

FACTORS INFLUENCING ACADEMIC PERFORMANCE OF LEARNERS WITH PHYSICAL HANDICAPS IN PRIMARY SCHOOLS IN KAPSARET SUB- COUNTY, UASIN GISHU COUNTY, KENYA

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Abstract

The purpose of the study was to assess the influence of selected factors on the academic performance of learners with physical handicap (PH) in public primary schools in Kapsaret Sub-county, Uasin Gishu County, Kenya. The study objectives were; to establish the influence of physical facilities and educational resources, to assess the influence of teachers support, and to examine the influence of school learning environment on academic performance of learners with physical handicaps. The study was anchored on normalization theory by Wolf Wolfersberger. The study adopted a descriptive survey and correlational research designs. The target population was 33 public primary schools with a total of 400 teachers, and 33 head teachers. The sample frame consisted of 45 teachers and 15 head teachers from 15 schools. Data was collected using semi structured teachers' questionnaire, head teachers interview schedule and physical facilities and educational resources observation schedule. A reliability Cronbach alpha coefficient of 0.8 ascertained that teachers' questionnaire was reliable. Content validity of the three data collection instruments was ascertained by presenting them various research experts in the content area whose advice was incorporated. Both descriptive and inferential statistics were used to analyze the Data. The study found that all the sampled schools were in dire need of physical facilities and educational resources for physically handicapped (PH) learners. Teachers were found to be overwhelmed by large numbers of pupils and most were apathetic to PH learners' academic performance. Pupils and subordinate school staff positive attitude towards PH learners provided a conducive learning environment. However majority of PH learners mean score in class seven was lower than their class mean score. The study's three formulated hypotheses were tested at 95% confidence level using multiple regression analysis. The result showed that 68.5% ($R^2 = 0.685$) variation in academic performance of PH learners was attributed to independent variables. Availability of physical facilities and educational resources made the most significant contribution or influence ($\beta = 0.526, t = 3.096, p < 0.05$) followed by teachers' support ($\beta = 0.489, t = 4.405, p < 0.05$) and the school learning environment support ($\beta = 0.159, t = 1.001, p < 0.05$). The study recommended a tripartite effort between the government, corporate bodies and the school parents to support the schools with the necessary facilities for PH learners. In addition teachers should have regular in-service training on how to handle learners with special needs.

Keywords: Academic Performance, Learners with physical handicaps, Physical facilities and educational resources, School learning environment, Teachers support

I. Introduction

Sachs and Schreuer (2011) observes that the well-educated learners with disabilities have a high chance of integration into the society and securing employment both in the public and private sectors. Unfortunately, studies have shown that students with disabilities have a high rate of dropping out of school and therefore have a persistently lower rate of employment (Barber, 2012). Globally scholars have documented findings on the learners with special needs and challenges they face. For example, in Portugal, Gonçalves and Lemos (2014) did a study on learners attitudes towards learners with special needs. The results showed that attitudes towards peers with special needs may be influenced by personal and contextual factors. The

results further showed that the girl-child showed more positive attitudes. Also, students who have contact with peers with special needs have more positive attitudes, evidencing the potential impact of inclusive settings. Ahmed and Aqueel (2011) study reported that physically handicaps and normal learners have been found to be significantly different on self-dimension self-concept. The mean differences favours the normal group of secondary school students, which clearly indicates that normal group of secondary school students have a high real self-concept as compared to physically challenged secondary school students. Similarly, Sitienei and Nyamwange (2013) found a significant relationship between self-concept and academic performance of physically challenged children in primary schools. The results were found to be useful in sensitizing the society on the significance of the importance of education of physically handicapped children.

Plessis and Reenen (2011) note that education for children with disabilities in Kenya is undertaken within segregated, integrated or inclusive educational settings despite the international obligations to educate the children in an integrated setting. In Kenya, the bulk of the children with disabilities (CWD) is enrolled in special schools. However, in compliance with the Kenya Education Act (2013) and Kenya Constitution 2010), the scenario is bound to change gradually as many primary schools embrace inclusive education where learners with disabilities are learning side by side with other children (Republic of Kenya, 2010, 2013). Further, Sitienei and Nyamwange (2013) assert that learners with disabilities are bound to face several challenges ranging from inappropriate infrastructure, insensitive teachers to issues of low self-concept due to hostile learning environment resulting to dismal academic performance. To this end, it is incumbent to establish the extent to which factors such as physical facilities, educational resources, teacher's support and learning environment do influence academic performance of learners with disabilities in a view of taking remedial measures.

