



**THE CONCEPTUAL FRAMEWORK OF THE
MEDIATING EFFECT OF INTERNAL CONTROL ON
THE RELATIONSHIP BETWEEN ACCOUNTING
INFORMATION SYSTEM AND FINANCIAL
REPORTING**

Eyad Khalile Eshtewe Abuhaq, Prof. Dr. Sadoun
N.Yassin Al heety

Al-Madinah International University, Malaysia, Faculty of Finance &
Administrative Sciences
eyadabuhaq@yahoo.com

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Abstract

Internal control effectiveness is very important because internal controls over financial reporting use financial reporting as a disclosure tool to communicate information to stakeholders and they can evaluate the performance of top management and assessment of investment risk. The aim of this research is to propose a conceptual framework in the role internal control mediating between accounting information system on the financial reporting.

Keywords: internal control, accounting information system, financial reporting.

Introduction and Problem Statement

Internal control is a process done by board directors and managers to insure many objectives such as providing efficiency and effectiveness of organizational operations, sustaining reliable financial report, and applying the laws and being committed to (Wangfeng & Lihong, 2015). So Internal controls over financial reporting are the organization's policies and procedures designed to ensure that the organization is producing reliable financial statements.

Internal control effectiveness is very important because internal controls over financial reporting use financial reporting as a disclosure tool to communicate information to stakeholders and they can evaluate the performance of top management and assessment of investment risk, Chen et al., (2016). The main objective of internal control is to give to the management true accounting reports which lead to provide quality of the information for decision making, Donescu et al., (2015). And understanding accurately the organizational objectives, business processes, organizational resources, structures, roles, and responsibilities (Heise, Strecker & Frank, 2014).

Information technology systems can carry out a lot of duties and management is recurrently found new ways to utilize the computer and the supporting systems to support operational performances and to help in future judgment and decision making. An information system is a set of interrelated subsystems that work together to collect, process, and store, transform, and distribute information for planning, decisions making and control (Dandago, 2013). Information systems have become among the most recent technologies increasingly needed by all working

institutions to promote and assist in solving a lot of obstacles and problems that faced or will face them in the information field. Al_Frijat (2013).

In addition, accounting information system (AIS) is a tool which was incorporated in the field of Information and Technology systems. It is very important for business entities. To generating reliable financial information needed for decision making, the (AIS)s have become among the most recent technologies increasingly needed by all working institutions to promote and assist in solving a lot of obstacles and problems that faced or will face them in the information field. Since the accounting information systems (AIS) has played a pivotal effect for all parties (the company's management, creditors, debtors, the internal control, and all related parties) have been imposed on the internal control is mandatory to develop methods and conventional procedures should be familiar with the skills and experience, Stanislav & Willborn (2002).

The companies differ among themselves Ba use (AIS)s where different systems are designed by programmers computer is available so the system checking process and the statement of its ability to deal with the nature of the work of manufacturing companies are judged on the extent of its acceptance or refusal by the internal control and how strong internal control over that system procedures which may result in the risk of the in the Financial reporting, and the diversity of business manufacturing Companies, and use of information technology and the risks faced by those companies, both from the nature of their work or of the use of information financial reporting to advanced levels to provide services to the company and stakeholders the company (Haller & Siedschlag, 2011).

in manufacturing Companies as any defect in the stages (AIS)s use (inputs, Processing, output, Surrounding Environment and data risk) represents the data set is obtained from the objective evidence supporting the financial events and documents and data that may be prone to mistakes, intended or unintended and result in inaccurate data, stage comes the effect of internal control to make sure that the data processing is performed without human intervention and that correlation between the risk of the work environment conditions and the using of computerized (AIS)s (Phosrichan et al., 2015).

The importance and seriousness that characterize the internal control opinion on the scope of its responsibilities for implementation of procedures process, understand, analyze and evaluate the technology and technology information systems and their impact on the control systems is one of the basic factors that enable him to assess the degree of robustness of the control system to improperly with regard to the justice and sincerity data representation situation and the activity (Brazel & Agoglia 2007). Also control risk can also increase as the focus shifts from segregation of duties to greater access to information, supervisory review is typically minimal, and supplemental internal control applications are often not properly integrated (Senft & Gallegos 2012). Silviu & Melinda, (2015) mentions that the internal control performances indicates that, should consider assigning in gain an understanding of controls, and design and perform tests of system controls. Specifically, inherent risk is often heightened because issues such as inadequately trained personnel, improper data input, and interdependencies among business processes can arise.

