results showed that lower primary school classroom environment in Kibwezi zone were not conducive for pupils to learn Social studies effectively. Availability and use of physical facilities in social studies was below average and pupils scrambled to use the little available resources. Pupils' performance in social studies was below average. It was recommended that parents be sensitized to participate in forums which could help primary schools get funded for teaching/learning materials and facilities such as CDF and county Government. It was also recommended that MOEST/Government should increase the Free Primary education funds to facilitate building and buying of school materials and facilities.

**Keywords:** Classroom environment, Pupils performance, lower-Primary Schools, conducive classroom, school practice, learning environment, social studies, knowledge, skills, attitude, Kenya, library, resting rooms, playground

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**Makau Mathias Wambua, Catherine Gakii Murungi, Caroline Mutwiri**

Department of Early Childhood Studies, Kenyatta University, Kenya

**Correspondence:** Catherine Gakii Murungi, Department of Early Childhood Studies, Kenyatta University, PO-43844-00100, Nairobi, Kenya, Email [Catherine\\_gakii@yahoo.com](mailto:Catherine_gakii@yahoo.com)

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## Introduction

Learning environment consists of many factors such as teaching and learning materials such as text books and charts and physical facilities such as classrooms, library, resting rooms, and playground among others. According to Murungi and Muthee<sup>1</sup> an effective classroom is attributed to its physical appearance or layout which encourages social and emotional needs of the students and therefore for a primary school teacher to protect the coherence of her social studies lessons there should be provision of conducive environment with provision of enough instructional teaching learning materials. Conducive classroom learning environment enables learners to learn different subjects such as social studies effectively. According to Murungi,<sup>2</sup> social studies is a process of education that gives children an opportunity to interact with other people and the society in their environment. Learning environment is the physical environment in a school setting such as school facilities, equipment's, school practice such as making facilities available, allocation of staff to teach primary education and strategies to promote participation.<sup>3</sup> In this research study learning environment is defined as materials and facilities or

equipment found in school or areas of study and that which help teachers and pupils to improve the acquisition of social studies knowledge, skills and attitude.

Globally, studies suggest that for social studies to be well performed teachers should build interest of their students in the environment around them. Study on Learning environmental carried by Linda,<sup>4</sup> suggest that teachers should know the subject matter and then engage students in the learning process through variety of instructional strategies. Social studies subject require meaningful teaching, reflective planning, instructions, and assessment.<sup>5</sup> reported that safe and orderly classroom environment and school facilities were significantly related to student academic performance in Canadian Schools. Adayemi,<sup>6</sup> noted that small classes and teacher quality improves learning environment. In Africa, primary schools in Nigeria have been attributed to inadequate instructional materials in social studies.<sup>2</sup> He farther states that social studies is an activity based subject and therefore depends on instructional materials utilization for effective teaching. Omabe<sup>7</sup> asserts that instructional materials are the most important while teaching-learning social

studies regardless of efficiency and the effectiveness in lesson delivery by the teacher. Unameh,<sup>8</sup> in South Africa observed that availability or scarcity of key school resources were linked to better educational outcomes in mathematics. Research done by Hienno,<sup>9</sup> and Dadzie,<sup>10</sup> in Ghana explained that uneven sharing of resources in schools and poor educational infrastructures negatively affect the quality of education. Makori points out that there was overcrowding and congested classrooms due to Free Primary Education in Kenya which also brought about shortage of teachers and teaching-learning materials. The report further states that Kenyan schools are seriously hit by lack of teaching resources. There are big class sizes of more than 80 pupils which a single teacher cannot handle. Kibwezi zone which is in Makueni County has been performing poorly in social study subject, with most primary schools in the zone scoring below 50%.<sup>11</sup> Therefore, it was important to explore the classroom learning environment on lower primary school pupils' performances in social studies in Kibwezi Zone primary Schools in the zone because lower primary is the level where young children acquire basic study skills.

## Literature review

Literature review in this study was guided by two study objectives:

- To find out the influence of availability and use of physical facilities on pupils' performance in social studies in lower primary schools in Kibwezi zone.
- To determine the strategies used by teachers to improve pupils' performance in social studies in lower primary schools in Kibwezi zone.

