

EFFECT OF TEACHER MOTIVATION ON IMPLEMENTATION OF MATHEMATICS CURRICULUM IN PRE PRIMARY SCHOOLS IN CENTRAL DIVISION, TRANS-NZOIA COUNTY, KENYA

by

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Abstract

Early childhood education provided the building block upon which the children develop socially, self-expression skills, communication skills and skills in mathematics. Motivation is a directional force that makes someone to behave in a certain manner. Okumbe (2013) still asserts that motivation is a process that takes place in within an individual and is psychological and cannot be seen directly but manifests itself in the way one behaves. It is agreed therefore that motivation comprises of all the inside situations explained as wishes or desired situation which activates the interests of a person to perform certain actions. Motivation has three main parameters; needs, drives and performance. Motivation therefore is that internal ability to make results look appealing intrinsic factors like having professional knowledge in the area; having an interest and being motivated are important characteristics in the implementation of the program and can also be a hindrance the implementation of the curriculum in a proper way if there are shortcomings in any of the areas. The purpose of this study was to determine the effect of teacher motivation on implementation of mathematics curriculum for pre-primary learners' in central division, Trans-Nzoia County. The objectives of the study were; to determine the effect of teacher motivation and commitment on implementation of pre-primary learners' mathematics curriculum in Trans-Nzoia County. The study employed skinner's theory. Descriptive survey design was used. The sample size using Fishers formula was 112 respondents then simple random sampling and sturges sampling were used to get target population to be used. 74 ECDE (Early childhood development education) teachers, 36 primary head teachers, and 3 educational officers. Pilot study to test reliability and validity of research instruments were above 0.70 cronbach alphas. The instruments for data collection were the questionnaires and interview schedule. Quantitative data was analyzed using Statistical Package for Social Sciences version 27.0 and results presented using percentages, means, frequencies and p-values while qualitative data was analyzed using themes. The study findings indicated a significant relationship between teacher's motivation and commitment on implementation of pre-primary mathematics curriculum. The study concluded that government should formulate a policy to always take into consideration teachers' motivation and commitment when recruiting and promoting ECDE teachers'. This study was important to inform the various ECDE educational stakeholders of the fundamental factors to consider for effective implementation of mathematics curriculum among the preprimary learners.

Keywords: pre-primary, curriculum, implementation

Background to the Study

The personalities of the teacher have had a big influence to the implementation of the curriculum. Based on the results of the study, who is motivated and accepts changes and tries out to find new opportunities for learning have been found to be effective implementers of the curriculum unlike their counterparts who are not motivated and not ready to accept changes. More so, Punch and Waugh (2013) are of the idea that if teachers, support the changes in the curriculum it will eventually influence the quality implementation of the same by the teachers

Densimone *et al.* (2016) conducted a study which established that there exists a joint positive correlation and networking between the teacher's attitudes, motivation, as well as their teaching work. The study established that so long as the teacher is motivated, they will give better results in implementing the curriculum in class. Chege (2016), carried out a study to establish the impact of motivation on teaching staff in Thika district established that the teaching profession should be structured in schools so as the teacher can get individual satisfaction as they perform their duties.

Ibrahim, Ghavifekr, Ling, Siraj, & Azeez, (2014) teacher has to carry out him/herself in a professional manner. Teachers should continue to learn from multiple sources of knowledge throughout your career. A teacher can have the chance to learn by doing practice through making mistakes learning from his colloquies and the school administration. The teacher should be able to commit him/herself to excellence. By utilizing learning opportunities provided by the school environment and the classroom. For every new student the teacher has to attend to, it provides a new learning opportunity for him. A teacher gains more while in class as a teacher than what they learn through lectures in the university. A teacher who is continuously learning is seen as a model by learners and shows the importance of learning to his learners.

McInerney, Ganotice, King, Morin, and Marsh (2015) noted that another way in which a teacher can show their level of commitment is by using implementing the curriculum in a responsible manner. As much as the ministry of education may provide you with the syllabus to teach, it is important that a teacher by emphasizing what is important and should bring it out in an interesting way and should be able to measure the progress of his learners. By being responsible to the curriculum it means that the teacher needs to be responsible in the way he makes choices so as to be able to meet the expectations of the learners. According to Bogler, & Nir, (2015). Teachers should cross their own familiar barrier so as to meet the expectation from their learners.

