

LEARNING ENVIRONMENT SUPPORT IN THE IMPLEMENTATION OF
COMPETENCE-BASED CURRICULUM FOR PUPILS' LEARNING IN
MPWAPWA DISTRICT COUNCIL

ABSTRACT

This study investigated on learning environment support in the implementation of competence-based curriculum. Preparation and use of competence-based instructional materials, teachers' competences on the use of teaching methods, and classroom situation for pupils' effective learning were the objectives of the study. Qualitative approach was employed to capture participants' views. The study was conducted in Mpwapwa District primary schools. Interviews and observations methods were used for data collection. 15 participants from 5 primary schools were involved in this study. 10 participants were classroom teachers, and 5 were head-teachers. 10 classroom teachers were selected on purpose, and 5 head-teachers were involved in this study by virtual of their administrative positions. The study revealed that government, teachers, pupils, and schools involved in the preparation of instructional materials. The findings also showed that simple questions and answers, lectures, and group discussions were the predominant methods used by teachers to teach pupils in spite of teachers knowing other teaching methods. Further the study found that classroom situation was an obstacle for the teachers to effectively exploit their knowledge to teach pupils. The point was evidenced by shortage of pupils' text books, desks, tables and chairs, and crowded classes. The study concluded that there was little support of learning

environment for effective implementation of the curriculum in Mpwapwa District Council. The study recommends that prior to the implementation of any curricular, there is a need to prepare appropriate teaching and learning environment.

Key terms: Learning environment, Implementation, competence based curriculum, and learning.

INTRODUCTION

This study investigated the support of learning environment in the implementation of competence-based curriculum for primary school pupils' learning. Literature contends that learning environment is vital for the implementation of competence-based for pupils' effective learning and better performance (UNESCO, 2014). According to literature (Burnette, 2018) learning environment constitutes several aspects among others competence-based instructional materials, teachers' competences on the use of competence-based teaching and learning methods/techniques, and classroom situation which encompasses size of a class, classroom facilities, relationships between teachers and students to name a few. It is argued that availability of competence-based instructional materials such as syllabus, students text books, and teachers' guide books, classroom facilities including pupils' desks, teachers' tables and chairs, classroom ventilation and light, and toilets support positively on pupils' learning, and better performance (Lovin, 2015; Ryan, 2014). It is further claimed that competent teachers bring about meaningful teaching and learning that effectively facilitates students' development of the intended competences. However, the question was whether primary schools in Tanzania specifically, Mpwapwa District Council primary schools had such learning environment for effective implementation of competence-based curriculum.

The study therefore, was planned to investigate the support of learning environment for effective implementation of competence-based curriculum for primary school pupils' learning. The focus was on preparation and use of competence-based instructional materials, teachers' competences on the use of competence-based teaching and learning methods/techniques, and classroom situations and its contribution for pupils' learning.

Competence-Based Instructional Materials

Literature argues that competence-based instructional materials are those materials which create opportunity for students to interact with them, and develop students' critical thinking, curiosity, and interest to learn at their own pace (Mosha, 2008; Kessy, 2016). The materials include texts such as books, journals, and articles. There are also graphic instructional materials including pictures, drawings, charts, graphs and tables. In addition, there are instructional materials which are in the form of technology. These include audio; radios, CDs, DVDs, visual materials; computer and VCDs, audio-visual; television and a projected computer (Kessy, 2016). It is asserted that the availability of these instructional materials is pre-requisite for not only implementation of the curriculum but also students' effective learning. The materials help students to acquire and develop the intended competences. In addition, the materials assist students to search more knowledge and skills at their own pace (Mosha, 2008). However, Mayer (2012) noted two challenges; shortage of the materials that leads teachers to embark on the use of traditional instructional materials mainly text books, and teachers' incompetence in the use of technological devices such as computers.

Teachers' Competences on Competence-Based Teaching and Learning Methods

The effectiveness of students' learning depends among others teachers' competences in conceptualizing, interpreting, and using teaching and learning methods/techniques (Ewell, 2013). However, not all teaching and learning methods or techniques are competence-based (Martin, 2019). Competence-based teaching and learning methods or techniques are those which allow and promote interaction between teacher and students, students and teaching and learning materials, and between or among students themselves (Martin, 2019). The methods include jig-saw, role-play, dramatization, think-pair-share, group discussions, brainstorming, think-pair-share etc. Literature portrays that competent teachers find such competence-based teaching methods/techniques useful for students' learning since the methods enable students develop critical thinking, creativity, collaborative and communicative competences (Ewell, 2013). However, the question was whether primary school teachers were competent to recognize, organize, and use competence-based teaching-learning methods/techniques for effective pupils' learning. Literature points out that sometimes teachers tend to perceive primary school pupils as empty sets who need constant feeding. This implies that teachers see their role as transmitting curriculum content to pupils through traditional methods/techniques (Kouwenhoven, 2013).

