TEACHER CLASS MANAGEMENT SKILLS AS DETERMINANTS OF STUDENTS’ ACADEMIC PERFORMANCE IN SCIENCE SUBJECTS IN UGANDA CERTIFICATE OF EDUCATION EXAMINATIONS IN BUIKWE DISTRICT, UGANDA

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Abstract:
This study investigated Teacher Class management skills as determinants of students’ academic performance in science subjects in Uganda certificate of education examinations in Buikwe district, Uganda. The target population included all head teachers, head of departments, science teachers, students in public and private secondary schools, and all Secondary Science and Mathematics regional trainers in Buikwe district. Both Probability and non-probability sampling were used. Simple random sampling was used to select 110 Science teachers, 375 students were selected using cluster random sampling while 28 head teachers were selected through census purposive sampling and expert sampling was used to select regional trainers. Data was collected using questionnaires, interview, focused group discussions and document analysis guide and were subjected to both content and face validity. Cronbach alpha technique determined reliability of quantitative instruments. Quantitative data were analyzed using SPSS version 23 for descriptive and inferential statistics. Frequencies and percentages were used to summarize data while Chi-square Test for associations was used to test hypotheses. The qualitative data were subjected to thematic analysis and findings presented in narrative form. The key findings indicated that there was a significant relationship between teacher class management skills and students’ academic performance in science subjects. The study found out that due to a sizable number of science teachers who do part timing, the effectiveness of instruction was hindered which affected students’ academic performance. The study also determined that poor teaching methodologies, negative attitude among students, lack of text books and well equipped laboratories in some schools contributed to poor performance. The study concluded that teacher class management skills are key to students’ academic performance in science

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subjects and teachers may acquire it through self-improvement, participating in seminars and refresher courses. The study recommended that MOES needs to organize seminars and equip science teachers with the required teaching and management skills to teach science subjects.

Keywords: teacher quality, teacher class management skills, students’ academic performance, science subjects, examinations

1. Introduction

Teacher quality has several dimensions such as formal qualifications, teaching experience, preparations, the quality of teacher education itself, class management skills and as well as the teaching efforts made by the teachers given their formal qualifications. Classroom management is a term used to describe the process of ensuring that classroom lessons run smoothly despite disruptive behaviour by students (Emmer & Sabornie, 2015). Classroom management is essential to both teachers’ education and professional development. It is crucial to keep teachers’ knowledge up to date, so they can deliver high quality teaching to students. Teacher’s varying approaches to classroom management are reflected in different levels of effectiveness. Kathryn (2013) examined effects of classroom management strategies on the success of students. This research looked at how student performance differs from interventionist, non-interventionist, or interactionalist models of teacher instruction (IM) and behaviour management (BM) in nationwide standardized test reading, English language arts, and mathematics.

2. Review of Related Literature

Effective teachers with proper classroom management skills know their students and how to communicate with them, both individually and collectively. Effective teachers carefully consider their audience when delivering a message. They observe reactions and decide how best to get their point across to different individuals. A case in a point is shown in a study carried out in USA.

In the percentage of students passing standardized reading, ELA, and mathematics using MANOVA at a p <.05 level, survey results from eighty-three 3rd, 4th, and 5th grade teachers on educational and behavioral classroom management values were contrasted. Student performance by IM type did not differ substantially. However, interactionalist BM classrooms had a significantly higher percentage of students completing statewide math, reading, and ELA assessments than interventionist classrooms. This study was carried out in USA which has a different environment in terms of school settings compared to Uganda. The study too was carried out in lower grades compared to secondary schools in the current study.
Classroom management is a complex set of articulate behaviour which the teacher uses to establish and maintain conditions to enable learners achieve instructional objectives efficiently. Nevin (2017) investigated primary school teachers’ classroom management and student performance in their classrooms in Turkey. Between October 2013 and December 2013, a total of 150 class-hours was spent studying a first grade and four second grades at a primary school in Eskisehir city centre. Criteria for teacher involvement in research included volunteering for analysis and having at least one student special needs for assessment in their classes so that teacher attitudes towards students with special needs could be studied. Research data were analyzed using descriptive statistics and one-way variance analysis (ANOVA) for testing hypothesis. The findings showed that teachers appeared to place students with special needs in the back rows of the classroom and did not offer individualized instructional opportunities in accordance with the needs of students with special needs.