II. Statement of the Problem

Global statistics on the number of out-of-school or excluded children vary with the source, but evidence suggests that the number is increasing. In Kenya, it is estimated that only one in six disabled children attend school (Kenya National Survey for People with Disabilities, 2015). Studies by Wachanga (2014) and Wanjiku (2014) investigated the support services offered to pupils with physical handicap by teachers in Kisumu East and Kiambu respectively. However, there is paucity of comprehensive studies inclined to establish the influence of crucial factors such as physical structures and support from both learners and teachers on the academic performance of physically handicapped pupils in primary schools. Mutisya (2010) observes that learners with physical disabilities integrated into mainstream schools resist integration, drop out of school or regress in performance. The reason for such a behavior was however, not investigated. Kapsaret Sub-County was found to have a relatively high population of learners with special needs in Uasin Gishu County (MOEST, 2016). Owing to the fact that most of these learners are in regular schools in accordance to the new government policy, it was imperative to investigate the extent to which certain crucial factors influence their academic performance. This study aimed at assessing the extent to which physical facilities, educational resources, teacher's support and school learning environment do influence academic performance among physically handicapped pupils in public primary schools in Kapsaret Sub-County, Uasin Gishu County.

III. Objectives of the Study

The study was guided by the following objectives:

- i. To establish the influence of educational resources on the academic performance of learners with physical handicaps in in public primary schools in Kapsaret Sub-County, Uasin Gishu County.
- ii. To assess the influence of teacher's support on the academic performance of learners with physical handicaps in in public primary schools in Kapsaret Sub-County, Uasin Gishu County.
- iii. To examine the influence of school learning environment on the academic performance of learners with physical handicaps in in public primary schools in Kapsaret Sub-County, Uasin Gishu County.

IV. The Study Null Hypotheses

The following null hypotheses were formulated:

H₀₁: Educational resources have no statistical significant influence on academic performance of learners with physical handicaps in in public primary schools in Kapsaret Sub-County, Uasin Gishu County

H₀₂: Teacher's support has no statistical significant influence on academic performance of learners with physical handicaps in in public primary schools in Kapsaret Sub-County, Uasin Gishu County.

H₀₃: School learning environment has no statistical significant influence on the academic performance of learners with physical handicaps in in public primary schools in Kapsaret Sub-County, Uasin Gishu County.

V. Literature Review

There are a number of conditions which bring about physical activity and mobility impairment. Some of these conditions are permanent while others are of temporary or intermittent nature. These conditions include arthritis, cerebral palsy, muscular dystrophy, Parkinson's disease, repetitive strain injury and multiple sclerosis. General mobility can also be affected by back or neck injury. A stroke may result in permanent or temporary loss of feeling or movement of part of the body – frequently on one side. Students with cerebral palsy, multiple sclerosis and in those who have suffered a stroke most often will have difficulty in speech and vision (Picard, 2015).

It is instructive to note that the fore mentioned conditions may have a mild or severe effect on coordination and balance of the body. Movement may be impaired by muscle spasms, numbness or pain. As a consequence, both manipulation of equipment and writing may be difficult. Some students use wheelchairs to enhance their mobility whilst others will walk with the aid of callipers, crutches or walking stick. Some students may experience chronic fatigue and for others there will be extreme fluctuations of energy from day to day (Picard, 2015).

According to Wapling (2016) disability is a leading cause of marginalization in education with enrollment, primary school completion and literacy rates consisting falling below those of nondisabled children (Grose & Bakhshi, 2011; UNESCO, 2010). Wapling (2016) states that assessing education systems in low and middle-income countries for quality education for children with disabilities is a complex research. While the evidence base is expanding, much

of it still focuses on access and attendance, with less attention paid to what happens within classrooms or to what type of education systems produce the most effective outcomes for learners with physical handicaps (Bakhshikett & Oliver, 2013). It is also true that because of poor physical infrastructure and lack of support many learners with physical disabilities were totally excluded from the education system (Healey, Pretorius & Bell, 2011).

In a study done by Korir (2013), lack of structured physical facilities have hindered the learners with physical handicaps in doing their daily class work. The study concluded that due to lack of enough physical facilities this has hindered implementation in terms of straining of physical facilities, increase in teacher workload which ultimately contributes to declining in standards of education. Moreover, it was noted by Mwangi (2013) that majority of public primary schools have inadequate or lack relevant physical facilities for the physically challenged learners like levelled door steps, lowered door handles, ramps, staircase rails and adapted toilets. It was also discovered that in the majority of the public primary schools, the teaching and learning resources are inadequate.

Kabuta (2014) examined the problems facing students with physical disabilities in higher learning institutions in Tanzania. The study found that though most of the essential infrastructures such as classrooms, library, dormitories and ICT facilities were available, they fell short of meeting the needs of students with physical disabilities. Most classrooms and dormitories lacked levelled doorways, passage with ramps and the level of door handles were too high. Washrooms were worse off since most lacked flowing water and lacked supportive bars an essential feature in adaptive toilets. However, while Kabuta study was conducted in Tanzania universities, the current study targeted pupils in primary schools.

