

## Influence Of Social Amenities On Academic Performance In Primary Schools In Gichugu Constituency, Kenya

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### **ABSTRACT**

*Social amenities are important to primary schools as they endeavour to provide quality education. Social amenities in schools include play materials and sanitation but in majority of the schools, little attention is directed towards the influence of social amenities on academic excellence of learners. This study was to assess the influence of social amenities on academic performance in primary schools in Gichugu Constituency, Kenya. The study was guided by the following objectives: to establish the status of social amenities in primary schools; to examine how play amenities affected academic performance of learners in primary schools; to establish how sanitation amenities influences pupils' performance in primary schools and assess the challenges faced by primary schools in provision of social amenities to learners. This study was guided by Social Constructionist. The target population consisted of 75 primary school head teachers. Kathuri and Pals Table for Sample Size Determination was used to arrive at a sample size of 63 school heads teachers who were randomly selected from the target population. The research instruments used in data collection were the questionnaires and an observation guide. A pilot study was conducted to establish the reliability of the instruments. Data was analysed with the Statistical Package for Social Sciences (SPSS Version 20) to generate charts, frequency tables, means and standard deviations. The study found out that majority of the*

*head teachers agreed with the statement that their school children had access to clean and safe drinking water although there were some schools that used water from the rivers and streams near the schools. The study also found out that majority of the schools had access to adequate sanitation amenities for their pupils. The study found out that social play materials play an integral part in assisting children to develop communication, persistence and other social skills. It was noted that sanitation amenities were not adequate for learners and these facilities did not cater for learners with physical disabilities. The study concluded that lack of sanitation amenities such as piped water and good toilets led to occurrence of diseases such as typhoid, cholera and other highly contagious diseases which affect learners' access to education due to high absenteeism rates. The study recommends that the Ministry of Education and other education stakeholders should emphasise the role of social amenities in primary schools in order to improve learners' motivation and overall academic performance of all schools in Kenya.*

### **Background to the Study**

One of the Millennium Development Goals calls on countries to reduce the proportion of people without access to basic sanitation by half (Guy & Haller, 2007). An important component towards

achieving this goal is the provision of a secure school environment. Improved sanitation amenities in schools ensure that the level of hygiene is maintained at a higher standard. Social amenities include provision of sanitation amenities, provision of play amenities among others in a bid to ensure that educational institutions provide a conducive environment for social and cognitive development. A contaminated environment and poor hygiene practices account for over 65% of the total burden of disease among students in developing countries (UNICEF/ WHO, 2011). Al-Shammari, Khoja, El-Khwasky and Gad (2001) in a study carried in Riyadh, Saudi Arabia concluded that water storage and open sewage disposal were significantly associated with parasitic infections among learners although they added that self-latrines care, lack of solid waste collection and visible sewage near the institutions significantly increased the risk of intestinal parasitic infections. Learners who suffered from intestinal infections were unable to attend school and if they attended the classes they exhibited lower concentration levels and ideally when assessment was done, such learners posted very low scores

### **Objectives of the Study**

The study was guided by the following

objectives:

- i. To establish the status of social amenities in primary schools in Gichugu Constituency.
- ii. To examine how play amenities affect academic performance of learners in primary schools in Gichugu Constituency.
- iii. To establish how sanitation amenities influences pupils' performance in primary school pupils in Gichugu Constituency.
- iv. To assess the challenges faced by primary schools in provision of social amenities to learners.

### **Theoretical Framework**

The study was based on Social Constructionist Theory as explained by Sahlin (2006). Social Constructivism holds that knowledge acquisition is a complex process involving language, community, social interaction and other cognitive functions that affect individual's intellectual development. In this study, the researcher holds that the knowledge acquisition is aided by engagement in social activities and therefore the social amenities play a pivotal role in aiding intellectual development of children. Social Constructivism also holds that social processes aids in development of

intellectual thought and thus provision of social amenities could be related to academic performance. The status of social amenities in primary schools was investigated to support the theory that social processes aid in development of intellectual capacity among learners. The provision of social play amenities such as play field, social play materials assists learners in development of social skills which provide a yard stick for intellectual growth as well as life skills development. Thus social play materials provide learner's with tools to exercise and develop their social skills that ensure learners are capable of interacting with other learners, community and the society at large. This study collected information from Gichugu Constituency primary schools that showed the link between social amenities and academic performance of children.

