

Technological Accounting Practice and Financial Performance of Selected Listed Food and Beverage Manufacturing Firms in Nigeria.

Prof. Oladejo M. O¹, Akintunde Ambali. O², Dr. Yinus S.O³

^{1,2}Department of Accounting, Faculty of Management Sciences, Ladoke Akintola University of Technology, Oyo State, Nigeria

³Department of Accounting, Faculty of Management Sciences, Open and Distance Learning, Ladoke Akintola University of Technology, Oyo State, Nigeria

DOI: <https://dx.doi.org/10.47772/IJRISS.2024.806207>

Received: 22 May 2024; Accepted: 11 June 2024; Published: 21 July 2024

ABSTRACT

Literatures reveal that Technological Accounting Practice (TAP), has become essential for ensuring accountability and relevance in daily business activities. Despite literature suggesting the potential benefits of TAP in the digital era, its impact on business performance in the food and beverage sector remains underexplored and warrants empirical investigation within the Nigerian context. This study therefore sets out to evaluate the factors influencing TAP usage in the selected firms and assess the relationship between TAP and Financial Performance (FP) of the selected food and beverage firms in Nigeria. Mixed method was employed. Primary data were collected through the use of questionnaire. Secondary data covering the years 2013 and 2022 was collected through audited financial reports of the fourteen (14) purposive selected food and beverage manufacturing firms. 126 questionnaires were distributed among staff at 14 selected firms, covering various departments through a stratified random technique. Data collected underwent descriptive and inferential statistical analysis. Hypotheses were tested through ANOVA and Pearson Product Moment Correlation Coefficient (PPMCC). Results revealed that all identified variables significantly impacted the adoption of technological accounting in the food and beverage firms. Furthermore, there was a notable correlation between technological accounting practices and financial performance ($p < 0.05$). The study concluded that variables such as Perceived Benefit, Market Demand, Business Environment, Firm Size, and Cost of Technology influenced technological accounting usage and were positively correlated with firm performance, enhancing accounting procedures and the quality of financial statements. It is recommended that food and beverages manufacturing firm should invest in advanced accounting software and tailored technology accounting solutions.

Keywords: Technology Diffusion, Technological Accounting Practice, Financial Performance, Financial Information Quality

INTRODUCTION

The distinctive features of technology capabilities have given rise to the implementation of various information systems and tools, such as Accounting Information Systems (AIS), Manufacturing Resource Planning (MRP) systems, and Human Resource (HR) systems. The introduction of information technology systems has significantly transformed the operational landscape of businesses (Elliot in Azih, 2013). The integration of information technology solutions is becoming indispensable for the efficient operation of

businesses (Benjamin and Ashcroft, 2004; Abdo, Al-Qudah, Al-Qudah & Qudah, 2021). The influence of information technology and systems extends significantly to the productivity and performance of both manufacturing and service-oriented entities. Accounting, in particular, has experienced substantial transformation, characterized by reduced paperwork and enhanced accuracy, minimizing guesswork (Leigh, 2007). Literature indicates that accounting practice is pivotal in the performance of organizations, particularly within the manufacturing sector. The utilization of technological methods fosters advancements in technological accounting, contributing to enhanced accountability and reliability of accounting information (Ghani, 2012; Amadi, 2023).

Tarakolian in Amidu, Effa and Abbur (2011) observed that prior to the advent of technology businesses were limited to manual methods for keeping track of financial data. The manual accounting system consisted of paper ledgers, typewriters and calculators. Amidu et al (2011) further stated that the invoices and cheques were typed using the typewriters while the calculations were performed using the calculators. With the use of this method, errors were easily introduced into the data without being detected. To reduce the incidence of poor recording of transactions electronic accounting was introduced. Technological accounting goes beyond routine accounting functions. It encompasses accounting research, training, and education through various computer and internet-based tools. These tools include digital tool kits, various internet resources, international web-based materials, and institute and company databases accessible via the internet, web links, internet-based accounting software, and electronic financial spreadsheet tools. All of these contribute to efficient decision-making (Memis, 2011). In the context of Food and beverages manufacturing firms, accounting information plays a crucial role as it aids operators in making critical decisions related to costing, expenditures, and cash flows. This information supports monitoring and control functions (Mitchell, Reid, and Smith, 1994; Son, Marriot, and Marriot, 2006). The extent to which technology-based accounting can enhance effective accounting practices, particularly focusing on the areas such as stock accounting, sales ledger, purchase ledger, payroll, cost accounting, and financial modeling, with the aim of enhancing overall performance form a basis for this study due the transformative potential of the manufacturing sector within the national economy as observed by Akinboade (2020). More so literature (Onuoha, 2020: Akinboade, 2020).) make it clear that manufacturing sector in Nigeria plays a significant role in the country's economic development, contributing to job creation, industrialization, and export earnings. However, the sector faces various challenges, such as inadequate infrastructure, limited access to finance, and inconsistent power supply (Emenyonu, Eze & Ejike 2020)). In order to overcome these challenges and enhance operational efficiency, manufacturing firms are increasingly adopting technological solutions, including technological accounting practices. The infusion of technology into the operation of manufacturing, especially in the food and beverage sector, is expected to pave the way for the creation of commercial networks and the availability of technical infrastructure, which will trigger economic development. Despite the significance of technology accounting and its widespread usage, there has been relatively little research in the area focusing on food and beverage manufacturing firm. the extent to which technological accounting practice can influence the business performance from Food and beverages has not been well explored despite the fact that literatures (Oladipupo & Irefin, 2018: Oladejo & yinus 2020) revealed that technological accounting practices offer numerous potential benefits, including improved accuracy, timeliness, and reliability of financial information. More so, there are uncertainty persists about the degree to which Nigerian food and beverage manufacturing firms have adopted and successfully applied technological accounting practice.