Classroom Situation

Classroom situation is an essential aspect in the implementation of competence-based curriculum for pupils' effective learning (Katera & Msafiri, 2019). Classroom situation can positively or negatively contribute to pupils' better learning (Newell, 2012). Literature remarks that classroom situation constitutes several aspects including size of

the class (UNESCO, 2014). However, the size of the class is perceived differently in different contexts since. In Tanzania context for example, a size of the class is determined by teacher-students' ratio. A primary school class that exceeds the ratio of one teacher to forty five (45) pupils is considered large (URT, 1995 & 2014). Such a class is claimed to limit teachers to effectively implement competence-based curriculum. The reason is that teachers find difficult to employ some competence-based teaching and learning methods to teach pupils (UNESCO (2014). Other aspects constituted in classroom situation are classroom facilities for teachers and students, classroom light and air ventilation (Katera & Msafiri, 2019). Literature argues that teachers and students find difficult to achieve curriculum goals especially competence-based curriculum goals in a situation where there is shortage/lack of essential classroom facilities such as text books, desks/chairs and tables for both teachers and students, and students' overcrowded (Fan, 2014; UNESCO, 2014). However, it was doubtful if the discussed classroom situation aspects are maintained in primary school education delivery based on current pupils' enrolment report (BEST, 2016-2020).

Statement of the Problem

There is a growing body of evidence indicating that learning environment has great support to the implementation of competence-based curriculum for pupils' learning and better academic performance (Ryan, 2014; & Burnette, 2018). As it has been discussed above, competence-based learning environment constitutes several aspects including instructional materials both textual and non textual, teachers' competences, well defined classrooms in terms of size, facilities, lighting, and air ventilation (Simir, 2016; Ryan, 2016; & Burnette, 2018). Ryan (2016) for example, asserts that a student

learning in appropriate environment becomes more knowledgeable, skilled, creative, critical thinking, and self regulated. Despite the described contributions of competence-based learning environment for pupils' learning, the question remains that do primary schools in Tanzania context experience competence-based learning environment that supports pupils' learning? The study by Kanon (2020) for example, revealed that most primary school teachers have limited instructional competences in teaching of social studies subject. Further, Kasumba (2014) found that although the University of Dar-es-Salaam adopted competence-based curriculum in 2000, most lecturers continued using traditional teaching-learning methods, specifically lectures. Furthermore, the study by Adrian (2012) showed that most primary school classes are overcrowded; consisting more than 80 pupils. The study was conducted in Muheza District Tanga Region. Likewise, the study by Mosha (2008) indicated that most primary schools in Kilimanjaro Region particularly Moshi Urban and Rural Districts faced shortage of pupils' competence-based text books. In respect to these studies, and the recent report about pupils enrolment (BEST, 2016-2020), the researcher considered it necessary to investigate on the support of competence-based learning environment for pupils in Mpwapwa District primary schools focused on how competence-based instructional materials were prepared and used by teachers, teachers' competences on the use of competence-based teaching method/techniques, and contribution of classroom situation in the implementation of competence-based curriculum for pupils' learning.

Purpose of the Study

The purpose of this study was to investigate learning environment support in the implementation of competence-based curriculum for primary school pupils' learning in

Mpwapwa District Council.

Specific Objectives of the Study

Specifically, this study intended to

1. Examine the preparation and use of competence-based instructional materials for effective pupils' learning.
2. Determine teachers' competences on the use of competence-based teaching methods/techniques.
3. Assess the contribution of classroom situation to the implementation of competence-based curriculum.

LITERATURE REVIEW

This part provides theoretical and empirical review related to the study. The theoretical review is guided by constructivists' theory of teaching and learning. The part also highlights empirical literature review related to this study.

Theoretical Review of the Study

This study is guided by Constructivism Theory for Teaching and Learning (CTTL). The theory was developed by a Russian Psychologist, Vygotsky in 1960s. Generally, the theory explains that people actively construct their knowledge in a meaningful learning environment. Constructivism theory for teaching and learning underpins a variety of learner-centered teaching and learning methods which contrast with traditional methods

in which knowledge is passively transmitted by teachers to students. Constructivists' teaching and learning methods include those which promote interaction between a teacher and students, between students themselves, and between students and instructional materials. From this perspective, a teacher plays a role as a facilitator rather than an instructor (Oliver, 2000). Constructivists focus more on relationship between teachers and students, and supportive learning environment; sharing of authority, and pupils' assessment without grading them. They believe that if environment including appropriate teaching and learning methods, availability of instructional materials, and assessments which are in favor of children, then learning can take place effectively (McLeod, 2019).

