



# INQUIRY-BASED AND DEMONSTRATION METHODS OF TEACHING ON STUDENTS' ACADEMIC PERFORMANCE IN FINANCIAL ACCOUNTING

IN PUBLIC SECONDARY SCHOOL IN AKWA IBOM NORTH-EAST  
SENATORIAL DISTRICT, NIGERIA

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## ABSTRACT

*The study investigated the effects of inquiry-based and demonstration teaching methods on students' academic performance in Financial Accounting in Public Secondary Schools in Akwa Ibom North-East Senatorial District. Two research questions and two hypotheses guided the study. The study adopted quasi-experimental design (pre-test-post-test non-equivalent group design). The population of the study comprised 2,236 senior secondary two (SS2) students offering Financial Accounting in 86 public secondary schools in Akwa Ibom North-East Senatorial District. A sample size of 200 respondents was used for the study. Census sampling technique was used in selecting the sample. To determine the reliability of instrument Financial Accounting Performance Test (FAPT), the researcher administered the instrument to 20 SS2 students who were selected from the population of the study but were not sampled. The scores of test-retest obtained from the respondents were analyzed using Pearson Product Moment Correlation (PPMC). A reliability coefficient of 0.88 was obtained which makes the instrument reliable for use in the study. Financial Accounting Performance Test (FAPT) was used for data gathering. Mean and standard deviation were used in answering the research questions whereas Analysis of Covariance (ANCOVA) was used in testing the hypotheses at 0.05 level of significance. The findings revealed that, there is significant difference in academic performance of students in Financial Accounting taught using inquiry-based and demonstration teaching methods in Public Secondary Schools in Akwa Ibom North-East Senatorial District. It was concluded that inquiry-based teaching method significantly improved students' understanding and application of accounting principles. It was recommended among others that Government through the Ministry of Education should encourage schools to embrace inquiry-based teaching strategies by way of providing the platform, resources, and training necessary for teachers to use these strategies effectively in Financial Accounting instruction.*

## Introduction

Financial Accounting is one of the vocational subjects taught in senior secondary schools. It is a systematic act of reading, classifying, selecting, measuring and interpreting financial data which enables the users to make decision. The aim is to provide appropriate knowledge, skills, abilities and competencies necessary for students to study higher and contribute meaningfully to the development of a nation and dynamic business environment. The Federal Republic of Nigeria



(2013) stated that the broad goal of secondary school education (also referred to as post basic education) is to prepare individuals for useful living within the society and higher education. To achieve this objective, at the Junior Secondary School, Bookkeeping (Prevocational subject) is taught as a component of Business Studies to prepare the students towards the choice of any of the business studies components including Financial Accounting at the senior secondary level.

Teaching methods are the various ways in which the teacher presents the lessons to the learners and engages them in learning the curriculum contents (Ogwo and Oranu, 2016). Teaching methods can also be seen as the various processes and strategies adopted and used by the teachers to present the skills, knowledge and appreciations to the learners in the classroom to facilitate their learning of the curriculum contents. There are several teaching methods used in the teaching of Financial Accounting at the secondary school level. These include, among several others, the lecture method, project method, discussion and demonstration method.

Eze *et al.*; (2016) noted that the teaching method adopted by the teacher affects the students' academic performance to a large extent. This source noted that the traditional methods of teaching Financial Accounting such as lecture seems inadequate to encourage the students to develop a wide range of knowledge and skills that will make them gain and sustain employment. As the number of topics that need to be covered in Financial Accounting continue to increase, the traditional methods of instruction seem to fall short of achieving the intended objectives, hence, the continuous poor examination results.

Inquiry-based teaching Method is a method of teaching where the learner is seeking to discover and create answers to recognized problems through procedure of making a diligent search, some time with minimum guidance from the teacher (Callahan, *et al.*, 2015). Inquiry teaching method is also a term used in science teaching that refers to a way of questioning, seeking knowledge or information or finding out about phenomena, it involves investigating data and arriving at a conclusion (Sola and Ojo 2017). In inquiry situation students learn not only concept but also self-direction, responsibility and social communication. It also permits students to assimilate and accommodate information. According to Sola and Ojo (2017), inquiry is a way people learn when they are left alone. Chukwudebem (2019) defined inquiry-based teaching method as a type of learning in which students attempt to uncover and produce answers to recognized problems through a process of attentive searching, often with limited teacher direction. In inquiry-based teaching method, a process of asking, exploring knowledge or information, and studying phenomena is used in financial accounting.