Murungi (2017) examined the influence of school based factors on performance of children with disabilities in KCPE in public primary schools in Igembe South District, Meru County. The study independent variables were the teachers' pre-service training, teaching strategies, availability of teaching and learning resources and teacher's attitudes. Murungi (2017) study found that there were very few teachers who had trained in special needs and recommended a compulsory subject on special needs to be incorporated in teacher training curriculum. By doing so, all teachers will be in a position to implement the inclusive education curriculum. Further, most teachers were found to have positive attitude towards teaching both special and regular pupils in one class. However, though most schools had the basic teaching and learning facilities, the crucial facilities for learners with disabilities such as crutches, wheel chairs, page turners, calipers, pen/pencil holders, paper stabilizer (clipboard, non-slip writing surface), touch screen computers and special low/raised seats, were in very few or totally lacking.

It was instructive to note that though Murungi (2017) study aimed at establishing the influence of school based factors on KCPE performance of learners with disabilities, the study failed to statistically link the independent variables and the performance and thus the results/deductions remained speculative. The current study not only solicited views of respondents but went further and determined the relative and composite influence of the considered factors on the physically handicapped learners' academic performance.

Children taught by teachers who espouse highly positive attitudes towards mainstreaming have significantly higher levels of classroom satisfaction, academic performance and marginally lower levels of classroom friction than children taught by teachers with less positive attitudes (Monsem & Norah, 2004). Similarly Waititu (2013) aver that learners with physical disabilities enjoy peer acceptance and also when both the teachers and the support staff interact with them freely. Deppeler (2012) notes that in an inclusive classroom learners learn differently. So when preparing for teaching one should consider the learners' unique needs the learners' strengths and challenges, how one's presentation methods affect the learners require special materials. In order to learn how the teacher's response affects the learners' performance one can prepare an I.E.P (individualized education plan) to suit the learners' diversity. Waruguru (2002) argues that for the teachers to effectively assist the learners with physical handicaps, one must use a variety of teaching approaches. This should be done in collaboration with others who are knowledgeable about the curriculum requirements as well as the appropriate adaptations that are possible for the learners with SNE assess the curriculum. According to Abby (2002) holistic in an inclusive classroom means looking at the child as a total human being and not just focusing on the area of special needs or the academics as a teacher. When teaching holistic approach requires that you plan teaching and learning activities by considering social aspects, emotional aspects, intellectual aspects, personality and communication skills.

Nyaga (2011) posit that classroom climate is partly determined by the teacher's behavior. For example, a teacher who constantly criticizes, ridicules and mocks the pupils prevents learning from taking place. The children are unlikely to participate for fear of teachers' reaction. Further, teachers who are deviant or provocative create a bad relationship between them and pupils causing pupils to behave negatively or use of sarcastic language approaches and loaded language. Pupils receive as criticism by teachers and unrealistic expectations can lead to angry responses and buildup of furious resentment on the part of the pupils. To eradicate this behaviour guiding and counselling services must be availed for effective learning (Kiarie, 2013).

According to UNESCO (2011) learning environment is meant to be a conventional classroom and in its widest sense as a combination of formal and informal education where learning takes place both inside and outside of schools. Kuuskorpi and Cabellos (2011) argues that learning environment consist of learning contexts which include social, individual, formal teaching and informal learning process. These contexts form an interactive whole in which the learning environment plays a central role in reforming the school's operational culture. Teaching children with diverse abilities is a big challenge, especially in terms of creating a friendly environment. UNESCO (2013) points out that learners have diverse needs and which are met depending on whether the environment is accessible or not. To alleviate this problem then the environment should be adapted to suit the diverse learners' needs. This involves organizing the classroom and the school compound. This can be possible by building ramps to classroom and school buildings, construction of adapted latrines, enlargement of classroom windows, painting walls to improve the lighting, leveling of the play grounds to ease mobility.

The school learning environment should be such that it promotes the PH learners physical wellbeing through sports and other activities. According to Lamarree and Pratt (2006), most of serious illnesses affecting humanity in the 21st Century are linked to physical inactivity. Physical inactivity is more prevalent among older persons, women and people with disability (WHO, 2012). According to the World Health Organization (WHO) (2012), the costs associated with physical inactivity and obesity in US accounts for 9.4% of national health expenditure. Similarly Canada spends 6% of total health care costs due to physical inactivity. McNamee (2015) posits that children with disabilities are more at risk of a sedentary lifestyle particularly when the school environment does not encourage them to participate in physical activities. Physical activity has social, physical and psychological benefits. McCarthy (2009) argues that physical activity at school enhances academic performance by enhancing the blood flow to the brain, changing hormonal secretion, enhancing arousal levels and improving self-esteem.