Empirical Literature Review

There have been many studies about learning environment for students/pupils' learning. Haney (2013) for example, found pupils' home environment including parents' education, and family income as factors that signify effects on pupil's learning. Unlike Haney, Edward (2009) discloses teachers' awareness of competence based teaching methods, competence based instructional material, and classroom situation cannot be separated from the effective learning environment for students' learning, and better performance.

Competence-Based Instructional Materials

Competence based instructional materials are among the determinants to be observed if at all we want to achieve goals of pupils' learning, and better academic performance (Edwards, 2009). Both textual and non-textual competence based instructional materials have significant role towards students' learning. Literature portrays that for schools which have adequate competence based instructional materials both printed and

non printed materials experience better students' academic performance (Atieno (2014). However, it is argued that most teachers use traditional instructional materials specifically, text books to teach pupils rather than modern or technological materials (Dubey, 2014). The study was silent about why teachers prefer using traditional instructional materials to modern or technological materials. Hovenga (2011) for example, discloses that using video-conferencing as one of the modern or technological instructional materials of teaching and learning helps to facilitate a number of classrooms or students at ago.

Teachers' Competences on Competence-Based Pedagogy Practice

Teachers' understanding of competence based teaching methods is of paramount important aspects for pupils' better learning and performance. Competence based pedagogy is learner-centered in which a learner involved in learning through various interactive teaching-learning methods/techniques including questions and answers, brainstorming, group discussion, jig-saw, demonstrations, role play, dramatization, and gallery walk (Bartram, 2011). Despite the advantages of competence based teaching methods, Masha (2008) found that some primary school teachers in Tanzania are still using traditional teaching methods such as lecture methods. Furthermore, Kafyulilo (2008) assessed the implementation of competence based teaching approaches in Teacher Colleges in Tanzania. The study found that both college tutors and student-teachers were unable to clearly explain about competence based teaching-learning methods. The danger of this situation according to Kafyulilo (2008) was that those student-teachers after completing their course of study would be employed and posted

to primary schools in Tanzania with little understanding of competence-based teaching and learning methods. However, the study has not discussed about why college tutors and student-teachers were unable to explain about competence-based teaching-learning methods. Simir (2016) determined teachers' awareness of shifting from teacher-centered to learner-centered as a new paradigm of competence based curriculum on students' learning. The study found that teachers who were aware of student-centered pedagogy spent less time talking, giving much time to students doing various learning activities. In turn, teachers who had little understanding about student-centered pedagogy used more time talking and doing activities than their students.

Classroom Situation and its Impact on Students' Learning

A large amount of a child's time is spent sitting in a school classroom. This place is where children develop various knowledge and skills deemed necessary and proper for them to achieve success in the global society (Lovin, 2014). The classroom is where students develop what they want their future to look like, as well as knowledge and skills needed to reach that goal. With the classroom being such an important place in the growth of a child it is important to understand the ways in which to positively affect this environment in order to receive maximum effectiveness for pupils' learning (Lovin, 2014).

Cheong (2015) for example, investigated the effectiveness of learning environment on students' learning. The study found that modern school classrooms are able to meet students' needs of learning since they incorporate the latest innovative technology including computers.

Ryan (2014) asserts that a student learning in appropriate environment becomes more knowledgeable and skilled. According to Ryan (2014) environment has an impact on student learning. Therefore, any improvement effort to the learning environment would definitely help enhance student achievement.

Newell (2012) contends that good learning environment consists of four main factors: visual, acoustical, aesthetic and thermal environments. The visual environment refers to appropriate lighting system in the classroom to facilitate students in focusing their tasks. The acoustical environment means a well designed environment free from external noise disturbance. The aesthetic environment focuses on an appropriate use of instructional materials; textual and non textual materials to accommodate students' learning activities. The thermal environment includes adequate air conditioning, heating and air ventilation in the classrooms to ensure physical comfort. Thus, these aspects are significant to be taken into account if at all we want our children achieve their learning goals (Newell, 2012).

Burnette (2018) studied the impact of school classroom environment on the word learning of students' performance. The study results indicated that school learning environment has direct and indirect impacts on students' performance. According to Burnette (2018) direct impact is associated with size of the classrooms, and learning facilities, appropriate lighting, controlled acoustics and proper air ventilation. A good learning environment frees students from physical distress, makes it easy for students to concentrate on school work and induces students in logical thinking. Students in good learning environment undoubtedly attain higher performance.