Demonstration involves showing, doing and telling the learners' the points of emphasis. It is mostly used within a method of teaching and sometimes as a method by itself. It is used as an exhibition lesson, more so, to show parts or correct use of equipment (Nwanekezi and Ugonwa 2021). Demonstration as a teaching method is an instructional method that has its link between explanation and practice, where the teacher demonstrates learning activity while the learners. The teacher demonstrates a procedure with clarification where necessary and then learners observe and then repeat theirs. Demonstration method is one of the best methods for teaching sciences as it heightens the development of skills and adeptness in carrying out some distinctive experiment. It also facilitates skill acquisition and leads to in-depth understanding.

Academic performance is the measurement of students' achievement across various academic subjects. Teachers and educators typically measure academic success and achievement using classroom performance, results of standardized test and graduation rate. Students' academic performance tends to show the efficacy or otherwise of schools and tends to determine the future



of students. Academic performance could be high, average or low/poor. Eze, *et al* (2016) described poor academic performance as any performance that falls below a desired standard. Eze, *et al.*, (2016) and Akpan and Caleb (2016) opined that students' academic performance in various vocational subjects could be affected by the teaching method used and financial accounting is not excluded. However, Financial accounting covers different topics, but this study considers only two topics that are relevant to the study. These are cash book and trial balance.

A cash book is a book of account which consists of all the cash transactions of the business. In general, it is considered as a book of original entry as well as final entry as it serves twin roles of a ledger as well as journal. The cashbook is a very useful document, as it contains information that can help managers ascertain the cash receipts and payments for a particular period, ensures the accuracy of cash and detection of misuse or misappropriation of cash (Amos (2017). Cashbook is a book that shows the receipts and payment of money in cash or cheque in a chronological order of dates with explanations and balance drawn at the end of the day or a particular period. The cashbook is of two types namely general cashbook and petty cashbook.

Trial balance is a statement extracted from ledgers showing a list of balances to test the arithmetical accuracy of accounts. It helps create trends as regards the financial performance which is very helpful in budgeting processes. Frank and Omuya (2018) defined trial balance as a statement which contains balance of all ledger accounts on a particular date. Trial balance consists of a debit column with all debit balances of accounts and credit column with all credit balances of accounts. When the totals of these columns tally, it is presumed that ledger has been maintained correctly. However, Trial Balance proves only the arithmetical accuracy of postings in the ledger.

Therefore, it is against this background that this study becomes necessary to investigate the effect of inquiry-based and demonstration methods of teaching on students' academic performance in financial accounting in Public Secondary School in Akwa Ibom North-East Senatorial District.

### Statement of the Problem

Academic performance in financial accounting should reflect more than examination scores; it should demonstrate students' ability to understand accounting principles, apply double-entry procedures, prepare basic financial records, and interpret financial information for decision making. Teachers and curriculum designers expect learners to show procedural fluency, accurate journalising, ledger posting, trial balance preparation and conceptual clarity so that classroom learning transfers to practical tasks. Strong performance therefore combines factual knowledge, procedural skill, and the capacity to reason through real accounting scenarios.

Observations from classroom assessments and interaction with financial accounting teachers indicates that many students in public secondary schools fall short of these expectations. Many learners frequently make simple posting errors, struggle to balance accounts, and show limited ability to interpret financial statements beyond rote answers. Routine class tests, continuous assessment records, and reports from subject teachers commonly reveal gaps in retention and application, suggesting that existing instructional practices may not be sufficiently engaging or diagnostic to build durable competence in financial accounting.

Various stakeholders have attempted to address these shortfalls through a range of measures. School administrators have organised subject workshops, provided additional practice materials, and encouraged remedial clinics for weaker students. Education officers and teacher-trainers have offered in-service sessions that promote alternative pedagogies, while some schools have trialed



resource supports such as accounting templates and calculators. Those efforts show commitment, but uptake of interactive, student-centred strategies has remained inconsistent and largely confined to isolated projects rather than sustained classroom practice.