Mong (2014) observes that the impact of including a pupil with a disability in a general class physical activities on the learners without disability is often overlooked. The first response of many peers without disability maybe a negative one as they wonder how the pupil with disability will fit in their activity while some feel their experience in say a play will be ruined (Mong, 2014). Block (2003) as cited in Barry (2010) proffer that the negative attitude as observed with pupils without disability is because they lack adequate information and preparation of the encounter. However, research has shown that with more contact and interactions, pupil without disability as well as those with disabilities acquire positive attitudes and tolerance to each other. Thus, it is incumbent for teachers and school managers to create more interactive forums and episodes such as in physical education classes so as to maximize the many benefits accrued from such arrangements.

Most of the reviewed studies have found that physically handicapped children have normal intelligence and can therefore be integrated and learn well in a regular school but with some modification and adaptation of the classroom and environment (Mwangi, 2017; Picard, 2015) Additionally, the teachers support has been consistently found to be critical in actualizing successful integration of learners with disabilities into regular schools.

However, while there exist many studies delineating the milestones made in Europe and America on inclusive education, there is paucity of studies on physically handicapped learners done in Africa and in particular Kenya. Furthermore, the relatively new concept of inclusive education in Kenya, coincided with the introduction of Free Primary Education (FPE) in 2013 and which led to phenomenal growth of learner's population albeit inadequate human and material resources. To this end, there was a need to establish the extent to which physically handicapped learner's academic performance is influenced by factors such as physical facilities, educational resources, teachers' support and school environment among others.

VI. Methodology

This study employed a descriptive survey research design. Bhattacharjee, (2012) defined descriptive survey research design as a detailed plan for collecting data in an empirical research project with the view of answering research questions or testing specific objectives. The design was preferred because it allowed collection of data from a large group of respondents through techniques for systematic collection of extensive data from a large group using questionnaire and interview schedules (Orodho, 2009). Further, descriptive research design was found suitable since there was no manipulation of the study variables but rather collection of data from the conditions as they existed. The target population in this study consisted of 400 teachers and 33 head teachers in 33 public primary schools in Kapsaret Sub-County (MOEST, 2016). Gay, Mills & Airasian (2009) suggest that at least 10% of the population is a good representation where the population is large and at least 30% where the population is small. This study therefore found it appropriate to sample 45% of the 33 public primary schools in Kapsaret Sub County. Thus 15 schools were selected through simple random sampling. Further, three teachers who teach class seven from each school were selected for the study.

Pupils in class 7 are relatively not very new in schools and as such, they have adopted a certain definite behaviour pattern which the teacher respondents can relate when responding to questions in the questionnaire. Moreover, pupils' academic performance at class seven can be associated with factors prevailing in their schools with a considerable degree of certainty. The researcher used class 7 physically handicapped (PH) learners mean academic performance for three terms in 2015 as the dependent variable. The study employed three data collection instruments: teachers' questionnaire, head teachers' interview schedule and physical facilities observation schedule. Both descriptive and inferential statistics were used in data analysis. Inferential analysis involved the use of multiple linear regression analysis which helped in explaining the extent to which each independent variable has influenced learners with physical handicap academic performance.

VII. Results and Analysis

In order to achieve the study's three objectives and test the formulated three hypothesis, the respondents were required to rate on five point Likert scale the extent to which they did agree or disagree to some statements aligned with each objective. The questionnaire responses were coded such that strongly disagree was rated number 1 while strongly agree was rated number 5. Using SPSS the mean response for each respondent (class seven teachers) for each independent variable was computed. The study dependent variable (PH learners' academic performance) was captured by considering the mean performance of each pupil in the three termly examinations in the year 2015. The mean mark of all PH pupils in standard seven in a particular school was then computed and used as the dependent variable. In addition the overall class mean for all pupils was computed against which the PH pupils' performance was compared and labeled as below or above the class mean as shown in Table 1.