### **Sanitation Amenities and Academic Performance**

Sanitation amenities include safe drinking water, toilets among other WASH program amenities. These amenities ensure that the learning environment allows children to use these amenities without exposing them to risk such as contamination, diseases among others. WHO (2002) noted that access to safe drinking water is an essential component of basic human rights

and that water should be provided in all schools and other public institutions. This document noted that access to safe drinking water has been documented by World Water conference held in Mardelplata, the world Millenium development Goals as well as Johannesburg World Summit for Sustainable development. Therefore it is vital for institutions to ensure that its occupants have access to safe drinking water. Owoeye and Yara (2011) conducted a study in Ekiti State, Nigeria to determine how social amenities in school contribute to academic performance of learners in schools. Using descriptive survey design of the ex-post factor type, the researcher was able to manipulate the study variables, the study determined that school social amenities whether health, sanitation, play amenities and academic oriented amenities all have an effect on academic performance. The study therefore argued that provision of academic and social amenities were paramount if the community were to have higher expectations in academics. The findings in this study collaborated Dewar (2008) who carried out his study in USA that social amenities affected the children's cognitive development and therefore directly influenced their academic performance.

Nigeria is a relatively rich African country due to oil presence and therefore the status of the social amenities in these schools and the level of incomes of the parents among other factors could have influenced the results of the studies. Kenya on the other hand is a relatively developing country and the status of primary schools not as developed as the Nigerian schools and therefore offers a scenario for further study.

### **Challenges facing Schools in Provision of Social Amenities**

Mukhtar (2008) carried out a situational analysis of education sector in Pakistan. In this study Mukhtar concluded that public schools faced several challenges including financial and social in provision of basic amenities to their learners. He argued that financial constrains were the greatest challenge since the amenities costs were relatively higher than the finances received by the local authorities who acted as financiers of education. He noted that schools thus sought ways to reduce costs by inviting parents to act as parents, school old students and local community leaders (Labour) and the local authority could then meet the cost of purchase of required items. Owoye and Yara (2011) argued in public schools unless the school sponsors and other charitable organisations chipped

in these schools would not develop social amenities due to financial pressure.

Tamilenthi, Mohanasundram and Padmini (2011) carried out a study on social and infrastructural challenges facing Zambian schools. In this study the authors noted that social amenities were well developed among the private schools compared to public schools. They argued that private schools enjoyed more comprehension on the link between social amenities and academic performance and that this comprehension emphasized provision and constant review of the status of social amenities. He noted that although amenities such as playgrounds were not adequate, they were organized in such a way that ensured all learners used the amenities at intervals for optimal use. Maphoso and Mahlo (2014) posited that cultural beliefs systems also posed a challenge to provision of social amenities in schools. He noted that in some schools the sanitation amenities must be separate and widely apart for them to be accepted by the society. He noted that ablution blocks for male and female learners although separate they were required to be located some distance from one another depending on the cultural belief systems of the area residents. They noted that in some schools learners in their menstrual

cycle would be required to avoid contact with male counterparts a belief system which was indicative of segregation and which contributed to absenteeism.

### Research Design

This study adopted a descriptive Survey design. According to Mugenda and Mugenda (2003) descriptive survey research design allowed the researcher to secure information concerning a phenomenon under study from selected number of respondents. Descriptive survey design generally entailed investigating populations by selecting samples to analyze and discover occurrences. This

design was suitable for this study because a sample was selected from the total number of primary school in Gichugu Constituency.

### Status of Social Amenities in Primary Schools

The school should provide learners with a conducive and child friendly environment. Provision of clean and learner friendly sanitation amenities allows the learner feel appreciated and cared for. The respondents were asked to indicate if their schools had adequate sanitation amenities for their learners as summarized in Table 4.1.