Classroom administration systems assume a fundamental part in upgrading students’ learning and performance. According to Zhang and Zhao (2010), classroom administration involves the exercises to compose and guide classes to accomplish particular objectives. It is therefore the teachers' responsibility to maintain a positive learning environment in the classroom. This is well articulated in a descriptive study carried out in Pakistan by Imran, Lubna, Iftikhar and Muzaffar (2018), on the impact of classroom management on students’ academic performance at university level in Punjab. The survey approach was used to collect the related data using a self-developed questionnaire and three universities were selected from Punjab for the study.

The study concluded that the views of male and female students on classroom management varied insignificantly. It was recommended that consistency and strict enforcement of regulations and timetable be established. The reviewed study was carried out among University student in Punjab Pakistan while the current study was carried out in secondary schools but having respondents such as Science teachers, Head teachers, Heads of science department, Students, and SEEMAT officials.

In the same development, Azlin, Wong and Satter (2012) examined the characteristics of an effective teacher who teaches English as a second language to 10 year old students from different ethnic, various social economic background and multi-level language ability, at a private primary school in Malaysia. The study focused on classroom management using a case study methodology where data was collected using both interviews and classroom observations. The study found out that a strong sense of belonging results in positive academic outcomes. Learning outcomes are directly related to the learning environment within the classroom created by the teacher due to the fact that the processes of learning that they foster are by far the more powerful. This study was conducted in private primary schools and focused on the English findings.

Classroom management can also be explained as the actions and directions that teachers use to create a successful learning environment; indeed, having a positive impact on students’ achievement given learning requirements and goals. This is so well
explained in a study carried out in Nigeria by Menene (2018). The study investigated the influence of classroom management and students’ academic performance in public secondary schools in Rivers State. For the study, correlation survey was adopted, and a standardized questionnaire was used to collect data.

Menene’s study found out that there is a significant and strong positive relationship between classroom discipline, successful instruction, use of classroom reward system and academic performance of students. There is a significant and moderate relationship between the use of authority delegation in the classroom and academic performance of students. The reviewed study was guided by a correlational survey design while the current was guided by the convergent parallel design which comprises both quantitative and qualitative approaches.

The importance of good classroom management in the realization of the objectives of education cannot be over emphasized. In the region of East Africa, a study in Kenya by Mwaniki (2012) investigated the influence of classroom management on the academic performance of History and Government in public secondary schools in Embu East District. A descriptive research approach was adopted. History and government teachers at secondary schools in Embu East District were the target population. A stratified random sampling technique was used to obtain the sample and data collected through questionnaires. The study found that a rise in disruptive behavior results in poor academic performance. The study carried out in Embu focused on the teaching and performance of history and government while the current study focused on the performance of science subjects as taught at ‘O’ level in Uganda.

In addition, classroom management is wider than the concept of student control and instruction. It encompasses all the things that teachers need to do in the classroom to promote academic participation and collaboration in classroom activities in order to build a healthy learning environment (Umoren, 2010). Classroom management means curtailing the disruptive behaviour of the learner, such as fighting and making noise, close observation, arrangement of learning materials in the classroom and reaction to students suffering from poor sight (vision), poor hearing, poor reading, poor writing, poor spelling, embarrassment, dullness, hyperactivity and poor study habits (Morse 2012). Musoke (2017) conducted in Uganda to identify successful classroom management strategies in the district of Luweero for secondary school teachers. The study used survey design and a questionnaire to collect data from 300 respondents.

Results obtained revealed the effective classroom management techniques included constant engagement of students in activities, use of innovative instructional strategies by teachers and teachers acting as models. Others included monitoring, effective communication, stimulating classroom environment and regular use of questions during instruction. Findings further showed that teachers’ classroom management effectiveness is a powerful motivator of student’s learning. The study adopted a survey design but did not elaborate on the sampling techniques used. The current study used convergent parallel design to guide the study.
A well-managed classroom gives the teacher firm control over the class, while the teacher loses control over the class when it is not well managed. Kyoshabire (2014) investigated effects of teachers’ management styles on the students’ academic performance in literature in English at the Uganda Advanced Level in selected schools in Wakiso district, Uganda. Data was collected using questionnaires, interview guide and document analysis guide. The findings revealed that teachers use different management styles; laissez, participatory and autocratic management style in teaching Literature in English.

