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Implementation: Evidence from Primary Schools in  
Marakwet West, Elgeiyo Marakwet County, Kenya**

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# A Resource Based View of Curriculum Implementation: Evidence from Primary Schools in Marakwet West, Elgeiyo Marakwet County, Kenya

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## Abstract

This paper aimed to determine the effect of teacher pupil ratio and variability of resources on curriculum implementation in Marakwet West Sub-county, Egeiyo Marakwet County Schools. Descriptive statistics were used to analyze data involving 2400 school managers, teachers and parents among the primary schools in Marakwet West Sub-County, Elgeiyo Marakwet County. The study findings showed a positive effect of teacher-student ration and variability of resources on curriculum implementation amongst the primary schools in the sub-county. The cross-sectional nature of collection of data weakens the author's claim of causality between the variables in focus. Similarly, the descriptive analysis done could not provide the real effects as the variability and causality of the variables could not be determined with such statistics. The study recommended that school managers need to uphold teacher-student ratio and variability of resources which would improve curriculum implementation in those schools. Besides, schools should emphasize on the teacher- student ratio and variability of resources while delivering their curriculum in order to be assured of effectiveness. Teacher-student ratio and variability of resources have an impact on effective curriculum implementation among schools, hence the society benefits from such implementation. The school stakeholders should strive to improve on them for societal benefits. This was the first study to investigate a linear relationship between teacher-student ratio and variability of resources on curriculum implementation among schools in Marakwet West sub-county, Elgeiyo Marakwet County.

**Keywords:** *Pedagogy, Curriculum Implementation, Employees, Financial Factors, Schools.*

## 1.1 Introduction

Studies on curriculum implementation have been on increase in the recent past due to its importance on education (Goodlad & Su, 1992). Curriculum is a plan that consists of learning opportunities for specific time frames and place, a tool that aims to bring out behavior change in the learner as a result of planned activities (Goodlad & Su, 1992). Implementation is carrying out of something or the practical application of methods, procedure or desired purpose (Fullan & Pomfret, 1977). Curriculum implementation on the other hand is the rolling out of a new practice to establish how it looks like when it is actually used in a school system (Loucks & Lieberman, 1983). This study looks at curriculum implementation as the process by which knowledge, skills, attitudes and abilities are put in practice. According to Fullan and Pomfret (1977), effective implementation of curriculum requires time, personal interaction and contacts, in-service training and other forms of support.

Curriculum implementation is a function of a number of factors. A teacher- pupil ratio and variability of resources are some of the key factors (Katunzi & Ndalichako, 2004; Wamukuru, Kamau & Ocholla, 2006 ). The teacher-pupil ratio remains a vital indicator of quality education since it makes teachers and learners have a conducive communication interface that makes the teacher discern and respond to learner's challenges (Katunzi & Ndalichako, 2004). A teacher-pupil ratio that goes way beyond the recommended of 40: 1 is detrimental to the performance of both the teacher and the learners (MOEST, 2009; Majanga *et al.*, 2010).

Variability of the necessary resources, mostly physical endowment of resources is also necessary. These necessary resources included facilities like classrooms, workshops and laboratories (UNESCO, 2004). The necessary class infrastructure like classroom and also water for sanitation and drinking are also very crucial for the curriculum implementation to the learners as well as their teachers (Kiriimi & Mwaniki, 2004). Rukunga and Mutethia (2006) adds to this discourse by opining that proper learning in schools is highly complemented by an environment with the proper hygiene. It therefore implies that water is a natural basic component in such hygienic environment. For water to be available it requires enormous resources that include drilling as well as piping (Rukunga & Mutethia, 2006).

## 2.1 Theoretical Review

The current study was guided by the resource based view theory (Rogan & Grayson, 2003; Barney, 1991; Prahalad & Hamel, 1990). This theory emphasizes that organizations need to focus more on their internal resources than on external ones (Wafula, 2016). It thus implies that primary schools should be more concerned with their internal endowment of resources like land , desks, chairs and water infrastructure before focusing on external resources. The theory posits that there are two types of resources: tangible assets and intangible assets. Tangible are physical resources such as machinery land and equipment, while intangible resources are those assets that are not seen physically, but their performance is felt. In the case of the primary schools the physical resources enable it to obtain competitive resources since teachers are uniformly distributed by the government (Wafula, 2016).

