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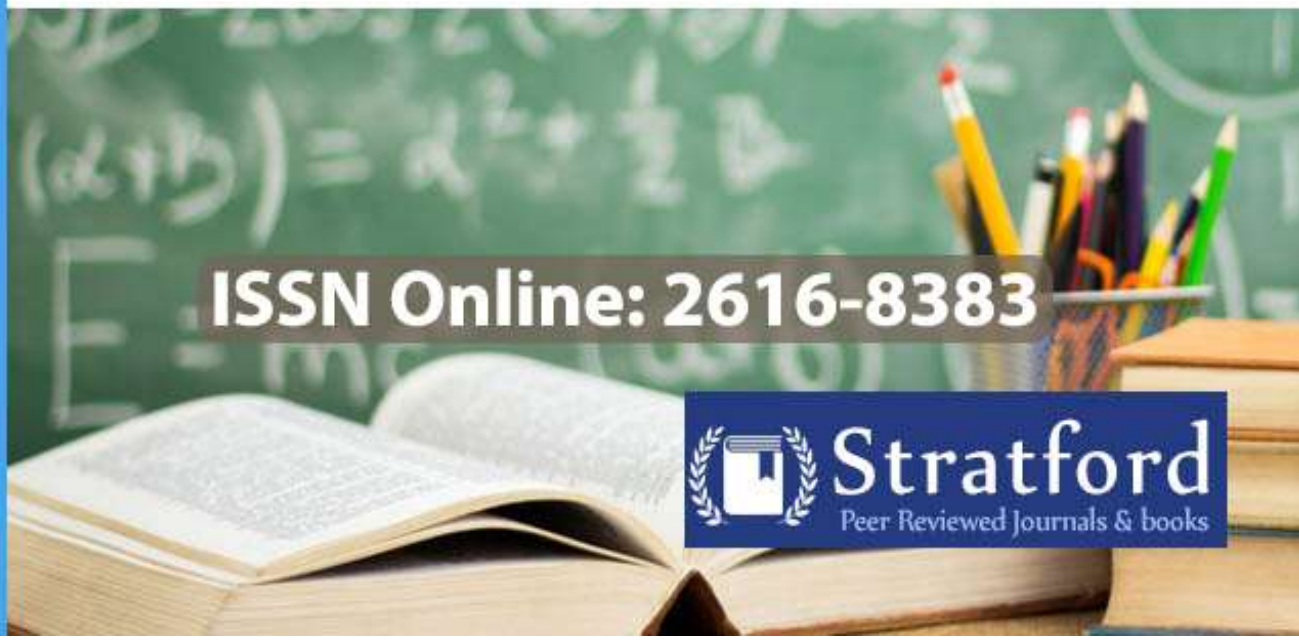

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Nteziyaremye Elie & Dr. Hesbon Opiyo Andala, PhD

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School Physical Infrastructures and Pupils' Enrolment Rates in Nursery Schools in Rwanda

[1*]Nteziyaremye Elie & [2]Dr. Hesbon Opiyo Andala, PhD

[1*]Post graduate student, Mount Kenya University, Rwanda

[2]Ag program leader, school of education, Mount Kenya University, Rwanda

***Email of the corresponding author: elientezi@gmail.com**

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Abstract

The school physical infrastructures play a significant role in the promotion of school enrolment in various levels of education. Adequate school playgrounds and classrooms help the school to enroll greater number of populations and reduce over age students in the classroom. The purpose of the paper was to establish the relationship between school physical infrastructures and pupils' enrolment in nursery schools in Ngororero district in Rwanda. The paper employed correlation research design. The target population was 260 respondents that provided the sample size of 164 got using Yamane formula. Interview guide and questionnaire were used as data collection instruments. The findings revealed that classrooms, playgrounds and dining hall are considered to be one of school physical infrastructures. The findings demonstrated that there is a significance high degree of positive correlation between school physical enrolment and pupils' enrolment as it was proved by Karl Pearson coefficient of correlation (r) = .977 and p-value= .000. It was also found that 95.7% of the variations in children enrolment in nursery schools of Ngororero district was determined by the school physical learning materials. The remaining 4.3% of pupils' enrolment can be affected by other variables. The study recommended that the educational planners should make effective set up that could enhance nursery schools to be equipped accordingly and to have all necessary infrastructures needed in school setting to accommodate all registered students. The Ministry of Education should provide regular financial support needed to allocate the infrastructures in schools and focus on regular maintenance to enhance daily school activities. The school head teachers should make effective management of the allocated school infrastructures and address any issue related to school infrastructures. Parents should also have their participation in the development of the school infrastructures so as to promote teaching and learning conditions of their children.

