



Volume: 04 Issue: 11 | 2023 ISSN: 2660-454X

<https://cajitmf.centralasianstudies.org>

## The Impact of Technological Capabilities on the Enhancement of Financial Data Reliability: An Analytical Investigation of Zain Iraq Telecommunications Company

<sup>1</sup>Salah Awad Mohamed

Received 25<sup>th</sup> Sep 2023,  
Accepted 30<sup>th</sup> Oct 2023,  
Online 10<sup>th</sup> Nov 2023

<sup>1</sup> College of Computer Science and  
Information Technology  
Kirkuk University  
salahawad@uokirkuk.edu.iq

**ABSTRACT:** The technological capabilities of a corporation are a crucial factor in attaining success and obtaining a high level of excellence. The utilization and integration of these technologies can yield significant benefits across all facets of organizational functioning, encompassing accounting procedures. This can be achieved through the optimization of financial reporting, resulting in improved outputs and heightened quality. Therefore, the primary objective of this study is to provide a comprehensive understanding of the impact of technological capabilities on enhancing the dependability of financial data. The research challenge revolves around the imperative to improve the dependability of financial data at Zain Company and enhance it via the incorporation of sophisticated technological capabilities. Hence, the primary objective of this study is to examine the impact of technological capabilities, specifically information technology infrastructure, technology training, and relationship capacity, on enhancing the dependability of financial data. The dependent variables in focus include perfection, caution, neutrality, information quality, and honest representation. The context of this investigation is the Zain Iraq Telecommunications Company.

The researchers operationalized the research purpose by developing a theoretical model that encompasses research variables, dimensions, and hypotheses, employing the analytical approach within Zain Iraq Telecommunications Company. Multiple hypotheses were created and subsequently evaluated through the utilization of suitable statistical techniques and the

Statistical Package for the Social Sciences (SPSS). The study's target group was comprised of personnel working at Zain Iraq Telecommunications Company. A sample size of (112) participants was selected for the research. The study yielded multiple findings, one of which was a notable positive association between the overall technological capacities and the overall dependability of financial data for Zain, as evidenced by its variables.

The researcher's recommendations, as informed by the research findings, suggest that Zain's administrators should prioritize and enhance their technology capabilities. The enhancement of internal financial transactions within the organization can be attained by focusing on the development of people capabilities, infrastructure, and relationships, and effectively integrating their utilization.

**KEYWORDS:** Technological capabilities, Financial data reliability.

## Introduction

Financial reports that are highly dependable play a crucial role in facilitating decision-making processes by offering useful information. These reports are characterized by their relevance and accuracy in representing the economic reality of a business's activities throughout the reporting period, as well as the financial condition of the company at the end of said time. Due to the significant significance attributed to reliability in financial reporting, firms consistently endeavor to improve this aspect. This objective is accomplished by actively pursuing optimal capabilities, particularly those of a technological nature, that play a vital role in the processes of knowledge transfer, generation, and engagement.

In recent decades, there has been a notable evolution in the realm of academic and practical accounting thinking, which has been essential in addressing a myriad of financial difficulties. The growth of financial management has led to a notable transformation in the structure and operational approaches of contemporary businesses. This shift is primarily attributed to the growing importance of information processing and analysis, which has emerged as a crucial resource and integral component of the financial process for any organization. Consequently, the advent and assimilation of technological skills have engendered novel prospects for managers of business organizations to identify domains for their application in company plans and in enhancing the financial performance of these enterprises.

## Chapter one: Research Methodology

### Firstly: Research Problem

The utilization of technical capabilities in financial operations has resulted in companies benefiting from the advantages that these capabilities provide. Nevertheless, a concern arises over the trustworthiness of the data that has been released and created. The concepts pertaining to data protection and reliability have undergone significant evolution. The potential for unauthorized access to this data and the

manipulation of inputs has given rise to the possibility of generating deceptive outputs. Hence, there is a pressing need to prioritize technological capabilities in order to enhance the dependability of financial data.

Companies that are engaged in business activities in Iraq, like Zain Company, encounter a multitude of obstacles and concerns pertaining to their financial information. The lack of credibility and trustworthiness in these assertions can be attributed to the limitations of decision-makers. This is mostly due to their limited understanding of the potential of these technologies, as well as the inefficiency displayed by users in utilizing these technological capabilities.

From the above presentation, the research focuses on highlighting the impact of technological capabilities in enhancing the reliability of financial data. Therefore, posing the following questions can contribute to clarifying the content of the research problem:

Is there a correlation between technical capabilities and the reliability of financial data in a sample research company?

Is there a positive impact of technical capabilities on improving the reliability of financial data in a sample research company?

### **Secondly: The Importance of Research**

The importance of research is directly attributed to the critical variables it addresses (technical capabilities, reliability of financial data) and the specific field under investigation (Zain Iraq Company). It aims to explore the correlations and relationships between these variables with the goal of improving the company's performance. The significance of this research is evident through:

1. Constructing a knowledge framework for the research topics (technical capabilities, reliability of financial data) and their dimensions. This involves tracing the theoretical paths in specialized literature, providing conceptual entry points to describe the interpretive trends for these subjects, and presenting the perspectives of researchers in relation to the scope and depth of their analysis of the content and variables.

2. Responding to the significance of the topic of technical capabilities both internationally and in the Arab context within the field of telecommunications companies.

3. Diagnosing the readiness of leadership in Zain Iraq Company to assess the impact of technical capabilities and their efficient implementation in enhancing the quality of financial reports.

4. Offering the correct scientific and conceptual foundations that enable the company's leadership to recognize technical capabilities as an advanced concept for improving the quality of financial reports.

5. Guiding Zain Iraq Company in the telecommunications sector to prioritize technical capabilities among its leadership and employ them to adapt to changes and enhance the quality of financial reports with the aim of achieving added value for the company.

### **Thirdly: Research Objectives**

Based on the research problem and its significance, the main objective of the research is to determine the impact of technical capabilities on improving the reliability of financial reports in Zain Iraq Telecommunications Company. Additionally, the sub-objectives are as follows:

1. To assess the extent to which Zain Iraq Company in the researched field adopts the concept of technical capabilities and utilizes it to enhance the reliability of financial reports.

2. To present ways to emphasize the leadership's focus on technical capabilities and their role in improving the reliability of financial reports in the sampled Zain Iraq Company. Perceptions, diagnosis, and response levels result from the interaction between leadership's cognitive abilities and the adoption of

technical capabilities in dealing with environmental variables. This interaction helps identify and improve the reliability of financial reports.

3. To identify the type and nature of technical capabilities suitable for managing Zain Iraq Telecommunications Company within the Iraqi environment.