Barney (1991) opines that a resource to have competitive advantage it has to be valuable, rare, cannot be imitated and should not be substitutable. It implies that schools that need to implement

their curriculums and to enhance learning of their pupils, need such resources for effectiveness and competitive advantage. Their ratio of teachers-to the pupils should also be adequate enough to enable effective communication between the learners and the teachers.

## **2.2 The Effect of Teacher-Pupil Ratio and Curriculum Implementation among Primary Schools in Marakwet West Sub- County**

A curriculum remains simply a package if it is not implemented effectively and for that matter if the objectives intended have to be accomplished and the role of the teacher is very crucial (). Curriculum implementation entails the interaction of students, teachers, and the educational programme to produce the desired objectives (Goodlad & Su, 1992). Shiundu and Omulando (1992) opined that curriculum implementation is the making real of that which has been planned. The task of curriculum implementation can be said to involve changing attitude of people. Curriculum implementation is the reaction between the teachers, learners and other stakeholders in education geared towards achieving the objectives of education.

Curriculum is the sum total of all the experience provided to the learners under the guidance of the school (Bishop, 1985). Ball (1990) defined policy as “the authoritative allocation of values; operational statements of values; statements of prescriptive intent”. Educational reforms are actions or recommendations by those in authorities that are intended to make education provision better or to put right any faults or errors in the provision of education. Policy implementation is generally held to be the step that follows policy formulation and is viewed as “the process of carrying out a basic policy decision” (Sabatier & Mazmanian, 1983). Bhola (2004) suggested that policy implementation is the process of actualising, applying and utilising a policy in the world of practice. Hope (2002) views policy implementation as a process of transforming educational policy into practice.

Since Kenya attained independence in 1963, various educational/ curriculum reforms and policies have been recommended. Examples are the 8.4.4 system of education (1985), the cost sharing strategy in education (1988), the Free Primary Education (FPE) policy (2003) and the Subsidized Secondary Education policy (2008) among others (Nafula, 2001). According to Abagi and Odipo (1997) education reform efforts in less industrialized countries (like Kenya) have aimed at making education an effective vehicle for national development. Nafula (2001) contends that in Kenya, one goal of educational reforms has been to ensure that educational opportunities reach all segments of the population, especially those living in economically disadvantaged areas. This is the reason why the government of Kenya has had policy interventions aimed at achieving Universal Primary Education (UPE) and Education For All (EFA) currently.

A teacher-pupil ratio is an important element in any curriculum implementation success. It refers to the number of learners enrolled in a given level of education divided by the number of teachers in the system (Williams, 1979). Pupil/Student-teacher ratio is a significant measure of quality in education. This is because a system where the ratio is high, learners may lack personal attention from the teacher, while the less academic endowed learners are likely to lag behind. Consequently, learners' progress through the curriculum may be hindered, a factor that may lead to dismal performance in the exit examination (Nkinyangi, 2003; Katunzi & Ndalichako, 2004).

In a low pupil-teacher ratio learning environment, learners are more likely to get more one-on-one time with the teacher (Katunzi & Ndalichako, 2004). Moreover, teachers may get to know the individual students' better, thereby enhancing teacher's capacity to identify areas where the student may be in need of assistance. In the ultimate, learners get more value out of their education. These observations lend support to the view that other factors held constant (e.g., learners' family background, material inputs, and so on), teacher factor is the most powerful determinant of learners' academic achievement (Glass, 1982).

Class size is another factor that is closely related to pupil-teacher ratio. It is often assumed that class sizes need to fall below a certain number before they can have an impact on educational outcome (Shapson *et al.*, 1980). Very little is known however, about class size thresholds below or above which effects on class room processes are evident. Shapson *et al.* (1980) compared a number of different class sizes but when the range of class sizes is wide, as it is in the UK, this kind of design can become unwieldy (Shapson *et al.*, 1980).