**Table 4.1: Adequacy of Sanitation Amenities**

Average School Population	No of Toilets	Ratio of Pupils to Toilets	Average Mean Grade (2014 KCPE)
200-250	7-10	1:25	240
	11-15	1:16	290
	15-20	1:13	327
300-500	7-10	1:50	180
	11-15	1:33	220
	15-20	1:25	250
	21-35	1:14	325
500-800	20-30	1:27	274
	31-40	1:20	315
	31-60	1:13	378

Data in Table 4.1 showed that schools with inadequate sanitation amenities posted

lower mean scores compared to the schools that recorded adequate sanitation amenities over the three year period. All

the head teachers indicated that the sanitation amenities were well maintained and clean. The head teachers also unanimously indicated that presence of adequate sanitation amenities corresponded with increased enrollment in their schools.

However the study observed that learners with physical disabilities shared the same sanitation facilities with other learners despite their physical disabilities. Thus learners with disabilities had difficulties in using these facilities. The study also noted that in some school boys and girls shared the sanitation facilities (See Photo 4)

Appendix VIII (Photo 8 and Photo 9) shows boys and girls crowding ablution blocks during break time. This shows that some schools did not have adequate sanitation amenities. In four schools the learners were observed to form queues' during the lesson breaks in the ablution blocks. The study also established that sanitation amenities in the some primary schools were not adequate for the number of learners. The study concurs with Owoye and Yara (2011) that majority of the public schools did not have access to adequate sanitation facilities particularly the toilets and in some schools the boys and girls shared the same sanitation

facilities as evidenced in Appendix VI, Photo 4.

As shown in Table 4.1, schools with a favourable student sanitation ratio posted better results. The study concluded that schools with more sanitation had better results in the KCPE. The study agrees with Maphoso and Mahlo (2014) who established that learners in schools that had adequate sanitation facilities and well equipped social amenities posted better results in the examinations compared to learners in schools that had poor, worn out or no social amenities. This according to Maphoso and Mahlo (2014) attributed to rising cases of learner absenteeism, poor health among other resultant features associated to poor social amenities. The researcher agrees with these findings and notes that sanitation facilities were inadequate for the population in these schools.

### **Play Amenities and Academic Performance**

Children engage in social activities within their environments and this enhances their social skills development. Through play and interaction with a given context, speech development is enhanced. The study sought to find out if the social play amenities influence development of

intellectual, language and motor skills as summarized in Table 4.2.

**Table 4.2: Social Amenities and Language, Motor and Intellectual Growth**

Responses	Frequency	Percent	Cumulative frequency
Strongly Agree	45	75.0%	75.0%
Agree	15	25.0%	100.0%
Do not Know	0	0.0%	
Disagree	0	0.0%	
Strongly Disagree	0	0.0%	
Total	60	100.0%	

Data in Table 4.2 showed that all (100%) of the sampled head teachers indicated they agreed with the statement that social play amenities allow for development of persistence and other social skills necessary for the development of language, motor skills as well as intellectual growth. The researcher noted the following swings, see-saws, football pitch and balls, merry-go-round; slides among others were common in most schools. The study established that all the social play materials play an integral part in allowing children to develop communication, persistence and other social skills. The findings concur with Lawrence (2011) study in Portland that showed that social play increased children's movement which corresponded

to an increase in children's physical and cognitive abilities. Lawrence noted that it is through such activities such as role play, seat changing coordinated dances among others assist learners get basics such as timing, coordination and concentration. Timing, coordination and concentration are necessary skills in development of language and problem solving skills which lead to improved academic performance.

The researcher sought to assess how social play enhances motivation in children. This was to assist the study to draw conclusion on the influence of social play and children motivation. The respondents were asked to indicate their opinion on the role of social play in children's motivation as summarized in Table 4.3.