Mwangi (2015) gives two main causes of motivation to perform some work; one is intrinsic motivation which in itself is the end result is the job in itself and the other is extrinsic which is the end towards which the job provides the means. Intrinsic motivation refers to motivation that is not driven by external factors and creates an interest or enjoyment in the task itself, and exists within the individual rather than relying on any external pressure. Social and educational psychologists have studied intrinsic motivation since the early 1950s. Research has found out intrinsic motivation is normally associated with high educational performance and that leads to enjoyment by learner. If teacher can control internal factors, then they are likely to be intrinsically motivated and will be able to associate their educational results to internal factors. This type of motivation is a good agent believed to help one achieve desired goals. In this regard, any achievement is not influenced by mere luck but by mastering the content but not just through rote-learning that a student can achieve good grades.

Statement of the Problem

Early childhood education provided the building block upon which the children develop socially, self-expression skills, communication skills and skills in mathematics. Motivation is a directional force that makes someone to behave in a certain manner. Okumbe (2013) still asserts that motivation is a process that takes place in within an individual and is psychological and cannot be seen directly but manifests itself in the way one behaves. It is agreed therefore that motivation comprises of all the inside situations explained as wishes or desired situation which activates the interests of a person to perform certain actions. Motivation has three main parameters; needs, drives and performance. Motivation therefore is that internal ability to make results look appealing intrinsic factors like having professional knowledge in the area; having an interest and being motivated are important characteristics in the implementation of the program and can also be a hindrance the implementation of the curriculum in a proper way if there are shortcomings in any of the areas. However, it is notable that motivation is not factored in planning and budgeting of pre-school institutions.

Literature Review

The desire to satisfy individual needs and the target of the organization will push the organization to motivate its workers by creating a conducive and enabling environment. This will in turn help the organization to achieve its goals. Motivation is defined by Okumbe (2013), as a process which takes place inside a person by giving him/her the drive and necessary energy which internally directs and maintains one behavior. Motivation is a directional force that makes someone to behave in a certain manner

The public being stakeholders in education desire to be informed about the productivity of their school by getting performance results of their children (Okumbe, 2013). When a pupil has passed an examination, parents will help the pupil to choose a good school. Lerine and Lezotte (2015) is of the opinion that a good school should have good learning environment, has a culture of performing well and being disciplined, there is cohesion and cooperation among staff members and the way problems are solved is oriented on the overall acquisition of knowledge by maximizing the use of the available time that enable the learner to master the content given to them by a teacher who has mastered the skill of teaching. A good school will always monitor the progress of its pupils. The school displays an outstanding leadership by saliently involving parents in the issues concerning student performance. The school needs to have an effective way in which implementation and placing of instructional materials involves placing this material to groups for use during study hours. Okumbe (2013) noted that to manage pupils comprehensively and effectively, it is required that a lot of efforts are made by the head teachers so to make that the teacher becomes creativity and operations in school are efficiently and effectively done. Ogola (2015) established that a lot of teachers who are degree graduates found in public secondary schools have no commitment to their duty. He argued that these graduate teachers have negative attitude as concerning teaching and have their hearts elsewhere. If given extra work a part from teaching they attach monetary value to any extra work given by their seniors and often feel they are overworked yet they get very little pay not equivalent to their many years of hustling in class. Others don't view teaching as noble profession that can be quantified in terms of money. He concluded that most of the teachers who avoided responsibility and often were not committed to their work were graduate teachers.

According to Ogola (2015) many of the graduate teachers feeling that are being overworked with little pay are quitting the teaching profession for alternative and well-paying jobs. The young and qualified teacher trained to teach mathematics could have had an option of getting some employment somewhere else easily even in private

sectors like banks. The massive move of these teachers to other better employers is necessarily because of the salaries. Pastor and Erlandson (2013) argues that the community and the employer failing to recognize the teachers and also the fact that if take long to be promoted making one feel the profession was not of any value by the society are the things that make these teachers move. In additional Park,(2014) was of the idea that for the teacher to understood the curriculum is very important so as there is effective implementation besides his appreciation of the philosophy as per the new curriculum. He argued that the personality of the teacher have had a big influence to the implementation of the curriculum. Based on the results of the study, who is motivated and accepts changes and tries out to find new opportunities for learning have been found to be effective implementers of the curriculum unlike their counterparts who are not motivated and not ready to accept changes. Alternatively, intrinsic factors like having professional knowledge in the area, having an interest and being motivated are important characteristics in the implementation of the program and can also be a hindrance the implementation of the curriculum in a proper way if there are shortcomings in any of the areas (Lewthwaite, 2014).apart from personal characteristics of the teacher, factors relate to the environment also play a crucial role in the academic performance.