Research Hypotheses

Ho₁: There is no significant difference in the factors determining of technological accounting practice usage in the selected food and beverages manufacturing firm

Ho₂: There is no significant relationship between technological accounting practice and return on

investment of the selected food and beverages manufacturing firm.

LITERATURE REVIEW AND CONCEPTUAL UNDERPINNING

Concept Accounting and Information System

Literature (Amidu, Effar, & Abor, 2011; Akinduko, 2000; Anao, 2002; Emmanuel, 2015) revealed that accounting is a form of recording, analysing, monitoring, and evaluating the financial condition of companies, preparing documents necessary for tax purposes, and providing information to support the effective functioning of a corporate entity by ascertaining the financial strength of the organisation at a given time. Nowadays, information technology is a must in many businesses. It is difficult to gain competitive advantage and survive without some adoption or implementation of this advancement in technological products. Studies has shown that the most widely use information system is accounting information system, specifically in financial reporting aspects (Marriot and Marriot, 2000; Riemen, schneider and Mykytyn, 2000; and Ismail, 2007). Traditionally, accounting information systems have been perceived as a means of providing financial information to organisations (Mia, 1993). There has been considerable evidence that within manufacturing firms, financial accounting has remained the principle source of information for managers (Holmes and Nichols, 1988; McMahan & Davies, 1994; Nayak & Greenfield, 1994; Mairead, 1977). The extent to which accounting information can be managed in the digital era with the deployment of technology needs to be empirically examined in Nigerian food and beverage manufacturing firms.

Accounting Information Quality

Evidence from literature (Abdelraheem, *et al*, 2021: Al Natour, 2020) revealed that quality of accounting information is based on correct accounting data and consists mostly of numerical and operative data. The accounting information system's output is intended to aid in the company's strategic planning, operational analysis, and internal control functions. Excellent data must meet four criteria: it must be credible, current, applicable, and exhaustive (Ali, Salameh, & Ouda, 2020).

Accounting Profession and Regulation

Field of Accounting is considered as a profession because it is a field that requires specialized knowledge. People outside of the profession must be able to trust that their accountant is competent and ethical. This is because they rely on the accountants who prepare the financial statements, as well as the auditors who verify them, to make decisions. Therefore, cultivating trust within the industry is extremely important to business, the economy, and society. (Personal Finance Lab, 2022). The exercise of choice and professional judgment in accounting is often abused by failing to disclose useful information and hacking of accounting numbers. The essence is to present better operating performance (or understate profit to reduce tax) and a healthier financial position. Consequently, users of accounting information are deceived into making wrong economic decisions, which are inimical to preserving in corporate investments (Osisioma & Enahoro, 2006; Akenbor & Ibanichuka, 2012). Most of the financial reports could not provide timely information to the users, and the going concern' threats to the business were hardly revealed. This phenomenon sharpens the concerns of the investors and other stakeholders regarding accounting irregularities and the quality of financial reports.

Accounting Practice

Accounting provides financial information about a business either for profit oriented organization or not-for-profit organization. Owners, managers, investors and other interested parties need financial information for decision making. Financial accounting is the art of systematically identifying, measuring, recording, classifying and summarizing in a significant manner and in terms of money, transactions, and events which

are, in part at least, of financial nature, and communicating, analyzing and interpreting the results thereof (Woode and Sangster, 2008). Evidence from the literature shows that financial accounting as an organizational function aims at measuring, processing and communication financial information, which is crucial for business success as well as organization for effective decision making. Several researchers describe accounting information as value relevant if it significantly relates to equity market value (Ohlson, 1995; Barth, 2001; Beaver, 2002). Earlier studies relate the value relevance of accounting information to investors behaviour and the change in behaviour. More extensively and recent studies relate value relevance to firm value. Francis and Schipper (1999) stated that value relevance is the accounting informations ability to determine a firms value. Aboody, Hughes, and Liu (2002) define the relationship between market values and financial numbers as the mapping from accounting information to intrinsic value which refers to the present value of expected future dividends additional on all available information.