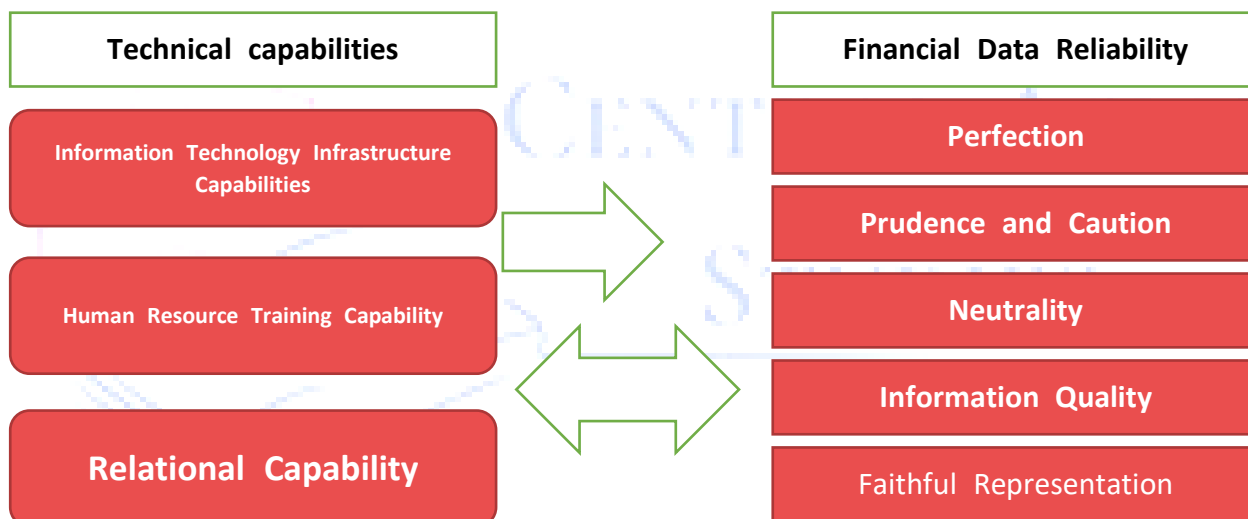
4. To understand the extent to which Zain Iraq Telecommunications Company adopts the research variables (technical capabilities, reliability of financial data).

#### Fourthly: Research Hypothetical Framework

To address the research problem within its methodological framework, it is necessary to construct a hypothetical model in which research variables, their dimensions, logical relationships among them, and the impact of these relationships on the research field (Zain Iraq Company) are elucidated. The hypothetical framework for the research can be presented through Figure (1), which represents two types of variables:

The independent variable includes the variable of technical capabilities and its dimensions, which consist of information technology infrastructure, technology training, and relational capability.

The dependent variable includes the variable of financial report reliability and its dimensions, encompassing accuracy, prudence and caution, neutrality, information quality, and faithful representation.



**Figure (1): The Hypothetical Research Framework Source: Prepared by the researcher**

#### Fifthly: Research Hypotheses

In alignment with the research problem, its importance, objectives, and the construction of the hypothetical research framework, the research establishes a set of hypotheses as follows:

**Hypothesis one:** There is a correlation between technical capabilities and the reliability of financial data in the research sample field.

**Hypothesis two:** Technical capabilities have a significant impact on improving the reliability of financial data in the research sample field.

#### Sixthly: Research Tools

Several data collection and analysis tools were adopted to obtain the final results, including the following:

**Theoretical Framework:** By reviewing books, studies, and previous research related to the research variables.

**Field Data:** For the purposes of data gathering, a questionnaire form was predominantly utilized in the practical domain. The tool was built by a comprehensive examination of the literature pertaining to the primary research variables. The measures and designs of the questionnaire were derived from existing literature and modified by the researchers to suit the specific characteristics of this investigation. The Likert five-point scale was employed to assess the research variables, with responses ranging from 1 to 5 points. The greatest score, denoted as 5 points, signifies a substantial level of agreement (Strongly Agree), while the score progressively diminishes to the lowest value of 1, representing a significant level of dissent (Strongly Disagree). The utilization of this methodology was implemented in order to secure the acquisition of unbiased outcomes and to prevent the inclusion of subjective replies that may potentially impact the precision of the research.

#### **Seventhly: Research Tool Testing**

The research tool (the questionnaire) and its associated measures underwent tests of validity and reliability, as follows:

1. **Questionnaire Credibility:** Validity pertains to the capacity of a questionnaire to accurately assess the intended construct, and it stands as a crucial prerequisite in the development of scales. If this criteria is not met, it suggests that the scale is not appropriate and its results cannot be trusted. Researchers employ a range of methodologies to assess the reliability and validity of scales, selecting those that are most appropriate for their specific study objectives. The aforementioned techniques encompass:

- **Apparent Validity:** The accomplishment was attained through the administration of the questionnaire to a group of 13 individuals who possess expertise in the subject matter, serving as judges. The individuals offered input and suggested alterations, which were taken into account in order to assess the questionnaire's validity.

- **Content Validity:** In order to evaluate the content validity of the questionnaire, the researchers conducted an analysis of internal consistency among the study variables. This was achieved by constructing correlation relationships between the variables and quantifying the strength of these relationships using correlation coefficients. The correlation coefficients indicate the degree of association between the items and the phenomenon under investigation. The examination of the correlation matrix of the variables under investigation reveals a significant degree of internal consistency among the aforementioned variables. This observation also indicates the credibility of their substance and the durability of their structure over an extended period.

2. **Questionnaire Reliability:** In this aspect, the researchers demonstrated that the questionnaire consistently yields the same results when applied again to the same research population. They used the Cronbach's Alpha coefficient to assess reliability, and the value of Cronbach's Alpha was (85%).

#### **Eighthly: Research Limitations**

**Objective Limitations:** These relate to the research variables and their dimensions as follows:

**Independent Variable:** Technical capabilities, including dimensions (information technology infrastructure, technology training, relational capability).

**Dependent Variable:** Financial report reliability, including dimensions (accuracy, prudence and caution, neutrality, information quality, faithful representation).

**Time Limitations:** The research was conducted from May 14, 2021, to January 20, 2022, encompassing the entire research timeframe.



**Spatial Limitations:** The spatial boundaries of the research were limited to Zain Iraq Telecommunications Company.

**Human Limitations:** The human limitations involved managers in Zain Company and their deputies, department and division managers, accountants, auditors, with a total of 112 individuals.