On the other hand, students in poor learning environment are under many physical constraints. It is believed that only very few students with great determination and self-discipline can overcome all the difficulties created by such hazardous learning environments. Indirect impacts are responses shown by students through positive and negative attitudes.

With a positive attitude towards their learning environment, students learn with high motivation and undoubtedly are able to demonstrate better performance. On the other hand, students' dissatisfaction with poor learning environments may lead to lowering their interest and enthusiasm in learning. Consequently, poor students' performance is no surprise (Burnette, 2018).

METHODOLOGY

The study employed an interpretive qualitative case study research to understand the participants' views on the learning environment support in the implementation of competence-based curriculum. The interpretive maintains that there are multiple, socially constructed realities in which the researcher's judgments are considered in interpretation of data (McMillan, 2010). Purposive sampling method was used to select classroom teachers.

The study was carried out in Mpwapwa District primary schools, Dodoma Region Tanzania. Semi-structured interviews were used to collect data of this study. The reason for choosing this method was its flexibility in allowing the discovery and elaboration of participants' in-depth information. Furthermore, the method provides the researcher

with a chance of engaging follow-up questions that expand participants' original information, thoughts and views (Cohen, Manion & Morrison, 2007).

The study also employed participant observation method for data collection. The method allows the researcher to observe the situation at the source rather than relying on second-hand information. Participant observation method also relies on researchers seeing and hearing things from the original setting (Frankael & Wallen, 2001). Interview guide questions and observation check list were prepared and used by the researcher to obtain information from participants. 15 participants from 5 primary schools in Mpwapwa District Council were involved in this study. 10 participants out of 15 were classroom teachers, and 5 were head-teachers. 10 classroom teachers were selected on purpose; only classroom teachers with the experience of five years or more were deemed to fit for this qualitative study. 5 head-teachers were involved in this study by virtue of their administrative positions. The data set obtained from interviews was analysed using thematic data analysis method. The process began by familiarizing with the data through transcribing audio-data to textual-data, reading transcripts several times. This followed by coding, finally naming the themes. Data from observations were analysed through content data analysis methods. The participant observations focused on addressing specific questions included the classroom situations, instructional methods, teaching and learning materials used by classroom teachers to teach pupils.

Profile of the Participants

Table 1 shows the participants' profile involved in this study. The participants' profile included participants' teaching experiences and gender; female and male.

Table 1 Categories of Participants According to Experiences and gender

Years	Female	Male	Total
5-10	2	3	5
11-15	2	2	4
16-20	2	1	3
21-25	1	1	2
26-30	-	1	1
Total	7	8	15

Source: Field Data 2021

DISCUSSION OF THE FINDINGS

The purpose of this study was to investigate learning environment support in the implementation of competence-based curriculum for primary school pupils' learning. Specifically, the study focused on preparation and use of competence-based instructional materials for effective pupils learning, teachers' competences on the use of competence-based teaching and learning methods/techniques, and contribution of classroom situation for pupils' learning, and better performance.

Preparation and Use of Competence-Based Instructional Materials

The study intended to assess preparation and use of competence-based instructional materials for pupils learning. To obtain information about this theme both interviews and classroom observations were used.

Preparation of Competence-Based Instructional Materials

The findings revealed four directions of preparations included government, teachers themselves, pupils, and school involved in the preparation of competence-based instructional materials. It was found that government used to prepare and distribute some competence-based instructional materials included subjects' syllabus, pupils' text books and teacher' guide books as one Head-teacher said:

“The government of Tanzania prepares some instructional materials included pupils' text books, syllabus, and teachers' guide books, and they distribute the materials to our schools.”

Further, the findings showed that simple competence-based instructional materials commonly known as Teaching Aids were prepared by classroom teachers themselves. The teachers explained that they used school and home environment to prepare teaching and learning materials commonly known as teaching Aids through improvisation as one classroom teacher confessed:

“We use our home and school surroundings to improvise simple competence-based T/Aids such as charts, cards with word/sentences, abacus etc.”

Moreover, the findings showed that some pupils were involved in preparation of competence-based teaching-learning materials/facilities. As one classroom teacher said:

“Some pupils are requested to help teachers to prepare simple T/Aids especially, those needed to be molded, weaved, carved, and even to collect things such as flowers, stones, plastic bottles from home or school environment.”

The last direction showed that schools were buying ready-made competence-based teaching-learning facilities. The teachers said that the advancement of science and technology has simplified the task to prepare some instructional materials since they are sold in shops and markets. One classroom teacher asserted:

“You know! This advancement of science and technology has simplified the work of preparing Teaching-Aids hence they are sold in shops and markets.”