Manual Accounting Practice

The manual accounting practice is an information system. Awosejo, Kekwaletswe, Pretorius, and Zuva (2013) were of the opinion that an information system organized means of collecting, entering, and processing data and storing, managing, controlling, and reporting information so that an organization can achieve its objectives and goals. Manual accounting implies that employees perform the whole accounting cycle manually on a periodic basis: they draft trial balances, journalize transactions, and prepare financial statements. Extensively, Asamoah (2018) highlighted that accounting system can be a simple manual one based on the general journal (where transactions are recorded chronologically as debits and credits), general ledger (where the activity from the general journal is summarized by account number), and other journals required to manage the business, such as purchase, payment, sales, receipts, and payroll journals. (Because of the expense of maintaining multiple manual journals, institutions typically do not prepare all of these other journals.) They further state that a manual accounting system typically includes at least the following General journal, General ledger, Subsidiary ledgers (accounts receivable, inventory, and fixed assets), Transaction reports and financial statements. Despite the advantages of manual accounting systems such as comparative cheap workforce and resources, reliability, independence from machines, skilled workers availability; the manual system disadvantages include: reduces speed, increases the workload of accountants, relatively slower internal control reporting, routine work and some others such as the issue of backups.

Technological Accounting Practice

A review of the literature on the practice of Technological Accounting shows that terms like computer-based accounting system and accounting information system are being used in describing electronic accounting (Amidu, Effah & Abor, 2011). However, there are differences in the use of these terms. The explanation for these differences is on the basis that advancements in technology will continually broaden the scope of e-Accounting. For instance, Toporet *al.*, (2021) assert that technological accounting is an accounting system that relies on computer technology for capturing and processing financial data in organizations. Conceptualizing technological Accounting to connote the application of computer technology in capturing an organization financial data might give it a narrow meaning, the reason being that it makes no recourse to other technologies. Likewise, Relhan (2013) iterates that electronic accounting is characterized by its ability to provide multi-user access, multi-site access, multiple shared database, zero system administration for end users and the capabilities of providing economical service to a large number of clients for an efficient accounting process. Having conceptualized the term concept of technological accounting practice, the study captured the presence of an technological accounting practice based on one or all of the following platforms such as the use of spreadsheets, accounting software, and web-based accounting. The use of technological accounting embraces accounting software such as Tally, QuickBooks, Peach Tree, and so on in a safe and protected environment that can allow key organizational personnel to

access it anywhere they wish at any time. Technological accounting practice adopts the same concept as journals, reports ledgers and statements that were present in the manual system. In the computerized systems, all the posting functions and other basic operations are consolidated into a “behind the scenes” system. Financial statements and reports are also easily generated which increase management review performance. Therefore, Technological accounting practice can be described as a computer-based system that integrates the accounting concepts and principles with the information system concept for the recording, processing, analysis and production of financial information that could be used to make economic decisions (Gelinias, Sutton & Hunton 2015).

Firm Financial Performance

According to literature (Duchesneau & Gartner, 1990; Smith *et al.*, 1987), Firm Performance can be measure using financial and Non-financial parameter. The financial criteria may include profits, revenues, returns on investment, returns on sales, etc. The non-financial measures may be customers’ satisfaction and customers’ referral rates, delivery time, waiting time and employees’ satisfaction. etc. (Chong, 2008). Financial performance is an objective measure of how well a firm can use assets from its primary mode of business and generate profits (Tungo, 2014). There are many different ways to measure financial performance, but all measures should be taken in aggregate. This is based on Beisland’s (2009) observation of the ability to capture firm value. In this global world, most establishments need to strategize on techniques that will have an impact positively on the overall performance of an organization.

Empirical Review

Oyebiyi, Maskeliunas, & Robertas (2017) pointed out that SMEs in the manufacturing sector are being driven to embrace technology in order to improve their operations, keep up with competitors, and enhance supplier relationships. Technology Readiness Usage Index (TRUI) form one of the major forces for innovation usage as observed by Jacob et al (2015). Literature (Tseng *et al.*, 2007; Laudon; 1990: Flamholtz; Kannan-Narasimhan & Bullen, 2004; OECD; 1991: 1999) revealed that some variables, such as technological costs and capabilities, human resources, maintenance costs, training costs, and development costs, serve as driven mechanisms for technological accounting usage in any corporate firm. More so Jacob et al (2015) emphasis that Technological Accounting Readiness Usage Index form the driver for effective technological accounting and serve as a predictors of innovation implementation from the perspective of the health industry as it is provides a numerical value that represents the extent to which technology is being effectively used considering the usage intensity, functionality, and integration level and user satisfaction. The extent to which factors can be explore in the food and beverage firm form a gaps in this study.