Activating the role of the internal control and the control work to follow the steps, which leads to increased convenience and reliability, The need to strengthen the independence of the internal control to boost confidence and quality in financial lists, and so by the organizations and bodies overseeing, Working to improve the (AIS) of institutions and adapt it to the requirements of the

new framework for the conduct of accounting for quality information, to take advantage of all features of efficient and effective financial reporting. Which result in a change in the performances of the financial reporting and the procedures used in the internal control mechanism, and to avoid damage to users' data to make financial and investment decisions may result in the control of (AIS) and procedures to achieve an abundance of time,

The objective of this study to suggest a framework for impact of Internal Control on Accounting Information Systems and Financial reporting in Jordanian manufacturing and Service sectors. This conceptual framework can serve financial reporting with an internal control tactic development guide, and it can also help them to recognize key components that may be of significance in bolstering their career as a control.

Literature Review

Accounting Information System Components

Inputs

In AIS, the initial operational stage is collecting data, with the objective of ensuring that data entered is valid, complete and material error-free (Sori, 2009). In this first stage, relevance and performance are promoted and the system captures only relevant data and gathers them at one time. It is important for managers to use the least level of input to realize the optimum benefits in increasing data in AIS. It is also important to obtain information right in this phase in order to prevent input errors and thus, input control has a key role in successful AIS (Xu, 2015).

AIS is a tool, which when integrated in the IT systems can assist management to control their finances (Soudani, 2012). The financial data represents input accounting information system based on the documentary court session counted and recorded, and procedures for control and oversight are conducted to check their validity before the introduction of the system (Sori, 2009). Rishel (2003) stated that the employed internal control functions to address controls, risks and significant factors during the process of IT implementation. Therefore can hypothesis the following.

Data processing

In the accounting system of operations, the collection, cataloging and summarizing performance on the input operations (data) in the accounting books and records are in accordance with the principles and concepts of accounting rules (Rishel, 2003). An automated AIS expedites the process of generating financial statements, while overcoming human data processing and with the available information, data processing can provide a basis for decision-making, action taking and achieving legal obligations (Sori, 2009). The process of computing mitigates automation and computerization costs and limits the individuals and businesses, lowers infrastructure maintenance costs and offers effective management and user's access (Allahverdi, 2017).

Output Data

It represents the output of the data processing operations (e.g., user accounts, reports, or magnetic files or exported checks tapes). And these outputs are traded by authorized persons only (Qasim, 2004). Reports and financial statements comprising various information, resulting from interactions of operations for the input group in the framework of environmental and

subjective variables, are forwarded to those who can use them and learn from them (Rishel, 2003; Soudani, 2012).

The physical components that fall within the accounting information systems components in light of the use of modern information technologies include: database, computer hardware, software, procedures, and techniques of communication. The use of computers has a significant impact on the accounting information systems used by the company (Atallah, 2013).

Abu-Musa (2006) argued that internal control has to be able to provide input to system configuration in order to ensure proper integral controls exist. It should communicate with the IT team to guarantee the adequate documentation of new systems and system modifications. In relation to this, effective documentation is important to internal control in that it evaluates the controls and risks, mandates CIS changes tracking, and inputs information for transactions and events in a simply manner, as well as evaluates controls and results critically. Moreover, the accumulation of enough evidence to develop informed decisions involves the understanding of the evidence source, the control procedures needs and the evaluation of such procedures (Reinstein 1998, Qasim 2004).

Surrounding Environment

The accountant's role is not limited anymore to analyzing, registering, deporting, and classifying economic processes in the project for the clarification of the business results and the financial center. The role also encompasses the dealing with the information evolution analysis and making decisions. It is also significant to understand the environment and the characteristics of AIS because of their influence on the accounting design and internal controls, and the selection of internal controls that it is expected to depend on (Kanellou & Spathis, 2011).

With regards to the risk in the IT environment, the study prepared by the Information Technology Committee of the Commission (IFAC) International Auditing Standards in February 2002 entitled, Business and Accounting, indicated that the risk of IT environment includes (Abu Alouon, 2004);

- Infrastructure for information technology risk
- Risk information technology applications

Moving on to the requirements of information technology in internal control system components of the environment evidenced in literature (Dorgalas & Dimou, 2010), in order to get an understanding of the control environment that affects the electronic data processing, focuses on the following factors (Jagdish, 2000);

First, is the administrative control ways, relating to the interest checker in the electronic work environment management and the trends and ideas that revolve around the following:

- Proof of the changes made in the regulations, policies and control procedures.
- The possibility of unauthorized transit documents and computer records.
- Monitoring applications.

It organizes operations or company events and ensures authorized access to data accuracy, based on the completion of the processing of the input to the output during the treatment. And oversight is designed to detect, prevent, or debug applications (Al Hosban, 2014).

