

Examination of Demonstration and Lecture Teaching Methods on Academic Performance of Public Senior High School Students in Financial Accounting in Ghana: Evidence from Nsawam Adoagyiri Municipality

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ABSTRACT

The study was carried out to determine the effectiveness of the lecture methods of teaching on students' academic performance in financial accounting, to explore the relationship between demonstration methods of teaching and students' academic performance in financial accounting and lastly to determine the effect of the demonstration method of teaching on students' academic performance in Financial Accounting in Ghana. The study adopted a quasi-experimental design, specifically, the pre-test, post-test non-equivalent control group. 725 students offering Financial Accounting in senior high schools in Nsawam Adoagyiri municipality formed the population of the study. From the population of the study, 105 students were selected which represent 14.48% of the population as sample using purposive sampling technique. Two senior high schools were purposively selected and randomly assigned to experimental groups and control group. St Martins senior high school, Nsawam senior high School (experimental group) was taught using Demonstration Method and Diaspora senior high School (control group) was taught using conventional Lecture method. The data collection period lasted for four (4) weeks with the use of well-structured questionnaires. A reliability coefficient of 0.83 was obtained. Research questions were answered using mean and standard deviation while the hypothesis was tested using analysis of covariance at 0.05 level of significance. The results of the study revealed that Demonstration method had significant effect on students' performance than lecture method. Among the recommendations made was that, efforts should be intensified by teachers to aggressively adopt Demonstration Method in teaching Financial Accounting.

INTRODUCTION

Background to the study

The curriculum designed for Senior High Schools in Ghana is comprehensive and broad-based, aimed at enhancing students' knowledge and outlook (Attafuah, 2020). Senior high school education has become an

essential part of basic education in a world of global market competition (Ameyaw-Akumfi, 2020). Education at the senior high level offers a lot of courses and financial accounting is one of the selected courses offered at the senior high school. Financial accounting is very important to all human activities especially businesses and industrial activities. Accounting education equips the recipients with saleable skills that prepare them for either teaching accounting subjects or serving accounting teachers, professors and officers in public and private organizations & institutions (Cook & Friend, 2019). Achieving the learning outcomes depends mainly on two things. The most important one is the class teacher's active cooperation with the right application of teaching methods used by accounting teachers. The second one is the appropriate use of quality textbooks and other teaching aids in senior High schools.

Accounting teachers are having a great need to face teaching methods with capabilities to solve the real-world problems. Teaching methods emphasis to give a space for students to discover by themselves instead of being spoon-fed and also develops creativity, foster problem solving and intrinsic motivation (Berkey, 2019). Teachers should use effective teaching methods that best suit specific objectives to facilitate the process of knowledge transmission. This has brought about some problems and challenges confronting the students of accounting subject in the fieldwork. The objective of studying Financial Accounting at the Senior High School involves the establishment of students to appreciate the basic rules, functions and principles of Accounting (Berkey, 2019). Financial Accounting teachers employ various instructional methods in the classroom. Teaching method comprises the principles and methods used for instruction to be implemented by teachers to achieve the desired learning by students. These strategies are determined partly based on subject matter to be taught and partly on the nature of the learner. For a particular teaching method to be appropriate and efficient it has to be in relation to the characteristics of the learner and the type of learning it supposed to bring about (Berkey, 2019).

According to John (2019), the objective of studying Financial Accounting at the senior High school includes the enablement of students to appreciate the basic rules, functions and principles of accounting. These strategies are determined partly based on the subject matter to be taught and partly on the nature of the learner. Many teaching methods and approaches have been in use in the teaching of Financial Accounting such as lectures and discussions among others (Pilato & Ulrich, 2019). The demonstration method involves showing, doing or telling the students the point of emphasis. It is mostly used as a technique within a method of teaching and at times as a method of teaching itself. The role of the teacher is to illustrate how to do something or illustrate a principle first by explaining the nature of the act verbally, followed by demonstrating the act systematically and later the students repeat the act. Here students are involved in doing things that will influence their behavior patterns.

Through demonstrations, students are exposed to physical materials that illustrate some meaning to their cognitive framework. Direct experiences like this go a long way to enriching learning (Dorgu 2020). If the teacher is showing the class how to solve an accounting problem, he would first explain the format to the students, put them through a step-by-step procedure of applying it, tell them why it should be applied and then guide them through the critical and fundamental aspects of the account. The students would therefore play their parts by repeating the performances many times as they put the workings together in proper format using sequence and timing.

Statement of the Problem

The rate of failure in Financial Accounting in senior high schools in Nsawam Adoagyiri municipality was clearly shown in the West African Examinations Council (WAEC) results from 2017 to 2021, where the number of students that passed with distinction and credit grade levels were on the decline from 22.38% in 2017 to 21.57% in 2018, it was 20.48% in 2019, it fell to 19.67% and 19.58% in 2020 and 2021 respectively, while those that had ordinary passes and failure were on the increase (WAEC, 2012). The student's performance was unsatisfactory and this has continued to be a major source of concern to schools,

parents, teachers and public examination bodies. Literature tends to show that, the low level of performance was attributed primarily to poor teaching methods used in imparting knowledge to the students. For instance, Akubia,(2021) attributes poor academic performance of students to a deficiency in teaching methods used by teachers. Probably, the non-use of innovative methods that are problem-solving oriented such as guided discovery, demonstration, problem-solving, and Socratic method are not yet widely recognized and utilized as method of teaching Financial Accounting within Nsawam Adoagyiri municipality. Some of the students complained of not understanding the subject, possibly because of the type of teaching methods used by the teachers. The use of the lecture method may seem to be a contributing factor to the poor performance of students and also at the workplace when eventually such students get employed after graduation (John, 2019). If this study is ignored, the academic performance of students in the subject may persist. The problem of the study is therefore, what is the effect of demonstration and lecture teaching methods on the academic performance of senior high school students in financial accounting in Nsawam Adoagyiri municipality, Ghana.