## **Chapter Two: The Theoretical Framework of the Research**

### **Firstly: Technical Capabilities**

1. **The concept of technical capabilities:** Capabilities encompass the aptitude to effectively carry out a designated set of actions or attain defined outcomes, with a focus on their application to human resources. Capacity refers to the ability to do or attain particular outcomes (Khawaleh, 2013: 1). According to Rasiah and Malakolunthu (2019: 182), it is crucial to acknowledge that an organization's resources play a significant role in facilitating its exceptional performance and establishing a strong reputation among its consumers, as well as within the broader market. These competencies enable the organization to outperform its competitors in the execution of its activities. The increasing complexity of developing technical capabilities can be attributed to the heightened levels of uncertainty and instability in the macroeconomic environment. This has had a detrimental effect on organizations that lacked a predisposition towards innovation (Nurazwa et al., 2014: 110).

Technical capabilities refer to the requisite knowledge and expertise necessary to effectively execute particular digital tasks. Proficiency in specific technical skills and capacities is crucial for achieving effective performance. It is imperative for employees to possess proficiency in the primary systems utilized. Although personal skills hold significance in the professional setting, the acquisition of technical skills and capabilities, sometimes referred to as hard skills, is vital for fostering corporate expansion (Rasiah, 2018: 166).

According to (Kumar et al. ,2019: 82), the notion of technical capabilities primarily centers on information technology, facilitating firms in attaining a competitive edge. The knowledge provided by technical capabilities enables organizations to make informed decisions and develop strategies that effectively support performance across different functional units. At a macroscopic level of strategic planning, competent management facilitates the establishment of a conducive work environment that is equipped to disseminate up-to-date and essential technical knowledge, hence influencing the degree of communication and adaptability across diverse business functions.

In a similar vein, (Oyebisi et al. ,2014: 425) define technical capabilities as a collection of tools and equipment employed by businesses to expedite, enhance, and optimize the acquisition, analysis, and presentation of information. In contemporary times, the effective functioning of business operations and tasks is heavily reliant on the utilization of modern technology and its sophisticated methodologies. This reliance enables the facilitation of various functions and activities, while also offering specialized information across diverse fields and sectors. Consequently, it assists in the timely and well-informed decision-making process, thereby influencing the performance of employees and the attainment of organizational objectives.

According to (Wang et al. ,2016: 29), technical capabilities can be described as a multifaceted combination of technical skills, knowledge, and organizational structures that are essential for the effective operation of technology and the successful implementation of any technological modifications or advancements. The primary contributors encompass the necessary resources for effectively managing and

attaining technical advancements and modifications. These resources are acquired and demonstrated through the accumulation of skills, knowledge, and organizational structures.

Technical capabilities can be defined as a concept used to activate activities, tools, physical systems, skills, knowledge bases, and administrative systems to enhance learning, acquire incentives, and generate exceptional value for the organization.

2. **The importance of technical capabilities:** The significance of this cannot be emphasized enough. The aforementioned talents are of utmost importance for organizations in the execution of tasks and technical operations. This includes the capacity to formulate and implement procedures, create products, and acquire the requisite technical knowledge, all of which contribute to attaining elevated levels of organizational efficiency. Organizational excellence can be achieved by leveraging technological capabilities to identify and harness latent talents and possibilities, so effectively advancing the organization's objectives.

Based on Tsai's (2014) findings, it is commonly observed that a significant portion, namely over 21%, of businesses' capital budgets is directed towards investments in technical skills. Furthermore, it is noted that roughly 22% of information technology budgets are frequently dedicated to infrastructure, equipment, and hardware expenditures. The attainment of an optimal equilibrium in these capacities is a pivotal determination that rests with upper-level management, necessitating a collaborative effort between them and information technology experts. The acquisition of proficiencies in information technology can present difficulties owing to the intricate amalgamation of technology, procedures, and human resources. The time required for competitors to reproduce these talents is significant, hence conferring a competitive advantage.

Wang et al. (2016) underscored the significance of technical competencies for business managers, as they asserted:

- The role of technical capabilities in long-term business strategy and their significance for organizational sustainability.
- Managers recognize the importance of technical capabilities for their role in maximizing the efficient use of resources.
- The ability of technical capabilities to interact and work with various processes in the work environment, giving the organization strength and a competitive advantage.

Technical capabilities are indeed key to gaining a competitive advantage. Several reasons can justify the advancement of technical capabilities, including the need to develop and maintain internal capabilities, research and development, changes in the technologies that underpin the control system, documenting relationships with organizations, research institutes, specialized suppliers, and developing new technical components over the long term. Technical capability is a positive indicator of product innovation, but high levels of technical capability may hinder a product from generating innovation. To mitigate this impact, investors should seek markets that demonstrate technological expansion potential (e.g., biotechnology industry) and market innovation (Oyebisi et al., 2014: 425).

### 3. Objectives of Technical Capabilities:

Technical capabilities contribute to harnessing various scientific and technological resources in a way that enables organizations to successfully develop innovative products and production processes. These objectives are as follows: (Jin & Zedtwitz, 2018: 329).

Generating a competitive environment that enables the organization to outperform its peers from other organizations by achieving competitive advantages and improving performance.

Granting patents, producing new products, and solving complex problems by relying on strategies related to the technology sourcing strategy.

Managing the organization's technological strategy through effective and efficient identification, execution, maintenance, and improvement of technological collaboration.

Creating, operating, accommodating, supporting, and expanding the scope of new values for processes and products in a dynamically changing manufacturing environment.

Generating a state of collaboration between technological strategy and the dynamic capability of the organization, in a way that provides it with an effective strategic capacity to achieve a competitive advantage.

Technical capabilities directly contribute to building a positive relationship between knowledge and economic performance, with several clear objectives, as outlined by (Coombs & Bierly in 2016: 425).

Granting organizations the ability to achieve technological innovations, enabling them to produce new and distinctive products, and thus surpass their competitors.

Pooling resources and capabilities, in a manner that enables the organization to possess more advanced technological capabilities than its competitors, and utilizing them as a means to reach higher levels.

Absorbing and creating positive technological knowledge through interacting with the environment and acquiring skills and knowledge.

Activating the role of research and development as an input to the production growth process, as investing in the relationship between research and development to activate performance directly contributes to improving the organization's operations.

#### **4. Dimensions of Technological Capabilities:**

Technological capabilities are considered a crucial element of economic growth. The development of an organization heavily relies on the capabilities, potential, and expertise it possesses, enabling it to offer innovative and advanced products that grant it a distinctive competitive position. These capabilities work to achieve exceptional levels of performance for organizations by activating organizational skills and making them effective in managing their business activities. They enhance their ability to face fluctuating and changing demands.

The short-term success of organizations doesn't necessarily guarantee their sustainability and long-term progress. Therefore, achieving organizational excellence provides the organization with the knowledge and ability to maintain today's success while preparing to adapt to the changing environment.

Technological capabilities encompass various dimensions (Croteau & Raymond, 2004).

