

IMPACT OF ACCOUNTING INFORMATION SYSTEM ON PERFORMANCE OF SMALL AND MEDIUM ENTERPRISES IN EBONYI STATE

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Abstract

Accounting information system represents a variety of sources that are designed to collect financial data in order to reach the information needed by various decision-makers at a given time. For all organizations, an accounting information system is very important. It is intended to assist in handling and collecting information, raw data or ordinary data and to turn it into financial data for reporting to decision-makers. Lack of accurate financial statements puts organizations at risk. It is important for business management to keep records. The absence of such accounting practices as proper record keeping, inventory management and efficient budgeting continues to aggravate the financial challenges that small and medium enterprises (SMEs) face. This paper seeks to examine the impact of accounting information systems on the performance of Small and Medium enterprises in Ebonyi State. Using descriptive statistics to analyse the data. Our findings reveal that accounting is essential in measuring financial performance by SMEs, and accounting record keeping has an impact on the performance of Small and medium Enterprises in Ebonyi State. The study also shows that there is some undermining attitude put up by SMEs towards record-keeping. Based on our findings, it is recommended that Small and Medium Enterprises need to adopt a comprehensive accounting system that will cover all business areas in order to improve performance. SMEs also need trained accounting personnel and sufficient training equipment for them

Keywords: Impact, Accounting Information System, Performance, Small and Medium Enterprises

Introduction

Small and Medium Enterprises (SMEs) play a key role in the economic development of countries around the world, including Nigeria. As the backbone of most developing economies, SMEs contribute majorly to not just employment generation, but also to poverty reduction and innovation (Abisuga-Oyekunle, Patra & Muchie, 2020). In Nigeria, SMEs, while accounting for 48% of the Nigerian GDP (Jacob, Abbah & Ahmed, 2024), also account for over 90% of businesses worldwide and employ almost 50% of the workforce in the formal

sector (Olubiyi & Itai, 2025). Despite their vital contributions, many Nigerian SMEs struggle with growth, sustainability, and long-term survival due to a variety of problems, such as poor financial management, lack of access to credit, inadequate infrastructure, low technological adoption, and weak managerial capacities. To overcome these challenges, managers of SMEs have to adopt more innovative management strategies aimed at improving strategic decision-making. One of these approaches is the implementation of information systems within businesses

(Davoren, 2019). Borhan and Bader (2018) note that information systems include managing conceptual and physical items, records, procedures, strategies, protocols, skill sets, equipment, technology, roles, and other components which determine an organization's capability.

The information system is one that offers vital information for scheduling, coordinating, managing, guiding and regulating the organization's operations for better decision-making. According to Yaser, Alina & Nor (2014), information systems include information management systems, transaction processing systems, office control systems, decision support systems, manager information systems, professional systems, and accounting information systems. Rainer's (2007) key information systems include delivery systems, corporate resource planning system, recruitment system, and awareness job method. Accounting information system has a lot of problems, ranging from economic harshness (Bracci, Humphrey, Moll & Steccolini, 2015), sustainable development (Cohen, Manes-rossi & Brusca, 2023) and public benefits (Bracci, Saliterer, Sicilia, & Steccolini, 2021; Panagiotopoulou, Klievinkb, & Cordella, 2019), to the growing demands of considering digitalization and data science (Agostino, Bracci, Cruz, Jorge, Lopes-Cardoso & Lourenço, 2023). While observing the significance of non-financial information, in particular sustainability reporting (Cohen, Manes-rossi & Brusca, 2023), it seems that a major problem facing information system accounting today is to understand what it is all about. Accordingly, some scholars propose new definitions of accounting. Some now see accounting as a social and moral practice, and not merely as a technical practice (Carnegie, Gomes, Parker, McBride, & Tsahuridu, 2024). However, for all organizations, an accounting information system (AIS) is very important. It is intended to assist in handling and collecting information, raw data or ordinary data and to turn it into financial data for reporting to decision-makers (Dandago & Rufai, 2014; Harash, Al-Timimi, & Alsaadi, 2014).