Table 1: Class Seven 2015 Mean Academic Performance in the Sampled Schools

Factors Influencing Academic Performance Of Learners With Physical Handicaps In Primary Schools In Kapsaret Sub- County, Uasin Gishu County, Kenya

School	Class 7 Mean Mark	Number of PH Pupils	PH Pupils Mean Mark	Position in Reference to Class Mean Mark
A	264.7	2	245.4	Below
B	247.7	4	256.3	Above
C	260.5	2	264.8	Above
D	210.2	3	200.3	Below
E	280.6	5	230.7	Below
F	250.4	4	220.4	Below
G	273.6	2	280.1	Above
H	282.9	8	260.5	Below
I	267.8	6	250.8	Below
J	236.5	5	279.0	Above
K	220.6	4	256.4	Above
L	261.6	2	210.2	Below
M	244.6	5	230.6	Below
N	288.4	2	246.4	Below
O	243.8	3	272.8	Above
Overall	255.6	57	247.0	Below

It is evident from Table 4.6 that the performance of PH pupils in 9 (60%) public primary schools scored below the class average mark. Taking into account that in most public schools the pupils’ population is high and thus lowering the mean performance, the PH pupils mean performance below the class mean, is a pointer that they encounter enormous challenges in comparison to the other pupils.

In order to ascertain both the composite and relative influence of the three independent variables in this study on the dependent variable, the mean responses for each of independent variables were regressed against the mean scores of sampled schools. Tables 2, 3, and 4 depict the output of multiple regression analysis.

Table 2: Multiple Regression Model Summary

Model	R	R ²	Adjusted R ²	Standard error of the estimate
1	0.828	0.685	0.662	0.32895

Predictors: (constant), Facilities & resources, Teachers’ support, School environment support
Dependent variable: Academic Performance

According to Table 2, the multiple correlation coefficients R had a value of 0.828 Multiple R is the correlation between the observed values of dependent variable and the value of dependent variable predicted by the multiple regression models. Therefore, the large value of R (0.828) meant there was a large or strong positive correlation between the predicted and observed values of the academic performance of PH learners. As such, multiple R is a gauge of how well the model predicts the observed data.

The coefficient of determination R^2 which is the proportion of variance in the dependent variable that can be explained by the independent variables was found to be 0.685 implying that 68.5 % of variance in the physically handicapped learners' academic performance was explained by the availability of educational resources, teachers' support and the school environment. Further, the adjusted R^2 value of 0.662 means that 66.2 % of variance in the academic performance could be accounted for if the model has been derived from the population from which the sample was taken.

Table 3: Multiple Regression Model Significance (ANOVA)

	Model	Sum of Squares	df*	Mean Square	F	Sig.
1	Regression	9.638	3	3.213	29.689	0.000
	Residual	4.437	41	0.108		
	Total	14.074	44			

df*- degrees of freedom.

Table 3 shows the analysis of variance (ANOVA) output. The *F*-ratio in the ANOVA table tests whether the overall regression model is a good fit for the data. That is, the ANOVA shows whether the model, overall, results in a significantly good degree of prediction of the outcome variable. The table shows that the joint independent variables statistically significantly predict the dependent variable, $F(3, 41) = 29.689, p < 0.05$ and that other variables not included in this model may have accounted for the remaining variance. In other words, the regression model was a good fit for the data.

Table 4: Summary of Multiple Regression Model Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients		t	Sig.
	Beta	Std. Error	Beta			
1 (Constant)	.734	0.509			1.441	0.157
Resources	.425	0.137	0.526		3.096	0.004
Teachers' support	.550	0.158	0.489		4.405	0.001
School environment	.238	0.237	0.159		1.001	0.032

Dependent variable: Academic Performance of PH Learners

Table 4 reveals the relative contribution of the three independent variables to the dependent variable, expressed as beta weights. The positive value of the effects of availability of physical facilities and educational resources, teachers' support and school environment support implies

that the academic performance is actually enhanced by positive reinforcement of these three variables. The regression model capturing the hypothesized relationship was as follows: $Y = \beta_0 + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + \varepsilon$ and where Y = academic performance of PH learners, X_1 = availability of physical and educational resources, X_2 = teachers' support, X_3 = school environment support, while ε is the error term. Assuming the error term ε to be zero and substituting the unstandardized coefficients β values, the estimated multiple regression equation becomes: $Y = 0.734 + 0.425 X_1 + 0.550 X_2 + 0.238 X_3$. The β values indicate the individual contribution of each predictor to the model if the effects of all other predictors are held constant. In other words, the β values show the relationship between the academic performance and each predictor. Thus, when availability of physical facilities and educational resources increase positively by one unit, the academic performance of PH learners increases by 0.425 units ($\beta = 0.425$) while holding the other factors constant. Similarly, when the teachers' support increases by one unit, academic performance of PH learners increases by 0.55 units ($\beta = 0.55$) and so on.

In order to have direct comparison and better insight into the importance of predictors, the standardized β values that do not depend on the units of measurement of variables are used. The standardized beta values give the number of standard deviation that the academic performance will change as a result of one standard deviation change in the predictor. Accordingly, Table 4 shows that the availability of physical facilities and educational resources had the most significant relative contribution to the prediction of the level of PH learners academic performance ($\beta = 0.526$) followed by teachers' support ($\beta = 0.489$) while provision of the effect of school environment support had the least influence ($\beta = 0.159$).