Persistent decline in financial accounting performance carries consequences for learners and the wider educational system. Students who advance with shaky foundations would likely face greater difficulty in senior secondary examinations and in subsequent tertiary or vocational pursuits that depend on accounting literacy. Schools may risk diminished academic reputation where pass rates stagnate, and the local economy loses potential entrants who possess basic financial skills useful for small-business ventures and personal financial management. These outcomes indicate the need to evaluate teaching methods, specifically inquiry-based and demonstration methods in order to determine which approach most effectively strengthens students' academic performance in financial accounting.

### **Purpose of the Study**

The main purpose of this study was to determine the effect of Inquiry-based and Demonstration Methods of Teaching on Students' Academic Performance in Financial Accounting in Public Secondary School in Akwa Ibom North-East Senatorial District. Specifically, the study sought to:

- i. determine the difference in students' mean performance scores when taught cash book using inquiry-based and demonstration method of teaching in Public Secondary School in Akwa Ibom North-East Senatorial District.
- ii. determine the difference in students' mean performance scores when taught trial balance using inquiry-based and demonstration method of teaching in Public Secondary School in Akwa Ibom North-East Senatorial District.

### **Research Questions**

This study sought to provide answers to the following questions:

- i. What is the difference in students' mean performance scores when taught cashbook using inquiry-based and demonstration method of teaching in Public Secondary School in Akwa Ibom North-East Senatorial District?
- ii. What is the difference in students' mean performance scores when taught trial balance using inquiry-based and demonstration method of teaching in Public Secondary School in Akwa Ibom North-East Senatorial District?

### **Research Hypotheses**

The following research hypotheses were formulated to guide the study at 0.5 level of significance:

Ho1: There is no significant difference of the mean performance scores of students in cash book when taught with inquiry based and demonstration method of teaching in Public Secondary School in Akwa Ibom North-East Senatorial District.

Ho2: There is no significant difference of the mean performance scores of students in trial balance when taught with inquiry based and demonstration method of teaching in Public Secondary School in Akwa Ibom North-East Senatorial District.



## Theoretical Framework

### Bloom's Mastery Learning Theory by Benjamin Bloom (1968)

Bloom's Mastery Learning Theory was propounded by Benjamin Bloom in 1968. The theory argued that given sufficient time and appropriate learning conditions, nearly all students can achieve mastery in academic subjects. Unlike traditional approaches that assume academic success is limited to a small proportion of students, mastery learning posits that academic performance is a function of instructional quality, learner engagement, and structured assessment. This theory directly challenges the notion of fixed intelligence and emphasizes the power of teaching in shaping academic outcomes.

A central principle of mastery learning is the clear specification of learning objectives. According to Bloom, students perform better academically when they know exactly what is expected of them. This principle is reflected in his famous taxonomy of educational objectives, which classifies learning goals into cognitive, affective, and psychomotor domains. In the context of financial accounting, this means setting precise objectives, such as "students should be able to prepare a cashbook and trial balance" which guide learners toward measurable performance.

Another pillar of mastery learning is formative assessment and feedback. Bloom believed that frequent, low-stakes assessments help teachers identify learning gaps early and provide corrective feedback before moving to new material. This systematic process ensures that learners do not accumulate misconceptions that could negatively impact their academic performance. In financial accounting, for example, quizzes on cashbook entries or class exercises on trial balance allow lecturers to detect misunderstandings and provide remediation promptly.

The theory also emphasizes corrective instruction and enrichment. Bloom argued that students who struggle should not simply be left behind but should receive additional support, what he called "corrective activities." On the other hand, students who achieve mastery quickly should be given enrichment tasks that extend their learning. This ensures that all learners, regardless of pace, can achieve high performance. In practice, this could mean providing struggling accounting students with simplified worked examples while assigning advanced case studies to high-performing students.