**A. Information Technology Infrastructure Capabilities:** The notion of IT infrastructure capabilities refers to a collection of tools and components that constitute the fundamental framework of technology within a business. The system comprises of two distinct categories of components: tangible components, such as computers and equipment, and intangible components, such as networks and diverse applications. The efficacy of all departments within the organization is contingent upon the capabilities of the information technology infrastructure. According to Al-Obaidi (2020: 148), IT infrastructure capabilities encompass a wide range of components, including devices, networks, software, facilities, and



equipment. These components are essential for various activities such as development, testing, monitoring, delivery, and support of technical capabilities.

Muina and Lopez (2017: 31) pointed out that information technology infrastructure goes beyond software and hardware. It includes application systems, relationships, activities, and even the information itself, regardless of its purpose or form. This can include scientific or commercial databases, audio and visual recordings, library archives, and other media.

**B. Human Resource Training Capabilities:** The human resource training process holds significant significance in contemporary organizations, as it recognizes the human element as the foremost asset of any organization. Consequently, it necessitates careful consideration and attention to enhance performance, thereby yielding positive outcomes for the organization as a whole. However, the lack of adequate foundations for the training process within companies is not only evident in terms of its integration into the overall strategy, but also in its basic structure as a standalone process (Muina and Lopez, 2017: 32).

Human resource training is defined as a process that relies on providing technical skills and expertise with the aim of delivering technical services to individuals and groups within organizations to achieve the highest level of performance in the face of obstacles and challenges in their jobs and professions. The goal of human resource training is to enhance the skills, capabilities, and knowledge of individuals in the organization (Bergek et al, 2018: 337).

**C. Relationship Capabilities:** The use of technology by humans not only involves the use of machines such as computers and equipment but also includes building organizational relationships with other workers and the environment (Bergek et al, 2018: 338).

Building capabilities or capacity development is the process through which individuals and organizations acquire the knowledge and skills needed to perform their jobs efficiently, enhance them, and retain them. This process also involves building better relationships between individuals, management, and those benefiting from it (Lestari & Ardianti, 2019: 212).

### **Secondly: Financial Data Reliability**

**1. The Concept of Financial Data Reliability:** The collapse of companies such as Enron has sparked global discussions and generated various viewpoints on the topic of financial data reliability. Consequently, investors have become skeptical about relying on financial data for making informed decisions. Consequently, ensuring transparency and reliability in financial data has become crucial, as reliability plays a significant role in influencing a company's performance during its operational activities (Vrentzou, 2017: 338).

The assurance of the dependability of financial information is important in order to uphold the credibility and steadfastness of capital markets. The issue of data veracity in financial statements is of utmost importance to stakeholders. In the context of organizational management, it is vital to possess a precise and equitable understanding of financial information. Evaluating the dependability of intricate financial reports is a formidable undertaking. The challenge occurs mostly due to the existence of a diverse array of accounting standards that organizations have the option to adopt when compiling their financial information (Adebayo et al., 2016: 241).

According to Iyoha (2012: 42), the concept of financial data dependability pertains to the quality of data that is devoid of substantial errors, impartial, and can be trusted by users as information that faithfully depicts previous operations, activities, events, or is anticipated to properly depict future events. Data reliability refers to the extent to which data is both comprehensive and precise, serving as a fundamental

pillar for fostering confidence in data across the entire company. One of the primary goals of data integrity initiatives is to guarantee the trustworthiness of data. These initiatives are also employed to uphold data security, data quality, and regulatory compliance (Afolabi, 2017: 209).

The reliability of financial data pertains to its consistent dependability for users, particularly individuals involved in decision-making processes (Dogan et al., 2017: 228). According to AL-Tahat (2015: 317), the accuracy of financial data is demonstrated by its ability to authentically represent the intended information without any kind of prejudice or personal judgments from those responsible for its preparation. The assurance of the accuracy and dependability of financial data encompasses the prescribed protocols and circumstances that are necessary to establish the credibility and efficacy of the information, thereby persuading stakeholders at large and decision-makers in particular (Vrentzou, 2017: 338).

The concept of the reliability of financial data can be expressed as follows: Financial data is considered important and valuable when users can rely on it as a measure of events, activities, and economic conditions that it represents. This is especially true when this information exhibits a degree of objectivity characterized by impartiality, freedom from errors, and honesty in its preparation.

2. The importance of financial data reliability lies in providing useful information for the economy and decision-making. Reliability of financial reports refers to the published financial data prepared in a trustworthy manner to provide valuable information for users in making economic decisions. The emphasis on the reliability of financial reports is based on seven dimensions rooted in the qualitative characteristics of financial information, including representational faithfulness, predictive value, company-specific, neutrality, completeness, verifiability, and freedom from error (Tontiset & Kaiwinit, 2018: 293).

Financial data is one of the most crucial elements in the working environment, and its importance is evident through its significant role for the stakeholders who shape this environment (Adeniran et al, 2013: 114). While financial data may be reliable, users may face challenges in understanding, using, and analyzing it in their decision-making model. Information should be understandable, and characteristics such as clarity and simplicity in published information reflect this. However, many users have varying levels of education, comprehension, and diverse objectives, making this task challenging for accountants in reconciling the different and contrasting preferences and qualities of financial data users (Aljifri, 2010: 52).

**3. Characteristics of Financial Data Reliability:** The inclusion of qualitative attributes in financial reports enhances the utility of the information they convey, thereby bolstering the assurance of users and stakeholders in their decision-making processes. Financial data that possesses certain characteristics, such as dependability, relevance, completeness, and comparability, is crucial in providing relevant information for decision-making purposes to a range of stakeholders, including investors and government agencies (Ismaeel, 2014: 241).

The primary objective of financial reports is to cater to the requirements of decision-makers. In order to accomplish this objective, the temporal aspect is recognized as one of the key information attributes in financial reports. The timely availability of financial reports is essential for providing information to decision-makers. Hence, it is imperative to promptly release financial reports subsequent to the conclusion of the accounting quarter. The usefulness of financial data diminishes when it is not promptly provided to users following the reporting date (Alqurashi, 2011: 2).

Reliability can be achieved through the following key characteristics (Fagbemi, 2011: 32)

**Neutrality:** It means not influencing the process of obtaining and preparing information intentionally, which can serve one user without another.