In order to test the study's three formulated hypotheses (section 1.6), the t statistic that tests whether a B value is significantly different from zero ($H_0: \beta = 0$) is considered (refer to Table 4). It is evident from Table 4 that the availability of physical facilities and educational resources made the most significant contribution or influence ($\beta = 0.526$, $t = 3.096$, $p < 0.05$). Thus the first null hypothesis was rejected. Similarly teachers' support had a significant influence ($\beta = 0.489$, $t = 4.405$, $p < 0.05$) as well as the school environment support ($\beta = 0.159$, $t = 1.001$, $p < 0.05$). Consequently, H_{02} and H_{03} were also rejected.

VIII. Discussion

The study's first objective was to establish the influence of availability of physical facilities and educational resources on academic performance of PH learners. Through the educational resources observational schedule, head teachers interview and teachers questionnaire response, 70% of the sampled schools lacked the essential physical facilities and educational resources for learners with physical handicaps. This implies that the learners mobility in and outside the class is curtailed, their comfort in class is not guaranteed, the basic need of elimination is not adequately met, and cannot write and move along with teachers as they teach. These problems were found to jeopardize their academic performance. Incidentally, the study found that the availability of physical facilities and educational resources was the most potent predictor of PH learners academic performance ($\beta = 0.526$, $t = 3.096$, $p < 0.05$). Cognate to this finding, Korir

(2013) concludes that lack of structured physical facilities have hindered the learners with physical handicaps in doing their daily class work and which ultimately contributes to declining academic performance. In addition, PH unfriendly school environment in terms of physical facilities greatly negates the inclusive education philosophy that advances that schools, learning environments and educational systems meet the diverse needs of all learners in the least restrictive environment irrespective of their physical, intellectual, social, disability and learning needs (Rocco, 2011).

The second objective of the study was to assess the influence of teachers' support on academic performance of PH learners. Over 70% of teacher respondents affirmed that they make sure PH learners are comfortably seated before they commence their lessons. This is a good gesture to PH learners who according to Baglieri, Valle, Connor and Gallagher (2011) are prone to feelings of being disregarded yet they have some unique needs. The importance of teacher support is further emphasized by Morsem and Norah (2004) who found that children taught by teachers who espoused highly positive attitudes towards mainstreaming were found to have significantly higher levels of classroom satisfaction and marginally lower levels of classroom friction than children taught by teachers with less positive attitudes. Nonetheless, teachers' support had a significant influence on academic performance ($\beta = 0.489$, $t = 4.405$, $p < 0.05$). This finding corroborates Waititu (2013) and Ashby (2012) who postulate that physically challenged children are capable of doing well in schools, so long as they are assisted to fit well in any educational program in order to unleash their potentials.

The third objective of the study was to assess the influence of school learning environment on academic performance of learners with physical handicaps in public primary Schools in Kapsaret Sub-County, Uasin Gishu County. Most of the teachers did not consider their head teachers to have fully embraced inclusive education (mean = 2.7, S.D = 1.4). This finding was in line with several other studies done in Kenya such as Mutisya (2010) and Wachianga (2010). Similarly, Kiarie (2014) found that though most head teachers do have a positive view on inclusive education their actions are not commensurate.

Only 24.5% of teacher respondents affirmed that PH learners in their schools received medical attention within the school. Similarly, only 35.5% of respondents affirmed that PH learners receive psychological counseling within the school. Medical attention and psychological counseling are some of the basic essential and crucial services that should not miss in a school offering inclusive education. This finding casted an ominous situation for PH learners in Kapsaret Sub County since as noted by Randiki (2002) that apart from regular and other teachers who have training on special needs education, the successful education of learners with disabilities requires the involvement of different professionals who assist in identification, referral, diagnosis, treatment and provision of appropriate educational and related services.

The issue of toilet training and assistance for physically handicapped learners is a pet peeve among teachers in inclusive education. According to most of the interviewed head teachers, the crucial service of toilet training and the associated services need trained personnel, a full time employee. Teachers and pupils do assist but soon become apathetic and PH learners with severe

conditions are left to struggle on their own who eventually affects their academic performance and self-esteem. Head teachers lamented of the huge number of pupils after the onset of free primary education which over stretched both physical and educational facilities. One of the head teacher commented:

Our facilities especially toilets need serious revamping to cater for the overwhelming number of pupils...so you can imagine, if we cannot cater for normal learners what about the learners with special needs? We have however, sought assistance from cooperate organizations around us to construct the two ablution blocks we are now in use... (Head teacher)

This finding was similar to Waititu (2013) who found that teachers assisted and taught very little on self-help skills such as bathing, toilet use and feeding in inclusive education. When some PH learners are not able to perform these tasks on their own it definitely affects their self-esteem leading to low self-efficacy in academics.