## Availability and use of physical facilities and pupils performance in social studies

Facilities such as library, classrooms and playground are also established as being important factors that influence teaching and learning of social studies. According to Mutai,<sup>12</sup> availability and use of physical facilities laboratories, classrooms and libraries make classroom learning environment conducive. Murungi<sup>2</sup> supported the same information and added that inputs such as school facilities make classroom environment very interesting and exciting and encourages more students to join school. A study on nature of schools and academic performance of public schools carried by Murungi<sup>2</sup> explained that school buildings must be not only a container or a functional program but also a friendly and attractive. The study also stated that buildings and toilets are some of the basic facilities that impact on academic performance. In a related study on effective use of educational inputs carried by Nanyonjo,<sup>13</sup> in Uganda lack of facilities was stated as impacting student's performance in languages. The study also confirmed a strong and positive relationship between quality of school facilities and student performance in mathematics.

In Kenya Lilian,<sup>14</sup> investigated the classroom environment on pupils academic performance in primary schools in Bungoma Sub county, Kenya and the study pointed out that availability of physical facilities in schools contributed positively to pupil's performance. Murungi and Muthee<sup>1</sup> carried out a study on school based factors affecting the KCSE performance of student in Kenya. The most influential factors discussed were availability of facilities as a factor that affected performance in KCSE. The study was carried in secondary schools while the current study was done in lower primary schools. Mbugua,<sup>15</sup> carried out a study on school based factors in

secondary schools. This was to determine what school based factors affect students' performance in mathematics public day secondary schools. This was a case study of Baringo County, Kenya and results revealed that Performance was better in schools with facilities than those without. Eshiwani<sup>16</sup> stated that school facilities such as laboratories, playing fields and library positively influenced student's performance. Zachariah,<sup>17</sup> carried a study to establish influence of teaching and learning resources for mathematics were available and used in secondary schools in Kenya and found that availability of teaching and learning resources in secondary schools impacted positively on student performance. However, this study targeted physical facilities and how they influenced learning environment in performance of social studies in Kibwezi Zone lower primary school.

## Strategies to improve pupils' performance in social studies

Many studies suggest that the subject social studies is one of the least liked in schools.<sup>18</sup> Therefore, there should be strategies intervening measures for pupils performance in social studies . This study defined strategies as effective methods that are used to improve the effectiveness of delivery service of curriculum content in teaching process. Most of the studies propose that increasing content application to real world situations is a way of promoting the relevancy of school subjects and elevating student interest level.<sup>19</sup> Studies demonstrate that student should be encouraged to work collaboratively in class hence creating a shared goal. Variety of teaching devices allowing students to move from teacher-centered to student-centered in classrooms should also be used. Despite many problems placed on them, teachers have significant influence over what and how they teach.<sup>20</sup> Teachers that are using some circular materials can use them differently and afford their students different experiences. The choice of teaching methods that teachers use in teaching depends on many factors such as the level of the class, nature of the topics, pupil's ability and available facilities in the school.<sup>19</sup> Many teachers prefer to teach class as a whole all the time, which may not field the desired educational results. Weak students may not benefit much in a large class of mixed ability.

Makau & Murungi,<sup>19</sup> indicated that the time students are present in schools and the time actually spent learning specific subjects either in schools or homework positively affects performance. Teaching must combine good mastery of content with methodology to guide students to be in control of media and tools for expression. This study wanted to suggest that teachers should possess command of the subject matter, use of variety instructional materials, variety of instructional methods, reflective planning, instructions and assessment. This study suggested that children should learn through different activities and teaching methods which should be linked to children's practical experiences in everyday life. Above all, monitoring of curriculum implementation by education officer and head teachers has been identified as strategies to improve academic performance. Jessica M & Murungi CG,<sup>1</sup> says supervision is a process of stimulating growth, and means of helping teachers and students. Ndani,<sup>21</sup> carried a study on impact of community participation on pre-school teacher motivation and physical learning environment in Thika District, Kenya and found that community participation in Pre-school welfare impacted learning environment positively. This study was investigating if the above mentioned strategies were being used by the lower primary teachers who taught social studies and their effectiveness in teaching learning process of social studies in Kibwezi Zone Kibwezi zone.