**Table 4.3: Social Play and Children's Motivation**

Responses	Frequency	Percent	Cumulative Frequency
Strongly Agree	9	15.0%	15.0%
Agree	48	80.0%	95.0%
Do not know	0	0.0%	95.0%

Disagree	2	3.3%	98.3%
Strongly Disagree	1	1.7%	100.0%
<b>Total</b>	<b>60</b>	<b>100.0%</b>	

Data in Table 4.3 showed that 95% of the head teachers agreed that non provision of social play amenities demotivated children and their involvement in play activities was reduced. Data also showed that 3.3% and 1.7% of the head teachers disagreed and strongly disagreed that social play amenities influenced children’s motivation. The study established that non provision of social play amenities negatively motivated learners in the schools. Therefore, social play amenities positively motivate learners. These findings concur with Gorman (2010) that there are children whose motivation in play influenced their intellectual development and who without play amenities would reduce their level of motivation and eventually translate into poor intellectual development. The study

also agrees with Gorman (2010) that learners are more inclined to post positive academic achievements to be sustained in the schools where they are sponsored by such schools. The study contradicts Beem (2006) who argued that pressure to produce winning teams gave rise to lower academic performance among the top performers in schools. The study views social play amenities as directly influencing academic performance of learners.

Children interaction with one another during play enhances their group interaction. Group dynamics assist children to develop leadership skills and communal spirit. The respondents were asked if the social play amenities affected children’s group dynamics as summarized in Table 4. 4.

**Table 4.4: Social Play Amenities and Group Dynamics**

<b>Responses</b>	<b>Frequency</b>	<b>Percent</b>	<b>Cumulative frequency</b>
Strongly Agree	50	83.4%	83.4%
Agree	8	13.3%	96.7%
Do not know	0	0.0%	96.7%
Disagree	2	3.3%	100.0%
Strongly Disagree	0	0.0%	
<b>Total</b>	<b>60</b>	<b>100.0%</b>	

Data in Table 4.4 showed that 96.7% of the head teachers agreed that social play



amenities boosted children’s interaction and group dynamics. Analysis in Table 4.10 showed that 3.3% of the head teachers disagreed that social play amenities boosted children’s group dynamics. Social play amenities allowed social development of children within the school and at home. The study thus finds that social play amenities influenced young children’s group dynamics. The study concurs with Milkie and Warner (2011) that social play amenities play an

important role in boosting social interaction and group interaction among children. The study agrees with Gorman (2010) that social play amenities influenced group dynamics.

### **Sanitation Amenities and Pupils’ Performance**

The respondents were asked if access to safe drinking water influenced academic performance of learners and their responses are presented in Table 4.5.

**Table 4.5: Access to Safe Drinking Water and Academic Performance**

<b>Responses</b>	<b>Frequency</b>	<b>Percent</b>	<b>Cumulative frequency</b>
Strongly Agree	45	75.0%	75.0%
Agree	14	23.3%	98.3%
Do not know	0	0.0%	98.3%
Disagree	1	1.7%	100.0%
Strongly Disagree	0	0.0%	
<b>Total</b>	<b>60</b>	<b>100.0%</b>	

Data in Table 4.5 showed that 98.3% of the head teachers agreed that access to clean and safe drinking water had an effect on the academic performance of learners.

The head teachers were asked if lack of piped water led to an increase in the rate of disease outbreak and the responses are summarized in Table 4.6.

**Table 4.6: Academic Performance in Sampled Schools**

<b>Year</b>	<b>2014</b>	<b>2013</b>	<b>2012</b>
Average KCPE Marks for Schools with piped water	Over 300	Over 280	302-315
Average KCPE Marks for Schools without piped water	240-280	250-280	236-280

Data in Table 4.6 shows that the average performance of the schools with piped

water in the area under study was over 300 marks compared to schools without piped

water which had average marks of 240-280. The study therefore showed that

schools with piped water had a higher test scores compared to schools without water.

**Table 4.7: Access to Piped Water and Disease Prevalence**

Responses	Frequency	Percent	Cumulative percent
Strongly Agree	0	0.0%	0.0%
Agree	46	76.7%	76.7%
Disagree	0	0.0%	76.7%
Strongly Disagree	14	23.3%	100.0%
<b>Total</b>	<b>60</b>	<b>100.0%</b>	

Data in Table 4.7 showed that 76.7% of all the head teachers agreed that lack of piped water led to an increase in disease prevalence. Data also showed that 23.3% of the head teachers disagreed with the statement. The study concludes that lack of piped water led to occurrence of diseases such as typhoid, cholera and other highly contagious diseases which affects learners' access to education through high absenteeism rates. The study concurs with the findings by Ezeagwuna, Okwelogu and Ogbuagu (2009) conducted a study on intestinal parasitic infection which affected the rate of class attendance in poor areas of Nigeria. Redhouse (2004) noted that lack of safe piped water contributed to

prevalence of diseases associated with unsafe water such as typhoid and cholera. Thus the study noted that such sicknesses contributed to lower academic achievement among children due to absenteeism and slow cognitive development due to illness.