## Conceptual Framework

The term teaching has been subjected to various definitions by different scholars. The goal of teaching is to bring about desired learning in the students. Therefore, for teaching to achieve its purpose, it must be effective. Ovawie (2016) viewed teaching as a systematic activity deliberately engaged in by someone to facilitate the learning of the intended worthwhile knowledge, skills and values by another person. Eze, *et al.*, (2015) defined teaching as a two-way traffic system involving exchange of ideas between the teacher and the students. the authors explained that teaching is a series of activities geared towards helping students "learn how to learn". From the definition above, it could be seen that teaching involves a teacher, learner(s), learning/teaching materials, learning activities and effective communication between teacher and learners.

According to Monday and Joel (2017), Financial Accounting is concerned with recording, classifying, selecting, measuring, interpreting, summarizing and reporting financial data of an organization to the users for objective assessment and decision making. It also involves the collection, recording, summarizing, analyzing and reporting in monetary terms, information about a business organization to users of such information.



Eze, *et al.* (2016) defined Financial Accounting as that aspect of accounting concerned with recording of business transaction and the preparation of financial statements and reports to be used internally by management for planning, control and decision making, and externally by investors, creditors as well as government agencies for investment decisions cum tax returns, computation and assessment. It involves the classification and recording of monetary transactions and presentation of the financial results of the activities of an entity for decision making.

Inquiry-based is a method of teaching and learning whereby the teacher directs, guides and facilitates the learners to acquire knowledge and skills through process of inquiry. It is a student-centred and a problem-solving approach that are real and relevant to the learner. Edet (2023) defined inquiry-based method of teaching as a student-centred activity and oriented teaching activity in which the teacher directs students through problem-solving approach to discover answers. Siddiqui (2021) opined that in inquiry-based method of teaching requires that students play a major role in the teaching learning process. According to Siddiqui, inquiry is a natural way that human beings learn about their environment.

Uwameji and Titilayo (2016) observed that inquiry-based method of teaching is an approach where the learner or student generates his or her own form of information, characterized by learner-centered, leader-facilitated, learner-active and learning process emphasis. The teacher here is released from the role of authority and knowledge giver to become a facilitator and fellow investigator who is not a reservoir of knowledge and a solution to all learning problems. Inquiry-based is a style of teaching in which the task acts as the context and a driving force for the learning. It encourages deep rather than surface learning and understanding, student however make use of the material by interpreting new knowledge with prior knowledge through the experience of solving problems using a wide range of critical, cognitive and transferable skills. In the context of this study, inquiry-based teaching approach is a range of activities aimed at assisting the learner to acquire knowledge, attitude, value, habits and skills on his own under the guidance of the teacher.

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, *et al.* 2019)

Awotua-Efebo (2020) stated that the demonstration method of teaching involves showing and telling the students the point of emphasis. According to the author, it is mostly used as a technique within a method of teaching, but is sometimes used as a method itself.

### **Cashbook**

The cash book is a book which consists of all cash transactions of the business. Cash book in general is considered as a book of original entry as well as final entry as it serves twin roles of a ledger as well as a journal. Cash book consists of Cash Account and Bank Account. Cash Account is an Asset account or Real Account and thus, any increase in Cash or Bank Account is debited to the amount and any decrease in Cash or Bank account is credited to the account (Pandey, 2017). According to Pandey, cash book has the following features: only cash transactions are recorded in cash book; it plays a twin role as it is both a book of original entry (Journal) as well as a book of



final entry; all cash transactions are primarily recorded in it as soon as they take place that is why it is considered as a book of original entry. On the other hand, the cash aspect of all cash transactions is finally recorded in the cash book. Cash book is also a ledger. This is one of the reasons to consider it as a book of final entry. David (2019) found out that there is a significant effect of inquiry-based teaching method on students' academic performance in Financial Accounting. Students who work in inquiry-based classes are exposed to higher level of reasoning and they accept this reasoning as valid.

### **Trial balance**

Trial balance is a statement used to check the compliance of double entry principle in preparation of accounts. Ukoima, Akpanobong, Usip and Uke (2024) opined that a trial balance is a check on the sum of all the individual balances from the ledger accounts including the cash and bank balances from the cashbook at the end of the accounting year or period to ensure that they balance. A trial balance is prepared as a check to ensure that each committed transaction has been recorded in two folds as a debit and as a credit in two different but complementing ledger accounts.