Keywords: *School physical infrastructures, pupils' enrolment, nursery schools and Rwanda*

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1.0 INTRODUCTION

The article 26, paragraph 2 of universal declaration of human of human right reveals that the right to education of each individual might be developed effectively. John (2014) stated that education has become an important element which involves people to human's life where both males and females need to get equal access to education. The researcher also stated that education is a bridge which leads people to their better future life as well as development of the country where its development can be varied when its citizens have access to schools.

Globally, Every learning institution like in Asia, might run as well as being developed due to the availability of its infrastructures that could be helpful to complete all the planned activities as well as increasing the number of population that are supposed to enroll schooling so as to acquire the prepared school instructions (Ogbuozobe, 2007). Therefore, the most important variables that could be emphasized and developed, is a child as well as society which is educated and healthy so as to get the positive change of the country. Each economy and effective welfare of citizens in the country might be developed with having fair and distribution of education without gender disparity, region as well as capacity building of the families. However, most of investments done by people as well as the government should be directed to the provision of education so as to reduce illiteracy of citizens in the country and to improve its socio-economic status (Denison, 2012). The life of people, there is a need to consider the learning environment with the availability of learning facilities grouped as adequate institutional infrastructures that could be used in schooling children.

In Africa, UNESCO (2018) stated that full provision of education, should be done at lower level of expenditure so as to enhance the availability of schooling access. Aigbokhan (2009) presented that the environmental infrastructures settled as learning institutions, should be allocated at a high level of availability. Therefore, Education is cited as an effective journey which guides an individual and develops full human personality and also making better life (Oyedepo, 2011). The presented sectors in the country need to be standardized so as to maintain the life citizens in the country and also to achieve the mission highlighted by the government.

The maintenance as well as replacement of the old learning materials might be done to make well conducive learning environment which directly attract the new intake to enroll to education and also this can be performed with distribution of adequate new learning materials that could be used during teaching and learning process like relevant textbooks, adequate classrooms and school playgrounds. To cope with those challenges, after many reforms in education sector took place to raise the low students' academic performance and to reshape education system which had broken down (MINEDUC, 2006). The effective development of every young individual could be emphasized and maintained so as to develop well completed human dignity. Personal servant of education should be fully prepared as well as developed physically, intellectually and emotionally so as to enhance the individual will related to the society and also to make effective tying of human personality which might be done in terms of the needs of the society. The children, who are in need of enrolling school, might be guided in possible ways that can lead full development required as one to become the member of the society.

In Rwanda, the availability of universal access to education of children in pre-school, should be accompanied by the provision of learning opportunities that help each child to afford the provided education in nursery school where this type of education is accessed by children who are below

seven years old but also greater than 2 years old. The effective delivery of cares to children by parents or households as well as learning institutions should be done with adequate provision of relevant skills and knowledge on how a child should be educated and developed. The education which should be developed to pre-school children might be developed in a positive way so as to ensure that every child has accessed to education. Various scholars have stated that high level of investment is needed to be done in pre-school education so as to finance such provided education, to improve the enrollment rate as well as reducing illiteracy level in the country. The mechanisms that should be employed to put in place in nursery schools in Rwanda might be built basing on the Economic Development Poverty Reduction Strategy and vision 2020.

1.1 Problem Statement

In most African countries, the government provides an important part to allocate school infrastructures. The school infrastructures, is taken as the important element in education system to increase the enrolment rates of children accessing their level of education and reduce illiterate level of education where having high quality of infrastructures, enhance better provision of learning instructions, help to improve students' outcomes, reduce dropout rate and provide other various educational benefits (World bank, 2017). The education sector strategic plan (ESSP, 2103) in Rwanda has developed the main goals such as expanding educational access in all levels of education, increasing the quality of education. In Rwanda, the vision 2020 came up with the commitment of attaining universal basic education and continuously rolling out access to high level of education as it was also reflected in the policy ECE. Therefore, the ECE should be one of the type getting skills and knowledge, provided before primary education and it is accessed by the children who are in the range ages of 3 to 6 years also known as pre-school age and also according to Piaget, such children are pre-operation stage of human development.