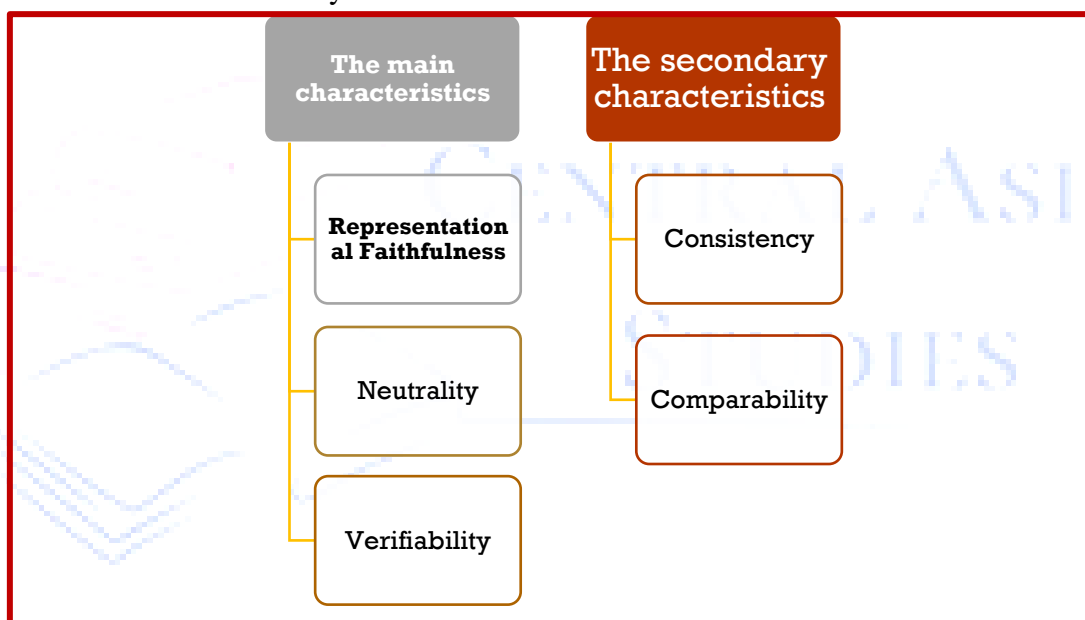
**Verifiability:** It means the ability to obtain the same results by more than one person when the same methods and techniques used in measuring accounting information are applied. It is often used as a synonym for objectivity.

**Representational Faithfulness:** It means that accounting information accurately and faithfully represents the events to which it relates, free from any intentional manipulation.

And there are secondary characteristics related to the following: (Atkinson, 2012: 215)

**Comparability:** This means that accounting information should have the ability to make comparisons between different financial periods for the same economic entity or compare it with other economic entities within the same industry.

**Consistency:** It means maintaining the use of the same methods and techniques for measuring and conveying accounting information from one period to another. If there is a need for any changes, it should be disclosed to be considered by the users.



**Figure (2): Primary and Secondary Characteristics of Financial Data Source: Prepared by the researcher.**

#### 4. Dimensions of Financial Data Reliability:

The main dimensions of financial data reliability were determined in this research based on what (Tontiset & Kaiwinit, 2018: 294) adopted. Therefore, in this paragraph, we try to identify the main dimensions of financial data reliability, focusing on completeness, prudence and caution, neutrality, information quality, and faithful representation.

**A. Completeness:** To ensure the reliability of information, it is crucial to prioritize its veracity and substance rather than solely its adherence to legal requirements. The absence of any advantage can be observed when data adheres to legal requirements but fails to accurately reflect the actual state of affairs. There are various instances that serve as illustrations, one of which is the categorization of investments. This categorization can be associated with an organization's intention to either hold them for trade purposes or make them available for sale. Consequently, it is imperative that the manner in which the financial

statements are presented is consistent with the organization's intended classification. The aforementioned idea is also applicable to assets that have been invested or transactions that occur between parties with a linked connection (Liou, F, 2018: 41).

**B. Prudence and Caution:** The prudence principle is considered to be one of the fundamental accounting concepts, as stated by Kamran (2013: 20). According to Kaminski et al. (2014: 59), the concepts of prudence and caution entail the imperative of taking into account all possible expenditures and losses when assessing the financial status and achievements of the business, without disregarding anticipated and projected earnings and profits. In contrast, it is recommended that only actual revenues and profits be acknowledged. The utilization of this idea by companies functions as a distinct safeguard against the ramifications of inflation, a matter that has garnered significant attention in the last decade. During the early 1970s, accounting associations increasingly embraced the notion of current value accounting, particularly in response to the oil crisis. This global event compelled nations to forsake the gold standard and adopt current value accounting practices.

**C. Neutrality:** The concept of neutrality refers to the absence of bias, and it is imperative that financial data be neutral when provided for broad utilization, irrespective of the specific interests of stakeholders. Moreover, the neutrality of information is determined by its processing without any preconceived notions on the potential outcomes (Abdullah et al., 2015: 32). According to Adediran et al. (2013: 115), it has been observed that the presence of verifiability in the accounting domain plays a crucial role in upholding the principle of objectivity in scientific measurements. This characteristic implies that the outcomes achieved by an individual employing specific measurement methods and procedures can be replicated by another individual employing the same approaches. The presence of verifiability in information serves as a safeguard against biases that may arise due to the personal characteristics of the individual carrying out the activity. It is crucial to distinguish between the capacity to authenticate the measurements per se and the capacity to authenticate the precision of the measurement technique's implementation.

**D. Information Quality:** The concept of information quality pertains to the necessity of ensuring that financial data is comprehensive and devoid of any omissions, deletions, or cancellations, whether they occur within the financial statements themselves or in the accompanying explanatory notes. An illustrative instance is the utilization of notes to communicate the details pertaining to shareholders' investments and withdrawals. Similarly, the revelation of non-current assets and their techniques of depreciation, together with financial investments and their methods of valuation, have been discussed by Berger (2011: 208). Nevertheless, it is important to acknowledge that there exist certain constraints on the dependability of information (Beyer et al., 2010: 301).

**1. Cost-Benefit Trade-Off.**

**2. Timeliness.**

**3. Fair Presentation (Fair Representation).**

**4. Trade-Off Between Qualitative Characteristics.**

**E. Faithful Representation:** The concept of faithful representation pertains to the potential hazards arising from uncertainty surrounding elements within financial information, resulting in their omission from recognition. As a consequence, this leads to a decrease in adherence to the principle of faithful depiction. On the one hand, the failure to acknowledge these objects is consistent with the principle of faithful representation, as there exists doubt surrounding their likelihood, worth, and quantifiability, hence

preventing them from attaining the standard of faithful representation. However, the omission of these disclosures fails to adhere to the principle of faithful depiction. According to Biddle et al. (2009: 118), Cohen et al (2014: 22) claim that faithful representation entails the accurate depiction of financial information and data, ensuring that they genuinely reflect the financial events and transactions that transpired within the business, as manifested in the financial statements. The proper representation of an organization's financial situation, encompassing its rights, obligations, and the distinction between assets, liabilities, and ownership rights, is a fundamental need of the statement of financial status. Likewise, it is imperative that the statement of income accurately reflects the financial success of the firm.