The teacher himself/herself or the school buys the materials such as toys, models, abacus etc from shops or markets.”

However, the researcher wanted to know from the teachers why pupils were involved in the preparation of Teaching Aids. The teachers responded that involving pupils in the preparation of teaching aids is advantaged since it helps the pupils to expose their talents. One classroom teacher clarified the advantage of pupils involvement in teaching aids preparation. She portrayed:

“Incorporating pupils to prepare simple teaching Aids especially, those needed to be molded, drawn, weaved and carved exposes, develops, and promotes pupils’ talents.”

The findings aligned with Kumar (2017) who asserts that it is good thing for teachers to involve pupils in preparing simple teaching aids because it not only develops pupils’ talents but also creates good relationships between teachers and pupils. However, the researcher’s perception was that it could be much better for teachers to involve all pupils in the preparation of teaching aids but, not some so as to develop talents and good relationships to all pupils.

Use of Competence-Based Instructional Materials

Under this theme, the findings showed that primary school teachers were mostly using textual materials such as books, charts, cards with words, sentences or pictures in their teaching process. However, one classroom teacher claimed that although they were frequently using text books for teaching pupils, they faced the shortage of the materials. Most schools experienced inadequate pupils’ competence based text books to the extent

that one text book was shared by five to six pupils. To combat such situation, the findings revealed that pupils were divided into groups of five to six members, and given one book to read, as one classroom teacher disclosed:

“I use both textual and non-textual materials such as books, charts, cards with words, sentences or pictures in my teaching process depending on the nature of the lesson. However, I face the shortage of pupils’ text books. So, in developing reading or writing skills for example, I divide pupils in groups, and display the materials to be shared by group members.”

The implication of the findings is that the government of Tanzania through the Ministry of Education, Science, and Technology is not providing primary schools with adequate competence based teaching-learning materials specifically, pupils’ text books. The shortage of pupils’ text books affects negatively the process of pupils’ learning. World literature contends that the availability of competence-based instructional materials specifically, pupils’ text books not only simplify teaching process but also promote pupils’ learning at their own pace (Janovsky, 2013).

On the other hand, the findings showed that none of the primary schools in Mpwapwa District Council had technological devices such as computers connected to internet. This situation is challenging especially, in this era of advancement of science and technology where much knowledge is obtained through online learning. When the researcher asked teachers particularly, Head-teachers why their schools lacked technological devices included computers. The Head-teachers responded that the

government had not provided their schools with such materials. One Head-teacher declared:

“Despite the fact that technological devices such as computers expose pupils to the world of science and technology, our schools lack these devices. The government has not provided our schools with such important technological devices.”

The importance of technological devices including computers for students' better learning has been discussed by various world literatures. Okafor (2016) for example, points out that those schools with adequate modern or technological instructional materials such visual and audio-visual materials contribute positively to both teachers and students' knowledge and skills enhanced the process of teaching and learning. However, the researcher perceives the shortage of pupils' competence based teaching-learning materials specifically, text books in Tanzania primary schools as the chronic phenomenon. This is because the study by Mosha (2008) found that most primary schools in Tanzania faced shortage of pupils' competence based text books. Mosha investigated competence-based teaching-learning materials used to teach primary school pupils; standard IV and VII. Based on the findings, it can said that for long time primary school in Tanzania have been experiencing shortage of teaching and learning materials/facilities despite their significance for pupils' better learning.

Teachers' Competences on the Use of Competence-Based Teaching Methods

The objective under this theme sought to determine teachers' understanding and use of competence-based teaching and learning methods/techniques for effective pupils' learning.

To obtain information about the theme, participant observations and interviews were employed by the researcher. Through classroom observations, the findings showed that most primary school teachers were employing simple Questions and Answers, Lectures, and Group discussions as methods for teaching pupils. Teachers used to prepare two to three questions from which pupils were asked orally at the beginning and at the end of the lesson. However, most of the questions were not really competence based because they did not develop and promote pupils' critical thinking rather, they were used to revise (memorization) previous lessons. For example, one classroom teacher teaching class VI asked pupils:

What did we learn yesterday?