The learning environment of nursery schools found in Ngororero district is not conducive because due to insufficient nursery school infrastructures. For instance, in Ngororero district there is 161 nursery schools and children who are at the ages of being enrolled in nursery school, only 47.1 percent are the one who are enrolled in nursery schools located in Ngororero district (Save the children, 2019). This implies that the availability of nursery schools do not meet with standard infrastructures. The school which is not equipped with the variety of infrastructures such as having equipped classrooms, adequate playground, dining hall well cleaned and adequate sanitation. This is alarming that school infrastructures in Ngororero district do not allow children to fully participate in nursery schools. This paper therefore, was to examine the school physical infrastructures and pupils' enrolment rates in nursery schools in Ngororero district in Rwanda.

1.2 Objective of the paper

The objective of the paper was to establish the relationship between school physical infrastructure and pupils' enrolment rates in nursery schools in Ngororero district in Rwanda.

2.0 LITERATURE REVIEW

2.1 Overview of school infrastructure

According to Spacey (2018), School Physical Infrastructures can enhance development in every learning institution to be aware of proving relevant knowledge and skills adequately so as to accomplish the vision and mission of the government. Therefore, it should be done as a continuous process of solving various issues raised by various stakeholders not only in the economic sector any given country in the educational systems. With the increased enrollment, school administrations find it a challenge to provide enough facilities to cater for educational needs of the pupils. It may be observed that in the sub-Saharan Africa (inclusive of Rwanda) and various developing countries that found in Africa as well as in Asia, have some problems related to the provision of the quality of education. The achievement of all presented difficulties related to the provision of well qualified education by various government composed by such developing countries, might achieved basing on the respect of human right and reducing illiteracy level of citizens in the country (World Bank, 2003).

Some countries located in the region of the south of Africa known as Sub-Saharan Africa, need to make proper presentation of a short form that could be used in the provision of infrastructures so as to make conducive school environment. This results to the reduction of overpopulation of children in a classroom setting and also reduce teacher and students ratio. Therefore, this can also provide positive implementation of the planned school activities and also government educational goals (Bonner & Wakeham, 2010). According to these observations, its paramount for Kenyan government among various other stakeholders to put more efforts in ensuring that not only policies are designed to promote infrastructure development, but the who society and community at large are reinforced and motivated to take part in the infrastructure development process in schools.

Infrastructure development in schools not only entails the construction of new facilities but it also includes repairs and maintenance of the already existing infrastructure. In most of the primary schools, no proper mechanisms have been set to aid in infrastructure repair and maintenance. As such, old facilities continue to deteriorate and thus posing insecurity risks to the learners. It may be noted that investment to be put in learning institutions, might be organized in such way that each school providing pre-school education, must be equipped by the necessary infrastructures. This implies that the educational sector which in charge of enhancing the development of the quality of education where this can be implemented when the educational cost effective has been elaborated in a strategic way. Despite the amount of money is needed to make the lifelong learning of school activities, the cost which should be invested has to be elaborated and provided (Bonner & Wakeham, 2010). According to Lawther (2009), the effective development of any educational level, is to have well conducive learning environment done by allocating sufficient infrastructures that should related to the number of children which are in range age of being enrolled in education in that related area of school location.

2.2 Overview of children enrolment in early childhood education

UNESCO (2005) stated that the pre-school education might be enrolled by the children of 3-6 years old. The World Bank project of early childhood, emphasized the principle of holistic development which came to replace the concept related to education to be provided in nursery schools. Accessibility of the location that deliver the education of pre-school age children enrolling

in pre-primary schools presents high quality delivery of early childhood development (UNESCO, 2006) therefore, educational equity should be emphasized n all levels of education.

2.3 Influence of funds on infrastructure development

Financing of education refers the amount of money provided to education sectors so as to enhance the implementation of school activities which results to the reduction of illiteracy level in the country through improving the quality of education. In 1974, the World Bank report on education suggested a number of broadened sources of revenue for education beyond the limits of regular government budgets which included various methods by which those who received education could play greater share of its cost (Sifuna, 2010).

2.4 The role of school infrastructures in education

According to Daniel (2016), adequate school infrastructures like well-maintained classrooms, prepared school playgrounds as well as administrative and teaching staff have to be developed and emphasized. Therefore, schooling conditions directly impact the school learning outcomes where the school having good infrastructures required to have full attendance school setting. Rivera (2014) also added that well completed school physical plant, enhance students' attendance and interest in a school setting and also help teachers to make effective delivery of teaching activities. Therefore, any investment done for the purpose of expanding the school infrastructures, might have an important role in solving enrolment problems of students to the school system as well as improving students' academic performance.