According to Longe (2011) trial balance is a statement showing list of balances in a double entry form extracted from the ledgers to test the arithmetical accuracy of the accounts. Luke (2017) also stated that trial balances are prepared with the view to prove the arithmetical accuracy of the ledger postings and to provide in one statement a concise summary of items which are to be used in the preparation of final accounts. Oyelami (2015) also defined trial balance as a list or schedule of balances, both debit and credit, extracted from all the accounts in the ledger and cashbook. Small scale business managers can make use of a trial balance to make sound decisions concerning the allocation of resources, reviewing the income and expenses over a specific period. Umoru *et al.*, (2020) found that although demonstration showed some positive effect, methods that engaged students more actively, such as inquiry approaches, tended to produce better outcomes. The inquiry-based teaching method has been particularly effective in teaching trial balance due to the nature of the subject.

### **Research Method**

The study adopted quasi-experimental design (pre-test-post-test non-equivalent group design). This implies that intact classes was used for the study. According to Cohen, *et al.*, (2011), this design is usually adopted when it is not possible to randomly sample the subjects and assign them to groups without disrupting the academic programmes of the schools used in the study. The study was carried out in Akwa Ibom North-East Senatorial District and the population of the study comprised 2,236 senior secondary two (SS2) students offering Financial Accounting in 86 public secondary schools in Akwa Ibom North-East Senatorial District (Akwa Ibom State Ministry of Education, 2025). The sample of the study comprised 200 senior secondary two (SS2) students drawn from four intact classes in the sampled schools. Due to the use of intact classes, the experimental group comprised 112 students while the control group comprised 88 students. A researcher-developed instrument was used for the study. The instrument was Performance Test which comprised 25-item multiple-choice test titled "Financial Accounting Performance Test" (FAPT). A test – re – test procedure was adopted to establish the reliability of the Financial Accounting Performance Test (FAPT). The instrument was pretested on 20 SS2 Financial Accounting students from schools within the study area but not involved in the main study. The test was administered twice within two weeks period and the two set of scores obtained was analyzed using Pearson Product Moment Correlation (PPMC). The reliability coefficient of 0.88



was realized. The instrument “Financial Accounting Performance Test” (FAPT) was used for data collection. The multiple-choice Financial Accounting Performance Test (FAPT) was administered to students in the two groups before the commencement of the treatment which lasted for five (5) weeks. After the treatment, the post test was administered to both groups by reshuffling the items in the Financial Accounting Performance Test (FAPT). The students’ scripts in the two tests was marked and recorded for collation and data analysis. Mean Statistics and Standard Deviation was used to answer the research questions while Analysis of Covariance (ANCOVA) was used to test research hypotheses at 0.05 level of significance. All data will be analyzed using Statistical Package for Social Sciences (SPSS version 22.0).

## Results

### Research Question One

What is the difference in students’ mean performance scores when taught cashbook using inquiry-based and demonstration method of teaching in Public Secondary School in Akwa Ibom North-East Senatorial District?

**Table 1: Mean Performance Scores of Students when Taught Cashbook using Inquiry-based and demonstration method of teaching**

| Group                | Pre-Test Mean | SD   | Post-Test Mean (X) | SD   | N   | Mean Gain |
|----------------------|---------------|------|--------------------|------|-----|-----------|
| Inquiry-based Method | 13.83         | 1.81 | 17.30              | 2.44 | 112 | 3.47      |
| Demonstration Method | 12.04         | 1.33 | 13.02              | 1.25 | 88  | 0.98      |

Source: Field Data (2026)

Table 1 shows the difference in the scores of students taught using inquiry-based and demonstration teaching methods. The pre-test mean score for the experimental and control groups were 13.83 and 12.04 with Standard Deviation (SD) of 1.81 and 1.33 respectively. This indicated that the two groups were relatively on the same level before treatment began. The experimental group taught cashbook had a mean achievement score of 17.30 with Standard Deviation (SD) of 2.44 while that of control group had a mean score of 13.02 and Standard Deviation (SD) of 1.25; showing that the performance of student taught cashbook using inquiry-based method was higher than the performance of those taught with demonstration teaching method. This implies that, the use of inquiry-based teaching method in instruction made the students perform higher in cashbook than demonstration method.