LITERATURE REVIEW

Conceptual Literature Review

Student Academic Performance

Performance has been defined by Carlson in Kimwelu (2020) as a specific event with its luminous nature for grounded, clearly separated from the rest of life, presented by performers and attended by an audience both of whom regard the experience as made up of material to be interpreted, to be reflected upon, to be engaged in emotionally, mentally, and perhaps even physically However, academic performance can be expressed in form of good scores and prizes as a result of handwork and exceptional performance in the classroom test, assignment and examination (Modundu, 2021). The provisions of the National Policy on Education for Teacher Education include the purpose of teacher education, institutions of training professional teachers and their entry qualifications, the curriculum of Teachers' colleges and the professionalization of teachers.

The provisions of the National policy on Education for Teacher Education includes the purpose of teacher education, institutions of training professional teachers and their entry qualifications, the curriculum of Teachers' colleges and professionalization of teachers. Effective learning in schools would require effective teaching to accompany the efforts of the learners. Teacher competence needs to be very high for meaningful teaching and learning to take place. At the senior high school level where a distinction is made between Junior High School (JHS) and Senior High School (SHS) curricula, teacher competencies for each level and appropriate subject would vary as well.

Teaching Methods

The primary purpose of teaching at any level of education is to bring a fundamental change in the learner (Tebabal & Kahssay, 2018). To facilitate the process of knowledge transmission, teachers should apply appropriate teaching methods that best suit specific objectives and level exit outcomes. In the traditional epoch, many teaching practitioners widely applied teacher-centered methods to impart knowledge to learner's compared to student-centred methods. Until today, questions about the effectiveness of teaching methods on student learning have consistently raised considerable interest in the thematic field of educational research (Hightower, 2021). Moreover, research on teaching and learning constantly endeavours to examine the extent to which different teaching methods enhance growth in student learning. Quite remarkably, regular poor academic performance by the majority of students is fundamentally linked to the application of ineffective teaching methods by teachers to impart knowledge to learners (Adunola, 2021). Substantial research on the effectiveness of teaching methods indicates that the quality of teaching is often reflected by the achievements of learners. According to Ayeni (2021), teaching is a process that involves

bringing about desirable changes in learners to achieve specific outcomes. For the method used for teaching to be effective, Adunola (2021) maintains that teachers need to be conversant with numerous teaching strategies that take recognition of the magnitude of the complexity of the concepts to be covered.

To achieve quality in education output, the process and the input strategies need to be improved to give the desired result. The process and the input strategies exist in the teaching and learning stages where teachers are expected to impact positively into learners.

Learner (Student) Centered Method

With the advent of the concept of discovery learning, many scholars today widely adopt more student-centered methods to enhance active learning (Greitzer, 2019). Most teachers today apply the student-centered approach to promote interest, analytical research, critical thinking and enjoyment among students (Jacobson & Kauchak 2019). The teaching method is regarded more effective since it does not centralize the flow of knowledge from the lecturer to the student (Lindquist, 2019). The approach also motivates goal-orientated behaviour among students; hence the method is very effective in improving student achievement (Slavin, 2019).

This is a type of method where learners are more active than the teacher. In the use of this method, the learner is placed at the Centre of the educational process. With the advent of the concept of discovery learning, many scholars today widely adopt more student-centred methods to enhance active learning (Greitzer, 2019). Most teachers today apply the student-centred approach to promote interest, analytical; research; critical thinking and enjoyment among students (Jacobson & Kauchak 2019).

Demonstration Method

Demonstration is a practical display or exhibition of a process and services to show or point out the fundamental principles involved (Musa, (2019). Teaching by demonstration is a useful tool available to teachers and plays an important part in the teaching of skills; however, for a demonstration to be effective it should immediately be followed with a practical session to reinforce procedures (Kimwere, 2020). This refers to the type of teaching method in which the teacher is the principal actor while the learners watch to act later. The teacher does whatever the learners are expected to do at the end of the lesson by showing them how to do it and explaining the step-by-step process to them (Ameh, & Akins, 2019)

Lecture Method

This teaching method applies the strategies used by both teacher-centred and student-centered approaches. The subject information produced by the learners is remembered better than the same information presented to the learners by the lecturer (Ayeni, 2021). The method encourages the student to search for relevant knowledge rather than the lecturer monopolizing the transmission of information to the learners.