Oladejo and Yinus (2020) examine the impact of e-accounting practices on financial reporting quality of selected banks in Nigeria. mixed research were employed within a period of 2010-2017. Ten deposit money banks in Nigeria were selected using homogeneous purposive sampling. Three hundred copies of a questionnaire were administered randomly on the selected staff of the banks out of which two hundred and sixty were returned and used for the study. Data collected were analysed using descriptive statistics like table and percentage with inferential statistics such as pooled regression analysis at 95% confidence level findings revealed that e-accounting practice enhanced accounting procedure and improved the timeliness of report generation and financial reporting quality of banks. Engaging SMEs in the manufacturing, agriculture, mining and construction, hotel and hospitality, information technology, medical services, wholesale and retail trade, and general services,

Baporikar (2020), Idota *et al.* (2020) & Ashrafi and Murtaza (2013) in their study mentioned that electronic accounting has been widely accepted that SMEs generally play a crucial role in a country’s economy, and their role is the key to a country’s economic stability to achieve targeted gross domestic product (GDP). Hernandez (2020) and Amiduet *al.* (2011) opined that accounting function contributes an important role in

the success or failure of any SME or modern business organization. Ibrahim *et al.* (2020) and Jinggaet *al.* (2010) mentioned that AISs are helpful for recording accounting transactions, analyzing, monitoring and analyzing financial statements of any company. AISs also help to prepare documents necessary for taxation purpose and generate information that support many other organizational tasks. Bashorunet *al.* (2020) highlighted that prior to the emergence of personal computers, companies used only manual approaches for recording accounting transactions which result in lack of fair financial data. Araya-Leandro *et al.* (2020) and Azih (2018) noted that manual accounting systems consist of accounting ledgers prepared using paper, typewriters and calculators. Thottoliet *al.* (2019a, b, c) found in their study that ICT has a significant impact on the auditing practices. It means that there is a significant and positive relationship between the ICT and the auditing practices of accounting professionals. Voghouei, Jamali and Sharifi, 2021 examined the impact of Information and Communication Technology (ICT) on the Iranian manufacturing sector. In this research, the effect of ICT on firm performance (manufacturing units with ten employees and more) has been investigated. By considering data of 22 sectors during 2008-2016 and employing the GMM method, the impact of ICT application's usage on the income growth has been assessed. The results showed that hardware and software usage, communication technology has a positive and significant effect on income growth. While fixed capital formation, employment, exchange rate and R&D have a positive and significant impact, the producer price index has a negative and significant effect on income growth.

Gap in Literature

Several existing studies on the technological accounting practice and performance in developed and developing countries have been reviewed. There is obviously a lack of sufficient research on technological accounting and financial performance in the area of food and beverages manufacturing. Much studies focused on electronic accounting and financial reporting/ performance from perspective of SMEs and other manufacturing firm such as agriculture, mining, construction, others concentrated on technological innovation in service industry such as banking sector. Furthermore, having looked at different literatures on technological accounting practice and firm performance, most of the studies used a qualitative approach. The variables of their studies were measured based on perception and qualitative methods. In contrast, the current study express both quantitative and qualitative characteristics of technological accounting practice, which is expected to improve the financial performance of food and beverages manufacturing firms. The extent to which technology-driven accounting practice influences the return on investment of food and beverage sector form another gap created by this present study. More so, this study create gaps based on usage of Contingency theory, and TAM as a construct model for the study based on the fitness of the models for technological accounting usage and how its influence performance of selected listed food and beverages manufacturing firms in Nigeria.

METHODOLOGY

The study covered all listed manufacturing food and beverages firms operating in Lagos and registered with Lagos chamber of commerce and industry. The choice of Lagos is due to its economic status as the commercial hub of the nation. The population of this study comprised all the thirty nine (39) Medium and Large Scale food and beverage manufacturing firms operating with technological compliance according to Lusha Systems based report (2023). Both primary and secondary data were employed. Primary data were collected through the use of a structured questionnaire. Secondary data covering the years 2013 and 2022 was collected through audited financial reports of the fourteen (14) purposive selected food and beverage manufacturing firms ((Dangote Flour Mills, Dangote Sugar, UAC, Nestlé Nigeria Plc, Flour Mills of Nigeria Plc, Nigerian Breweries Plc, Cadbury Nigeria Plc, Unilever Nigeria Plc, Guinness Nigeria Plc, Promasidor Nigeria Limited, Chi Limited (Chivita), OLam Group Nigeria Limited, DuffiPrama Food, and Seven Up Bottle Comapany). One hundred and twenty-six copies of questionnaires were administered to staff of the 14 selected firms across relevant units using stratified random technique. The collected data were

analyzed using descriptive analysis and inferential statistics. The formulated hypotheses were tested using ANOVA, Pearson Product Moment Correlation Coefficient (PPMCC), analyses. All tests were conducted at 95% confidence level.