AIS is a program which helps with gathering and storing data and information on incidents that affect organizations financially. Accounting information system is considered to play a great part in handling the day-to-day activities of commercial organizations, just like any other information system. Accounting information systems are considered to be one of the supporting information systems used to perform managerial functions such as planning, organizing, controlling and decision-making to make better use of available resources (Samer, 2016). According to Bodnar & Hopwood (2010), the accounting information system seems to be a logical system for the identification, measurement, accumulation, analysis, preparation, interpretation and communication to a particular group of accounting information about a particular entity. Accounting information system represents a variety of sources (persons and equipment) that are designed to collect financial data in order to reach the information needed by various decision-makers at a given time (Bodnar & Hopwood, 2010). Olajire, Olaleye, Kolade, Ayoade, Abayomi (2021) opine that using an accounting information system leads to better financial reports and decision-making. The study revealed a link between the deployment of an accounting information system and better credit access. He concluded that there is a strong link between present accounting methods and the performance of SMEs. Small Medium Enterprises that prioritize proper accounting practices are more likely to achieve financial profitability, stability and growth (Adejoke, 2025).

However, SMEs need to adopt proper accounting practices among themselves in order to play these critical developmental roles. In order for a company to survive, decisions need to be made that will enable it to remain solvent and run profitably (Miegs & Miegs, 2000). Accounting is the basis for informed decision-making. For example, important decisions such as pricing, costing, shutting down under-performing outlets/branches or product lines, investment decisions, among others, cannot be made without proper information on accounting. Accounting offers relevant information for

external parties such as: investors, prospective stakeholders, creditors and government. Even given that accounting is the business language, there is a need for any director, customer and company decision-maker to be acquainted with accounting terms and principles (Miegs & Miegs, 2000). In Nigeria, this paper is relevant given the vital role that SMEs play in our economic development.

Brief Literature Review

Olufemi & Oladimeji (2019) analyzed to what extent accounting information is used to measure SMEs' financial performance. Questionnaires were administered to 200 owners of SMEs that validated and analyzed 197 questionnaires using the Likert scale. It was observed that while respondents agree that the main advantages of keeping proper records are knowing the performance of the business and record keeping is key to the success of the business, most owners of SMEs lack basic accounting knowledge and decrease the costs involved in preparing financial statements, thus keeping records themselves manually.

The study recommends that small and medium-sized enterprise operators should endeavor to keep proper records and, where necessary, seek the services of small and medium-sized enterprise professionals to do so at minimal cost because the costs involved in business failure due to lack of proper record keeping far outweigh the costs of maintaining good records for a business concern.

Emad (2017) evaluates the impact of the accounting information system (AIS) on small and medium-sized enterprises (SMEs) accounting performance. "What is the impact of AIS on SMEs' accounting performance? The results of the study show a positive relationship between AIS and accounting performance in Iraqi SMEs.

Decision Usefulness Theory

Decision Usefulness Theory is the theoretical framework for this study. Decision—the basic purpose of financial reporting is to provide useful information. The Conceptual Structure of the Financial Accounting Standard Board notes that financial reporting aims to provide information useful for business decisions

(Concepts Resolution No. 1, FASB 1980, Paragraph 34). In terms of relevance, reliability, comparability, and understandability, decision-making utility is defined, according to Onugu (2015).

The utility principle of decision-making was implemented to satisfy the information needs of account holders, namely: shareholders and lenders. Agbemava, Ahiase, Sedzro, Adade, Bediako, Nyarko, & Kudo, (2016) indicated that accounting is seen as the calculation process which allows financial reports available to support decision-makers and their business decisions. The financial statement plays an important role in rendering crucial financial decisions for various users, consisting mainly of lenders, shareholders, staff, consumers, government and their agencies (Rathnasiri, 2014). Accounting information's usefulness is based on factors such as timeliness, reliability, relevance, materiality of the accounting data presented, understandability, comparability and verifiability (Rathnasiri, 2014). Single-person decision theory, based on a person's point of view who has to make a decision under uncertain conditions, is the vital part of this paper. The theory provides space for additional information to be obtained by entities to review a decision-maker's possible subjective assessment of what might have happened after a decision has been made.

Data and Methods

This study adopts a descriptive approach to analyze the data extracted from One Hundred and fifty (150) questionnaires from Small and Medium Enterprises within Abakaliki Metropolis. This paper draws from Saunders, Lewis, & Thornhill (2009) of descriptive data analyses. This method of research is crucial as it enabled us to describe, examine, record, analyze and interpret the variables that exist in the study.

Area and Population of Study

The population of the study is six hundred selected small and medium-scale enterprises that operate within Ebonyi State. The research instrument used for data collection was a structured questionnaire. This questionnaire, developed by us, was employed to collect data from the respondents, who were business

owners operating within Abakaliki, Ebonyi State, Nigeria. The analysis technique used in the study is the chi-square with 5% level of significance was used in testing the hypothesis. That is to say, the two null hypotheses formulated were tested using the chi-square. The decision rule is to accept the alternative hypothesis if the calculated value is greater than the critical value and reject if otherwise. Chi-square is calculated with the help of the following formula.

$$X^2 = \sum \frac{(O - E)^2}{E}$$

Where O = represents Observed frequency

E = Represents Expected frequency

E = $\frac{\text{Number of questionnaire}}{\text{Number of response}}$

Level of significant = 0.05

Results

Descriptive Results

The results of the descriptive analyses are presented using frequency distributions and percentages. One hundred and fifty copies of the questionnaires were distributed; one hundred and thirty-eight copies were returned, giving a total of 92% return rate.