Theoretical Framework

Theoretical Framework

Theories are formulated to explain, predict and understand phenomena and, in many cases, to challenge and extend existing knowledge within the limits of critical bounding assumptions (Swanson, 2019). The theoretical framework is the structure that can hold or support a theory of a research study. The theoretical framework introduces and describes the theory that explains why the research problem under study exists (Swanson. 2019). A theoretical framework is a collection of interrelated concepts, like a theory but not necessarily so well worked out. A theoretical framework guides the research, determining what is to be measured and what statistical relationships are to be looked out for (Swanson, 2019). The theoretical framework for this study covers the effect of teaching methods in accounting on the academic performance

of students. It also takes into consideration the learning environment and its effect on students learning. Successful blending of the attributes of effective teaching in the classroom enhances students learning and also increases their interest in learning. The most desirable aspects of face-to-face teaching are how these aspects can be appropriately integrated to effect learning.

As given away by Ayeni (2021), teaching is a continuous process that involves bringing about desirable changes in learners through use of appropriate methods. Adunola (2021) indicated that to bring desirable changes in students, teaching methods used by educators should be best for the subject matter.

As such, alignment of teaching methods with students' needs and preferred learning influence students' academic attainments (Zeeb, 2020). In senior High schools in Ghana, mainly teacher-centered methods and student-centered methods are being used by teachers for accounting subject although some prefer using the teacher center method like lecture and student-centered method like group discussion. The lecture method is necessary quite economical and especially in handling large classes. This could account for its preference by some accounting teachers. According to Wright (2007) the student-centered methods is an instructional teaching method in which students influence the content, activities, materials, generic skills and peace of effective learning.

Empirical Framework

Effective learning in schools would require effective teaching to accompany the efforts of the learners. Teacher competence needs to be very high for meaningful teaching and learning to take place (Segun, 2020). At the senior high school level where a distinction is made between junior high School (JHS) and Senior high School (SHS) curricula, teacher competencies for each level and appropriate subject would vary as well. To ascertain what these competencies are, the JhS and ShS programs need to be examined in the context of the preparation of the teachers who would implement these programs. Their competencies must therefore relate to academic and professional preparation, professional growth, classroom interaction and evaluation Macaulay, (2019). The professional accounting teacher is expected to possess certain competencies both professional and personal. Professional competencies are both academic and pedagogical. Academic competencies are the teachers' knowledge of his subject. Pedagogical competency is the art of teaching the subject, observing such principles as teaching from known to unknown, concrete to abstract and from simple to complex (Akpan, 2022).

The accounting teacher's success in the classroom depends very much on his preparedness for the instruction process. It has been observed that most of the present accounting teachers in senior high schools are not professional accounting teachers nor have they even undergone a teacher training program. Secondary education has become very pertinent and imperative in a world of global market competition. Accounting is very important to all human activities especially business and industrial activities. Today it is also both as vital practice and profession in the economic development of the world. Accounting education equips the recipients with saleable skills that prepare them for either teaching accounting subject or serving accounting teachers, professors and officers in public and private organizations & institutions Adunola, (2021). Through proper implementation of the accounting curriculum to ensure learning i.e., achieving the learning outcomes depends mainly on two things. The most important one is the class teacher's active cooperation. It is the right application of teaching methods used by accounting teachers. The second one is the appropriate use of quality textbooks and other teaching aids in secondary schools. Effective teaching methods should be ensured particularly that accounting teachers engage all students in business studies groups to participate in teaching-learning of accounting subjects at the secondary level. Accounting teachers have a great need to face teaching methods with capabilities to solve real-world problems. Teaching methods emphasis to give a space for students to discover by themselves instead of being spoon-fed and also develops creativity, foster problem solving and intrinsic motivation³. Teachers should use effective teaching methods that best suit specific objectives and level exit outcomes to facilitate the process of knowledge

transmission⁴. This has brought about some problems and challenges confronting the students of accounting subject in the fieldwork. Teachers take place their own pedagogy, style and nature of students deciding to need flexible and willing to adjustability Adunola,(2021).

Accounting adopts must need to consider the students’ background, knowledge, environment and learning. Sometimes, those who teach accounting are graduates from the universities and of course, many of these teachers are not education graduates (Akpan, 2022). It is to be noted that the teacher is the main aid to learning, his methods, styles and techniques being additional aids. Where a teacher is deficient in a particular topic, the tendency is to dodge the areas of deficiency while the learner is bound to suffer; Keegan (2021) affirmed that a beautiful building and expensive equipment, stocked in, will not lead to effective learning without the qualified teacher putting them into use and making students to participate in the experimental procedures. What is then needed to be a competent accounting teacher? A competent accounting teacher is a person who is professionally qualified and trained to teach accounting, having the necessary qualities or skills and showing adequate skills in the teaching process, (Osaat, 2019).

Conceptual Framework

A conceptual framework explains either graphically or in narrative form, the main things to be studied, such as, the key factors: constructs or variables of a social research and the presumed relationships among them (Miles & Huberman 2019). Frameworks can be rudimentary or elaborate and theory-driven or of ordinary description of any event or causes of any event. A conceptual framework specifies who and what will or will not be studied.

According to Ravitch and Riggan (2019), a conceptual framework is an argument about why the topic one wishes to study matters, and why the means proposed to study it are appropriate and necessary. A conceptual framework is also an analytical tool that expresses various views about issues within particular contexts. Often effective conceptual frameworks would portray real situations and show them in such a way as to make them easy to remember and apply (Ravitch & Riggan 2019). Conceptual frameworks may be abstract representations, connected to a research project’s goals that direct the corrections and analysis of data. Rangarajan (2019), defines conceptual framework as the way ideas are organised to achieve a research project purpose.