With the introduction of Free Primary Education in Kenya, the country witnessed 10 % increase in enrolment in primary schools nationally, with a record of 1.3 million children registered in various schools across the country, raising the enrolment from 5.9 million in 2002 to 7.2 million in 2003 (MOEST, 2004). The sharp increase in enrolment rejuvenated the challenges of FPE in the country (Wamukuru *et al.*, 2006). For instance, the number of pupils exceeded the available human and physical facilities in the primary schools in the country. The pupil-teacher ratio increased steadily from the recommended 40:1 to over 60:1 in 2008 (MOEST, 2009).

In their study on the effect of class-size on classroom interaction during mathematics discourse in the wake of free primary education in Nakuru Municipality, Majanga, *et al.* (2010) revealed that the FPE policy created high pupil-teacher ratio, congested classrooms, teacher shortage and huge teacher work-load. They noted that these factors affected classroom interaction because teachers found it difficult to give personalized attention to all the pupils. In addition, Majanga *et al.*, (2010) noted that in schools where pupil-teacher ratios were high, performance of pupils is very low compared to schools with low pupil-teacher ratio. This was found to be true with learners' discipline. Schools with high number of pupils per teacher were found to have disciplinary problems. They argued that this was because teachers did not have total control of the pupils' population, and in many occasions many discipline cases were not noted for correction. This study also found that privately managed schools achieved greater performance or academic value than the publicly managed schools.

In a related study, Boy (2006) noted that over enrolment caused poor performance in public schools. This was evident from the comparison of the Kenya national examination results for 2006 and 2007 where performance of primary school pupils in public schools in K.C.PE declined compared to those in private primary schools (Too, 2005).



Therefore, the reality of teachers trying to teach over 100 pupils became too common in public schools and raised concern about academic standards and therefore questioned the effectiveness of public schools as opposed to the private ones (Abagi & Olweya, 1999). Sifuna (2003) noted that free primary education in public primary schools stretched the teaching and learning facilities as a result of high influx of new pupils. In the year 2007, the performance of pupils in public and private primary schools reflected disparity, with private institutions producing more candidates in the top 100 positions nationally compared to public schools in some selected provinces in Kenya.

### **2.3 The Effect of Variability of Resources on Curriculum Implementation among Primary Schools in Marakwet Sub-County, Elgeiyo Marakwet County**

Most schools in Kenya have inadequate facilities like classrooms, workshops, and laboratories. UNESCO (2004) points out that few schools and colleges have access to computers, the internet and email facilities which are essential for research and learning process. This issue was deliberated during the national conference on education and training held in Nairobi in November 2003 (UNESCO, 2004). With the implementation of the Free Primary Education programme currently in Kenya, the problem of inadequate facilities has become rampant. According to Kirimi and Mwaniki (2004) no additional classrooms have been built to cater for the increased numbers. UNESCO (2006) reports that in most primary schools in Kenya there's poor school infrastructure which include a major shortage of desks (Kirimi and Mwaniki (2004). When such important facilities miss, they may reduce the morale of employees hence weakening their Organizational citizenship behaviours (Kimwolo, 2019).

According to UNESCO (2004) most schools in Kenya lack water and sanitation facilities. Rukunga and Mutethia (2006) contend that most schools have inadequate sanitary facilities like latrines and safe water for drinking. This is detrimental to effective learning in that it makes children vulnerable to common preventable diseases such as diarrhea. Substantial learning time is wasted if the rate of absenteeism occasioned by such diseases is rampant. According to Rukunga and Mutethia (2006), proper hygiene in schools is essential for enhancing effective learning, attracting enrolment in schools, particularly of girls and in sustaining a reduced burden of diseases and worm infestation among pupils.

The authors also report that despite the increased enrolments in primary schools in Kenya which is as a result of the Free Primary Education programme, water and sanitation facilities remain the same. Inadequate water and sanitation facilities mostly affect adolescent school girls. Additionally, most schools in Kenya also lack chalkboards and visual aids which are necessary for effective curriculum implementation.