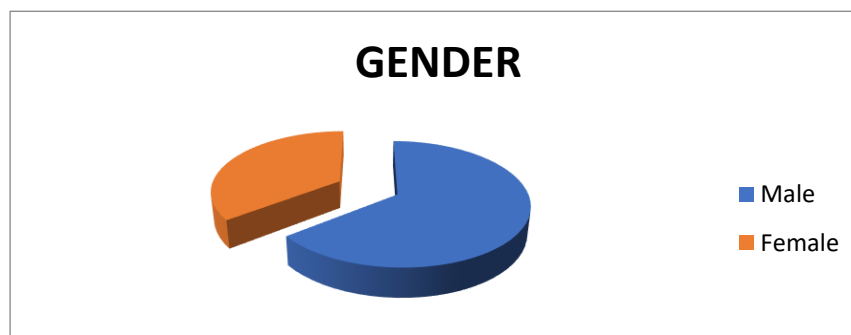
Table 1: Gender

	Frequency	Percent	Valid Percent	Cumulative Percent
FEMALE	49	35.5	35.5	35.5
Valid MALE	89	64.5	64.5	100.0
Total	138	100.0	100.0	

Source: Field Survey (2019)

Table 1 reveals that 49 (35.5%) respondents were female, while 89 respondents representing 64.5% were male. Thus, this implies that the

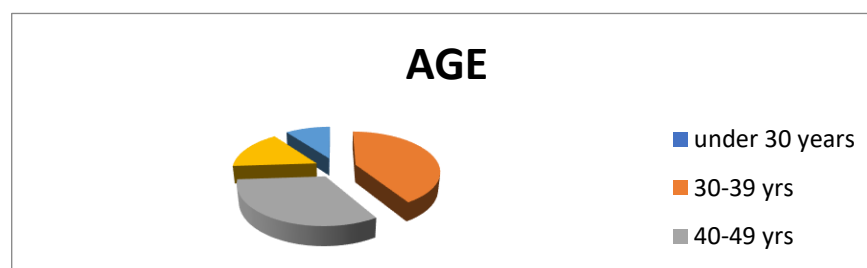
majority of the respondents are male. This is represented below with the aid of a chart.



Source: Authors' Computation

From the pie chart above, the piece in blue colour represents the male respondents, while

the piece in brown colour represents the female respondents.



From the chart above, it can be seen that the largest number of respondents is between the

ages of 30-39. The benchmark means for items at 3.0

Table 2: Age Distribution of the Respondents

	Frequency	Percent	Valid Percent	Cumulative Percent
<30YRS	0	0	0	0
30-39yrs	57	41.3	41.3	41.3
40-49yrs	45	32.6	32.6	73.9
50-59yrs	22	15.9	15.9	89.9
60 YRS &above	14	10.1	10.1	100.0
Total	138	100.0	100.0	

Source: Field Survey (2019)

Table 2: Shows that none of the respondents which represent 0% are below the age of 30 years, furthermore, 41.3% of the respondents are between the age of 30-39 years, 32.6% of the respondents are between the age of 40-49 years,

15.9% of the respondents are between the age 50-59 years, while 10.1% of the respondents are of the age 60 and above. The output is represented in a chart and displayed as below:

Table 4: Analysis of the degree to which accounting information is being adopted in measuring financial performance by SMEs in Nigeria

Descriptive Statistics			
ITEMS	N	Mean	Std. Deviation
To be able to make accurate tax payments	138	3.93	.949
To facilitate the management of debtors and creditors	138	4.31	.753
To determine the financial position of the business	138	3.73	.900
To know the performance of the business	138	3.33	.814
To facilitate the management of debtors and creditors	138	4.15	.754
Valid N (listwise)	138		

Source: Field Survey, 2019.