Diagrammatic presentation of the conceptual framework

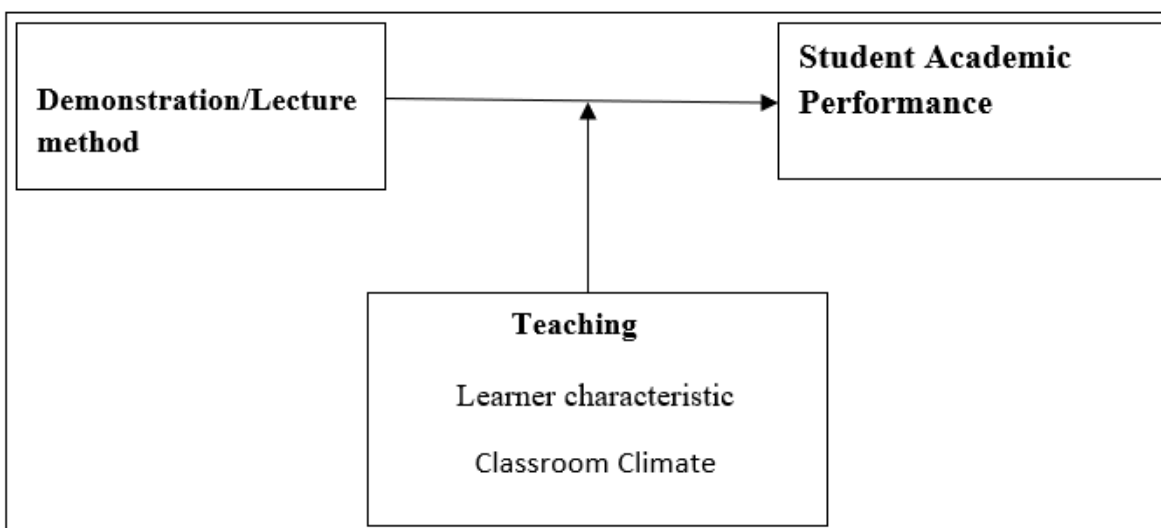


Figure 2.1: Conceptual framework showing the relationship between Demonstration/Lecture teaching methods on students’ academic performance

As given away by Sequeira (2012), teaching consists of set of events, outside the learners which are designed to support internal process of learning. The teacher's role is therefore characterized by the traditional role which is teacher centered and modern role which has the teacher as a facilitator and is student centered. Figure 2.1 explains teaching as the process whereby teachers make use of the content in relationship with classroom climate.

METHODOLOGY

Research Design

Research design describes what a researcher is writing on, thus the operational implications to the final analyses of the data (Akubia, 2021). Furthermore to this, it describes how the study would be conducted. It identifies the methods suitable for the study and explains the rationale for the study chosen. It also points out stages for which the researcher would follow (Gerald, 2019). This study adopted the quasi-experimental research, specifically the non-randomized control group, and the experimental group was adopted. A quasi-experimental design follows the general procedures of experimental research without the use of a control group or without random assignment. Random assignment or use of a control group is often not practicable in an educational setting.

By definition it lacks random assignment Enemali (2020). The Quasi-experimental designs were chosen for this study to identify a comparison group that is as similar as possible to the treatment group in terms of baseline characteristics. The quasi-experimental design was chosen to test the causal consequences of long-lasting treatments outside of the laboratory and also to determine what is best for the population. It gives the researcher the power over the variables by being able to control them.

The experimental treatment adopted in this study is a type of research that usually has a sample of subjects selected randomly in two groups called the experimental group and the control group: The two groups (Experimental and control) are then assessed and evaluated to determine the effect of the of the treatment. For instance, if the researcher randomly assigns 40 Financial accounting students to two groups to constitute the experimental and the control groups. One group becomes the experimental group and the other becomes the control group. The experimental group is given an experiment treatment which may be new teaching approach, counselling strategy or new studying habits. The treatment will be preceded by an experiment for both groups. Both groups and any effect that is observed could be attributed to the treatment given.

Population

The population for this study was based on Senior High School students from the Nsawam Adoagyiri Municipality specifically Nsawam senior high school and St Martin senior high school. The students fall under the Business, departments. 725 students offering Financial Accounting in senior high schools in Nsawam adoagyiri municipality formed the population of the study.

Sample and Sampling Technique

A sample on the other hand may be defined as the segment of the population that is selected for investigation. It is a subset of the population (Richard, 2019). Purposive sampling technique was used to select 100 Financial Accounting students from two senior high schools in Nsawam Adoagyiri, municipality. Purposive sampling enables the researcher to squeeze a lot of information out of the data that they have collected.

This allows researchers to describe the major impact their findings have on the population (Richard, 2019).

The schools are Nsawam senior high school, St Martin senior high school experimental group one and Diaspora senior high school control group. A survey of co-educational public senior high schools was carried out to identify schools that have an intact Financial Accounting class and are equivalent in terms of provision of facilities and are all funded by the Government. Only schools that have at least one graduate Financial Accounting teacher with relevant professional teaching qualifications was chosen.