According to UNESCO (2011), the school dropout rate presented in Sub-Saharan Africa, is 17 percent greater than in urban areas. This was also found in several studies that, conducive school facilities affect positively school completion rates as well as increasing the number of school registration. In the same way, World Bank (2010) conducted the study related to school infrastructures and came up with evidence saying that teachers teaching in school having adequate infrastructures, presented an average 10 percent of less absenteeism than those teachers who are teaching in schools having the problems or insufficient infrastructures. Therefore, the school infrastructures have a greater effect on the reduction of teachers' absenteeism as well as teachers' salaries.

The school physical infrastructures like classrooms well completed, adequate playground, dining hall well cleaned and adequate sanitation as well as staff houses enhance physical learning environment in terms of the provisional technical skills and to develop qualitative and adequacy aspects that are needed in the school (Maron & Brooth ,2007). Housing teachers and students according to the school environment ,improve student's performance where teachers can get opportunity of providing special courses whenever it is needed like remedial teaching (Watson, 2003) .Sanitation facilities which comprise waste disposal ,drainage and adequate water for personal hygiene ,cleaned toilets and other materials used while making school infrastructures modify the level of cleanliness which attract and motivate students that lead to effective students' academic performance(Kinder, 2003).

According to Sidhul (2012), the character of school infrastructures presents the real current extent, types and quality of curricular and co-curricular activities provided in that school. The Nature and size of school infrastructures presents the shape and size of classrooms. The shape and size of classrooms with their educational materials which are available change the way through which

learners are conducted and organized for instruction. Practical courses could not be maintained for science students in school setting without science laboratories (Sidhu, 2012). The appearance of school infrastructures and other school of conduct are striking due to parents and educational stakeholders which provide their views about the quality of what goes on the school (Mgbodile, 2010). The extent to which school administrators perform the organizational goals depends on the combination of various variables which lead to the effective management of school infrastructures (Obi, 2011).

2.5 School infrastructures and children enrolment rates

School infrastructure like adequate classrooms accommodate the possible number of children who are at the ages of having access to education as they need to develop their knowledge and become more skilled in a country through having conducive environment in a school setting (Burret, 2016). This is also helpful to teacher to develop positive teaching and learning activities, reading, spelling and also getting counting skills. According to Gidado (2009), school infrastructures like having adequate playground are needed in a school so as to perform various activities prepared in a school program specifically like school extra-curriculum activities. Physical plants of the school setting, enhance the action of enrolling the possible number of children due to the school size and completing one of its specific objectives of delivering the planned curriculum, encouraging and promoting self-instruction of teachers, presenting teachers learning tasks and also motivating children in classroom setting which may results to high completion rate with low dropout rate and also having high children enrolment rate in a school setting (Agu, 2012). Alcon (2007) also added that adequate school infrastructures such as dining hall well cleaned and having adequate sanitation in a school setting, can increase the better life of children in a school which may also results to getting effective children retention to actual knowledge, attracting and enhancing schooling condition where children behavior can be changed, illustrated and classified through non-verbal symbols.

2.6 Educational policy on children enrolment

Early Childhood Education (ECE) in the developed countries like European countries as well as United States, is guided by educational policies developed to enhance the capacity of education supposed to be given to nursery schools as well as maintaining the education that should be given to other children who need special education (Kamerman, 2007). Most of schools in Africa, were down because lack security in the country and this reduced the reenrollment rate of children supposed to allocate in all level of education. Various levels of understanding the policy of education to be used in educational development, should be channelized with the enhancement of children learning opportunities that might be appeared (Kamerman, 2006). Enrolment rates improved during developed countries as it was presented in in conference which took place in Dakar, the World Summit for Children presented that children enrolment rates remain very low in most African counties where pre-primary enrolment rates were less 10 percent. However, rates vary greatly in the region (World Education Forum, 2010).

2.7 Relationship between school infrastructures and children enrolment rates

Early childhood development classroom set up on the promise of having an increase to transition to those who enroll in primary education and this has been shut down in order to accommodate the surge of the enrolment in primary education sparked by Free Primary Education (FPE) (UNESCO, 2006).

According to Shinali, Githui and Thinguri (2014), the school infrastructures can influence early childhood devolvement of young children where some classrooms in the most cases kept having classrooms that are inadequate as well as insufficient materials that can help children to have full enrolment. For instance, some classrooms appeared to be generally congested due to their small sizes and hardly getting free movement during lesson delivery. In addition, some schools having insufficient and inadequate sitting desks can also reduce the number of children to be enrolled as well as affect those children who are already enrolled in terms of getting writing skills and general physical development.