Fishman, Gallagher, Penuel and Yamaguchi (2013) established that if the teacher is allocated time to plan for the implementation of the curriculum and also supporting them in a technical way is very important for effective implementation of the curriculum. Based on Lewthwaite (2013) argument, factors of the environment and other extrinsic factors are important factors that support effective performance in academics. As per him, the most common environmental factors are constrained by time and inadequate resource like equipment, the facilities and space to install this facilities, which are limited equipment, space and facilities. Additionally, support system like form the school principle and other teachers that is available in schools is very important for successful performance in academics. Desimone (2015) likewise looks at the importance of the support from the administration for the effective implementation of the curriculum by saying that beside the knowledge and skills, the teachers need to encouraged and assisted to reach defined goals set for their children in class. He says that the environment for collaboration from other teachers is important to effective implementation of the curriculum.

Some of the very important practice of management which has potential to motivate teachers to be involved is: the low ratio of teacher to pupils (27:1) in the primary section and 30:1 in the preprimary section compared to 50:1 in the public schools. Some of the measures that have contributed to the success of school performance in improving the motivation of teachers include: Staff development where committee/boards of governors were concerned with staff upgrading and welfare. School based in-service which gives new graduates and older members of staff opportunities to share knowledge and experience are important. Induction programs for new staff to be clearly aware of the school mission and policies improve teacher motivation. Strong dynamic leadership with duties clearly delegated to individuals or panels of staff motivates. Positive parental involvement and supportive parent\teacher association and including free tea at break time or the provision of school lunch adds to high teacher moral

Research Methodology

Descriptive survey research design was used in conducting this research(Gay (2014); . Descriptive survey is a method of collecting information by interviewing or administering a questionnaire to a sample of individuals. It could be used when collecting information about people's attitudes, opinions, habits or any of the variety of education or social issues (Orodho & Kombo (2014). The method involves more than just collection of data but includes measurement, classification, analysis, comparison and interpretation of data. It was therefore suitable to determine the effect of teacher motivation on implementation of mathematics curriculum in pre primary in central division of Trans-Nzoia County. The area was selected because it's among the counties in Kenya which has adequate number of ECD centers and there is consistent poor performance of pupils in mathematics at Kenya certificate of primary examinations throughout the years among other counties and therefore its findings can be generalized to improve the implementation of mathematics curriculum in Kenyan preschools. This is crucial because ECDE Center laid a foundation for children and the nature of foundations determines how far the pupils go. The area was also selected because there was no record of a similar study having been conducted in the area therefore providing a suitable area for study. The target population comprised of 104 preprimary teachers and 52 head teachers, 2 curriculum support officers and 1 county ECDE program officer.

Simple random sampling was used to select 74 pre-teachers and 56 primary head teachers..Saturated sampling was used to select the one program Officer and while purposive sampling was used to select two curriculum support officers. The data collection instruments used were: questionnaires, observation and interview schedule .The instruments was established through pilot testing on the two pre schools which was excluded from the final study. The instruments were validated by two education experts from the University School of Education

.Quantitative data was analyzed through cross tabulation of responses to derive general trends while qualitative data from interview were used as informative evidence in explaining some of the findings.

Findings

The researcher distributed a total of 74 questionnaires to the ECDE teachers and conducted interviews with the head teachers, program officers CSOs. From the targeted sample 34 head teachers were available for the study together with the CSO and DECECE program officer. From the pre-primary school teachers 51 of the questionnaires were brought back for the study. The total instruments received for the study was 36 interview schedules and 51 questionnaires giving a response rate of 77.7% This was more than sufficient for the study so the researcher went ahead to analyze the data. The classrooms were also observed to find out the use or lack of the use of instructional materials and facilities in class interaction. The return rate indicated that majority of the respondents co-operated with the researcher in the process of data gathering.

Demographic Information of the Respondents

The study sought to determine the demographic information of the pre-primary school teachers. The findings are presented in table 3

Table 1: Demographic Information of the Pre-Primary School Teachers

		Frequency	Percent
Gender	Male	22	43.1
	Female	29	56.9
	Total	51	100
Age	Below 25 years	6	11.8
	25-35 years	17	33.3
	36-45 years	18	35.3
	Above 46 years	10	19.6
	Total	51	100
Education	Certificate	11	21.6
	Diploma	34	66.7
	Graduate	5	9.8
	Post-graduate	1	2
	Total	51	100

Source: Research (2018)

The findings on the gender of the respondents indicate that 56.9% were female while 43.1% were male. These findings indicate that both genders were well represented in the study and therefore the findings were not biased towards any gender.