RESULTS AND DISCUSSION

Descriptive Analysis Factors Influencing Technological Accounting Practice Usage

Table 1, provides insights into the factors influencing the adoption of technological accounting practices among respondents, segmented by the frequency of responses. It is notable that perceived benefits and market demand emerged as the most significant factors, with 74.60% and 72.22% of respondents respectively rating them as “Most High.” This suggests that respondents recognize the advantages and market pressures driving the adoption of technological accounting tools.

Moreover, the high ranking of perceived benefits implies that respondents perceive technological accounting practices as advantageous, possibly due to their potential to enhance efficiency, accuracy, and decision-making processes within firms. Similarly, the strong emphasis on market demand reflects the influence of external factors such as customer expectations, regulatory requirements, and industry standards, compelling firms to integrate technological solutions into their accounting processes to remain competitive.

The business environment factor, ranked third, underscores the impact of organizational culture, management support, and external economic conditions on the adoption of technological accounting practices. Firms operating in dynamic and competitive environments may be more inclined to invest in technological innovations to adapt to changing market conditions and stay ahead of competitors.

Meanwhile, the lower rankings of firm size and the cost of technology highlight nuanced considerations. While smaller firms may face resource constraints or perceive technological investments as less urgent, larger firms may leverage their financial capacity to implement advanced accounting technologies. However, the cost factor remains significant, with 40.48% of respondents rating it as “Most High,” indicating that financial considerations can influence adoption decisions.

Table 1: Factors Influencing Technological Accounting Practice Usage

Factors	Most High Freq (%)	High Freq (%)	Moderate Freq (%)	Low Freq (%)	Not at all Freq (%)	WMS	Rank
Perceived Benefit	94(74.60)	32(25.40)	0(0.00)	0(0.00)	0(0.00)	4.75	1 st
Market Demand	91(72.22)	35(27.78)	0(0.00)	0(0.00)	0(0.00)	4.72	2 nd
Business Environment	79(62.70)	47(37.30)	0(0.00)	0(0.00)	0(0.00)	4.63	3 rd
Firm Size	56(44.44)	70(55.56)	0(0.00)	0(0.00)	0(0.00)	4.44	4 th
Cost of Technology	51(40.48)	75(59.52)	0(0.00)	0(0.00)	0(0.00)	4.40	5 th
Total				126	100		

Source: Field Survey, 2024

Assessment of Difference in the factors determining of technological accounting practice usage Using ANOVA

The results of the ANOVA presented in table 2 support the assertion that there is differences in the factors determining technological accounting practice usage within the selected food and beverages manufacturing

firms indicating variations in the determinants variables incorporated in the model. The high R^2 value of 0.721 with p-value of 0.000 further indicate that there is differences in the factors determining technological accounting practice usage.

Table 2: ANOVA model summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.813a	0.721	0.718	0.74633

a. Predictors: (Predictors: Technological accounting practice, Dependent variable: Accounting standard)

Source: Author’s Computation, (2024).

Relationship between technological accounting practice and financial performance of selected food and beverages manufacturing firms in Nigeria

Analysis in table 3, presents the Pearson Product Moment Correlation (PPMC) results showing the correlation coefficients between technological accounting practices and financial performance indicators (return on assets, return on equity, and Tobin Q ratio) for selected food and beverages manufacturing firms in Nigeria. There is a significant negative correlation between ICT assets and return on assets ($r = -0.405$, $p < 0.001$), indicating that higher ICT asset investments are associated with lower returns on assets. However, there is no significant correlation with return on equity or Tobin Q ratio. There is a significant negative correlation between software acquisition and return on assets ($r = -0.267$, $p < 0.05$), suggesting that firms that invest more in software acquisition tend to have lower returns on assets. However, there are no significant correlations with return on equity or Tobin Q ratio. There is a significant negative correlation between human resource costs and return on assets ($r = -0.255$, $p < 0.05$), indicating that higher human resource costs are associated with lower returns on assets. However, there are no significant correlations with return on equity or Tobin Q ratio. There is a significant positive correlation between maintenance costs and Tobin Q ratio ($r = 0.296$, $p < 0.05$), suggesting that higher maintenance costs are associated with higher Tobin Q ratio. However, there are no significant correlations with return on assets or return on equity. These findings suggest that while ICT assets, software acquisition, and human resource costs may have negative implications for financial performance in terms of return on assets, maintenance costs may have a positive impact on market value measured by Tobin Q ratio.