3.0 METHODOLOGY

Correlation research design was employed to indicate the relationship between school physical infrastructures and pupils' enrolment. The population was 260 respondents and Yamane formula was used to get sample size of 62 teachers, 10 school head teachers and 92parents that gave a total of 164 respondents. Questionnaire and guided interview were used as data collection instruments. Stratified sampling was also used as sampling technique. The data management was maintained by using SPSS software version 21.

4.0 RESEARCH FINDINGS

The paper sought to establish the relationship between school physical infrastructures and pupils' enrolment in nursery schools in Ngororero district. The paper also described various variables that determine school physical infrastructures and pupil's enrolment in nursery schools.

4.1 The school physical infrastructures in nursery schools in Ngororero district

By determining the school physical infrastructures found in nursery schools in Ngororero district, teachers were given questionnaires while head teachers and parents were given guided interview. The quantitative findings were found using SPSS version 21 as data management tool and thematic analysis for qualitative data. Table 1 depicts teachers' responses on availability of school physical infrastructures in nursery schools, Ngororer district

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Table 1: Teachers' responses on availability of school physical infrastructures in nursery schools, Ngororer district

Statement	SD		D		N		A		SA		Mean	Std
	Freq	%	freq	%	Freq	%	freq	%	freq	%		
Having completed classrooms	13	21.0	47	75.8	2	3.2	0	0	0	0	1.82	0.46
Well-equipped classrooms	27	43.5	31	50.0	2	3.2	2	3.2	0	0	1.66	0.70
Having sufficient playgrounds	21	33.9	32	51.6	4	6.5	5	8.1	0	0	1.89	0.85
Maintained playgrounds	27	43.5	26	41.9	3	4.8	6	9.7	0	0	1.81	0.92
Having cleaned dining hall	22	35.5	28	45.2	2	3.2	9	14.5	1	1.6	2.02	1.06
Having sanitation facilities	22	35.5	27	43.5	4	6.5	7	11.3	2	3.2	2.03	1.09
Maintained school classrooms	20	32.3	30	48.4	3	4.8	6	9.7	3	4.8	2.06	1.10
Equipped school dining hall	26	41.9	25	40.4	4	6.5	5	8.1	2	3.2	1.90	1.05

Table1 presents the responses of teachers teaching in nursery schools located in Ngororero district, where the findings reveal that the majority of teachers' respondents agreed that they have maintained classrooms as indicated by the mean of 2.06 and standard deviation of 1.10. This is implies that the maintenance of nursery classrooms was still low as presented by the low mean and only 14.7% agreed that they have maintained classrooms and can reduce the enrollment rate of pupils. According to Spacey (2018), the lack of regular maintenance of the school infrastructures like classrooms affects negatively the implementation of school activities that may lead to low quality of education. This was followed by the mean of 2.03 and the standard deviation of 1.09 agreed that they have sanitation facilities in schools. Smith (2008) revealed that the lack of sanitation facilities as well as other school facilities affects the new school entrants enrolled in rural areas and learning condition of students who are already enrolled. The findings in the Table 1 also show that the mean of 2.02 and standard deviation of 1.06 agreed that schools have cleaned dining hall while the mean of 1.90 and standard deviation of 1.05 agreed that equipped dining hall. This is implies that the majority nursery schools in Ngororero district do not have adequate dining halls as one of school infrastructures. According to Roy (2008) the school dining halls as school infrastructure strengthen the students learning condition as well as improving the school productivity once they are equipped effectively.

On the other hand, teachers with the mean of 1.89 and standard deviation of 0.85 agreed that they have sufficient playgrounds. This reveals that most nursery schools do not playground as school infrastructures and this can be a challenge to pupils that have enrolled. This was followed by mean of 1.82 and 0.46 of standard deviation of teachers agreed that they have completed classrooms. This indicates that availability of completed classrooms in nursery schools of Ngororero district is a challenge that may be a burden to enrolment of pupils in nursery schools. Bonner and Wakeham (2010) revealed that the school playgrounds and classrooms help students to develop and discover various talents and also enhance learning conditions. This implies that any learning institution should have sufficient school play grounds and classrooms to facilitate the children' new talent and skills.

However, the findings present that teachers with the mean of 1.81 and the standard deviation of 0.92 agreed that they have standard and maintained playgrounds while the mean of 1.66 and standard deviation indicated that schools have well equipped classrooms. This implies that the availability of infrastructures of nursery schools in Ngororero district indicate to be low and may discourage the effective of teaching and learning activities. According to Aigbokhan (2009), learning institutions should allocate adequate infrastructures that promote schools activities that lead to the quality of education effectively.