Consequently, it was concluded that participatory, autocratic and laissez-faire management styles have a lot of effect on students’ academic performance because they determine the direction of teaching-learning processes. It was recommended that teachers should employ management styles that enhance students’ learning for better academic grades. The reviewed study focused on the performance in Literature in English at the Uganda Advanced level while the current study focused on the performance of science subjects at the ‘O’ level in the Uganda certificate examinations.

The broader view of classroom management indicates increased dedication, reduction of improper and disruptive behaviour, encouragement of student accountability for academic work, and enhancement of student academic performance (Bassey, 2012). In the same vein, Cherotin (2010) researched on management and academic performance of pupils in Tegeres Sub-County, Kapchorwa District, Uganda. The research inquired why Tegeres Sub county primary schools had persistently not performed well in national examinations. Head teachers and teachers were purposively selected. The study established that there exists a significant positive relationship between teacher motivation, Head teacher’s school control, coordination of school activities and pupils’ academic performance. This study was more concerned on the general administration and management of the school and how it impacts on the students’ academic performance. While the current study focused on how teacher quality indicators impacts on the student’s academic performance in science subjects.

3.1 Research Design and Methods

The study was conducted to determine how teacher Class Management Skills determines students’ academic performance in science subjects in Uganda certificate of education examinations in Buikwe district, Uganda. The study employed Convergent parallel mixed methods design. The methodology involves the collection of both quantitative and qualitative data, analysis and integration of both forms of data (Creswell, 2011). The researcher used the method to collect, analyze and integrate both quantitative and qualitative data simultaneously. From quantitative paradigm, a cross-sectional survey design was used to collect data from many informants (Mugenda, 2011). These included science teachers and students from the 28 sampled secondary schools. The design is cherished by most scholars for collecting descriptive data which can be generalized to the population where the sample is drawn.
From qualitative paradigm, phenomenological design was chosen to explore the meaning of participants’ own perspectives and lived experiences (Creswell, 2014). This enabled the researcher to collect data from Headteachers, heads of science department and SESEMAT officials’ lived experiences, on Teacher Class Management Skills as determinants of students’ academic performance in science subjects in Uganda certificate of education examinations. The target population comprised all the 92 secondary schools in Buikwe district: 12 public secondary schools and 80 private secondary schools. That is all the 92 secondary school headteachers, 92 heads of science department, 368 science teachers, 12 SESEMAT officials and 11,531 “O’ Level students in secondary schools in Buikwe district (Buikwe District Statistical Report for 2018/2019). The head teachers and heads of science department were included in the study because they were the immediate managers and administrators of the schools under their care.

In this study both probability and non-probability techniques were used. Best and Kahn (2006) note that a sample of 30 or more is to be considered in a large sample. However, this depends on how diverse the population is. In this study, the researcher used a mixed sampling design of probability and non-probability sampling. Probability sampling technique permitted the researcher to ensure that each member of the population had a chance of being selected for the sample. Non-probability sampling gave a study a chance to use participants basing on their expertise and responsibilities (Kothari, 2013). Probability sampling used simple random sampling, stratified sampling and cluster sampling while non-probability used expert sampling to draw the sample from a list of experts in the field. Census sampling was used to select the entire population which was relatively small in the study without drawing a sample as proposed by Lodico, Spaulding & Voegtle (2006).

The researcher selected all the 12 public secondary schools by use census sampling as for 16 private secondary schools stratified and simple random sampling were used because schools were categorized according to their performance in UCE in the last four years. This made a total of 28 secondary schools which formed 30% out of the 92 secondary schools in the district. The percentage is higher than the minimum 10% as recommended by Creswell (2014). Science teachers were selected by use of simple random sampling technique.