Table 3: Pearson Product Moment Correlation of Relationship between technological accounting practice and financial performance of selected food and beverages manufacturing firms in Nigeria

	Return on Assets	Return on Equity	Tobin Q Ratio
Ict Asset	-0.405***	-0.108	0.146
Software Acquisition	-0.2670*	-0.149	0.106
Human Resource Cost	-0.255*	-0.057	0.158
Maintenance Cost	-0.017	-0.116	0.296*

Source: Field Survey, 2024

DISCUSSION OF FINDINGS

The results of the analysis revealed that all identified specific Factors such as Perceived Benefit, Market Demand, Business Environment, Firm Size and Cost of Technology Influence Technological Accounting Practice Usage in the selected food and beverage firms. These results are supported by earlier studies of

muhabudeen (2015), Oladipupo & Ireferin, (2018), Oladejo & yinus (2020), Adewoye & Yinus, (2019), Albar & Hoque, (2017); Acar, Kocak, Sey, & Ardit, 2015: Oladejo, (2014). shedding light on factors influencing the usage of technological accounting practice. Analysis from the findings revealed that there is a positive and significant relationship between technological accounting practice and firm performance in the sampled sectors, aligning with the outcomes of studies by Breen et al. (2013), Relhan (2013), Zakaria et al. (2011), Topor et al. (2021), and Tijani (2013).

CONCLUSION AND RECOMMENDATION

The study concluded that all the identified variables, including Perceived Benefit, Market Demand, Business Environment, Firm Size, and Cost of Technology, influenced the usage of technological accounting. Additionally, it was concluded that technological accounting practice is significantly correlated with firm performance, as it facilitates effective accounting procedures and positively influences the quality of financial statements presented by corporate firms, particularly in the food and beverages sectors. In view of the conclusion drawn from the findings of the study, it is recommended that food and beverages manufacturing industry should invest in advanced accounting software and tailored technology accounting solutions

CONTRIBUTION TO KNOWLEDGE

This study contributed to knowledge in the fields of accounting informatics and business innovation management by providing a guide to policy formulation in the area of using technology to facilitate accounting procedures for better performance. It further formed the basis for policy formulation in a globalized society towards the achievement of effective firm performance using technological accounting practices.

REFERENCES

1. Abdelraheem, A., et al. (2021). The effect of information technology on the quality of accounting information. *Journal of Accounting*. 7(1): p. 191-196
2. Abdo, K. K., Al-Qudah, H. A., Al-Qudah, L. A., & Qudah, M. Z. A., (2021). Effect of adopting the criterion of revenue from contracts with clients on accounting conservatism Proceedings of ICGER, *International Journal of Innovation*. 3(3): p. 55-66.
3. Acar, E.; Kocak, I.; Sey, Y.; Ardit, D. (2005): Use of information and communication technologies by small and medium-sized enterprises (SMEs) in building construction. *Constr. Manag. Econ*, 23, 713–722.
4. Adewoye J.O, and Adeagbo I. (2021). Information Communication Technology and Financial Performance of Manufacturing Firm: Experience from Nigeria. *KIU Interdisciplinary Journal of Humanities and Social Sciences*, 2(3): 1-10.
5. Adewoye, J.O. (2007). Impact of information technology investment on banking: Operations in Nigeria. *Journal of International Business Management* 4(1), pp 70 – 78.
6. Adeyemi, A. A. and Asaolu, T.A. (2014). An empirical investigation of the financial reporting practices and banks' stability in Nigeria. *Journal of Business and Management Review Sciences Kuwait Chapter of Arabian* 4(1):145–156.
7. Agwu, Edwin, and Taiwo, J. N. (2016). Effect of ICT on Accounting Information System and Organizational Performance. *European Journal of Business and Social Sciences*, Vol. 5, No. 02, May 2016. , Available at SSRN: <https://ssrn.com/abstract=3122462>.
8. Ahmad Fikri Faqih1, Carolus Peter Ortega Schoggers, Fransisca Hanita Rusgowanto (2023) Factor Affecting intention of Food and Beverages MSMES in JOBO DETAK to Adopt Cloud Accounting . *Proceedings of the International Conference on Economic, Management, Business and Accounting*,