However, through interviews most teachers were found mentioning several competence-based teaching and learning methods. For example, one classroom teacher mentioned brainstorming, think-pair-share, role-play, jig-saw, Galley-walk, dramatization, demonstration, and peer teaching as competence-based teaching and learning methods. When the researcher wanted to know why classroom teachers were only using questions and answers, lectures, and group discussions as methods for teaching pupils while they had known a number of competence-based teaching and learning method, the majority classroom teachers pointed out that overcrowded classes

as factor limited them to use such competence-based methods. For example, one classroom teacher who was teaching standard IV said:

“.....questions and answers, and lecture methods simplify teaching process especially, in the overcrowded class like this one. This class has 120 pupils therefore, it is difficult to use other competence based methods such as jig-saw etc.”

Further, another classroom teacher said the following about the methods he used to teach pupils:

“I mainly use Questions and Answers to teach my pupils. Sometimes, I use Pupils’ group discussions with the expectations that group discussions develop pupils’ collaborative and communicative competences.”

Furthermore, another teacher who was teaching standard IV explained the following pertaining competence based methods she used to teach pupils:

”I teach a class of 120 pupils. For me the simple methods to teach such a class are Questions and Answers, and Lecture methods.”

The findings contradict the literature which contends that for effective pupils’ learning especially under competence-based curriculum, competence-based teaching and learning methods including peer teaching, jig-saw, role play etc are highly recommended (Simir, 2016; Edwards, 2009).

However, the implication of the findings is that most primary school teachers understand

competence-based curriculum but the classroom situation limit them to use such methods. On the other side, UNESCO (2014) remind that for effective use of competence based teaching methods on pupils' learning, the question of teacher pupils' ratio is inevitable. In Tanzania primary school context for example, the teacher pupils' ratio is one teacher to forty five pupils (URT, 1995; 2014).

Classroom Situations

Under this theme, the study sought to examine how classroom situation facilitated pupils' learning. The focus was on teacher pupils' ratio, pupils' desks, and classroom teaching-learning aids. Through classroom observations, the study findings revealed that most primary school classrooms were overcrowded. For example, in most primary schools, class IV and VI had more than 80 pupils. The following figure 1 reveals the overcrowded classroom.



Figure 1 An overcrowded Classroom

Source: Field Data, 2021

When the researcher wanted to know from participants why most classrooms were overcrowded. The participants responded that the situation was strongly realized after the government of Tanzania had announced free education. One Head-teacher for example, claimed:

“After the government of Tanzania has announced free education, our primary schools experience this challenge of overcrowded classes. Every parent ensures that his/her child goes to school. This situation leads primary schools to receive many children even beyond the capacity of the school.”

It is good thing for the government of Tanzania to provide their citizens with free education. This enables at least all Tanzania children to acquire basic/primary education. However, for effective implementation of competence-based curriculum for pupils' learning, and better performance, the government could extend primary school classrooms so as to accommodate the enrolled pupils. It is also significant to consider Tanzania Educational Policy of 1995 and 2014 that mark the ratio of teacher to pupils in primary education to be 1:45. In line with the findings, literature argues that the overcrowded class or the class which has more than eighty (80) pupils affect the practice of competence-based curriculum (UNESCO, 2014). In support of UNESCO (2014), Ngina (2013) contends that higher teacher pupils' ratio has negative impact on pupils learning through competence based curriculum. Ngina (2013) asserts that it

difficult for teacher to facilitate and assess an individual learner based on every learned competence in the situation where teacher students ratio is exceeded

Furthermore, the study found that most classrooms in Mpwapwa District Council primary schools faced shortage of pupils' desks. The extent was one desk shared by four to five pupils. The figure 2 below shows how the situation was in most primary schools in Mpwapwa District Council.



Figure 2 One Desk Shared by Four to Five Pupils

Source: Field Data, 2021

When the researcher asked participants specifically, Head-teachers why primary schools in the District faced shortage of pupils' desks to the extent that one desk is shared by four to five pupils. The majority participants responded that it was the responsibility of the government through District councils to provide their schools with pupils' desks. One Head-teacher for example, said the following about shortage of pupils' desks.

“Some years ago, schools had good arrangement of obtaining pupils' desks. The schools through their School Committees used to ask pupils' parents to provide contributions which partly was used to cover issues concerning desks, stationeries etc. But now days, provision of desks and stationeries is left to the government through District councils. What we do as school leaders is to request our District council officers to provide funds to cover such issues.”

This situation is unhealthy and not providing pupils with comfort in learning. The Four or five pupils sitting on one desk may reduce pupils' efficacy in demonstrating writing competences/skills. In support of the findings, literature contends that classroom facilities including students/pupils' tables and chairs or students/pupils' desks are significant for comfort and appropriate students' learning, and better performance (Chan, 2012; Anbalagan, 2017).