The lack of proper social amenities and infrastructure, particularly with the developments in the mobile telephone industry in Kenya is a notable impediment. UNESCO (2004) asserts that few schools and colleges in Kenya have access to computers, internet and email facilities which are essential for research and learning processes. In addition, computer resources like hardware and software are expensive for any schools to afford in reasonable quantities and quality. This incapacitates the use of computers essential in the teaching-learning process. Moreover, the teachers lack computer literacy skills as well. Health facilities are also lacking in most schools and colleges in Kenya. Pupils and teachers are frequently absent from school due to common ailments especially in rural areas. The foregoing discussion indicates that lack of facilities in

schools in Kenya is a major problem affecting teachers in the implementation of educational reforms and policies in Kenya.

### 3.1 Research methodology

The study adopted a descriptive research design. The purpose of descriptive statistics was to enable the researcher to meaningfully describe a distribution of scores or measurements using means, frequencies and standard deviations. The targeted population was 2400, which was inclusive of school managers, teachers and parents from the primary schools in Marakwet West Sub-County, Elgeiyo Marakwet County. However, the researcher distributed 205 questionnaires to each identified respondent filled and returned them.

### 4.1 Descriptive Statistics of the Influence of Pupils-Teacher Ratio and Curriculum

#### Implementation

The study sought to find out from the respondents who included head teachers, teachers and parents the influence of prevailing pupil-teacher ratio on curriculum implementation. The descriptive statistics of the influence of pupils-teacher levels on curriculum implementation is presented in Table 1

**Table 1: Descriptive statistics of the influence of pupils-teacher ratio and curriculum implementation**

Statement	SA-5 (Strongly Agree)	A-4 (Agree)	N-3 (Neutral)	D-2 (Disagree)	SD-1 (Strongly Disagree)
High pupils-teachers ratio means learners may lack personal attention from the teacher thus affecting curriculum implementation	48(21.0%)	116(50.7%)	25(10.9%)	16(7.0%)	
High pupils-teachers ratio means less academic learners are likely to lag behind thus affecting curriculum implementation	55(24.0%)	78(34.1%)	37(16.2%)	25(10.9%)	10(4.4%)
A large classroom affect curriculum implementation	44(19.2%)	94(41.0%)	28(12.2%)	37(16.2%)	2(0.9%)
When pupil-teacher ratios are high, performance of pupils is poor indicating poor curriculum implementation	107(46.7%)	86(37.6%)	8(3.5%)	4(1.7%)	
High pupils-teachers ratio means teachers are de-motivated thus affecting curriculum implementation	85(37.1%)	84(36.7%)	23(10.0%)	12(5.2%)	1(0.4%)

**Source: Researchers findings (2018)**

Based on the descriptive statistics presented in Table 1, majority 116(50.7%) of the respondents agreed that high pupils-teacher's ratio means learners may lack personal attention from the teacher thus affecting curriculum implementation, 48(21.0%) strongly agreed with the statement, 25(10.9%) were neutral while 16(7.0%) disagreed. This showed that most of the respondents agreed that high pupils-teacher's ratio means learners may lack personal attention from the teacher thus affecting curriculum implementation.

Besides, when the respondents were asked whether high pupils-teachers ratio means less academic achievement, learners are likely to lag behind thus affecting curriculum implementation. Majority 78(34.1%) of the respondents agreed, 55(24.0%) strongly agreed, 37(16.2%) were neutral, 25(10.9%) disagreed while 10(4.4%) strongly disagreed as shown in table 4.3 below. This implied that most of the respondents agreed that high pupils-teachers ratio means less academic learners are likely to lag behind thus affecting curriculum implementation.

Furthermore, the respondents were asked whether a large classroom affect the curriculum implementation and majority 94(41.0%) of the respondents agreed, 44(19.2%) strongly agreed, 37(16.2%) disagreed, 28(12.2%) were neutral while 2(0.9%) strongly disagreed. This indicated that most of the respondents agreed that a large classroom affect the curriculum implementation. Further, the respondents were asked, whether, when pupil-teacher ratios are high, performance of pupils is poor indicating poor curriculum implementation and majority 107(46.7%) of the respondents strongly agreed, 86(37.6%) agreed, 8(3.5%) were neutral while 4(1.7%) disagreed. This showed that most of the respondents strongly agreed that when pupil-teacher ratios are high, performance of pupils is poor indicating poor curriculum implementation.