## Apparatus

Research instruments were administered as follows;

### a) Questionnaire for lower primary school teachers

Questionnaire was used to collect data from teachers who taught social studies in Kibwezi Zone lower primary schools. The questionnaire comprised of two parts, A and B. Part A was used to obtain demographic information of the respondents. Part B contained items that were developed based on research questions.

### b) Observation guide

An observation guide was used as check list on classroom learning environment. It was used to determine the availability of resources in lower primary schools. It was also used to collect data on teaching learning materials, class enrolment ,availability of social studies text books, teachers' qualification and Pupils performance scores. The researcher also used the lower primary zonal exams to get pupils test scores from sampled schools.

### c) Methodology

The target population of this study was all primary school teachers and lower primary school pupils in Kibwezi zone. Kibwezi zone had 16 public and 5 private primary schools. The lower primary enrolment in public primary schools was 1006. The enrolments in the private schools in lower primary were 120. The teachers who taught lower primary schools in Kibwezi zone in both public and private were

**Table 1** Population and sample size of pre-school teachers

Facilities	Adequately available	%	Fairly available	%	Not available	%
Desks	9	42.86	12	57.214	0	0
Library	5	23.81	4	19.05	11	52.38
Classrooms	15	71.43	6	28.57	0	0
Play ground	5	23.81	9	42.86	7	33.33

As it can be seen in Table 1 lower primary schools in Kibwezi zone had 21 sampled classrooms and many of them were lacking important facilities. The researcher observed that many pupils missed desks and chairs and some desks were broken. Pupils were seen squatting on uncomfortable forms as some sat on the floor. The researcher also observed that pupils were not comfortable while in classroom. This was leading to poor concentration which resulted to poor social studies performance. A study carried by UNESCO,<sup>22</sup> on school facilities, states that most rural schools were characterized by missing or broken desks and chairs as well as sanitation facilities which discouraged schools to perform better. This study agrees with this statement as most of the pupils in lower primary schools in Kibwezi zone did not have enough desks thus some were to sit in turns or squat while in classroom. On the availability of a School Library and Pupils Performance in Social studies, the researcher observed that library was one of most important resources in lower primary schools. However; there were no primary schools with library in the zone. Materials were stored in deputy head teacher's office as a common storage or in pupils' classrooms. The researcher observed that schools library as an important facility for proper storage of documents, course books and place for private studies. The highest number of school did not have any form of library. Most of the libraries were structure prepared by teachers to store material within their classrooms. Pupils

21 (Kibwezi Education Office, 2015). The research used purposive sampling technique to select Kibwezi Zone. Lower Primary school Pupils were also purposively sampled. 7(30%) of primary schools in the zone were selected to be involved in the study. Questionnaire was used to collect data from teachers who taught social studies in Kibwezi Zone lower primary schools. An observation guide was used as check list on class learning environment. It was used to determine the availability of resources in lower primary schools. The statistical package for social science (SPSS) was used to make descriptive analysis. Data was reported by use of tables and the researcher explained the meaning of the captured data using text then made conclusion.

## Results and discussion

### Availability and use of physical facilities and pupils performance in social studies

The first objective aimed at finding out the influence of availability and use of physical facilities on pupils' performance in social studies in lower primary schools in Kibwezi zone. This was in line with answering the question: How does the availability and use of Physical facilities influence pupils' performance in social studies in Lower primary schools in Kibwezi zone? The physical facilities were: Desks, library, classrooms and playing ground. The availability and use of physical facilities in lower primary schools was determined and results presented in Table 1.

were seen carrying out their studies under trees or in the open field because classroom environment was not conducive for learning. For safety of text books pupils had been assigned to carry them on daily basis from and to school. This contributed to lose of many text books and more so, destruction of many text books hence poor performance due to lack of reference materials.