Table 4: indicates that item 1 in table 4 had a mean score of 3.93 and a standard deviation of 0.949, Item 2 had a mean score of 4.31 (Std. = 0.753), Item had a mean score of 3.73 (Std. = 0.900), while Item 4 had a mean score of 3.33 (Std. = 0.814) and while Item 5 had a mean score of 4.15 (Std. = 0.754). From the result, it could be concluded that the items were significant as their various means were greater than the benchmark of 3 set in this study. In table 5, item

1 had a mean score of 4.00 and a standard deviation of 0.936, item 2 had a mean score of 4.29 (Std.=0.707), item 3 had a mean score of 4.13 (Std. = 0.723), while item 4 had a mean score of 3.94 (Std. = 0.799) and item 5 had a mean score of 4.10 (Std. = 0.687). The items in this section of the questionnaire were also significant as they all had a mean greater than the benchmark of 3.

Table 5: Examination of the impact of accounting record keeping on small-scale form performance, method of keeping records

Descriptive Statistics			
ITEMS	N	Mean	Std. Deviation
Record keeping is essential for decision-making and business adjustments	138	4.00	.936
Record keeping reduces operating costs, improves efficiency and productivity	138	4.29	.707
Accounting records assist in resource allocation and performance planning	138	4.13	.723
Accounting records keeping increase the chances of the business operating and achieving success	138	3.94	.799
Records keeping provide information to enable the control of cash in the business	138	4.10	.687
Valid N (listwise)	138		

Source: Field Survey, 2019.

Table 6: Assessing the attitude of SMEs towards record keeping, and to ascertain if manual accounting record keeping is more popular among SMEs than computerized accounting systems

Descriptive Statistics			
ITEMS	N	Mean	Std. Deviation
Some businesses, for example, micro and small businesses, do not require record keeping	138	3.92	.944
One should not keep records of transactions that did not go well for their business because the records will discourage them	138	4.31	.753
It is a waste of money to employ an accountant to help with record-keeping	138	3.77	.898
My business has been very successful, even if I don't practice record keeping	138	3.37	.802
Would really appreciate it if given a chance to learn more about record keeping	138	4.17	.744
Valid N (listwise)	138		

In table 6, item 1 had a mean score of 3.92 and a standard deviation of 0.944, item 2 had a mean score of 4.31 and a standard deviation of 0.753, item 3 showed a mean score of 3.77 and a standard deviation of 0.898, item 4 had a mean score of 3.37 and a standard deviation of 0.802, and finally, item 5 had a mean score of 4.17 and a standard deviation of 0.744. The items are significant, going by their mean, which was greater than the benchmark mean of 3.0.

Test of Hypotheses

Hypothesis One

H₀: Accounting Information is not a measure for financial performance by SMEs in Nigeria

H₁: Accounting Information is a measure of financial performance by SMEs in Nigeria

X2 Cal	X2 Tab	DF	Remark
89.40231	18.307	(15-1) (3-1) = 28	Significant

The calculated value of chi-square was 89.40231, and the table value of chi-square at 28 degrees of freedom and 5% significance level stood at 18.307. Since the calculated chi-square value is higher than its table value, the null hypothesis is rejected. It is concluded from the result that Accounting Information is a measure of financial performance by SMEs in Nigeria

X2 Cal	X2 Tab	DF	Remark
29.80231	18.307	(15-1) (3-1) = 28	Significant

Hypothesis Two

H₀: Accounting record keeping does not have an impact performance of Small and medium scale

H₁: Accounting record keeping does have an impact on the performance of Small and medium-scale.

Hypothesis Three

H₀: SMEs do not have a negligent attitude towards record keeping

H₁: SMEs have a negligent attitude towards record-keeping.

The calculated value of chi-square was 29.80231, and the table value of chi-square at 28 degrees of freedom and 5% significance level stood at 18.307. Since the calculated chi-square value is higher than its table value, the null hypothesis is rejected. The study concludes that accounting record keeping does have an impact on performance, Small and medium scale

X2 Cal	X2 Tab	DF	Remark
83.91764	18.307	(15-1) (3-1) = 28	Significant

The calculated value of chi-square was 83.91764, and the table value of chi-square at 28 degrees of freedom and 5% significance level stood at 18.307. Since the calculated chi-square value is higher than its table value, the null hypothesis is rejected. The study concludes that SMEs have a negligent attitude towards record-keeping.

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Conclusion

Accounting performance plays a key role in the survival of SMEs ' development and growth. Not only is it necessary to give the company reasonably high returns, but it also addresses several critical issues relating to the analysis and review of procurement activities leading to the higher priorities of SMEs. Efficient accounting information systems ensure that all levels of management receive sufficient, adequate, relevant and true information and increase control and enhance accounting performance in small and medium-sized enterprises also provide an opportunity to update and align procedures with perceived examples of best accounting performance and improve SME strategic efforts and data sheriffs.

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