Lastly, the respondents were asked to indicate whether high pupils-teacher's ratio means teachers are de-motivated thus affecting curriculum implementation. Majority 85(37.1%) of the respondents strongly agreed, 84(36.7%) agreed, 23(10.0%) were neutral, 12(5.2%) disagreed while 1(0.4%) strongly agreed. This showed that most of the respondents strongly agreed that high pupils-teacher's ratio means teachers are de-motivated thus affecting curriculum implementation.

#### **4.2 Descriptive Statistics of Influence Level of Variability of Resources and Curriculum Implementation**

The study sought to find out from the respondents who were; head teachers, teachers and parents the influence of level of variability of resources on curriculum implementation. The descriptive statistics of level of variability of resources and curriculum implementation is depicted in Table 2



**Table 2: Descriptive statistics of influence level of variability of resources and curriculum implementation**

Statement	SA-5 (Strongly Agree)	A-4 (Agree)	N-3 (Neutral)	D-2 (Disagree)	SD-1 (Strongly Disagree)
Lack of enough teachers affect curriculum implementation	60(26.2%)	99(43.2%)	34(14.8%)	9(3.9%)	3(1.3%)
Inadequate school facilities affects curriculum implementation	61(26.6%)	118(51.5%)	13(5.7%)	10(4.4%)	3(1.3%)
Lack of technology affect curriculum implementation	53(23.1%)	97(42.4%)	33(14.4%)	22(9.6%)	
Lack of enough instructional material affect curriculum implementation	29(12.7%)	80(34.9%)	60(26.2%)	33(14.4%)	3(1.3%)
Lack of necessary equipment affect curriculum implementation	70(30.6%)	107(46.7%)	17(7.4%)	11(4.8%)	

**Source: Researchers findings (2018)**

Based on the findings presented in Table 2, majority 99(43.2%) of the respondents agreed that lack of enough teachers affect curriculum implementation, 60(26.2%) strongly agreed, 34(14.8%) were neutral, 9(3.9%) disagreed while 3(1.3%) strongly agreed. This showed that most of the respondents agreed that lack of enough teachers affect curriculum implementation. Likewise, in response to whether inadequate school facilities affect curriculum implementation, majority 118(51.5%) of the respondents agreed with the statement, 61(26.6%) strongly agreed, 13(5.7%) were neutral, 10(4.4%) disagreed while were 3(1.3%) strongly disagreed. This implied that most of the respondents agreed that inadequate school facilities affect curriculum implementation.

In addition, majority 97(42.4%) of the respondents agreed that lack of technology affects curriculum implementation, 53(23.1%) strongly agreed, 33(14.4%) were neutral while 22(9.6%) disagreed. This showed that most of the respondents agreed that lack of technology affects curriculum implementation. Moreover, in regard to whether lack of enough instructional material affect curriculum implementation, majority 80(34.9%) of the respondents agreed with the statement, 60(26.2%) were neutral, 33(14.4%) disagreed, 29(12.7%) strongly agreed while 3(1.3%) strongly disagreed. This meant that most of the respondents agreed that lack of enough instructional material affect curriculum implementation. Finally, majority 107(46.7%) of the respondents agreed that lack of necessary equipment affects curriculum implementation, 70(30.6%) strongly agreed, 17(7.4%) were neutral while 11(4.8%) disagreed. This showed that most of the respondents agreed that lack of necessary equipment affects curriculum implementation.

### **4.3 Summary of the Findings**

#### **4.3.1 Influence of Prevailing Pupil-Teacher Ratio and Curriculum Implementation**

The study established that majority (50.7%) of the respondents agreed that high pupils-teacher's ratio means learners may lack personal attention from the teacher thus affecting curriculum implementation, 21.0% strongly agreed, 10.9% were neutral while 7.0% disagreed. This showed that most of the respondents agreed that high pupils-teachers ratio means learners may lack personal attention from the teacher thus affecting curriculum implementation. Besides, majority (34.1%) of the respondents agreed that high pupils-teacher's ratio means less academic learners are likely to lag behind thus affecting curriculum implementation, 24.0% strongly agreed, 16.2% were neutral, 10.9% disagreed while 4.4% strongly disagreed. This indicated that most of the respondents agreed that high pupils-teachers ratio means less academic learners are likely to lag behind thus affecting curriculum implementation.