Data Risk

At present, the dependence of information systems is paramount and as such, the threat of incidents of data risk is serious, particularly if it jeopardizes the financial information of

organizations. Technology advancements are increasingly replacing institution-controlled and paper-documented transactions, and thereby, it is crucial for financial institutions to use new methods to monitor and control the transaction input, for its accuracy (Jagdish, 2000). The primary success factor of the company is its implementation of an efficient risk-based data that could optimize the flow of data. In this background, the companies need to tackle how to identify, assess and control different risk types (Maurer & Germany, 2008).

Moreover, suitable measures have to be adopted to promote input integrity, protect against data corruption or programming, and to examine the output accuracy. Threats can originate from internal and external sources in the form of external hackers, unsatisfied employees, and errors that can negatively impact data reliability. Also, unauthorized access of parties should initiate denial of service attacks to bar users from business transactions (Otero, 2015). All of these require the determination of how to efficiently assist decision makers' implementation of data risk systems that meets the needs of the business (Maurer & Germany, 2008).

Just like for every information system, issues have to be defined and specified. The integration of information technology in businesses in general and in accounting in particular, has provided many benefits to the organization's internal control system, since many risks associated with manual procedures are eliminated (Drogalas & Dimou, 2010). This is due to differences in the nature of data processing and exchange as well as the differences in the methods of the internal electronic control systems, in particular, protection and confidentiality systems of data and risks related to the ability of administration to use electronic systems for distorting the data, (Okab, 2013). This involves the knowledge specialized in (1) the effect of using the electronic sites on the financial operations, (2) providing internal control standards related to the safety of electronic sites' security, knowledge specialized in using the tools of information technology involving risks relating to the internal control standards that may include following : (1) penetrating and stealing the data, (2) destroying them (Okab, 2013).

In the context of larger institutions, on one hand, their size and complexity necessitate computerized auditing but on the other, both can also make it more difficult to achieve an enterprise-wide risk auditing view. This is particularly true when measuring operational risk because of several reasons (Kunkel, 2004) one of which is internal controls primarily concentrates on traditional IT risks and controls (IT data integrity, privacy and security, safeguarding of asset and application processing). Internal control performance of IT evaluations is related with several factors, which are objective, industry type, number of IT control specialists on the staff, existence of new CIS – all these have implications to management's understanding and evaluation of computerized accounting systems (Hermanson, 2000).

Internal Control

The organization uses internal control to provide reliable financial and accounting information, ensure validity of transactions, and ensure human resources commitment to procedures, laws, policies and regulations (Makgatho, 2013). Babatunde and Dandago (2014) argued that the internal control is an important element driving organizational performance. Internal control systems, notwithstanding how they are designed, all face specific inherent drawbacks that make for an impossible absolute assurance (Abu-Musa, 2006). Errors can arise in an IT system in light of its design, maintenance or oversight of automated controls. IT personnel may not understand

the way an IT system processes sales transactions, which then may lead to erroneous system changes for sales processes of a newly launched product line (Ratcliffe & Munter, 2002).

According to Lashgari, Gawradar and Bakhshayesh (2015), internal control is the evaluation of financial reporting reliability and process, the assessment of strategic and operational organizational goals, and evaluation of the act through the application of laws and regulations. The internal control weakness can appear if a material is defective, or incompetent to detect a mistake in annual or financial statements. Internal control is a process done by board directors and managers to ensure many objectives such as providing efficiency and effectiveness of organizational operations, sustaining reliable financial report, and applying the laws are being committed to (Zhang & Cao, 2016).

According to Huang, Guo, Ma and Zhang (2015), internal control has an important effect on the organization, because internal control weaknesses lead to raising the cost of capital remarkably, and internal control weaknesses increase inaccurate information risk that generates cost of equity by reducing the financial reporting reliability. The managers give the importance to internal control because lack of internal control can cause deficient decisions and create many risks that negatively impact financial performance (Mihaela & Lulian, 2012). The evaluation of internal control and the understanding of risks that can face the organization require many individuals to determine these risks and correct the deviation that may appear. The participating individuals are: executives, line managers, process owners, risk managers, and internal and external auditors. The effective internal control requires understanding accurately the organizational objectives, business processes, resources of the organizations, and the organizational roles, responsibilities and structures as evidenced by Heise, Strecker and Frank (2014). Also, according to Li et al. (2015), internal control helps the organization to reach strategic benefits, because internal audit leads to discovering fraud and misdirection of the available resources to enhance the accuracy of financial reporting. Both investor and auditor circles taken into accounting the environment of internal control and evaluate the environment, in order to use the gathered information in decision-making (Lashgari et al., 2015).