The school head teachers of nursery schools located in Ngororero district were given a guided interview on the theme "*availability of school infrastructures in nursery schools of Ngororero district*". The school head teachers responded that the availability of school infrastructures in nursery schools were like classrooms, toilets a well as latrines, playgrounds and school garden. They also added that such infrastructures are not sufficient due to enrolled pupils and not maintained to facilitate teaching and learning activities. According to Gidado (2009), the school infrastructures such as classrooms, laboratories and libraries play signification in the improvement of students' learning condition.

Ninety-two parents whose children in nursery schools in Ngororero district were given guided interview on the theme "*availability of the school infrastructures in nursery schools of Ngororero district*". The parents responded that the school infrastructures available were classrooms and school playgrounds. They also added that the majority of nursery schools in Ngororero district are not at the standard of enhancing early childhood education in Ngororero district due to inadequate schools infrastructures.

Stratford Peer Reviewed Journals and Book Publishing
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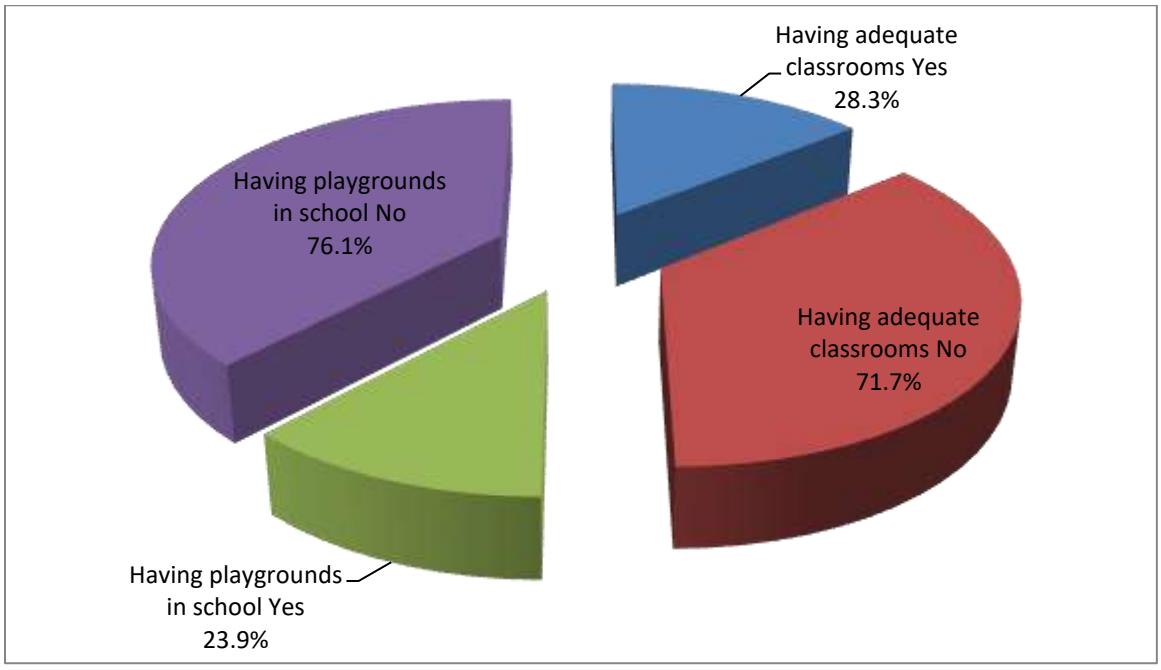

Figure 1: Parents' responses on the availability of school physical infrastructures

Ninety-two parents whose children in nursery schools located in Ngororero district indicated their perception on the availability of school infrastructures where 28.3% of parents agreed that there were adequate classrooms in nursery school and the remaining 71.7% disagree. 23.9% of parents also agreed on having playgrounds while the remaining 76.1% disagreed.

4.2 Level of pupils' enrolment in nursery schools in Ngororero district

Teachers in selected nursery schools were given questionnaires to provide their responses related to pupil's enrolment in nursery schools in Ngororero district in Rwanda. Table 2 presents the teachers' responses on children enrolment in nursery schools