The individual science teachers from each school were selected randomly from the list of the staff to get the representative. Head of Departments were selected by using simple random sampling, Head teachers and SESEMAT officers were selected by census and expert sampling respectively. This chosen sample size is consistent with Wiersema (2009), who points out that a sample should be sufficiently large to maintain the integrity and reliability of the data and indicates that a sample of 30% of the population is representative enough. The sample size for this study was 551 subjects which included 28 schools, 28 Head teachers, 28 Heads of science department, 110 Teachers, 12 SESEMAT regional trainers and 375 students.
All research instruments were subjected to content and face validity which is a measure of the degree to which data collected represents a specific content of a particular concept (Mugenda, 2011). Two experts from research and two from educational administration departments scrutinized the instruments to determine whether the intended content was covered. Their feedback on sentence construction, grammar and clarity on question items were incorporated to improve on the research instruments. Questionnaires were pilot tested in two secondary schools with similar characteristics with the schools that later participated in the study. Reliability of Likert scale quantitative items was determined using Cronbach alpha that requires only one testing, which yielded a coefficient of 0.924. Thus, meeting the recommendation by McMillan and Schumacher (2001), of a good rule of thumb for a satisfactory reliability of at least 0.70. The Cronbach’s Alpha technique is the most appropriate test of internal reliability for survey research and other questionnaires, which use more than two choices, such as the Likert scale (Kothari & Garg, 2014).

Qualitative items for interview guide and Focus Group Discussions guide were subjected to trustworthiness in terms of, member checking, transferability, dependability, and credibility and. There was also instrument and source triangulation of instruments and participants respectively. Statistical Package for Social Sciences (SPSS) version 23 was used to analyse quantitative data and to generate descriptive statistics that included frequencies and percentages presented in tables. Inferential statistics included chi-square tests for association which was used to test the hypothesis. Qualitative data were organized manually and prepared by the researcher for analysis basing on research questions; meaningful analytical concepts developed and later compared with analysed quantitative data to establish convergence or otherwise. Analytical concepts were then reported in verbatim and narratives.

4. Findings and Discussion of the Study

The researcher sought responses from students on whether class management skills of the science teacher determine students’ academic performance in science subjects at UCE. Table 17 presents a summary of the Students’ responses and the Likert scale was used to get the information. The scores of the scale are Strongly Disagree (SD) = 1 Disagree (D) = 2 Undecided (UD) =3 Agree (A) =4 and Strongly Agree (SA) =5. Scores of the scale are presented in frequency and percentages.
Table 1: Students’ responses on Teacher class management skills as a determinant of students’ academic performance in Science subjects (n=375)

<table>
<thead>
<tr>
<th>Item</th>
<th>SD</th>
<th>D</th>
<th>U</th>
<th>A</th>
<th>SA</th>
</tr>
</thead>
<tbody>
<tr>
<td>Teachers instruct students on when to start writing during lessons.</td>
<td>17</td>
<td>4.5</td>
<td>30</td>
<td>8.0</td>
<td>28</td>
</tr>
<tr>
<td>Teachers go around the class to ensure that students are participating in learning activities.</td>
<td>18</td>
<td>4.8</td>
<td>19</td>
<td>5.1</td>
<td>16</td>
</tr>
<tr>
<td>Teachers’ strict classroom management forces students to change their habits.</td>
<td>16</td>
<td>4.3</td>
<td>31</td>
<td>8.3</td>
<td>35</td>
</tr>
<tr>
<td>Teachers move around to note students who fail to copy from the blackboard.</td>
<td>33</td>
<td>8.8</td>
<td>49</td>
<td>13.1</td>
<td>49</td>
</tr>
<tr>
<td>Teachers punish students who engage in malpractice during examinations.</td>
<td>32</td>
<td>8.5</td>
<td>26</td>
<td>6.9</td>
<td>21</td>
</tr>
<tr>
<td>Teachers intervene when students talk at inappropriate times during science class.</td>
<td>30</td>
<td>8.0</td>
<td>49</td>
<td>13.1</td>
<td>57</td>
</tr>
<tr>
<td>If a student talks to a neighbor, our teachers move the student away from other students.</td>
<td>58</td>
<td>15.5</td>
<td>81</td>
<td>21.6</td>
<td>43</td>
</tr>
<tr>
<td>Our science teachers firmly redirect students back to the topic when they get off task.</td>
<td>30</td>
<td>8.0</td>
<td>29</td>
<td>7.7</td>
<td>35</td>
</tr>
<tr>
<td>Teachers’ class management creates fear that aids learning.</td>
<td>47</td>
<td>12.5</td>
<td>51</td>
<td>13.6</td>
<td>74</td>
</tr>
<tr>
<td>Teachers always adjust instruction in response to individual student needs.</td>
<td>30</td>
<td>8.0</td>
<td>45</td>
<td>12</td>
<td>68</td>
</tr>
</tbody>
</table>