Chosen schools were randomly assigned to experimental and control groups while students in the sampled schools remained in their intact classes. In order to give the schools equal chance of being in any group, the researcher wrote the names of the three schools on each of the three pieces of paper which was folded and mixed thoroughly in a hat. These pieces of papers were shuffled after which it was picked for each group.

Data Collection Instrument

The researcher employed questionnaires to collect information from students and teachers from the business department. A questionnaire is a research instrument that is used by researchers to collect information from the respondents (Miles, 2021). It consists of a series of questions that help researchers to learn what a respondent thinks or what is his opinion on the topic on which the questions are asked. A questionnaire must exhibit uniformity; it must be exploratory and easy to understand. They can be conducted on telephone, face-to-face, by sending through email or post. Collecting information using questionnaires is one of the most inexpensive, efficient, and fast ways. The data collected using the questionnaire is relatively detailed and sorted as compared to the other methods of gathering information. Moreover, the data can be obtained from a large group of people.

Data Analysis

Descriptive statistics such as percentages and tables were used in the analysis. Inferential statistics, mainly regression analysis, were used to analyse the effect of demonstration/lecture teaching method in accounting on students' academic performance. The software used for the analysis of the study is Statistical Package for Social Sciences (SPSS) version 20.

RESULTS AND DISCUSSIONS

Analysis of Data to Answer the Research Questions

The data to answer the research questions of the study were analyzed and the results are presented in Tables 1 to 5 as follows:

Analysis of Demographic Data

The demographic variables for the study were analyzed in table 1 below:

Table 1: Percentages distribution of students according to the grouping

Group	Frequency	Percentage (%)
Experimental Group	60	60%
Control Group	40	40%
Total	100	100%

Source: Field experiment, 2024

The data presented in Table 1 revealed that there are 60 students representing 60% in experimental group

(Demonstration method group), 40 students representing 40% in the Control group (Lecture method group). This indicated that there are more students in experimental group than the control group.

Relationship between demonstration method and students' academic performance

To answer this question, scores of students obtained from financial accounting achievement test including both the pre-test and post-test were analyzed using mean and standard deviation as shown in Table 2 below.

Table 2: Mean of pre-test and post-test scores of treatment group two taught

Group	N	Mean	SD
Pre-Test	50	44.39	7.64
Post Test	50	67.56	8.55
Mean & SD difference		23.17	0.91

Source: Field experiment, 2024

The data presented in Table 2 showed that the treatment group two who were taught financial Accounting using demonstration method had a mean score of 44.39 and standard deviation of 7.64 (mean = 44.39; SD = 7.64) in the pretest and mean score of 67.56 And standard deviation of 8.55 (mean= 67.56; SD = 8.55) in the post test, giving a pre-test post-test mean gain in the treatment group two who were taught Financial Accounting with demonstration method to be 23.17. The low standard deviation difference (0.91) showed that the scores of students in both the pre-test and post-test did not differ in the way in which they are clustered around their respective mean scores. With this result, students' performance in Financial Accounting has improved which indicated that demonstration method is more effective in teaching Financial Accounting.

Effect of treatment of lecture method on academic performance

To answer this question, scores of students obtained from financial accounting achievement test including both the pre-test and post-test were analyzed using mean and standard deviation as shown in Table 3.

Table 3: Mean of pre-test and post-test scores of control group taught Financial Accounting using lecture method

Group	N	Mean	SD
Pre-Test	60	42.80	9.49
Post-Test	40	50.30	8.36
Mean difference		7.50	1.13

Source: Field experiment, 2024

The data presented in Table 4 revealed that the control group who were taught Financial Accounting with lecture method had a mean score of 42.80 and standard deviation of 9.49 (mean= 42.80; SD = 9.49) in the pre-test and a mean score of 50.30 and standard deviation of 8.36 (mean = 50.30; SD = 8.36) in the post-test, giving a pre-test post-test mean gain in the control group taught with traditional lecture method of 7.50. Also, the low standard deviation difference (1.13) showed that the scores of students in both the pre-test and post-test did not differ in the way in which they are clustered around their respective mean scores. This

result indicated that the lecture method has fairly improved students' academic performance in Financial Accounting.

The relationship between demonstration method of teaching and students' academic performance in financial accounting.

To answer this question, scores of students obtained from financial accounting achievement test including both the pre-test and post-test were analyzed using mean and standard deviation as shown in Table 4.

Table 4: Estimated marginal means of both the treatment and control groups

Group	N	Mean	SD
Pre-Test	60	62.80	1.393
Post-Test	40	30.30	7.36
Mean difference		9.50	2.14

Source: Field experiment, 2024

The data presented in Table 4 revealed that the control group who were taught Financial Accounting with teacher to student interactive method had a mean score of 62.80 and standard deviation of 1.393 (mean= 62.80; SD = 1.393) in the post-test, giving a pre-test post-test mean gain in the control group taught with teacher to student interactive method of 9.50. Also, the low standard deviation difference (2.14) showed that the scores of students in both the pre-test and post-test did not differ in the way in which they are clustered around their respective mean scores. This result indicated that teacher to students' interactive method has also fairly improved students' academic performance in Financial Accounting

Table 5: Estimated marginal means of both the treatment and control groups

Group	Mean	Standard Error
Treatment	67.61	1.395
Control	50.22	1.386

Source: Field experiment, 2024

The data in Table 5 showed the estimated marginal means for the two groups, i.e. the adjusted mean after the covariance. The table revealed that the participants in experimental group performed better than their counterparts in control group because they had the highest adjusted post mean score (mean = 67.61) as against the adjusted posttest mean score of the control group (mean = 50.22). The implication here is that teaching with demonstration method, lecture method and the teacher to student's interactive method is effective in improving the academic performance of senior High school students in Financial Accounting. Based on the analysis, when these three methods are inculcated in teaching Financial Accounting, students' academic performance will be more efficient and effective or highly improve.