The findings on the ages of the respondents indicates that 35.3% of the respondents were aged between 36-45 years, 33.3% were aged between 25-35 years, 19.6% were aged above 46 years while 11.8% were aged below 25 years. These findings indicate that the respondents were drawn from different age brackets and therefore were representative of different opinions from different age brackets.

The findings on the educational level of the respondents indicate that 66.7% of the respondents had diplomas, 21.6% had certificates, 9.8% were graduates while 2% were postgraduates. These findings indicate that the respondents were drawn from different educational level brackets providing a representative group for the study.

Effect of Teacher Motivation on Implementation of Pre-primary Mathematics Curriculum

Financial Challenges as a Teacher Motivational Factor affecting Implementation of Pre-primary Mathematics Curriculum

The study sought to determine the financial challenges affecting Implementation of Pre-primary Mathematics Curriculum

Table 2: Financial Challenges as a Teacher Motivational Factor affecting Implementation of Pre-primary Mathematics Curriculum

Financial factor	T	Df	Mean	Sig	Remarks
Inadequate funding of School	6.94	51	4.46	.000	Affect
Delay in disbursement of funds by the government	22.53	53	4.89	.000	Affect
Seeking more money from parents due to delay in disbursement of funds	.590	50	3.67	.560	No effect
Personal Income financial challenges (Salary)	3.55	53	4.19	.001	Affect

T-value=3.5

Source: Research (2018)

Majority the finding on financial challenges affecting teacher motivational to influence implementation of Pre-primary mathematics curriculum indicate that 97.80% (mean= 4.89) of the respondent agreed that there is delay in disbursement of funds by the government affects, 98.20% (mean=4.46) of the respondent agreed that there is Inadequate funding. Over 83.80% (mean=4.19) of the respondent agreed that there is personal financial challenges (salary) affect teacher motivation and finally 73.40% (mean=3.67) of the respondent agreed that having to seek for more money from parents due to delay in disbursement of affects Teacher Motivational Factor in influencing implementation of Pre-primary mathematics curriculum. The findings from the interview schedule of the influence of teacher’s motivation on academic performance at pre-primary schools indicate that a majority of the respondents were of the opinion that motivation of the teachers was very crucial in determine how they did their job. The level of motivation they received determined how committed they were at their jobs and the kind of results they would yield since children at this level require special attention in order for them to perform well. Interview findings indicated that most teachers were generally motivated by financial rewards more than anything else. One teacher said, "While I like teaching, I cannot teach on an empty stomach. I love my pupils. But I also need to be paid well and on time if am to cater for myself and my family, if am to be comfortable while teaching." Most of the teachers expected their employers to pay them well and on time to motivate and keep their morale high. Some teachers, especially in private schools, had issues with their employers, for example, low salary and delayed payments.

On observation, teachers in schools with more finances to buy instructional materials seemed more highly motivated than those in schools with fewer finances to purchase needed instructional materials. The questionnaire, interview, and observation responses indicated that teachers were encouraged when teaching in schools with more financial resources. The researcher further observed that schools with more financial resources had a higher capacity to purchase, hire or construct better facilities such as classrooms and other critical playing facilities such as metal swings. Schools with more finances were better placed to make provision for teaching preprimary mathematics.

Parental Role Challenges as a Teacher Motivational Factor affecting Implementation of Preprimary Mathematics Curriculum

Parental Role Challenges as a Teacher Motivational Factor affecting Implementation of Pre-primary Mathematics Curriculum

The study sought to determine the Parental Role Challenges as a Teacher Motivational Factor affecting Implementation of Pre-primary Mathematics Curriculum

Table 3: Parental Role Challenges as a Teacher Motivational Factor affecting Implementation of Pre-primary Mathematics Curriculum

Challenges from parents	T	Df	Mean	Sig	Remark
Failure of parents to pay school development levy on time	5.03	51	4.48	.000	Affect
Lack of knowledge by parents on their role in the program	6.01	51	4.48	.000	Affect
Failure of parents to motivate learners to excel in academics	8.24	51	4.41	.000	Affect

T-Value =3.5

Source: Research (2018)

Averagely the finding indicate that 89.60%(mean=4.48) of the respondent agreed that parents fail to pay school development levy on time, 89.60% of the respondent also agreed that there is parents lack knowledge on their role in the pre-primary program. While 88.2% (mean=4.41) of the respondent agreed that parents fail to motivate learners to excel in academics.