### **Thirdly: The Relationship Between Technical Capabilities and Financial Data Reliability:**

The enhancement of an organization's capacity to continually change and advance is heavily influenced by its technical skills. This is achieved through the implementation of a continuous technology development strategy that is directly associated with expansion and growth. During a period characterized by notable technological advancements in various industries, primarily driven by the introduction of novel and sustainable energy sources, organizations are compelled to continuously invest in technology to remain aligned with evolving market and technological trends. Consequently, it has become progressively crucial for these organizations to comprehend their technological capabilities and limitations. The aforementioned comprehension, adaption, and awareness contribute to the improvement of their competitive position, enabling them to furnish decision-makers with indispensable and dependable knowledge (Coombs & Bierly, 2016: 427).

The activation of organizational capacities is heavily reliant on the presence and utilization of technical skills. Investors operating in emerging economies acquire technological capabilities by investing in externally created technologies, subsequently leveraging these capabilities to foster the development of local technology. Technological capability is a crucial determinant that empowers firms to effectively execute their fundamental operations, particularly in relation to innovation, which holds significant significance for both economic progress and competitive advantage. The acquisition of these capabilities plays a significant role in the attainment of a heightened absorptive capacity, which denotes the capability to acquire knowledge and offer dependable information and solutions (Jin & Zedtwitz, 2018: 329).

## **Chapter Three: The Research Framework**

### **First: Field Description and Research Sample**

1. The research sample company is a subsidiary of the Kuwait Telecommunications Company and offers its services across many nations, namely (Kuwait, Saudi Arabia, Iraq, Sudan, Jordan, Bahrain, South Sudan, Lebanon, and Morocco). Zain Iraq constitutes a significant proportion of Zain company Kuwait's overall customer base, accounting for 33%, hence exhibiting the greatest consumer representation among the many firms within the company.

Zain Iraq commenced the provision of mobile telecommunication services, encompassing voice calls and data connectivity, across the nation of Iraq, operating under the brand name "Atheer," commencing in December of the year 2003. In the year 2007, the company underwent an acquisition by MTC, resulting in a subsequent rebranding of the company under the name Zain. Subsequently, a merger occurred between the aforementioned company and Iraqna, resulting in the establishment of Zain Iraq. The corporation was granted a 15-year operating license in August 2007. Zain Iraq achieved the status of the leading mobile telecommunications provider in the nation subsequent to its acquisition of Iraqna's network. Subsequently,



Zain Group augmented its ownership interest in Zain Iraq, raising it from 30% to 76%. The organization currently maintains a comprehensive network of branches across all governorates in Iraq. Zain was officially included on the Iraq Stock Exchange in the year 2015.

2. The research sample consisted of individuals who are employees and customers of the company. A total of 120 electronic questionnaires were distributed, and 112 valid questionnaires were collected for analysis.

### Secondly: Description and Diagnosis of Research Variables

**1. Description and Diagnosis of Technical Capability Dimensions:** Table (1) presents a summary of the technical capability dimensions. The overall agreement rate for these technical capability dimensions was 78.8%. This means that the surveyed individuals in the company under investigation confirmed the company's use of technical capability dimensions in accordance with their respective aspects. On the other hand, individuals whose responses had a negative direction accounted for 6.7%. Those who either had no opinion or provided neutral responses represented 14.5%. The initial analysis of the surveyed individuals' responses affirms that the company under study possesses dimensions of sustainable development. All dimensions had an average of 4.01, a standard deviation of 0.84, and a coefficient of variation of 0.211.

**Table (1) Summary of Technical Capability Dimensions**

| Technical Capability Dimensions | I completely agree, I agree | Neutral | I disagree, I strongly disagree | The arithmetic mean | Standard deviation | Coefficient of variation |
|---------------------------------|-----------------------------|---------|---------------------------------|---------------------|--------------------|--------------------------|
| Infrastructure capabilities     | 76.5                        | 16.4    | 7.1                             | 3.99                | 0.87               | 0.221                    |
| Training capabilities           | 81.4                        | 12.2    | 6.4                             | 4.01                | 0.82               | 0.201                    |
| Relationship capabilities       | 79.2                        | 14.5    | 6.3                             | 4.00                | 0.85               | 0.215                    |
| The overall average             | 78.8                        | 14.5    | 6.7                             | 4.01                | 0.84               | 0.211                    |

**Source: Prepared by the researcher based on the outputs of the statistical program.**

2. Description and Diagnosis of Financial Data Reliability: Table (2) summarizes the dimensions of financial data reliability. The overall agreement rate for the dimensions of financial data reliability was (78.12%). This means that the surveyed individuals confirmed the company's use of the dimensions of financial data reliability through its tools. Among the surveyed individuals, those with negative responses constituted (7.6%), while those with neutral opinions or no opinion accounted for (14.3%). The initial analysis of the responses of the surveyed individuals indicates that they believe the company possesses financial data reliability. All dimensions scored an average of (3.87) with a standard deviation of (0.85) and a coefficient of variation of (0.222).

**Table (2) Summary of Dimensions of Financial Data Reliability**

| Financial Data Reliability | Agree Completely, Agree | Neutral | I disagree, I strongly disagree. | The mean | The standard deviation | The coefficient of variation. |
|----------------------------|-------------------------|---------|----------------------------------|----------|------------------------|-------------------------------|
| Completion                 | 76.8                    | 15.1    | 8.1                              | 3.70     | 0.88                   | 0.237                         |
| Caution and Care           | 78.6                    | 13.3    | 8.3                              | 3.79     | 0.87                   | 0.229                         |
| Neutrality                 | 80.1                    | 13.8    | 6.1                              | 4.02     | 0.82                   | 0.203                         |
| Information Quality        | 78.5                    | 15.1    | 6.4                              | 3.94     | 0.87                   | 0.22                          |
| Honest Representation      | 77.2                    | 15.7    | 7.1                              | 3.96     | 0.87                   | 0.219                         |
| Overall Average            | 78.12                   | 14.3    | 7.6                              | 3.87     | 0.85                   | 0.222                         |

**Source:** Prepared by the researcher relying on the outputs of the statistical software.

### Thirdly: Testing the Research Hypotheses.

1. **Testing the First Hypothesis:** It posits a significant positive relationship between technical capabilities and the reliability of financial data, as indicated by their dimensions. Table (3) presents the results of testing the relationships associated with this hypothesis.