### Research Question Two

What is the difference in students’ mean performance scores when taught trial balance using inquiry-based and demonstration method of teaching in Public Secondary School in Akwa Ibom North-East Senatorial District?



**Table 2: Mean Performance Scores of Students when Taught Trial Balance using Inquiry-based and demonstration method of teaching**

| Group                | Pre-Test Mean | SD   | Post-Test Mean (X) | SD   | N   | Mean Gain |
|----------------------|---------------|------|--------------------|------|-----|-----------|
| Inquiry-based Method | 13.83         | 1.87 | 18.14              | 1.59 | 112 | 4.31      |
| Demonstration Method | 13.03         | 1.51 | 14.18              | 2.07 | 88  | 1.15      |

Source: Field Data (2026)

Table 2 shows the difference in the scores of students taught using inquiry-based and demonstration teaching methods. The pre-test mean score for the experimental and control groups were 13.83 and 13.03 with Standard Deviation (SD) of 1.87 and 1.51 respectively. This indicated that the two groups were relatively on the same level before treatment began. The experimental group taught trial balance had a mean achievement score of 18.14 with Standard Deviation (SD) of 1.59 while that of control group had a mean score of 14.18 and Standard Deviation (SD) of 2.07; showing that the performance of student taught trial balance using inquiry-based method was higher than the performance of those taught with demonstration teaching method. This implies that, the use of inquiry-based teaching method in instruction made the students perform higher in trial balance than demonstration method.

### Research Hypothesis One

There is no significant difference of the mean performance scores of students in cash book when taught with inquiry based and demonstration method of teaching in Public Secondary School in Akwa Ibom North-East Senatorial District.

**Table 3: ANCOVA Analysis of the Difference between the Mean Performance score of students when Taught Cashbook using Inquiry-based and Demonstration Teaching Method**

| Source           | Type III Sum of square | df  | Mean Square | F       | Sig  |
|------------------|------------------------|-----|-------------|---------|------|
| Corrected Model  | 942.405a               | 2   | 471.202     | 121.770 | .000 |
| Intercept        | 437.102                | 1   | 437.102     | 112.957 | .000 |
| Pretest Cashbook | 39.318                 | 1   | 39.318      | 10.161  | .002 |
| Teaching Method  | 550.912                | 1   | 550.912     | 142.368 | .000 |
| Error            | 762.315                | 197 | 3.870       |         |      |
| Total            | 49260.000              | 200 |             |         |      |

Source: Field Data (2026)

Table 3 shows the result of the analysis of covariance conducted to determine the difference between the mean performance score of students when taught cashbook using inquiry-based and demonstration teaching method. There was a difference between the mean performance score of students when taught cashbook with using inquiry-based and demonstration teaching method, (F 121.77, 112.95, 10.16, 142.37,  $p < .05$ ). Since p-value was less than .05, the stated null hypothesis was rejected. Therefore, this result concludes that there was significant difference between the mean performance score of students when taught cashbook with inquiry-based and demonstration teaching method.



### Research Hypothesis Two

There is no significant difference of the mean performance scores of students in trial balance when taught with inquiry based and demonstration method of teaching in Public Secondary School in Akwa Ibom North-East Senatorial District.

**Table 4 ANCOVA Analysis of the Difference between the Mean Performance score of students when taught Trial Balance using Inquiry-based and Demonstration Teaching Method**

| Source          | Type III Sum of square | Df  | Mean Square | F       | Sig  |
|-----------------|------------------------|-----|-------------|---------|------|
| Corrected Model | 788.259a               | 2   | 394.129     | 120.989 | .000 |
| Intercept       | 630.304                | 1   | 630.304     | 193.489 | .000 |
| Pretest TriBal  | 15.064                 | 1   | 15.064      | 4.624   | .033 |
| Teaching Method | 687.762                | 1   | 687.762     | 211.127 | .000 |
| Error           | 641.741                | 197 | 3.258       |         |      |
| Total           | 55222.000              | 200 |             |         |      |

Source: Field Data (2026)

Table 4 shows the result of the analysis of covariance conducted to determine the difference between the mean performance score of students when taught trial balance using inquiry-based and demonstration teaching method. There was a difference between the mean performance score of students when taught trial balance with using inquiry-based and demonstration teaching method, ( $F$  120.99, 193.49, 4.62, 211.13,  $p < .05$ ). Since  $p$ -value was less than .05, the stated null hypothesis was rejected. Therefore, this result concludes that there was significant difference between the mean performance score of students when taught trial balance with inquiry-based and demonstration teaching method.