Children need water to quench their thirst as they spend an average of six hours within the school. Safe drinking water ensures that children can drink without getting sick and suffering water borne diseases. The respondents were asked if lack of access to clean safe water led to absenteeism in schools and their responses are summarized in Table 4.8.

**Table 4.8: Safe Drinking Water and School Absenteeism**

Responses	Frequency	Percent	Cumulative frequency
Strongly Agree	22	36.7%	36.7%
Agree	14	23.3%	60.0%
Disagree	8	13.3%	73.3%
Strongly Disagree	16	26.7%	100.0%
<b>Total</b>	<b>60</b>	<b>100.0%</b>	

Data in Table 4.8 showed that 60.0% of

the head teachers noted that lack of access

to safe drinking water led to an increase in the school absenteeism rate. Analysis also showed that 40.0% of the head teachers disagreed with the statement that safe drinking water contributed to school absenteeism. The relatively higher rate of disagreement could be explained by the fact that Gichugu Constituency is located just next to Mt. Kenya Forest which is a source of many clean unpolluted rivers and thus the river water and streams that are in the constituency have clean unpolluted mountain water.

### **Challenges Faced by Primary Schools in Provision of Social Amenities**

The study sought to assess the challenges faced by primary schools in provision of social amenities to learners. The respondents were asked if financial constraints were a challenge in provision of social amenities in their schools and their responses are summarized in Table 4.9. The study showed that all (100.0%) of the head teachers agreed that financial constraints were a challenge in provision of social amenities in public primary schools.

**Table 4.9: Financial Constraints in Provision of Social Amenities**

Responses	Frequency	Percent
Strongly Agree	46	76.7%
Agree	14	23.3%
Do not know	0	0.0%
Disagree	0	0.0%
Strongly Disagree	0	0.0%
<b>Total</b>	<b>60</b>	<b>100.0%</b>

The study thus concluded that primary schools faced financial challenges in provision of sanitation amenities and therefore depended on parents and other community leaders to ensure that there were adequate sanitation amenities in their institutions. The findings agree with Mukhtar (2008) who carried out a study on the challenges facing schools in provision of social amenities. Mukhtar noted that the greatest challenge that school face has to

do with lack of financial resources required to adequately provide and maintain the social amenities. Amenities costs were relatively higher than the finances received by the local authorities who acted as financiers of education. He noted that schools thus sought ways to reduce costs by inviting parents to provide labour required in construction and maintenance of these resources.

The respondents were asked to indicate if

lack of land was an impediment in provision of social amenities in primary

schools and the responses are summarized in Table 4.10.

**Table 4.10: Land Challenge in Provision of Social Amenities**

Responses	Frequency	Percent
Strongly Agree	8	13.3%
Agree	33	55.0%
Disagree	19	31.7%
Strongly Disagree	0	0.0%
Total	60	100.0%

Data in Table 4.10 showed that 55% and 13.3% of the head teachers agreed and strongly agreed respectively that land was not an impediment in provision of social amenities in their schools. The analysis showed that 31.7% of the head teachers also noted that land was indeed a challenge in provision of social amenities in their schools. Since a higher proportion of those sampled indicated that land was not a challenge, the study opines that indeed in majority of the primary schools land was available for provision of social amenities. Mbula (2014) in her study in Machakos County noted that schools had large tracts of land which was under-utilised. This presented a challenge to manage the school grounds due to the vastness and lack of personnel to ensure safety of children. Evidence in Table 4.22 showed that majority of schools had over six hectares of land and thus schools had expanse land to install social amenities in

Gichugu Constituency, Kirinyaga County.