These finding concurred with those of Makau and Murungi,<sup>19</sup> who observed that pupils performance at any point is accumulative function of inputs which are not limited to course books, laboratories, libraries and school building among others, yet primary schools in Kibwezi zone, even lacked stores for the storage of few available teaching learning materials and which this study noted as the likely reason for decreasing academic performance in social studies in Kibwezi Zone. On availability of classrooms, this study established that big number of lower primary school classrooms were substandard. The researcher observed that some classrooms had earthen floor, lacked windows, doors and had cracked walls. This was not only risk for the teachers and pupils but also contributed to low pupils performance in social studies in Kibwezi Zone lower primary schools. On availability and use of playground, the study established that the schools with play grounds were very few as big number of schools play fields were substandard or not available. The researcher observed that some schools had been established on volcanic rocky foundation where it was impossible

to prepare playground. The study concluded that pupils' holistic development was not well taken care of because children did not interact through play as recommended by Murungi.<sup>2</sup> Damien<sup>23</sup> carried study on the nature of schools and academic performance in public primary schools in Gasobo District, Rwanda and found that schools that lacked facilities performed poorly as compared with those which had enough facilities. This study also established that schools that lacked adequate facilities performed poorly when compared with those with adequate facilities.

### Strategies to improve pupils' performance in social studies in lower primary schools

The second objectives was to determine the strategies proposed by teachers to improve classroom learning environment on pupils' performance in social studies in lower primary schools in Kibwezi zone. This objective aimed at answering the question: What are the strategies used by teachers to improve social studies performance in lower primary Schools in Kibwezi zone? Suggestions to improve pupils' academic performance in social studies were given by 21 teachers in 7 sampled lower primary schools and Table 2 presents the results.

**Table 2** Teacher/pupil ratios and teaching mathematics in pre schools

Aspect	Frequent	Percentage
Provision of adequate teaching/ learning materials	10	47.62
Sensitize parents on value of education and public participation	3	14.29
Improve physical facilities in schools	5	23.8
Government to employ more qualified teachers	3	14.29
Total	21	100

Table 2 shows that 10(47.62%) of the teachers had observed that provision of adequate teaching/ learning materials could improve pupils performance in social studies. Guloba,<sup>24</sup> carried research on teaching method and availability of teaching resource and how they influenced pupils' performance and its findings were in support to this study that variety of methods and use of different teaching resources improves student performance. 3(14.29%) indicated that sensitizing parents on value of education on public participation could improve academic performance. Public participation would involve parents attending both CDF and County Government rallies to mobilize for resources such as physical facilities and money. 5(23.80%) stated that Government improvement on physical facilities in schools would improve classroom environment hence good pupil's performance in social studies. 3(14.29%) also observed that if government employed more teachers pupils performance in social studies would improve making learning classroom environment in lower primary schools good.

### Conclusion

The first objective was to find out the influence of availability and use of physical facilities on pupils' performance in social studies and this study found that most schools lacked physical facilities. The results indicated lack of facilities in lower primary influenced the learning environment negatively. The second objective was to determine the strategies used by teachers to improve pupils' performance in

social studies in lower primary schools in Kibwezi Zone. Teachers stated that the problems in lower primary schools could be solved by the government increasing FPE funding to buy enough resources. Teachers also suggested that parents should be sensitized on value of education to assist in improving physical facilities in schools. Teachers also stated that the government should employ more qualified teachers to help the increasing enrolment.

### Recommendations

Recommendations were made for key stakeholders based on the study findings

The following recommendations were suggested by teachers in lower primary schools who were respondents of this study:

#### A. Ministry of education

On availability and use of physical facilities in lower primary schools, the government should increase the funding to schools so as to cater for the essential facilities and teaching/learning aids. This may help to create a generation that is well educated in the future community.

#### B. Parents and the community

Parents should cost share buying of school materials so as to supplement materials supplied to school through Free Primary Education. The parents should ensure their public participation during County Government rally consensus so as to mobilize school resources. The parents through the school BOM should mobilize school resources from CDF kit so as to build standard school libraries and classes hence improving classroom learning environment.

#### C. Lower primary teachers

Teachers need to use variety of teaching methods that enable them to handle big enrolment such as exploration, use of play fields, libraries, discussion and use of immediate environment where they can acquire teaching/learning materials for social studies .This will enable them improve classroom learning environment in lower primary schools hence acquire good performance in social studies.

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### Conflicts of interests

Author declares that there is no conflict of interests.

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