Moreover, majority (41.0%) of the respondents agreed that a large classroom class size affects curriculum implementation, 19.2% strongly agreed, 16.2% disagreed, 12.2% were neutral while 0.9% strongly disagreed. This shows that most of the respondents agreed that a large classroom class size thus affecting curriculum implementation. Furthermore, majority (46.7%) of the respondents strongly agreed that pupil-teacher ratios are high, performance of pupils is poor indicating poor curriculum implementation., 37.6% agreed, 3.5% were neutral, while 1.7% disagreed. This shows that most of the respondents strongly agreed that when pupil-teacher ratios are high, performance of pupils is poor indicating poor curriculum implementation. Lastly, majority (37.1%) of the respondents strongly agreed that high pupils-teacher's ratio means teachers are de-motivated thus affecting curriculum implementation, 36.7% agreed, 10.0% were neutral, 5.2% disagreed while 0.4% strongly agreed. This shows that most of the respondents strongly agreed that high pupils-teacher's ratio means teachers are de-motivated thus affecting curriculum implementation.

#### **4.3.2 Level of Variability of Resources Affects Curriculum Implementation**

The study established that majority (43.2%) of the respondents agreed that lack of enough teachers affect curriculum implementation, 26.2% strongly agreed, 14.8% were neutral, 3.9% disagreed while 1.3% strongly agreed. This showed that most of the respondents agreed that lack of enough teachers affect curriculum implementation. Likewise, 51.5% of the respondents agreed that inadequate school facilities affect curriculum implementation, 26.6% strongly agreed, 5.7% were neutral, 4.4% disagreed while were 1.3% strongly disagreed. This indicated that most of the respondents agreed that inadequate school facilities affects curriculum implementation.

Moreover, 42.4% of the respondents agreed that lack of technology affects curriculum implementation, 23.1% strongly agreed, 14.4% were neutral while 9.6% disagreed. This showed that most of the respondents agreed that lack of technology affects curriculum implementation. In addition, the study established that majority (34.9%) of the respondents agreed that lack of enough instructional material affect curriculum implementation, 26.2% were neutral, 14.4% disagreed, 12.7% strongly agreed while 1.3% strongly disagreed. This showed that most of the respondents agreed that lack of enough instructional material affect curriculum implementation. Finally, the study established that majority (46.7%) of the respondents agreed that lack of

necessary equipment affects curriculum implementation, 30.6% strongly agreed, 7.4% were neutral while 4.8% disagreed. This implied that most of the respondents agreed that lack of necessary equipment affects curriculum implementation.

### **5.1 Conclusions**

This study assessed the challenges facing pedagogical practices of primary school education curriculum implementation.

It is clear from the study that most of the respondents established that factors influencing curriculum implementation include; teachers' inadequate preparation, low teachers and pupils' interests, lack of teachers' dedication towards their work, teachers' poor leadership skills and poor parents' socio economic status.

On the role of finance on curriculum implementation; it was observed that finances allocated to the school, budget of the school, expenditure of the school, debt of the school and liabilities owed by the school affect curriculum implementation.

On the influence of prevailing pupil-teacher ratio on curriculum implementation; it was observed that high pupils-teachers ratio implied that learners might lack personal attention from the teacher thus affecting curriculum implementation. Also, high pupils-teachers ratio meant less academic learners are likely to lag behind thus affecting curriculum implementation. Besides, the study concluded that large classroom and pupil-teacher ratios influenced the curriculum implementation. The study found that performance of pupils was poor indicating poor curriculum implementation and high pupils-teachers ratio implied that teachers were demotivated thus affecting curriculum implementation.

On the level of variability of resources on curriculum implementation, it was observed that lack of enough teachers, inadequate school facilities, lack of technology, lack of enough instructional material and lack of necessary equipment affected the curriculum implementation.

### **6.1 Recommendations**

- i. The study recommended that enough and more teachers should be employed to march the high number of enrolled pupils to enable smooth curriculum implementation.
- ii. Likewise, the study also recommend that school facilities should be provided by education stakeholders to enable smooth curriculum implementation.

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