DISCUSSION OF FINDINGS

Discussion of Findings

The analysis of research question one revealed that the control group who were taught Financial Accounting with lecture method had a mean score of 42.80 and standard deviation of 9.49 (mean= 42.80; SD = 9.49) in the pre-test and a mean score of 50.30 and standard deviation of 8.36 (mean = 50.30; SD = 8.36) in the post-

test, giving a pre-test posttest mean gain in the control group taught with traditional lecture method of 7.50. Also, the low standard deviation difference (1.13) showed that the scores of students in both the pre-test and post-test did not differ in the way in which they are clustered around their respective mean scores. This result indicated that the lecture method has fairly improved students' academic performance in Financial Accounting.

Furtherance to this, research question two also revealed that, teaching with demonstration method has significant positive impact on the academic performance of senior High school students in Financial Accounting as the post test result was higher than the pretest result giving a pre-test post-test mean gain in the treatment group two of 7.50. the analysis found out that demonstration method is the most effective method of teaching Financial Accounting in Senior High schools. Research question three also revealed that that the control group who were taught Financial Accounting with teacher to student interactive method had a mean score of 62.80 and standard deviation of 1.393 (mean= 62.80; SD = 1.393) in the post-test, giving a pre-test post-test mean gain in the control group taught with teacher to student interactive method of 9.50. Also, the low standard deviation difference (2.14) showed that the scores of students in both the pre-test and post-test did not differ in the way in which they are clustered around their respective mean scores. This result indicated that teacher to student's interactive method has also fairly improved students' academic performance in Financial Accounting.

The analysis in Table one (1) was about the demographic data of the respondents. It revealed that that there are 40 students representing 40% in experimental group (Demonstration method group), 60 students representing 60% in Control group (Lecture method group). This indicated that there are more students in experimental group than the control group. Table 2 showed that the treatment group two who were taught financial Accounting using demonstration method had a mean score of 44.39 and standard deviation of 7.64 (mean = 44.39; SD = 7.64) in the pretest and mean score of 67.56 And standard deviation of 8.55 (mean= 67.56; SD = 8.55). The low standard deviation difference (0.91) showed that the scores of students in both the pre-test and post-test did not differ in the way in which they are clustered around their respective mean scores. With this result, students' performance in Financial Accounting has improved which indicated that demonstration method is more effective in teaching Financial Accounting.

Table 3 revealed that the control group who were taught Financial Accounting with lecture method had a mean score of 42.80 and standard deviation of 9.49 (mean= 42.80; SD = 9.49) in the pre-test and a mean score of 50.30 and standard deviation of 8.36 (mean = 50.30; SD = 8.36) in the post-test, giving a pre-test post-test mean gain in the control group taught with traditional lecture method of 7.50. Also, the low standard deviation difference (1.13) showed that the scores of students in both the pre-test and post-test did not differ in the way in which they are clustered around their respective mean scores. This result indicated that the lecture method has fairly improved students' academic performance in Financial Accounting. Table 4 revealed that the control group who were taught Financial Accounting with teacher to student interactive method had a mean score of 62.80 and standard deviation of 1.393 (mean= 62.80; SD = 1.393) in the post-test, giving a pre-test post-test mean gain in the control group taught with teacher to student interactive method obtain 9.50.

Also, the low standard deviation difference (2.14) showed that the scores of students in both the pre-test and post-test did not differ in the way in which they were clustered around their respective mean scores. This result indicated that teacher-to-student interactive method has also fairly improved students' academic performance in Financial Accounting. Table 5 showed the estimated marginal means for the two groups, i.e. the adjusted mean after the covariance. The table revealed that the participants in experimental group performed better than their counterparts in control group because they had the highest adjusted post mean score (mean = 67.61) as against the adjusted posttest mean score of the control group (mean = 50.22). The implication here is that teaching with demonstration method, lecture method and the teacher to student's

interactive method is effective in improving the academic performance of senior High school students in Financial Accounting. Based on the analysis, when these three methods are inculcated in teaching Financial Accounting, students' academic performance will be more efficient and effective or highly improve.

This corroborated the findings of Musa (2015) who stated that demonstration method was better than the conventional lecture method in improving students' performance in Financial Accounting. This is also supported by the findings of Mohammed, Ladu, and Bala (2016) which reported that demonstration and lecture methods as well as the teacher to students' interactive method in learning concepts in accounting among senior High school students were effective. When the three methods were compared, demonstration method was more effective than lecture method and teacher to students' interactive method. This was supported by Omwoyo (2010) who stated that demonstration as a teaching method combines telling, showing and doing for the benefit of the students.