### Discussion of Findings

The findings revealed a mean difference of academic performance of students in cashbook when taught using inquiry-based and demonstration teaching methods. The findings also showed that there was a significant difference between the mean performance score of students when taught cashbook with inquiry-based and demonstration teaching methods. This implies that, the use of inquiry-based teaching method is preferred to demonstration teaching method. The inquiry-based method allows students to actively participate in the learning process by asking questions, investigating financial transactions, and drawing conclusions based on evidence rather than passively receiving information from the teacher. The finding of this study aligns with that of David (2019) who found out that there is a significant effect of inquiry-based teaching method on students' academic performance in Financial Accounting. Students who work in inquiry-based classes are exposed to higher level of reasoning and they accept this reasoning as valid.

Also, the finding revealed a mean difference of academic performance of students in trial balance when taught using inquiry-based and demonstration teaching methods. The findings also showed there was a significant difference between the mean performance score of students when taught trial balance with inquiry-based and demonstration teaching methods. This supports the fact that, the use of inquiry-based teaching method is preferred to demonstration teaching method. The inquiry-based method enhances students' performance in trial balance by promoting active learning during class time rather than passively listening to lectures. The finding of this study is in tandem with the findings of Umoru *et al.*, (2020) who found that although demonstration showed some positive effect, methods that engaged students more actively, such as inquiry approaches, tended to



produce better outcomes. The inquiry-based teaching method has been particularly effective in teaching trial balance due to the nature of the subject.

### Conclusion

Based on the results of the data analysis this conclusion was reached. That, there is significant difference in academic performance of students in Financial Accounting taught using inquiry-based and demonstration teaching methods in Public Secondary Schools in Akwa Ibom North-East Senatorial District. In other words, students who were exposed to inquiry-based teaching method on the concepts of cashbook and trial balance performed better than those who were taught these concepts using demonstration teaching method. In conclusion, inquiry-based teaching method significantly improved students' understanding and application of accounting principles.

### Recommendations

Based on the findings of the study, the following recommendations are made:

- i. Government through the Ministry of Education should encourage schools to embrace inquiry-based teaching strategies by way of providing the platform, resources, and training necessary for teachers to use these strategies effectively in Financial Accounting instruction.
- ii. School administrators should organize regular professional development workshops and seminars for Financial Accounting teachers to build their capacity in implementing inquiry-based teaching methods and to share best practices in student-centered pedagogies.

### References

- Akpan, G. A. and Caleb, E. E. (2016). Project based teaching, problem-based learning and Technical College students' skills acquisition in electrical installation and maintenance works. *India Journal of Vocational Education*, 2(1): 189-195.
- Akwa Ibom State Ministry of Education (2025). Information on schools. Uyo; Government Printer, 6.
- Ameh, I. E., Daniel B. P., and Akins, Y. (2019). *Research and methods in the social sciences*. Anka: Rowis Press. 121p.
- Amos, D. O. (2017). Effect of Bookkeeping on the Performance of Small and Medium Scale Enterprises in Uyo Metropolis. *International Journal of Business and Management Review*, 5(9): 1–10.
- Awotua-Efebo, E. B. (2020). *Effective teaching: Principles and practice*. Port Harcourt: Paragraphics. 231p
- Bloom, B. S. (1968). Learning for mastery. *UCLA Evaluation Comment*, 1(2): 1–12.
- Callahan, J. F., Clark L. H, and Kellough, R. D. (2015). *Teaching in the Middle and Secondary Schools (5th ed.)*. Englewood Cliffs, NJ: Prentice-Hall. 246p
- Chukwudebem, A. (2019). Effects of guided inquiry instructional strategy and cognitive style on students' academic achievement in Physics in Delta North Senatorial District. M.Sc. Dissertation. Delta State University, Abraka.
- Cohen, L., Manion, L., and Morrison, K. (2011). *Research methods in education (7th ed.)*. Routledge.