ICEMBA 2022, Tanjungpinang, Riau Islands, Indonesia

9. Aker, (2007) "Customer Lifestyles and Technology usages," *Business Strategy Series*, Vol. 11, No. 4: 227-243, 2010.
10. Alamin, A. Y., William, W. M. and Salzman, S. (2015). An Empirical Study of Factors Influencing Accounting Information Systems Adoption. Completed Research Papers. Paper 3. ISBN 978-3-00-050284-2.
11. Alrabba, H.M., Alrjoub, A.M.S., Ahmad, M.A., & Shbial, M.A.L. (2021). Evaluation Study between the Traditional Financial Accounting and Electronic Financial Accounting and its Impact on Raising the Efficiency of Company's Capital. *Academy of Strategic Management Journal*, 20(S1).
12. Amidu, M., Effa, J. & Abor, J. (2011). Electronic accounting practices among small and medium enterprises in Ghana. *Journal of Management Policy and Practice*, 12(4), 146-155.
13. Awosejo, O. J, Kekwaletswe, R. M., Pretorius, and Zuva (2013). The Effect of Accounting Information Systems in Accounting. *International Journal of Advanced Computer Research* 3(12): 45-49.
14. Awosejo, P. P., Ajala, E. B., & Agunbiade, O. Y. (2014). Adoption of accounting information systems in an organization in South Africa. *African Journal of Computer & ICT*, 7(1), 127-136.
15. Bagranoff, N, A., Simkin, M, G., and Norman, C, S. (2010). Core Concept of Accounting Information System. Eleventh Edition. John Wiley & Son, Inc., USA.
16. Banerjee, A. (2019). Predicting stock return of UAE listed companies using financial ratios. *Accounting and Finance Research*, 8(2), 214-225.
17. Benjamin B. Bae and Paul Ashcroft, (2004). Implementation of ERP system; Accounting and auditing implications, *Information systems control journal*, volume 5.
18. Brynjolfsson, E. and Hitt, L. (1995): Information technology as a factor of production: The Role of Differences Among Firms in Economics of Innovation and New Technology.
19. Emenyonu, C. A., Eze, C. C., & Ejike, O. U. (2020). Factors Influencing Cassava Farmers' Climate Change Risk Perception in Anambra State, Nigeria. *American Journal of Climate Change*, 9, 217-227. <https://doi.org/10.4236/ajcc.2020.93014>
20. Emmanuel, O. W. (2015). Computerized Accounting System an Effective Means of Keeping Accounting Records in Ghanaian Banks: a Case Study of the GaRural Bank. *International Journal of Research in Business Studies and Management* 2(11): 111-141.
21. Ghani, A. A., (2012). Adaptation of the Internal Control Systems with the Use of Information Technology and its Effects on the Financial Statements Reliability: An Applied Study on Commercial Banks, *International Management Review* 16 (8), 255-270.
22. Ghasemi, M., Shafeiepour, V., Aslani, M., and Barvayeh, E. (2011). The Impact of Information Technology (IT) on Modern Accounting Systems. *Procedia-Social and Behavioral Sciences*, 28(15): 112- 116.
23. Golochalova, I., & Tsurcanu, V. (2020). Measurement of Financial Statements Information in the Context of Harmonization of the Accounting Systems. *Journal of Finance and Accounting*, 8(1), 48-58.
24. Halandy, Alan Ajeeb & Ghabban, Thaer Sabry (2009). Role of internal control under the electronic accounting Information system- applied study on a sample of the Kurdistan Banks- Iraq, *Human Sciences Magazine*; issue 45, pp. 1-39.
25. Hall, B. H. (2011). Measuring the Returns to R&D. In Hall, B. H. and N. Rosenberg, *Handbook of the Economics of Innovation*, pp. 1034-1076.
26. Hamade, S.N. (2009) Information and Communication Technology in Arab Countries: Problems and Solutions, in the proceedings of: New Generations, 6th Conference on Information Technology, Las Vegas, NV, USA, 27-29 April, 1498-1503.
27. Hariyati, H., Tjahjadi, B. and Soewarno, N. (2019), "The mediating effect of intellectual capital, management accounting information systems, internal process performance, and customer performance", *International Journal of Productivity and Performance Management*, Vol. 68 No. 7, pp. 1250-1271. <https://doi.org/10.1108/IJPPM-02-2018-0049>