**Table (3) Results of the Correlation Relationships**

| The explanatory variable.   | Technical capabilities. |
|-----------------------------|-------------------------|
| The responsive variable.    |                         |
| Financial data reliability. | *0.61                   |

$N=1120.05 \leq P^*$

Table (3) demonstrates a statistically significant and positive association between technological capabilities and the trustworthiness of financial data. The overall correlation coefficient is 0.61, which is significant at the 0.05 level of significance. This serves as empirical support for the association between the variables under investigation, namely technical capabilities and financial data reliability. The findings of this study indicate that there is a positive association between a company's level of interest in technological capabilities and the reliability of its financial data. This relationship is facilitated by the provision of infrastructural capabilities, training programs, and the establishment of relationships.

Based on the statistical analysis of the correlation between the research variables (technical capabilities and financial data reliability), the primary hypothesis is accepted at the company level.

2. **Testing the Second Hypothesis:** which states that there is a significant effect of technical capabilities on improving the reliability of financial data, as indicated by their dimensions. Table (4) illustrates this impact as follows:

**Table (4) Results of the Impact Relationships.**

| The explanatory<br>The responsive variable. | Cumulative technical capabilities. |                    |      | F     |
|---|------------------------------------|--------------------|------|-------|
|   | $\beta_0$                          | $\beta_1$          | R2   |       |
| Financial data reliability.                 | 0.699                              | 0.702<br>(12.115)* | 0.49 | 93.02 |

(\*) Indicates the computed T-value.

N=112      DF=1. 110 P  $\leq$  0.05\*

Based on the findings presented in Table 4, which pertains specifically to regression analysis, it is apparent that there exists a statistically significant positive relationship between cumulative technological capabilities, serving as explanatory variables, and financial data reliability, which acts as the responsive variable. The F-value obtained from the computation is 93.02, surpassing the critical value from the F-distribution table for degrees of freedom (1, 110) at a significance level of 0.05. The R2 value, which stands for the coefficient of determination, is 0.49. This value suggests that approximately 49% of the observed changes in financial data reliability may be ascribed to the impact of cumulative technical capabilities.

Upon analysis of the regression coefficient ( $\beta_1$ ), it is evident that an increment of one unit in the emphasis on technical capabilities results in a corresponding alteration of 0.702 in the reliability of financial data. Regarding the intercept coefficient ( $\beta_0$ ), it indicates that corporation Zain is able to accomplish financial data reliability irrespective of the level of effectiveness of its technical skills.

Upon examination of the calculated t-value (12.115), it has been determined that it is statistically significant and exceeds the critical value at a significance level of 0.05, with degrees of freedom of 1 and 110. Therefore, the second basic hypothesis is deemed valid, as it posits a notable impact of cumulative technical capabilities on the dependability of financial data within the examined organization.

## Chapter Four: Conclusions and Recommendations

### Firstly: Conclusions

The research began by presenting the theoretical framework built on the contributions of pioneers in financial thought and the field of financial management, encompassing the conceptual and philosophical foundations. These have been employed in practical and academic contexts to serve as a theoretical model, acting as a launching point for subsequent studies. Thus, the research transitioned from exploring its theoretical and philosophical foundations to a set of conclusions as follows:

- A significant and positive correlation relationship has been established between technical capabilities and financial data reliability at Zain Telecommunications Company under study, as evidenced by the correlation coefficient at the overall level.
- A significant positive effect of cumulative technical capabilities on financial data reliability has been confirmed. This indicates that an increased focus on technical capabilities by the management of Zain Telecommunications under study contributes to the improvement of financial data reliability.
- The significance of technical capabilities lies in their direct impact on the company's overall performance, providing the necessary expertise and skills, and delivering reliable information to the management for making appropriate decisions.

- Technical capabilities represent a strategic direction pursued by companies in general to enhance their operations on all fronts, particularly in financial aspects.
- Financial data reliability is an integral part of the organization's financial efforts, primarily focusing on providing measurable and dependable information. Therefore, the company continually strives to enhance the reliability of its data.

### **Secondly: Recommendations**

In accordance with the previous conclusions, the researcher presents a set of recommendations for consideration by the stakeholders at Zain Telecommunications Company and researchers, with the hope that they will receive the appropriate and sufficient attention, aiming to achieve the desired objectives of this research. The recommendations include:

- There is a need to focus on contemporary and modern methods used in financial management at Zain in order to enhance the reliability of financial data.
- The management at Zain should recognize the importance of technical capabilities in telecommunications companies and their direct impact on all company activities, including the production of reliable financial data. Neglecting this focus could result in missed valuable opportunities for telecom companies to achieve growth, sustainability, expansion, and excellence.
- It is essential to develop and adopt technical capabilities at Zain accurately and comprehensively, as they form the foundation for achieving outstanding performance and subsequent development across all areas, including process improvement.
- The leadership at Zain should consistently emphasize the study and enhancement of technical capability management as a working philosophy within the company, with a direct focus on financial data reliability.
- The company's management must take practical steps to prioritize technical capabilities, creating an environment that supports human resource training, infrastructure development, and a direct focus on interrelationships to provide services of appropriate quality. Additionally, company employees should undergo training courses to enhance their competencies and provide reliable information.

### **Arabic references**

1. Ismaeel, M. D. (2014). The Impact of Creative Accounting Methods on the Reliability of Accounting Information: An Applied Study in a Governmental Bank. *Al-Qadisiyah Journal for Administrative and Economic Sciences*, 16(3).
2. Khwaledi, F. (2013). The Impact of Strategic Alliances on Technological Capabilities Support (Unpublished master's thesis). Faculty of Economic Sciences, Commercial Sciences, and Management Sciences, University of Arabi Ben Mhidi, Oum El Bouaghi.
3. Al-Obaidi, R. A. H. (2020). The Role of Technical Capabilities in Enhancing Organizational Excellence Dimensions: A Survey Study of Employees at the Directorate of Education in Nineveh Governorate. *Arab Journal of Management*, 30(3), 145-161.
4. Al-Quralla, M. H. S. (2011). The Effect of Using Information Technology on the Credibility of Financial Statements from the Perspective of Jordanian External Auditors (Unpublished master's thesis). Accounting Department, College of Business, Middle East University.