Table 2: Teachers' responses on children enrolment in nursery schools

Statement	SD		D		N		A		SA		Mean	Std
	Freq	%	Freq	%	Freq	%	freq	%	freq	%		
Increased children enrolment	18	29.0	32	51.6	4	6.5	5	8.1	3	4.8	2.08	1.06
Pupils regular class attendance	24	38.7	29	46.8	2	3.2	5	8.1	2	3.2	1.90	1.01
Low children enrolment	7	11.3	18	29.0	4	6.5	21	33.9	12	19.4	3.21	1.36
Low children completion	8	12.9	13	21.0	4	6.5	20	32.3	17	27.4	3.40	1.41
Affected level of enrolment rate	6	9.7	13	21.0	6	9.7	22	35.5	15	24.2	3.44	1.33
High children dropout rate	11	17.7	6	9.7	4	6.5	24	38.7	17	27.4	3.48	1.45

Stratford Peer Reviewed Journals and Book Publishing
Journal of Education
Volume 4||Issue 1||Page 127-142||May||2021|
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Basing on the Table 2, it indicates the responses provided by teachers, on the level of pupils' enrolment in nursery schools located in Ngororero district where teachers agreed that there is increased children enrolment in nursery schools with the mean of 2.08 and the standard deviation of 1.06 while teachers agreed that enrolled children in nursery schools with, indicate a regular class attendance by pupils with the mean of 1.90 and 1.01 of standard deviation. According to Kamerman (2006) the lower level of students class attendance which might be done regularly, experience a lower level of quality education due to various factors like parental involvement and school learning environment.

On another hand, teachers indicate that there was a low children enrollment rate in nursery schools located in Ngororero district and they also perceived at the mean of 3.21 and the standard deviation of 1.36. Teachers also provided their responses agreeing that there is a lower level of children completion in nursery schools with the mean of 3.40 and 1.41 of the standard deviation. World Bank (2010) revealed that effective teaching load and performance of school activities improve the students' completion attending the school activities. Therefore, the lack effective performance of school activities increases the school completion and vice versa.

Similarly, the mean of 3.44 and the standard deviation of 1.33 of teachers also agreed that the level of children rate in affected by various factors including insufficient school infrastructures. The mean of 3.48 and 1.45 of standard deviation of teachers agreed that there was children dropout rate with the. According to UNESCO (2011), the school dropout rate presented the rural areas in Sub-Saharan Africa, is 17 percent greater than in urban areas due inadequate provision of learning facilities.

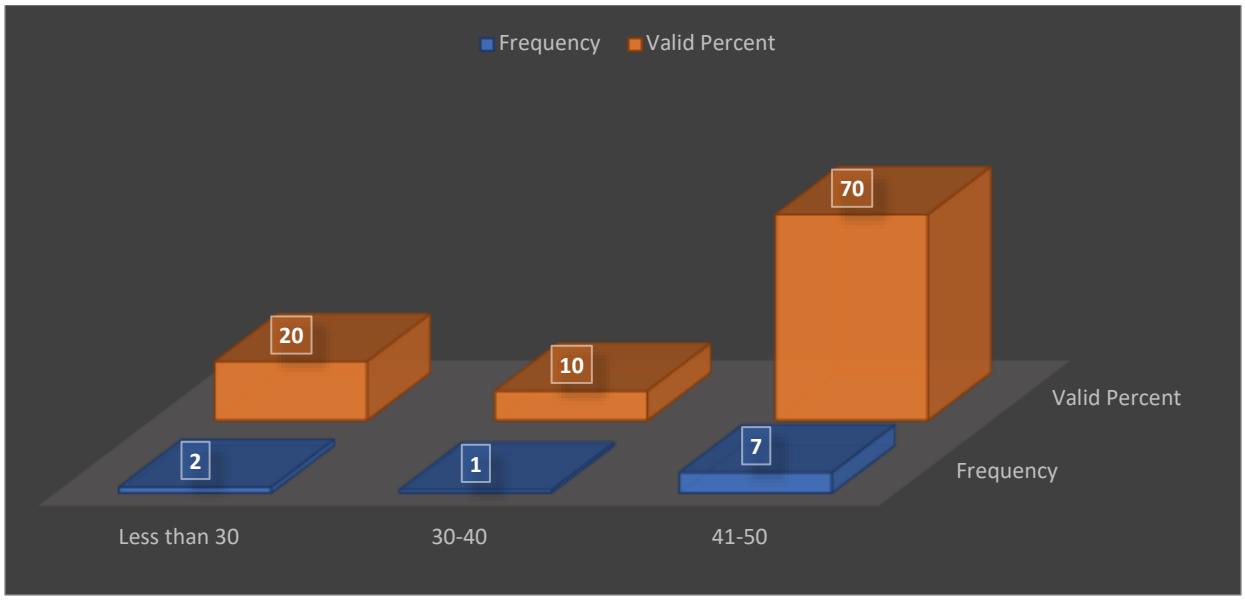

Figure 2: Ration of pupils per teacher in nursery schools in Ngororero district

The Figure 2 indicate the responses of head teachers on the ratio of students and teacher in classroom where the majority of 70 percent indicated that the ratio of students per teacher is the range of 41chideren to 50 children which tends to be over population in classroom due to inadequate school infrastructures in school setting.