Naz'aina (2015) defined internal control as procedures done by managers and the board of directors to achieve a set of objectives such as: safeguard asset, encourage employees to follow company policy, promote operational efficiency to ensure accurate and reliable accounting records and comply with legal requirements.

In addition, internal control is a process that can be affected by the board of directors, management and employee, and is developed to ensure that the objectives of the organization are achieved via efficient and effective operations, financial reporting and adherence to law and regulations (Babatunde & Dandago, 2014). Internal control refers to a set of processes consisting of methods, procedures, and policies employed by the board of directors, management and staff. Such controls are geared towards safeguarding assets and compliance to laws and regulations set out by government (Makgatho, 2013).

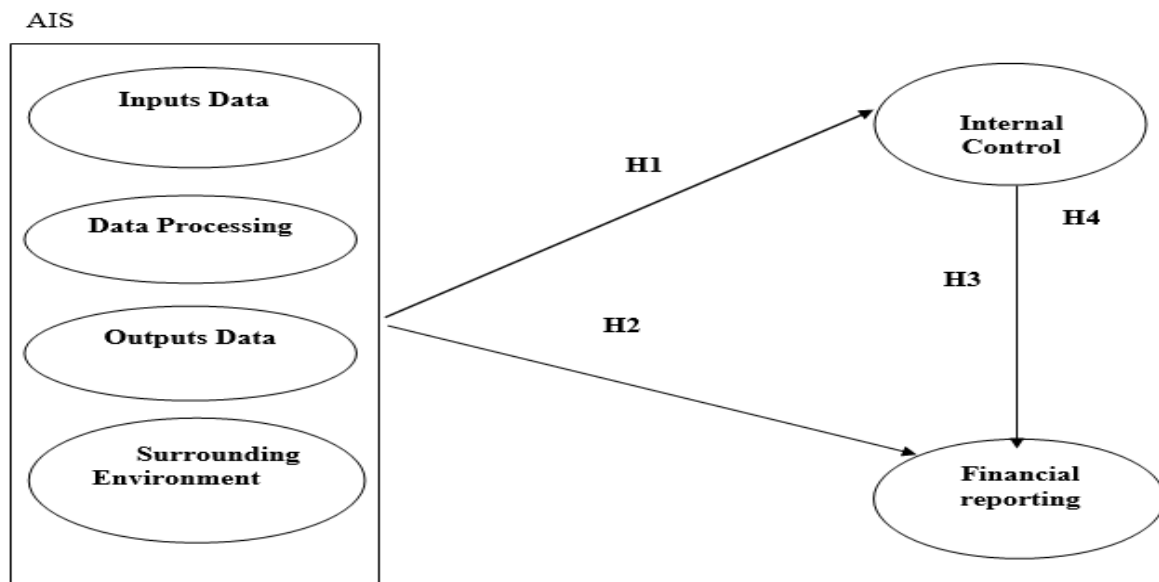
Added to the above, internal control comprises of five components namely, environmental control, risk assessment, activity control, information and communication and supervision (Afiah & Azwari, 2015). Therefore, an internal control system refers to a process that offers reasonable assurance of the achievement of accurate financial reporting, adherence to the law, and operational efficiency and effectiveness. In this background, an accounting control is a part of the system that consists of organizational structure, methods, and measures that are coordinated primarily to safeguard the wealth of the organization as well as check the accuracy and reliability of accounting data (Manurung, Suhartabi, & Saefudin, 2015).

Furthermore, the organizational management and implementation of internal control system is affected by the AIS. In the field of accounting and management, decision-making is related to the relationship between AIS and organizational needs for information communication and control (Onaolapo & Odetayo, 2012). Thus, the AIS advantages can be investigated through its effects on enhancing the decision-making process, input data quality, data processing, output data and the company transactions facilitation (Bento, 2010; Bento et al., 2014).

Conclusion

this study suggest a framework for Financial reporting in Jordan which focus in five dimensions, Input Data (ID), Data Processing (DP), Output Data (OD), Surrounding Environment (SE) and Data Risk (RD) a figure below represents the proposed conceptual framework and following table represent the suggestion hypothesis

H1	<i>Accounting information System (AIS) significantly affects financial reporting (FR).</i>
H2	<i>Accounting information System (AIS) significantly affects Internal Control (IC).</i>
H3	<i>Internal Control (IC) significantly affects Financial Reporting (FR).</i>
H4	<i>Internal Control (IC) mediates the relationship between Accounting information System (AIS) and Financial Reporting (FR).</i>



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