The implication therefore is that, the lecture method that is predominantly used in teaching Financial Accounting is not as effective as the other methods. Therefore, if lecture method alone is relied upon instead of incorporating demonstration method and teacher to student interactive method in teaching Financial Accounting, improvement in students' performance in external examinations would be difficult. This will also negatively affect students at the work place when eventually such students get employed after graduation. The intellectual competence of the teacher is a primary asset in the quality of learning than what the students acquire in schools. An accounting teacher competent in his work possessing the qualities which enable him to inspire and develop the latent capacities of his students would automatically contribute immensely to the high academic performance of the students in accounting. Also, teachers' competence in terms of resourcefulness, effective teaching skills and good evaluation enhance students' performance. Furtherance to this, Teaching methods emphasis to give a space for students to discover by themselves instead of being spoon-fed and also develops creativity, foster problem solving and intrinsic motivation.

SUMMARY OF FINDINGS, CONCLUSIONS AND RECOMMENDATIONS

Summary

Summary of findings

Base on the analysis of the study and the discussion of the results it was realized that teaching with demonstration method has significant positive effect on the academic performance of senior high school students in Financial Accounting as the post test result was higher than the pretest result giving a pre-test post-test mean gain in the treatment group two taught Financial Accounting with demonstration method to be 23.17 The analysis further revealed that the convectional lecture method has a slight effect on students' academic performance. Participants in experimental group two (Demonstration method) performed better than their counterparts in lecture method because they had the highest adjusted post mean score. The students score in the experimental group improved drastically as a result of the demonstration method used in teaching them.

This corroborated the findings of Musa (2015) who stated that demonstration method was better than the conventional lecture method in improving students' performance in Financial Accounting. This is also supported by the findings of Mohammed, Ladu, and Bala (2016) which reported that demonstration and lecture methods as well as the teacher to students' interactive method in learning concepts in accounting among senior High school students were effective. When the three methods were compared, demonstration method was more effective than lecture method and teacher to students' interactive method. This was supported by Omwoyo (2020) who stated that demonstration as a teaching method combines telling, showing and doing for the benefit of the students. The implication therefore is that, the lecture method that is predominantly used in teaching Financial Accounting is not as effective as the other methods. Therefore,

if lecture method alone is relied upon instead of incorporating demonstration method and teacher to student interactive method in teaching Financial Accounting, improvement in students' performance in external examinations would be difficult.

Conclusion

The aim of the study was to examine the effect of teaching methods in accounting on students' academic performance in senior High schools. Consequent to the findings from this study, it is hereby concluded that:

There exists a significant relationship between lecture method and student academic performance. There is a strong relationship between the demonstration method of teaching and students' academic performance in accounting. There also exists a relationship between teacher-to-student interactive methods and students' academic performance.

Recommendations

Based on the various objectives of the study the following recommendations are made:

Specifically, the study sought to:

- Examine the efficiency of the lecture methods of teaching on students' academic performance in financial accounting.

Financial Accounting teachers should be encouraged on the use of traditional lecture method in improving students' academic performance.

- Explore the connection between demonstration methods of teaching on students' academic performance in financial accounting.

Financial Accounting teachers should be encouraged to use the demonstration Method in Teaching in Senior high Schools since it improves students' academic performance as compared to the conventional lecture method.

REFERENCES

1. Adunola, O. (2021). The impact of teachers' teaching methods on the academic performance of primary school pupils in Ijebu-Ode Local cut Area of Ogun State. Ego Booster Books, Ogun State, Nigeria.
2. Akoh & Musah. (2021). Teaching methods as correlate of student performance in business studies in selected public secondary schools in Port Harcourt. *International Journal of Innovative Social & Science Education Research*, 7(2), 1-12.
3. Akpan, (2022). University lecturers' perception of entrepreneurship education as an empowerment strategy for graduate self-employment in South-South Nigeria. *International Journal of Asian Social Science*, 3(5), 1180-1195.
4. Akubia, L. (2021). The effect of motivation on the performance of teachers in Ghana Education Service [A case study of Obuasi Municipality] (Doctoral dissertation).
5. Ameh, I. E., Daniel B. P., & Akins, Y. (2017). *Research and methods in the social sciences*. Ankpa: Rowis Press.
6. Ameyaw-Akumfi, (2020). The promotion of science education in Ghana. A paper delivered by Prof. Christopher Ameyaw Akumfi, Minister of Ports, Harbour and Railway at the first National Forum on Harnessing Research, Science and Technology for Sustainable Development in Ghana, held at the Accra International Conference Centre 15-1