### **Play Amenities and Academic Performance.**

Social play amenities are play materials that allow social development of children within the school and at home. Social play materials play an integral part in allowing children develop communication, persistence and other social skills necessary for development of language, motor skills as well as intellectual growth (Edwards, 2006). Milkie and Warner (2011) argued that schools should ensure they have ample play amenities, access to play tools and teachers encouraged to participate in play activities together with learners. The report argued that schools that lacked play amenities were unsuitable for learning particularly at tender early age learners. In order for learners to develop motor skills which are applied later in life, schools should provide a variety of

amenities such as horizontal trunks ropes and temporally items to provide learners with a variety of play amenities and broaden their play scope. Lawrence (2011) argued that innovation in school can increase involvement of learners. He imitated that movement increases children's physical and cognitive abilities. It is through such activities such as role play, seat changing coordinated dances among others assist learners get basics such as timing, coordination and concentration. These skills are very useful in development of language and problem solving skills which leads to improved academic performance. However this study was carried out in a more developed country than Kenya and therefore other underlying factors could have played an important role in the findings. The current study will be based in Kirinyaga County which is a relatively more developed region of Kenyan highlands and will provide key data on the role of sanitation amenities in Kenya.

### **Conclusions**

The study concluded that primary school children in Gichugu Constituency had access to clean and safe drinking water and access to sanitation amenities for their pupils. The sanitation amenities were well maintained and clean. However, the

sanitation amenities were not adequate for the number of learners. The sanitation facilities did not cater for learners with physical disabilities.

Electricity and play fields were provided in the primary schools although not evenly distributed in the schools. Other social amenities such as common rooms, and leisure outdoor seating areas were not provided in majority of the schools.

Social play materials play an integral part in allowing children to develop communication, persistence and other social skills. Such skills as timing, coordination and concentration are necessary skills in development of language and problem solving skills which leads to improved academic performance. Other than influencing social skills, social amenities influence growth of intellectual capacity of children. The study also concluded that non provision of social play amenities negatively motivated learners in the schools. Lack of play amenities would reduce their level of motivation and eventually translate into poor intellectual development. Provision of diverse social play materials motivates learners by providing a way for children to relax and indulge with others and has an influence on children's academic performance.

The study concluded that lack of sanitation amenities such as piped water and good toilets led to occurrence of diseases such as typhoid, cholera and other highly contagious diseases which affect learners' access to education through high absenteeism rates. The study concluded sicknesses contributed to lower academic achievement among children due to absenteeism and slow cognitive development due to illness. The study also concludes that lack of clean safe drinking water led to an increase in the absenteeism rate in schools. Sanitation amenities contributed to incidences of diseases in their schools. Poor sanitation amenities lead to increase in the rate of absenteeism in schools.

The study concluded that financial constraints existed in provision of social amenities. Although schools were not charged for labour, they still had to buy other materials required to make and maintain the social amenities which regularly suffer from wear and tear due to daily use by children. The study also concluded that land was not a challenge, the study concluded that indeed in majority of the primary schools land was available for provision of social amenities.

### **Recommendations**

In line with the findings, the study makes the following are recommendations.

- i. The school administration should construct more sanitation amenities in their schools to correspond with the high population of children and also cater for learners with physical disabilities. The study found out that the sanitation amenities were not adequate for the population of learners in primary schools in Gichugu Constituency.
- ii. The Ministry of Education should develop a clear policy on the choice of play and social amenities for early childhood learner's social amenities to ensure that the facilities are suitable for use by the children aged three to nine years in early childhood and lower primary school. The study established that schools did not have standardized play and social amenities.
- iii. Other social amenities such as electricity should be distributed to all buildings in the primary schools to make them accessible. The play field should also be well marked and equipped with necessary amenities such as track for running, goals posts. The schools should also regularly carry out maintenance on these facilities to enhance their usefulness to learners. The study established that

electricity in majority of schools was only connected in the administration block.

iv. The Ministry of Education and other education stakeholders should emphasise the provision of social amenities in primary schools in order to improve learners' motivation and overall academic performance in all schools in Kenya.

v. The Ministry of Education, National Government Constituency Development Fund and the local community should ensure that all schools have access to piped water to reduce occurrence of diseases such as typhoid, cholera and other highly contagious diseases which affects learners' access to education through high absenteeism rates. The study found out that some schools depended on water from streams which was not safe for consumption by learners.

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