Table 17 shows that 80% of the students agreed that science teachers instruct them on when to start writing during lesson. This concurs with Zhang and Zhao (2010), who noted that classroom administration involves the exercises to compose and guide classes to when to start and when to accomplish particular objectives. It is teachers’ responsibility to maintain a positive learning environment in the classroom by giving instructions to the learners to listen to the teacher when he or she is explaining important concepts in class and when to begin taking notes during the lesson.

The table also indicates 85.8% of students either strongly agreed or agreed that science teachers move around the class to ensure that students are participating in learning activities. Babalola and Ayeni’s (2009) stipulated that students would show a keen interest in academic activities if teachers are concerned about their academic well-being and are motivated by instructional supervision. This is further in line with Wolfgang’s and Glickman’s (1980) theory, which holds that the Teacher Behavior Continuum (TBC) represents the power relationship between teacher and student.
methods that teachers use to deal with a) the child (C) enjoys the most control over his or her behavior while the teacher (T) has least control; b) oppositely, the teacher (T) assumes control of the child (C). Those who behave from the viewpoint of the non-interventionist are therefore likely to use minimal power while more influence would be exerted by interventionists.

From the finding in Table 17, 78.1% of students agreed that their science teachers’ strictness in class compels students to change their habits. This finding confirms Ndiana (2009) who maintained that if teachers give guidance on how to do classroom exercises, the classroom would be organized enough for lessons to be affective. This would have a positive impact on the academic performance of the students. Science teachers, therefore, should monitor if learners take notes during class and should exercise full class control to ensure no student distracts another during the lesson.

Table 17 shows that 79.0% of the students agreed that science teachers punish students who engage in malpractice during examinations. The finding is consistent with Etim (2015) who opined that punishment makes students think twice before the same crime is committed. Ime (2018) also reported students only respond to punishment. Therefore, effective management of the classroom requires the substantial use of discipline by the teacher which would create a conducive atmosphere for learning. So, in the case of cheating in an examination, learners can be compelled to repeat or do another exam. The teacher should also carry out a strict invigilation during the time of exams in order to minimize malpractices.

Table 17 also indicates that, 63.8% of the students agreed that science teachers intervene when students talk at inappropriate times during science class. The finding supports that of Chandra (2015) that at times silence can be effective during teaching and learning. Science teachers should move around the room to make students pay and plan lessons to ensure adequate learning activities. Teachers should have a knack to memorize student names as quickly as possible to enhance class control and confidence of the teacher.

The result in Table 17, shows 74.9% accepted that their science teachers firmly redirect students back to the topic when they get off task. The result is in line with George, Abisola and Adam (2017) that once teachers are able to effectively reduce or eliminate disruptive behaviour in the classroom, there may be improved academic attentiveness and engagement that would pave the way for students to achieve better academic performance. Therefore, in cases where learning seems to be interrupted and learners go off tract, it is the duty of the teacher to put them back on track. This can be done by using different activities and teaching aid to capture their attention.