Further, the study through classroom observations found that some pupils particularly in class IV were sitting on the floor while others were sitting on the desks. The situation was as indicated in the figure 3 below:



Figure 3 Pupils Sitting on the Floor while others sitting on desks

Source: Field Data, 2021

This situation is not convincing particularly, when considering competence-based learning environment. Literature views competence-based learning environment as the one aspect of competence-based curriculum has great contribution for students' learning, and better performance. The situation in which, large number of pupils sit on the floor while learning does not favor competence-based curriculum (Khan, 2011). Consequently, this situation might have resulted into pupils' poor academic performance. Notably, it is suggested that pupils' desks, tables or chairs enable pupils to properly take note, and develop good handwritings (Chan, 2012).

It was also found in this study that most classrooms in Mpwapwa District Council primary schools lacked teaching-learning Aids on the walls despite their importance. Literature contends that for effective learning through competence-based curriculum especially, for lower classes including standard IV, availability of teaching-learning Aids is a vital thing. The availability of teaching aids especially, those materials which are put on the classroom walls enable pupils develop knowledge and skills, and revise what has already been learned at their own pace (Goodman (2005). The figure 4 below revealed the situation.



Figure 4 A Classroom Lacking T/Aids on the Wall

Source: Field Data, 2021

When the researcher wanted to know why classroom walls lacked teaching Aids. The majority classroom teachers claimed that they used to put teaching Aids included pictures, posters, cards with word/sentences on the classroom walls but, the teaching Aids were often destroyed because some classrooms had no door and window-shutters. One classroom teacher for example, lamented:

“We try to prepare several teaching Aids; drawings, pictures and even real objects, and put them in our respective classrooms. But people including our pupils destroy the materials, I think because the classrooms doors and windows lack shutters.”

However, the researcher perceived that in order to avoid the destruction of the materials, classroom teachers would put the teaching Aids during the classroom sessions, and go with them after lessons had been over. This might have reduced the destruction of the materials.

Moreover, the study findings portrayed that most classrooms lacked essential teachers' facilities such as chairs and tables. The majority teachers seemed unhappy with lacking of tables and chairs. One classroom teacher teaching standard IV said the following:

“It is believed that a teacher does not need a chair while she/he is in classroom. I think this is wrong perception. The fact is that despite most time we stand up, sometimes we not only need chairs but also tables especially, when we correct pupils' work/exercises.”

The implication of this situation is that classroom teachers feel uncomfortable when they do not find their essential facilities included classroom tables and chairs. The disadvantage of this situation for teachers is not only difficulty in correcting pupils' work/exercises but also to spend some minutes looking for a place to put their teaching-learning material including teacher's lesson plans, guide books, and teaching Aids. In class “Y” for example, one classroom teacher was found holding instructional materials from the beginning of the lesson up to the end. Figure 5 below shows the situation.



Figure 5 A Classroom Lacking Teacher's Table and Chair

Source: Field Data, 2021

However, literature has been silent about this issue of teachers lacking chairs and tables in their respective classrooms. The fact is that this situation reduces teachers' comfort, and efficacy in teaching-learning process, which might have resulted into ineffective teaching.

SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

Summary and Conclusion

The study was guided by three objectives: examining the preparation and use of competence-based methods for effective pupils' learning, assessment of teachers' competences on the use of competence-based teaching and learning methods/techniques, and determining the contribution of classroom situation for pupils' learning, and better

performance.

Government, teachers, pupils and schools are involved in the preparation of instructional materials. However, most schools face shortage of both textual and non-textual materials including text books and computers. Most primary school teachers in Mpwapwa district understanding various competence-based teaching methods such as think-pair-share, jig-saw, gallery-walk, role play, brainstorm, peer teaching, dramatization to name a few but, they mostly use simple questions and answers, and lectures because the classes are overcrowded (more than 80 pupils in one class).

Most classrooms in Mpwapwa District are overcrowded. The classes contained more than eighty pupils. This situation limits teachers to effectively employ some competence-based teaching methods/techniques such as jig-saw, gallery-walk, role play. Most primary schools face a shortage/lack of essential classroom facilities included pupils' desks to the extent that some pupils are sitting on desks while others sitting on the classroom floor. The classrooms also lack teachers' tables and chairs. In line with the study findings and the ensuing discussion generally, it can be concluded that there is unsupportive learning environment for the effective implementation of competence-based curriculum for pupils' learning since the environment was characterized by the above discussed situations.

Recommendations

It is important for the government of Tanzania to develop or extend primary schools' infrastructure including pupils' desks, teachers' tables and chairs, and classrooms to avoid pupils overcrowded in one classroom that results into ineffective use of competence

based teaching methods.

The government of Tanzania should provide schools with adequate competence-based instructional materials both textual and non-textual materials such as text books and computers.