7. Attafuah, P. (2020) The status of the Fast feedback method in the classroom and its effect on students' learning.
8. Ayeni, (2021). teachers' professional development and quality assurance in nigerian secondary schools. *world journal of education*, 1(2):143-149.
9. Berkey, T. (2019). *Improving Your Daily Practice: A Guide for Effective School Leadership*. Larchmont: Eye on Education.
10. Boadu, G. (2019). Teachers' perceptions of the problems faced in the teaching of History in senior high schools. *Journal of Arts and Humanities*, 5(7), 38-48.
11. Borrington, K. (2020). *Teaching and assessing skills in business studies*. Cambridge University Press.
12. Bharadwaj, R., & Pal. (2021). Effective teaching methods as correlate of student academic performance
13. Cook & Friend (2019). Principles for the practice of collaboration in schools. *Preventing School Failure*, 35(4), 6-9.
14. Dorgu, T. E. (2015). Different teaching methods: A panacea for effective curriculum implementation in the classroom. *International Journal of Secondary Education*. Special Issue: Teaching Methods and Learning Styles in Education. 3. 6-1.
15. Enemali, J.D. (2020). *Education and training for industrialization: Edo state*: Stirling-Horden Publishers
16. Fook, C. Y., & Sidhu, G. K. (2015). Investigating learning challenges faced by students in higher education. *Procedia-social and behavioral sciences*, 186, 604-612.
17. Gerald F. (2019) Why do we still have journals? *Administrative Science Quarterly* 59(2), 193-201
18. Gretzer,. (2019). A critical analysis of the interpretation of biochemical failure in surgically treated patients using the American Society for Therapeutic Radiation and Oncology criteria. *The Journal of urology*, 168(4 Part 1), 1419-1422.
19. Hightower, M. B. (2021). Why education researchers should take school food seriously. *Educational researcher*, 40(1), 15-21.
20. Jacobson & Kauchak. (2019). Teaching methods as correlate of student performance in business studies in selected public secondary schools in Port Harcourt. *International Journal of Innovative Social & Science Education Research*, 7(2), 1-12.
21. John. (2019). *Evidence-based education policy: What evidence? What basis? Whose policy?* (Vol. 6). John Wiley & Sons.
22. Keegan, C. (2021). *Education and Arts Participation: A Study of Arts Socialization and Current Arts-Related Activities Using 1982 and 1992 SPPA Data*.
23. Kimwele, (2020). A Kenyan perspective on the use of animals in science education and scientific research in Africa and prospects for improvement. *Pan African Medical Journal*, 9(1).
24. Kimwelu. (2019). Teaching methods as correlate of student performance in business studies in selected public secondary schools in Port Harcourt. *International Journal of Innovative Social & Science Education Research*, 7(2), 1-12.
25. Kimweri,. (2020). Determinants of perceived quality of obstetric care in rural Tanzania: a cross-sectional study. *BMC health services research*, 14(1), 1-9.
26. Laddunuri, M. M. (2019). Status of school education in present Tanzania and emerging issues. *International Journal of Educational Research and Technology*, 3(1), 15-20.
27. Linquist, (2019). Suzuki-type cross coupling reactions using palladium-water soluble catalyst. Synthesis of functionalized dienes. *Tetrahedron letters*, 36(9), 1443-1446.
28. MacAuley, L. E. (2019). *A mixed methods study of on-farm apprenticeship learning in Virginia* (Doctoral dissertation, Virginia Tech).
29. Miles, M. B., & Huberman, A. M. (2021). *Qualitative data analysis: An expanded sourcebook*. Sage
30. Mundi. (2019). Demonstration methods as correlate of student performance in business studies in selected public secondary schools in Port Harcourt. *International Journal of Innovative Social & Science Education Research*, 7(2), 1-12.
31. Modundu. (2021). Socratic methods as correlate of student performance in business studies in selected

- public secondary schools in Port Harcourt. *International Journal of Innovative Social & Science Education Research*, 7(2), 1-12.
32. Musa, O.S. (2021). Effect of demonstration and assignment methods on students' performance in Financial Accounting in Federal Government Colleges in Kaduna State, Nigeria. Unpublished M.Ed Project. Department of Vocational Teacher Education, A.B.U. Zaria.
 33. Odeh & Akoh (2019). Teaching methods as correlate of student performance in business studies in selected public secondary schools in Port Harcourt. *International Journal of Innovative Social*
 34. Omwoyo, L. (2020). Primary social studies standard four secondary schools. Nyanza province. Nairobi. Kenya Literature Bureau.
 35. Pilato, B. & Ulrich M.M. (2019). Is the Case Study Method an Effective Pedagogical Method for Students to Learn the Fundamentals of Financial Accounting? *Proceedings of ASBBS*; 21
 36. Richard. (2019). Evidence-based education policy: What evidence? What basis? Whose policy? (Vol. 6). John Wiley & Sons.
 37. Rangarajan, S. (2019). Urinary sodium and potassium excretion, mortality, and cardiovascular events. *New England Journal of Medicine*, 371(7), 612-623.
 38. Ravitch, S. M., & Riggan, M. (2019). Conceptual frameworks and the analysis of data. *Reason & rigor: How conceptual frameworks guide research*, 81-106.
 39. Segun, A. (2020). Universal Basic Education: Primary education and the Problem of qualified Teachers in planning and Implementation of Universal Basic Education in.
 40. Slavin, R. E. (2019). Research on cooperative learning and achievement: What we know, what we need to know. *Contemporary educational psychology*, 21(1), 43-69.
 41. Swanson, R. A. (2019). *Theory building in applied disciplines*. San Fransisco, CA Berrett-Koehler
 42. Tebabal, A., & Kahssay, G. (2018). The effects of student-centered approach in improving students' graphical interpretation skills and conceptual understanding of kinematical motion. *Latin-American Journal of Physics Education*, 5(2), 9.
 43. West African Examination council, (2012). Percentage Performance of Candidates in Twenty Popular Subjects in West African Senior School Certificate Examination (WASSCE)
 44. Zeeb, M. S. (2020). Improving student success through matching learning and teaching styles. An Unpublished Master of Arts in Education (M. A (Ed)) Project, University of Phoenix, Tempe,