The study found that 54.1% of the students indicated that science teachers create fear among students that helps in learning. However, the result from the majority differ from Morse (2012), who asserts that class control is not only creating fear among students but also curtailing learner’s disruptive behaviour such as fighting and noise making. Classroom management also implies close observation, arrangement of classroom
learning materials, and responding to students who suffer from poor sight (vision), hearing, reading, writing, spelling, shame, dullness, hyperactivity and poor study habits. According to Bassey (2012), the broader view of classroom management shows increased commitment, reduction of improper and disruptive behaviour, encouragement of student accountability for academic work, and improvement of student academic performance. Classroom management as a skill can be acquired like in any other profession. According to Umoren (2010), the concept of classroom management is wider than the concept of student control and discipline. This covers all the things teachers need to do in the classroom to promote academic participation and engagement in classroom activities in order to create a favorable learning environment.

In addition, Table 17 indicates that 61.9% of the students agreed that science teachers always adjust instruction in response to individual student needs and behaviour. Such a finding is in line with Obinaju’s (2016) who notes that most students misbehave and perform below standards because the teacher in the classroom fails to give and explain the rules and regulations governing the class. On the same development, Okon (2019) advances that verbal guidance on what to do gives students an understanding of the task in the classroom which allows them to behave well. Guidance from the teacher which is key can be done through academic counseling taking the disruptive student through what to do and what is expected of him or her.

4.2 Science teachers’ views on teacher class management skills and students’ academic performance.

In this study, sampled science teachers from Buikwe district were asked to respond to statements intended to describe the role of teacher class management skills in relation to the students’ academic performance in science subjects at UCE. Table 18 presents a summary of the responses. The Likert scale where Strongly Disagree (SD) = 1 Disagree (D) = 2 Undecided (UD) = 3 Agree (A) = 4 and Strongly Agree (SA) = 5 were used. Scores are presented in frequency and percentages.

The findings in Table 18 indicate that 75.4% agreed that they instruct their students on when to start writing during lessons while 20.9% were undecided on the item. The findings, therefore, are in line with Wong et al. (2012), who observed that classroom management alludes to all that a teacher does to organize students, space, time, and resources with the intention that learning students will occur. It is characterized by student-focused learning groups as sharing administration, community building, and a harmony between instructors’ and students’ requirements. Therefore, students of all academic and social backgrounds are to develop together in the same classes, with teachers considered responsible for the success of each individual student.
Table 2: Science teachers’ responses on class management skills as a determinant of students’ academic performance in science subjects (n=110)

<table>
<thead>
<tr>
<th>Item</th>
<th>SA</th>
<th>A</th>
<th>U</th>
<th>D</th>
<th>SD</th>
</tr>
</thead>
<tbody>
<tr>
<td>I instruct my students on when to start writing during lessons.</td>
<td>60</td>
<td>54.5</td>
<td>23</td>
<td>20.9</td>
<td>23</td>
</tr>
<tr>
<td>I always go around the classroom to ensure that students are actively participating in science in class.</td>
<td>69</td>
<td>62.7</td>
<td>26</td>
<td>23.6</td>
<td>11</td>
</tr>
<tr>
<td>My strict classroom management forces students to change their habits to a better and rewarding performance.</td>
<td>49</td>
<td>44.5</td>
<td>17</td>
<td>15.5</td>
<td>40</td>
</tr>
<tr>
<td>While teaching I conduct myself around to note students who fail to copy from the blackboard.</td>
<td>60</td>
<td>54.5</td>
<td>26</td>
<td>23.6</td>
<td>20</td>
</tr>
<tr>
<td>I always intervene when students talk at inappropriate times in class.</td>
<td>64</td>
<td>58.2</td>
<td>28</td>
<td>25.5</td>
<td>13</td>
</tr>
<tr>
<td>I reward students for good behavior in the classroom.</td>
<td>43</td>
<td>39.1</td>
<td>21</td>
<td>19.1</td>
<td>32</td>
</tr>
<tr>
<td>If a student talks to a neighbor, I move the student away from other students.</td>
<td>25</td>
<td>22.7</td>
<td>15</td>
<td>13.6</td>
<td>41</td>
</tr>
<tr>
<td>I use input from students to create classroom rules.</td>
<td>34</td>
<td>30.9</td>
<td>27</td>
<td>24.5</td>
<td>38</td>
</tr>
<tr>
<td>I firmly redirect students back to the topic when they get off task.</td>
<td>62</td>
<td>56.4</td>
<td>28</td>
<td>25.5</td>
<td>16</td>
</tr>
<tr>
<td>I strictly enforce classroom rules to control student behavior.</td>
<td>50</td>
<td>45.5</td>
<td>40</td>
<td>36.4</td>
<td>16</td>
</tr>
<tr>
<td>I create fear that aids learning and causes good performance.</td>
<td>29</td>
<td>26.4</td>
<td>23</td>
<td>20.9</td>
<td>27</td>
</tr>
<tr>
<td>I always adjust instruction in response to individual student needs.</td>
<td>46</td>
<td>41.8</td>
<td>23</td>
<td>20.9</td>
<td>27</td>
</tr>
</tbody>
</table>