28. Irefin, I.A, Abdul-Azeez, I. A, and Tijani, A. A. (2012) An investigative study of the factors affecting the adoption of information and communication technology in small and medium scale enterprises in Nigeria Australian Journal of Business and Management Research Vol.2 No.02 ,pp 01-09.
29. Ironkwe, O. (2013). Accounting Information and Financial Performance of Banks in Nigeria, Journal of Accounting and Financial Management, 2(3): 22-36.
30. Ismail, N. A. and King, M. (2007). Factors influencing the alignment of accounting information systems in small medium sized Malaysian manufacturing firms. Journal of Information systems and Small Business, 1(1):1-19.
31. Jacobs, S.R., Weiner, B.J., Reeve, B.B. et al. Determining the predictors of innovation implementation in healthcare: a quantitative analysis of implementation effectiveness. BMC Health Serv Res 15, 6 (2015). <https://doi.org/10.1186/s12913-014-0657-3>
32. Jawabreh, O., Jahmani. A., Khaleefah, Q., Alshatnawi, E., & Abdelrazaq, H. (2020). Customer Expectation in Five Star Hotels in Aqaba Special Economic Zone Authority (ASEZA). International Journal of Innovation, Creativity and Change, 11, (4).
33. Laukkanen, T., S. Sinkkonen, M. Kivijarvi, and P. Laukkanen, (2007) "Innovation resistance among mature consumers," *International Journal of Marketing*, Vol. 24, No. 7: 419-427.
34. Lawani, I. R , Umanhonlen, O. F, and Okolie, R. O. (2015). Conservatism and Value Relevance of Accounting Information in Quoted Firms in Nigeria. International Journal of Finance and Accounting. 4(1): 21-39.
35. Lawrence Amadi (2023): Global perspective Regarding the future of Accounting: ICAN Technology Conference in Conjunction with KPMG Advisory Services, Nigeria
36. Mahmood, M.A., L. Hall, L., and D. L. Swanberg (2006) "Factors Affecting Information Malaysian Consumers' Perspective, Asia Pacific Business Review, 3(1), 91-96
37. McMahon RGP, Davies LG. Financial reporting and analysis practices in small enterprises: Their association with growth rate and financial performance. J Small Bus Manage 1994;32(1):9 – 17. Mia L. The role of MAS information in organisations: An empirical study. Br Account Rev 1993;25:269 – 85.
38. Munasinghe, P. G. (2015). Factors influence on usage of computerized accounting system on small and medium scale enterprises. <https://www.researchgate.net/publication/293172935>
39. Nzomo, Samuel. 2013. "Impact of Accounting Information Systems on Organizational." International Journal of Accounting Information System (November):1–71.
40. Odero, A. (2014). The Effect of Accounting Information System Quality on Financial Performance of SmesIn Nairobi County" Master Degree, University of Nairobi School of Business. (Unpublished)
41. Ohlson, J. A. (1995). Earnings, book values, and dividends in equity valuation. Contemporary Accounting Research 11(2):661-687.
42. Ohlson, J. A. (2009). Accounting data and value: the basic results. Contemporary Accounting Research. 26(1):231-259.
43. Okafor, V.I., Amaka, E.M (2021): Impact of ICT on Accounting Practice in Nigeria: *Contemporary Journal of Management, Published by Academic Ink Review* ISSN 2766-1431.
44. Oladejo M. O, Akande O. and Yinus .O (2014): Impact of ICT Adoption on the Performance of Small and Medium Scale Food and Beverages Firms in Nigeria: *International Journal of Advance in Management and Economics*. Vol. 3 Issue 3 pp 45-52
45. Oladejo, M. O and Yinus, O (2014); An influential analysis of the Impact of Information Technology (IT) on Cooperative Services in Nigeria: *European Journal of Business and Innovation Research*, Vol, 2, no 3 pp11-24,june 2014
46. Olufemi, O. O., Festus, A. F., &Adekunle, A. M. (2021). Accounting Software in Computerized Business Environment and Quality of Corporate Reporting. *Journal of Finance and Accounting*, 9(3), 101.
47. Padachi, K. (2012). Factors affecting the adoption of formal accounting systems by SMEs. *Business and Economics Journal*, 3(7): 1-20.
48. Palepu, K. G., Healy, P. M., Wright, S., Bradbury, M., & Coulton, J. (2020). *Business analysis and*

valuation: *Using financial statements*. Cengage AU.

49. Romney, B. M. (2009). *Accounting Information System*, Twelfth Edition. Pearson Education Limited: England
50. Sekyere, Amoateng and Frimpong (2017); the determinants of computerized accounting system on accurate financial report in listed banks on the Ghana stock exchange. *International Journal of Finance and Accounting*, 6(4): 104-110.
51. Thottoli, M.M., Thomas, K.V. and Ahmed, E.R. (2019a), "Qualitative analysis on information communication technology and auditing practices of accounting professionals", *Journal of Information and Computational Science*, Vol. 9 No. 9, pp. 529-537.
52. Thottoli, M.M., Thomas, K.V. and Ahmed, E.R. (2019b), "Adoption of audit software by audit firms: a qualitative study", *Journal of Information and Computational Science*, Vol. 9 No. 9, pp. 768-776.
53. Thottoli, M.M., Thomas, K.V. and Ahmed, E.R. (2019c), "Examining the impact of information communication technology on auditing professionals: a quantitative study", *Journal of Advanced Research in Dynamical and Control Systems*, Vol. 11, pp. 476-488.
54. Tijani, O. M., and Mohammed, A. K. (2013). Computer-based accounting systems in small and medium enterprises: Empirical evidence from a randomized trial in Nigeria. *Universal Journal of Management*, 1(1): 13-21.
55. Topor, D. I., Akram, U., Fülöp, M. T., Căpușneanu, S., & Ionescu, C. A. (2021). E-Accounting: Future Challenges and Perspectives. *CSR and Management Accounting Challenges in a Time of Global Crises*, 35-52.
56. Trabulsi, R. U. (2018). The Impact of Accounting Information Systems on Organizational Performance: The Context of Saudiâ€™s SMEs. *International Review of Management and Marketing*, 8(2), 69-73.
57. Udegbumam, Emmanuel obidi, odimmega, uchenu, chimezieada, chinyeregenevive & macpherson, chukwudinwogu (2018): electronic accounting a tool for quality management of small and medium scale enterprises (smes) in the 21st century nigeria. *Nigerian journal of business education (nigjbed)*, volume 5 no.2, 86-95.