The study findings indicates that failure of parents to pay school development levy on time affect (p-value=0.00) teacher motivation. Lack of knowledge by parents on their role in the program affect (p-value=0.00) teacher motivation. Finally failure of parents to motivate learners to excel in academics affect (p-value=0.00) teacher motivation Interview reports also indicated that most preschool teachers expect the active participation of parents to manage preschools. One head-teacher said, “We cannot succeed as a school without the active participation of parents. Parents need to follow up on the homework we give our pupils. We do well when we have informed parents who are concerned about everything their children do at school.”

Local Community Challenges as a Teacher Motivational Factor affecting Implementation of Pre-primary Mathematics Curriculum.

The study sought to determine the Local Community Challenges as a Teacher Motivational Factor affecting Implementation of Pre-primary Mathematics Curriculum

Table 4: Local Community Challenges as a Teacher Motivational Factor affecting Implementation of Pre-primary Mathematics Curriculum

Challenges from the local community	T	Df	Mean	Sig	Remark
Failure of the local community to put in place measures that ensure that children attend school	7.93	51	4.48 89.60%	.000	Affect
Negative cultural practices in the communities towards education in school	1.03	51	3.70 74.00%	.314	No effect
Negative attitude by the local communities towards education in schools	1.07	51	3.70 74.00%	.296	No effect

T-Value = 3.5

Source: Research (2018)

Averagely the finding indicate that 89.60% (mean=4.48) of the respondent agreed that the local community fail to put in place measures that ensure that children attend school, 74.00% (mean=3.70) of the respondent agreed that there is negative cultural practices in the communities towards education in school. While 74.0% (mean=3.70) of the respondent agreed that there is negative attitude by the local communities towards education in schools.

The study findings indicates that failure of the local community to put in place measures that ensure that children attend school affect (p-value=0.00) teacher motivation.

The study findings are supported by Ngegi (2015) who noted that the pre-primary schools besides being very fundamental in the development of children in the country face numerous challenges including the teacher motivation challenge, Teachers in the pre-primary feel that they do not have the necessary support from the local community and that they are not appreciated enough financially. They feel that their pay is inadequate and that they would wish for better pay like other teachers teaching the primary and the secondary schools. The study notes that these teachers’ voices are not as high on these challenges as they do not have strong unions like their counterparts. For this reasons therefore it is clear that teacher motivation in the pre-primary schools is not sufficient.

The findings from the interview schedule of the influence of teacher’s motivation on academic performance at pre-primary schools indicate that a majority of the respondents were of the opinion that motivation of the teachers was very crucial in determine how they did their job. The level of motivation they received determined how committed they were at their jobs and the kind of results they would yield since children at this level require special attention in order for them to perform well.

Conclusions

The study also concludes that teachers are motivated in implementation of pre-primary mathematics curriculum among pre-primary learners when they receive adequate funding, their income is improved, parents pay school development levy on time, parents motivate learners to excel in academics and when local community challenges are solved to ensure children’s attend school .Hence the motivation of teachers is precipitated by diverse sources which have to be well comprehended by the concerned education stakeholders.

Further the study found that teacher's commitment through putting their learners' wants, needs, and interests first, having positive attitude and zeal towards teaching profession influenced implementation of pre-primary mathematics curriculum. Therefore pre-primary learner's stakeholders should devise strategies which will ensure teachers are committed to achieve better results in implementation of pre-primary mathematics curriculum.

Recommendations

Based on the findings of this study, the researcher came up with a number of recommendations that may help improve implementation of pre-primary mathematics curriculum. The study focused on the unique and additive contributions of teacher motivation on implementation mathematics curriculum on pre primary. The study further recommends that the government should motivate teachers by disbursing funds in time. The teachers should be paid well to overcome financial challenges, staff development and welfare, Schools should organize school based in-service which gives new graduates and older members of staff opportunities to share knowledge and experience are important. Induction programs for new staff to be clearly aware of the school mission and policies improve teacher motivation.

The study recommends that during recruitment process for teachers, proper criteria should be set so as to employ only committed teachers who will guide the learners in a friendly manner and motivate them to develop a positive attitude towards mathematics even at a young age and make the implementation of pre-school curriculum much easier.

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