Table 18 also shows that 86.3% of the science teachers agreed that they always go around the classroom to ensure that students are actively participating in science. The finding concurs with Azlin, Wong and Satter (2012), who noted that learning outcomes are directly related to the learning environment within the classroom created by the teacher. Conducive classroom environment strengthens the child’s level of understanding which leads to considerable significance to the study of critical issues of classroom teaching. Silencing noise makers, dealing with curricular subjects and the behaviour of the teachers make the classroom environment favourable or unfavourable and gratifying or discouraging to the pupil.

The results in Table 18, a majority of the science teachers; 60.0% agreed that their strict classroom management compels students to change their habits to a better and rewarding performance while 36.4 were undecided on the item. This is in line with what was reported by Soheili, Alizadeh, Murphy, Bajestani, Ferguson and Dreikurs (2015) that classroom management is crucial because it supports the proper execution of curriculum.
implementation, and development of best teaching practices. Notably, poor classroom management has a negative impact on students’ academic performance.

Data in Table 18 show that 78.1% of the science teachers reported that they monitor students who fail to copy from the chalkboard while 18.2 remained undecided. The finding concurs with Kyoshabire (2014) that teachers use different management styles; laissez, participatory and autocratic management style in teaching Literature in English. These styles have a lot of effect on students’ academic performance because they determine the direction of teaching-learning processes. As such, teachers should employ the mentioned management styles to ensure maximum order, checking on whether learners are taking notes during the lesson; enhancing students’ learning for better academic grades.

According to Table 18, 83.7% of the science teachers reported that they intervene when students talk at inappropriate times in class while 11.8% were undecided. Mwaniki (2012) researching on the same revealed that an increase in disruptive behaviour leads to negative academic performance. This alludes to good classroom management in the realization of the objectives of education which cannot be over emphasized. Hence, science teachers need to ensure that they stop any unnecessary noise in class since it can disrupt teacher facilitation.

The finding in Table 18 show that 58.2% of the science teachers agreed that they reward students for good behaviour in the classroom while 29.1% were undecided and 12.7% disagreed. A study in Nigeria by Menene (2018) reported that there is a significant and strong positive relationship between classroom discipline, effective teaching; and use of classroom reward system and student academic performance. It also determined that there is a significant and moderate relationship between use of delegation of authority in the classroom and students’ academic performance. This is an implication on reward for the best performing and well-behaved students as a way of attracting others to work hard and behave well in class.

From Table 18, 36.3% of the science teachers agreed that when a student talks to a neighbour they move the student away, 37.3% were undecided while 26.3% disagreed. Freiberg (2013) argued that classroom management is concerned with a course of action of teachers’ behaviour and activities that are basically anticipated that would develop student co-operation and consideration in the classroom. This is why teachers should be concerned about classroom management and student performance; and create an enabling environment for all the learners by keeping a close watch on disruptive students in class.

Table 18 also shows that 81.9% science teachers agreed that they strictly enforce classroom rules to control student behaviour. The finding is consistent with Chafouleas et al. (2012), who showed a direct correlation between classroom management and student learning and academic achievement. Students are more sensitive with management systems to the classrooms because they feel more individually responsible for their learning and develop a sense of connectedness to the institution. Science teachers...
should have rules in class that guide every student on how to behave in teaching and learning process, for example, stopping learners from coming late to class.