**Foreign Sources**

1. A. Bergek, F. Tell, C. Berggren, and J. Watson, (2018), "Technological capabilities and late shakeouts: Industrial dynamics in the advanced gas turbine industry, 1987-2002", *Industrial and Corporate Change*, vol. 17, pp. 335-392.
2. Abdullah, Z. I., Almsafir, M. K., & Al-Smadi, A. A, (2015), "Transparency and reliability in financial statement: Do they exist? Evidence from Malaysia", *Open Journal of Accounting*, 4(4), 29-43.
3. Adebayo, P.A., Adebisi W.K., (2016), "Effect of firm characteristics on the timeliness of corporate financial reporting: evidence from Nigerian deposit money banks", *International Journal of Economics, Commerce and Management*, United Kingdom. 4(3).
4. Adediran, S. A., Alade, S. O., & Oshode, A. A. (2013), "Reliability of financial reporting and companies attribute: The Nigerian experience", *Research Journal of Finance and Accounting*, 4(16), 108-114.
5. Adeniran, S.A., Alade, S.O., Oshode, A.A., (2013), "Reliability of Financial Reporting and Companies Attribute: The Nigerian Experience", *Research Journal of Finance and Accounting*, 4(16).
6. Afolabi, F., (2017), "Financial reporting in Nigerian emerging market", Paper presented at a seminar organized by the Morgan State University, Victoria, August.
7. Aljifri, K., Khasharmeh, H., (2010), "Timeliness of Annual reports in Bahrain and United Arab Emirates: An Empirical Comparative Study", *The International Journal of Business and Finance Research* 4(1): 51-71.
8. Atkinson, A.S. (2012) "Ethics in Financial Reporting and the Corporate Communication Professional", *Corporate Communications: An International Journal*, 7, 212-218.
9. B. Y. Aw and G. Batra, (2018), "Technological capability and firm efficiency in Taiwan (China)", *The World Bank Economic Review*, vol. 12, pp. 59-79.
10. Berger, P. G. (2011), "Challenges and opportunities in disclosure research—A discussion of the financial reporting environment: Review of the recent literature", *Journal of Accounting and Economics*, 51(1), 204-218.
11. Beyer, A., Cohen, D. A., Lys, T. Z., & Walther, B. R. (2010), "The financial reporting environment: Review of the recent literature", *Journal of Accounting and Economics*, 50(2-3), 296-343.
12. Biddle, G. C., Hilary, G., & Verdi, R. S. (2009), "How does financial reporting quality relate to investment efficiency?", *Journal of Accounting and Economics*, 48(2-3), 112-131.
13. Cohen, J., Krishnamoorthy, G., & Wright, A. (2014), "The corporate governance mosaic and financial reporting quality", *Journal of Accounting Literature*, 23(1), 1-80.
14. Coombs and P. E. Bierly, (2016), "Measuring technological capability and performance", *R&D Management*, vol. 36, pp. 421-438.
15. Costa and S. R. R. de Queiroz, (2012), "Foreign direct investment and technological capabilities in Brazilian industry", *Research Policy*, vol. 31, pp. 1431-1443.
16. Dogan, M., Coskun, E., Celik, O., (2017), "Is timing of financial reporting related to firm performance? – An examination of ISE listed companies", *International Research Journal of Finance and Economics*, 12: 220-233.



17. E R Lestari and F L Ardianti, (2019), "Technological capability and business success: The mediating role of innovation", IOP Conf. Series: Earth and Environmental Science 250.
18. F. E. Garcia-Muina and J. E. Navas-Lopez, (2017), "Explaining and measuring success in new business: The effect of technological capabilities on firm results", *Technovation*, vol. 27, pp. 30-46.
19. Fagbemi, T.O., Uadiale O.M., (2011), "An appraisal of the determinants of timeliness of audit report in Nigeria: evidence from selected quoted companies", The 2011 New Orleans International Academic Conference, New Orleans, Louisiana USA.
20. Iyoha, F.O., (2012), "Company attributes and the timeliness of financial reporting in Nigeria", *Business Intelligence Journal*, Vol. 5(1), 41- 49.
21. J. Jin and M. von Zedtwitz, (2018), "Technological capability development in China's mobile phone industry", *Technovation*, vol. 28, pp. 327-334.
22. k.-H. Tsai, (2014), "The impact of technological capability on firm performance in Taiwan's electronic industry", *Journal of High Technology Management Research*, vol. 15, pp. 183-195.
23. Kaminski, K.A., Wetzel, T.S. and Guan, L. (2014) "Can Financial Ratios Detect Fraudulent Financial Reporting?", *Managerial Auditing Journal*, 19, 15-28.
24. Kamran, A, (2013), "Thetimeliness of corporate reporting: A comparative study of South Asia", *Advances in International Accounting*, Volume 16: 17–43.
25. Liou, F.-M. (2018), "Fraudulent Financial Reporting Detection and Business Failure Prediction Models: A Comparison", *Managerial Auditing Journal*, 23, 650-662.
26. M. Bell and K. Pavitt, (2012), "Accumulating technological capability in developing countries", *The World Bank Research Observer*, pp. 257- 282.
27. Mainoma, M.A., (2012), "An Assessment of the quality of financial reporting inNigeria", *Journal of Business Administration*, 2(1).
28. Nurazwa Ahmad, Siti Norezam Othman, Halim Mad Lazim, (2014), "A Review of Technological Capability and Performance Relationship in Manufacturing Companies", *International Symposium on Technology Management and Emerging Technologies (ISTMET 2014)*, May 27 - 29, Bandung, Indonesia.
29. R. Rasiah and A. Malakolunthu, (2019), "Technological intensities and economic performance: a study of foreign and local electronics firms in Malaysia", *Asia Pacific Business Review*, vol. 15, pp. 181-197.
30. R. Rasiah, (2018), "Conclusions and implications: the role of multinationals in technological capability building and localization in asia", *Asia Pacific Business Review*, vol. 14, pp. 165–169.
31. T. O. Oyeibisi, O. O. Olamade, and A. A. Agboola, (2014), "An assessment of the level of availability of technological capabilities in the Nigerian telecommunication industry", *International Journal of Information Management*, vol. 24, pp. 423-432.
32. Tontiset Nattawut, KaiwinitSirilak, (2018), "The Factors Affecting Financial Reporting Reliability: An Empirical Research of Public Listed Companies in Thailand", *Journal of Modern Accounting and Auditing*, Vol. 14, No. 6, 291-304

33. Tontiset Nattawut, KaiwinitSirilak, (2018), "The Factors Affecting Financial Reporting Reliability: An Empirical Research of Public Listed Companies in Thailand", Journal of Modern Accounting and Auditing, Vol. 14, No. 6, 291-304
34. V. Kumar, U. Kumar, and A. Persaud, (2019), "Building technological capability through importing technologies: The case of Indonesian manufacturing industry", Journal of Technology Transfer, vol. 24, pp. 81-96.
35. Vrentzou, E, (2017), "The Effects of International Financial Reporting Standards on the Notes of Auditors", Managerial Finance, 37, 334-346.
36. Vrentzou, E, (2017), "The Effects of International Financial Reporting Standards on the Notes of Auditors", Managerial Finance, 37, 334-346.
37. Y. Wang, H.-P. Lo, Q. Zhang, and Y. Xue, (2016), "How technological capability influences business performance: An integrated framework based on the contingency approach", Journal of Technology Management, vol. 1, pp. 27-52.