Primary school teachers should use home and school surroundings to improvise simple teaching materials (teaching aids) since they are important for pupils' effective learning, and better performance.

The teachers should not wait for the government to provide them with simple teaching materials commonly known as teaching aids since they can be improvised by the teachers themselves.

REFERENCES

Atieno, J. (2014). *Influence of teaching and learning resources on students' performance in Kenya certificate of secondary education in free day secondary education in Embakasi district.*

Bartram, D. (2005) *The Great Eight competencies: A criterion-centric approach to validation.*

Burnette, E. (2018). *Impact of classroom environment on word learning of retardates with high and average activity levels.* Unpublished doctoral dissertation, George Peabody College for Teachers.

- Cheong, C.Y. (2013). "Classroom Environment and Student Affective Performance: An Effective Profile." *The Journal of Experimental Education*, Vol. 62,
- Claire, M. (2005). *Conditions under which Assessment support students learning and teaching*. The University of Gloucestershire. London: OUP.
- Dubey, A. (2014). *An Experimental Study of Impact of Multimedia*. Package on Achievement of Science of VIII Class Students. (Unpublished doctoral dissertation) Sharma Open University.
- Edwards, M. (2009). *Achieving competence-based curriculum in Engineering Education in Spain*. INGENIO (CSIC-UPV), Working Paper Series. Polytechnic University of Valencia.
- Ewell, P. T. (2013). *Implications for assessment*. National Institute for Learning Outcomes Assessment. The Lumina Degree Qualifications Profile (DQP):
- Fan, C. C. (2014). Perceived Classroom Management and Students' learning motivation in Social studies of Taiwan Junior High school students. *Journal of Research in Social Sciences*, 2(3), 40-51.
- Haney, N. (2013). Constructivist beliefs about the science classroom learning environment: *Perspectives from teachers, administrators, parents, community members, and students*. School Science and Mathematics.
- Hovenga, E. (2011). *Health Information Governance in a Digital Environment*.

Boston: World CAT Member Libraries.

Janovsky A. (2012). *Instructional Materials: Definition, Examples & Evaluation*

Retrieved March, 2014 from

<http://study.com/academy/lesson/instructional-materials-html>.

Kafyulilo, A. (2008). *Implementation of Competence Based Teaching Approaches in Teacher Education in Tanzania*. Unpublished Dissertation. University of Dar es Salaam.

Katera, L. and Msafiri, D. (2019). *Learning Environment and Performance of Primary Education in Tanzania*.

Khan, K. S. (2011). Formative Self-Assessment Using Multiple True-False

Questions. *The Teaching and Learning through Competence Based Curriculum*. New York: MacMillan.

Lovin, J. C. (2014). *The effect of school's physical environment on the self-concepts of elementary school students*. Unpublished doctoral dissertation, University of Georgia.

Mayer, (2003). *Cognitive Theory and the Design of Multimedia Instruction: An Example of the Two-Way Street between Cognition and Instruction*. University of California: EBSCO Publishers

McLeod, S. A. (2019, July 17). *Constructivism as a theory for teaching and learning*. Simply Psychology. Retrieve from

<https://www.simplypsychology.org/constructivism.html> on

15th July, 2020

- Mosha, H. J. (2008). *Learning Materials Used to Deliver Knowledge and Skills in Competency-Based Curricula* (in Tanzania). Unpublished Dissertation. Dar es Salaam.
- Mpwapwa District Education Report (2011; 2012; 2013 & 2014).
- Newell, C. (2012). "Classroom Environment and Pupil Welfare." *Journal of Educational Psychology* 45 (1): 52-59. Accessed October 25, 2021.
- Oliver, K. M. (2010). *Methods for developing constructivism learning on the web*. Educational Technology, 40 (6).
- Ryan, H. (2014). "The Effect of Classroom Environment on Student Learning" HonorsTheses.2375.WesternMichiganUniversity,
- Segers, M. (2008). *Constructivist learning environments and the (im)possibility to change students' perceptions of assessment demands and approaches to learning* BY Springer Science+Business.
- Samir, A. (2016). The study on the EFL Teachers' Awareness of classroom Observation Criteria. *International Journal of English Linguistics* Vol. 6: unpublished by Canadian Center of Science and Education.
- Southern and Eastern Africa Consortium for Monitoring Education Quality Report {SACMEQ} (2014),

URT. (1995). *Education and Training Policy*. Dar es Salaam.

URT. (2014). *The report on the Effectiveness of Competence Based Curriculum for Primary Education in Tanzania*.

UNDER PEER REVIEW