IX. Conclusion

Based on the study findings, the following conclusions were made:

- i. Most of the schools in Kapsaret Sub County had no adapted toilets, no ramps in essential buildings and inclined pathways depriving PH learners' conducive environment for learning. However, most schools were found to have special seats for PH learners implying that they have endeavoured to comply with the requirements for implementation of inclusive education. The mean score of PH learners where schools had adequate physical and educational facilities was found to be higher than the class mean and by far greater than mean score of PH learners from schools deficient in facilities.
- ii. Teachers in public primary schools in Kapsaret Sub County have a positive attitude towards PH learners, they strive to assist them overcome psychological feelings of being different and neglected, however, due to the large number of pupils in FPE, some have not been able to give individualized attention. Additionally, due to lack of training to handle learners with disabilities, some teachers have low self-efficacy in handling PH learners' issues leading to nonchalance disposition.
- iii. Although most head teachers in Kapsaret Sub County public primary schools did view inclusive education positively, they were not proactive in ensuring PH learners have a conducive school environment. Lack of medical support, reliable guidance and counseling services, and physiotherapists within the school greatly jeopardized PH learners' welfare and academic performance.

X. Recommendations

The study recommended that:

- i. All education stake holders –the Government of Kenya, the school community, teachers, National Council for Persons with Disabilities in Kenya, United Disabled Persons of Kenya and others, should combine synergies and ensure all primary schools have met the minimum requirements for successive implementation of inclusive basic education. This would ensure that all learners with disabilities are provided with

necessary provisions in learning institutions in conformity with the Kenya Persons with Disability Act No. 14 of 2003.

- ii. In order to enlist maximum support of PH learners from teachers, handling of children with special needs should be a compulsory course for all prospective teachers in colleges. In addition there should frequent seminars and workshops for all practicing teachers.
- iii. The Government in collaboration with other stake holders can engage the services of counseling psychologist, medical personnel and resident therapist to serve a block of several schools. This would ensure PH learners psychosocial and medical welfare is assured and thus boosting their self-esteem and self-efficacy in academics.

References

1. Abby, O. C. (2002). *Teaching and learning strategies in an inclusive setting*. Nairobi: Longhorn publisher K.I.S.E.
2. Ahmed, M., & Aqueel, J. (2011). *A study of self concept, level of aspiration and academic achievement of physically challenged and normal students at secondary level in district Baramulla* (Unpublished M. Ed Dissertation). University of Kashmir.
3. Ashby, C. (2012). *Disability studies and inclusive teacher preparation: A socially just path and method*. New York, NY: Peter Lang.
4. Baglieri, S., Valle, J. W., Connor, D. J., & Gallagher, D. J. (2011). Disability studies in education: The need for a plurality of perspectives on disability. *Remedial and Special Education, 32*(4), 267-278.
5. Bakhship,P., Kett, M., & Oliver, (2013). *What are the impacts of approaches to increase the accessibility to education for people with disabilities*. London: Eppi-centre, social science research unit, institute of education University of London.
6. Barber, P. (2012). *College students with disabilities: What factors influence successful Degree completion? A case study*. Retrieved from http://www.heldrich.rutgers.edu/sites/default/files/content/College_Students_Disabilities_Report.pdf
7. Barry, D. (2010). *The inclusion of students with disabilities in main-stream post primary physical education from the perspective of the physical education teacher* (Unpublished MA Thesis). Waterford Institute of Technology.
8. Bhattacharjee, P. (2012). *Social sciences research principles, methods and practices* University of South Florida: scholar commons.
9. Deppeler, J. M. (2012). Variables affecting teachers' attitudes towards inclusive education in Bangladesh. *Journal of researching special needs education 12*(3), 132-140.
10. Gay, L. R., Mills, G. E., & Airasian, P. (2009). *Educational research: competencies for analysis and applications (9th ed.)*. New Jersey: Pearson Education.
11. Gonçalves T., & Lemos, M. (2014). Personal and social factors influencing students' attitudes towards peers with special needs. *Journal of Social and Behavioral Sciences, 112*, (6), 949-955.
12. Groce, N. E., & Bakshi,P.(2011). Illiteracy among adults with disabilities in developing world: *A review of the literature and a call for action international journal of inclusive education, 8*(15), 1153-1168