David, S. (2019). *Effects of guided-discovery and problem-solving teaching methods on students' academic performance in Financial Accounting in Colleges of Education, North central, Nigeria*. MSc (Ed) Dissertation. Kwara State University, Malete. 176p.

Edet, A. A. (2023). Effects of guided instruction, demonstration and expository teaching students' acquisition of practical skills in Introductory Technology in Uyo Local Government area. M.Sc. Dissertation. University of Uyo, Uyo.

Eze, T. I., Ezenwafor, J. I. and Molokwu, L. I. (2015). Effect of meta-learning teaching method on the academic performance of building trades students in technical colleges in South-East Nigeria. *International Journal of Vocational and Technical Education*, 7(10): 101-108.

Eze, T. I., Ezenwafor, J. I. and Obidile, I. J. (2016). Effects of problem-based teaching method on students' academic performance and retention in Financial Accounting in Technical Colleges in Anambra State. *Scholars Journal of Arts, Humanities and Social Sciences* 4(6a): 634-639

Federal Republic of Nigeria (2013). National policy on education. Lagos: NERDC Press.

Frank, W. and Omuya, J. O. (2018). *Business Accounting 1*. Essex. Longman group. 424p.

Kimwere, . (2020). Determinants of perceived quality of obstetric care in rural Tanzania: a cross-sectional study. *BMC health services research*, 14(1): 1-9.

Longe, F. (2011). *Simplified and Amplified Financial Accounting for Senior Secondary Schools Polytechnics and Universities*. 2nd ed., Abeokuta: LongeVenture.

Luke, L. (2017). *Small Business Management in Developing Countries*. Everand Publishers

Monday, A. L. and Joel, O. L. (2017). Comparative effect of students academic performance in learning financial accounting using instructional video. *International Journal of Advanced Academic Research in Arts, Humanities and Education*, 13(12): 24-30.

Musa, O.S. (2019). *Effect of demonstration and assignment methods on students' performance in Financial Accounting in Federal Government Colleges in Kaduna State, Nigeria*. M.Ed Dissertation. Ahmadu Bello University, Zaria

Nwanekezi, A.U and Ugonwa, R. C. (2021). *General Principles, Conventional and Innovative methods of teaching and learning*. Chinedu printing press limited. Enugu. 323p

Ogwo, B. A. and Oranu, R. N. (2016) *Methodology in Formal and Non-formal Technical and Vocational Education*. Nsukka: University of Nigeria Press. Ltd. 311p

Oviawe, J. I. (2016). Teachers' effectiveness as correlates of students' academic achievement in basic technology in Nigeria. *International Journal of Academic Research in Progressive Education and Development*, 5(2): 111–119.

Oyelami, O. A. (2015). Accounting Practices and Performance of Small Scale Enterprises in Nigeria. *International Journal of Academic Research in Business and Social Sciences*, 5(1): 45–56.

Pandey, I. M. (2017). Financial Management. Vocals Publishing House PVT Limited, London. 326p.

Siddiqui, M. H. (2021). *Models of teaching*. New Delhi: A. P.H Publishing Corporation. 123p.

Sola, A. S and Ojo, E. (2017). Effect of project, inquiry and lecture – Demonstration Teaching Method on Academic Achievement on senior Secondary Student in Separation of Mixtures Practice test. *Educational Research and Review* (6): 124-132.



Ukoima, E. F., Akpanobong, U. E., Usip, M. E., and Uke, A. F. (2024). *Introduction to Financial Accounting: Chamber for Business Educators*. Calabar: Academic Publishing Centre, South-South, University. 317p.

Umoru, T. A., Ademiluyi, L. F., Okereke, E. C., and Eebo, T. O. (2020). Effect of inquiry-based instruction strategies on Business Education students' academic achievement in principles of accounting in universities, Nigeria. *KWASU Journal of the Business of Education*, 3(1): 24-34

Uwameji, W and Titilayo, G. (2016). Utilization of innovative strategies in teaching financial accounting for improved performance among secondary school students in Rivers State. *International Journal of Innovative Finance and Economics Research*, 1(3): 21-34