In addition, the table also shows that 62.7% of the science teachers agreed that they always adjust instruction in response to individual student needs. The finding is in agreement with Prasertcharoensuk, Somprach and Keow (2015), who saw that teachers need to have competencies such as curriculum content mastery, delivery of content in a proper order, organizing the content, mastery in employing training tools in practice, keeping accurate records and giving feedback to the learners. For this study, the study focused on competences skills of teachers based on, teaching methods, utilization of instructional resources, evaluation techniques and preparation of professional documents.

4.3 Testing of the Null Hypothesis four.

**H₀:** There is no significant association between teacher class management skills and students’ academic performance in science subjects at UCE in Buikwe district.

**Hₐ:** There is a significance association between teacher class management skills and students’ academic performance in science subjects at UCE in Buikwe district.

To test the null hypothesis, a Chi-Square test for associations was computed. The inferential findings on the relationship between teacher class management and students’ academic performance in science subjects were drawn from the data in the two categories of the respondents. The results obtained are summarized in Tables 19.

<table>
<thead>
<tr>
<th>Chi-Square Tests</th>
<th>Value</th>
<th>df</th>
<th>Asymp. Sig. (2-sided)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pearson Chi-Square</td>
<td>752.502 *</td>
<td>2</td>
<td>.091</td>
</tr>
<tr>
<td>Likelihood Ratio</td>
<td>391.860</td>
<td>2</td>
<td>1.000</td>
</tr>
<tr>
<td>Linear-by-Linear Association</td>
<td>1.772</td>
<td>1</td>
<td>.183</td>
</tr>
<tr>
<td>N. of Valid Cases</td>
<td>110</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

*Note:* a. 0 cells (0.0%) have expected count less than 5. The minimum expected count is .01.

In Table 19, Chi-Square Tests result indicates that “0 cells have expected count less than 5 and the minimum expected count is 0.01”. Therefore, the sample size requirement for the Chi-square test of association is satisfied. The Chi-Square test statistic (Chi-Square=752.502) was p=0.91, more than the alpha level of significance of (0.05). Therefore, we fail to reject the null hypothesis. Consequently, there is no statistically significant association between teacher class management skills and students’ academic performance in science subjects at UCE in Buikwe District. The results are in disagreement with Kyoshabire (2014), who asserted that a well-managed classroom gives the teacher a firm control over the class. However, the teacher loses control over the class if it is not well managed and this negatively affects the performance of the learners.
Teachers need to know how to manage classroom dynamics effectively. This entails organizational and disciplinary skills that both help make different types of classroom interactions more systematic and aligned with the learning objectives.

5. Summary of Findings

The study endeavored to show how teacher class management skills influence students’ academic performance in science subjects at UCE in Buikwe district. The study found out that teacher class management skills play a key role in the academic performance of the students at UCE. Classroom management skills are important for a teacher to enhance students’ academic performance. Some teachers exhibited such important skills such as planning, organizing, giving classroom rules to control student behaviour, aptitude for team work, commitment, promoting initiatives, teachers’ willingness to adjust, creating order in class, and creative thinking and actions.

6. Conclusion

Based on the findings, the individual science teachers exhibited certain skills such as planning, organizing, and giving classroom rules to control student behavior, aptitude for team work, commitment, promoting initiatives, teachers’ willingness to adjust, creating order in class, creative thinking and actions. However, each individual science teacher needs to be assisted in his or her unique way by the administration to become effective in teaching science subjects.

7. Recommendation

Basing on the findings of the study, the researcher makes a number of recommendations to education policy makers and implementers: the Ministry of Education and Sports, the Directorate of Education Standards, BOG, head teachers, science teachers, students, parents and teacher training institutions. These people have different roles to play to ensure effective teacher performance in class and students’ academic performance in science subjects. It is hoped, that if implemented the recommendations will set the agenda for strengthening the quality and effectiveness of the science teachers in class which may lead to good academic performance of students in science subjects.

Students should collaborate, honour and comply with science teachers. They should know that everything is done in school for their benefit and good performance. They should be open and let teachers know what they do not understand. This helps in improving their attitude towards science subjects. They should also be truthful and inform the administration if a teacher keeps on absenting himself or herself and when the teacher cannot deliver the content well.
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References