13. Healey, T., Pretorius, A., & Bell, D. (2011). *Disability in higher education*. Nairobi: Longman publishers
14. Kabuta, L. G. (2014). *Problems facing learners with physical disabilities in higher learning institutions in Tanzania* (Unpublished MED Thesis). University of Tanzania.
15. Kiarie, M. W. (2014). Educating students with physical disabilities in Kenya: Progress and promises. *International of Educational Studies*, 1(2), 109-118
16. Korir, J. K. (2013). *Factors influencing academic achievement of learners with disabilities in an inclusive education in primary schools in Nandi South district Kenya*. Unpublished MED Thesis, University of Nairobi.
17. Kuuskorpi, M., & Cabellos, N. (2011). *The future of physical learning environment: school acilities that support the user*. Finland: CELE exchange
18. Lamaree, M., & Pratt, M. (2006). Physical activity and health promotion. *Promotion and Education*, 3(6), 34-51.
19. McCarthy, J. (2009). *Ireland among the worst for childhood obesity*. Retrieved from www.irishhealth.com
20. McNamee, M. (2005). *The nature and values of physical education*. London: Sage
21. MOEST. (2016). *Kapsaret Sub County schools cencus report*. SCEO Kapsaret Sub County
22. Mong, H. H. (2014). *Assessment of students with disabilities in physical education. A quantitative research on students in upper secondary schools in Norway* (Unpublished MSS Thesis). Norwegian School of Sport Sciences.
23. Morsem, J., & Norah, F. (2004). *Diagnostic Teaching in classroom*. New York: Macmillan Publishing Company.
24. Murungi, G. K. (2017). *Influence of school based factors on performance of children with disabilities in KCPE in public primary schools in Igembe South District, Meru County Kenya* (Unpublished M. Ed Thesis). University of Nairobi
25. Mutisya, C. M. S. (2010). *Factors Influencing Inclusion of Learners with Special Needs in primaty schools in Rachuonyo District, Kenya* (unpublished M. Ed Thesis). Nairobi: Kenyatta University
26. Mwangi, L. (2013). *Special needs education in Kenyan public primary schools: exploring Government policy and teachers' understandings*. Unpublished doctoral dissertation. London. Brunel University.
27. National Council for Persons with Disabilities (2003). *The Persons with Disabilities Act, 2003*. Nairobi: NCPWD
28. Nyaga, V. K. (2011). *Effectiveness of guidance and counselling services on university students' development of academic, social and personal competencies: a comparative study of public and private universities in Kenya* (Unpublished MED Thesis). Egerton University.
29. Orodho, J. A. (2009). *Essentials of educational and social science research methods*. Nairobi: Masola Publishers.
30. Picard, D. (2015). *Teaching students with disabilities*. Retrieved from <https://cft.vanderbilt.edu/guides-sub-pages/disabilities/>
31. Plessis, I. G. D., & Reenen, T. H. (2011). *Aspects of disability law in Africa*. Pretoria, South Africa: Pretoria University Law Press.
32. Randiki, F. (2002). *Historical development of special needs education*. Nairobi: KISE
33. Republic of Kenya (2010). *The Constitution of Kenya, 2010*. Nairobi: The Attorney General
34. Republic of Kenya (2013). *The Basic Education Act 2013*. Nairobi: Government Printer
35. Rocco, T. S. (2011). *Challenging ableism, understanding disability, including adults with disabilities in workplaces and learning spaces*. San Francisco: Jossey-Bass.

36. Schreuer, N., & Sachs, D. (2011). *Inclusion of students with disabilities in higher education: Performance and participation in students experience*. Retrieved from <http://www.dsqsds.org/article/view/1593/1561>
37. Sitienei, E. C., & Nyamwange, C. B. (2013). Academic performance and self-concept of physically challenged children in regular primary schools in Kenya. *IJEMR*, 3(7), 92-102
38. UNESCO (2010). *Education for All Global Monitoring Report: Reaching the marginalized*. UNESCO, Paris.
39. UNESCO (2013). *Challenges of Implementing Free Primary Education in Kenya Assessment Report*. UNESCO, Nairobi Office.
40. Wachiana, J. O. W. (2010). *Investigation into the provision of support services for learners with physical disabilities in the two selected schools in Kisumu east district, Kenya* (Unpublished M.Ed Thesis). Nairobi: Kenyatta University.
41. Waititu, P. (2013). *Psychosocial challenges facing integrated learners with physical disabilities in selected mainstream secondary schools: A case of Ol'kalou District in Nyandarua County, Kenya* (Unpublished M. Ed Thesis). Catholic University of Eastern Africa.
42. Wanjiku, K. R. (2014). *School based factors influencing participation of physically challenged learners in public primary schools in Kiambu municipality* (Unpublished M. Ed Thesis) Nairobi: University of Nairobi
43. Waruguru, N. M. (2002). *Introduction to inclusive education*. Nairobi: Longhorn Publisher

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