Stratford Peer Reviewed Journals and Book Publishing
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Volume 4||Issue 1||Page 127-142||May||2021|
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Parents were interviewed on the level of children enrolment in nursery school in Ngororero district where they were asked if it is necessary to enroll pupils in nursery school or not. They responded that, some parents don't enroll their children due that lack of understanding related to the value nursery schools.

The summary of the results whether it is necessary to enroll pupils in nursery schools is illustrated in Table 3

Table 3: Is it necessary to enroll pupils in nursery schools?

Responses	Frequency	Valid Percent
Yes	70	76.1
No	22	23.9
Total	92	100.0

Source: Field data, 2020

The Table 3, presents the responses where they were asked whether it is necessary to enroll a child in nursery school or not and 76.1% agreed that it is necessary while the remaining 23.9 percent indicated that it is not necessary to enroll children in nursery school. This shows that some parents are not yet getting the value early childhood education.

4.3 Relationship between school infrastructures and pupils' enrolment in nursery schools in Ngororero district

Correlation analysis was established to indicate the relationship between school physical infrastructures and pupil's enrolment in nursery schools in Ngororero district. The regression analysis was also conducted to indicate the extent through which school physical infrastructures affect pupils' enrolment. The correlation analysis results are depicted in Table 4

Table 4: Relationship between school physical infrastructures and pupils' enrolment

Correlations

		School physical infrastructure	Pupils' enrolment
School physical infrastructure	Pearson Correlation	1.000	.977**
	Sig. (2-tailed)		.000
	N	62	62
Pupils' enrolment	Pearson Correlation	.977**	1.000
	Sig. (2-tailed)	.000	
	N	62	62

**. Correlation is significant at the 0.01 level (2-tailed).

Table 4 indicates the correlation between school physical infrastructures and pupils' enrolment in nursery schools, where the responses from teachers indicated that there is a statistical significance relationship between school physical infrastructures and pupils' enrolment rates due to the fact that P-value was .000 and Karl Pearson coefficient of correction (r) was .977. This also implies

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Journal of Education
Volume 4||Issue 1||Page 127-142||May||2021|
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that school infrastructures play an important role in improvement of school enrolment as well. According to Vandiver (2011), having insufficient and inadequate sitting desks, can also reduce the number of children to be enrolled as well as affect those children who are already enrolled in terms of getting writing skills and general physical development.

Table 5 presents the model summary showing the R square results based on the effect of school physical infrastructures like school playgrounds, equipped classrooms and school sanitation on children enrolment

Table 5: R square results of school physical infrastructures and pupils' enrolment

					Change Statistics			
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	R Square Change	F Change	df1	df2	Sig. F Change
1	.978[a]	.957	.954	.24648	.957	427.409	3	58	.000

a. Predictors: (Constant), School playgrounds, Equipped classrooms, School sanitation

The R Square was .957. This implied that 95.7% of the variations in children enrolment in nursery schools of Ngororero district is determined by the school physical learning materials. This also indicates that the remaining 4.3% of children enrolment can be affected by other variables. Violya (2018), revealed that the external children' schooling indicates a high magnitude school physical infrastructures and involvement of parents. This means that there should be a need of collaboration between schools administration and parents.

5.0 CONCLUSION

Basing of the findings presented in this study, this paper concluded that every increase in school physical infrastructures, could directly increase the level of pupils' enrolment in nursery school. However, inadequate school physical infrastructures may also reduce the level of pupils' enrolment rate in nursery schools of Ngororero district.

6.0 RECOMMENDATIONS

Basing on the presented findings and drown conclusion, the study recommended that the educational planners should make effective set up that could enhance nursery schools to be equipped accordingly and to have all necessary infrastructures needed in school setting to accommodate all registered students which also tends to achieve the school productivity. The Ministry of Education should provide regular financial support needed to allocate the infrastructures in schools and focus on regular maintenance so as to enhance daily school activities as well as teaching and learning outcomes. The school head teachers should make effective management of the allocated school infrastructures and address any issue related to school infrastructures that can discourage or be an obstacle to the effective working condition of the school activities. Parents should also have their participation in the development of the school infrastructures so as to promote teaching and learning conditions of their children.

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