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Research Article

Accounting Information Systems as an Internal Control Tool in the Business Sector of Ecuador, 2024

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ABSTRACT

Received: 22 Dec 2024 Revised: 30 Jan 2025 Accepted: 18 Feb 2025 The objective of the study is to analyze the importance of information management in the economic events of companies, with the aim of providing useful accounting information to allow the evaluation of the company's condition and thus help in the decision-making of managers. For this, the research had a non-experimental design, a qualitative and quantitative approach and a descriptive method, and the survey was used as an information gathering technique. From the data obtained, an interpretation was carried out, revealing the importance of accounting information systems as a tool for internal control. The main result was that 66% were unaware of accounting information systems, while 34% were aware of them and at the same time gave the importance that they have within an organization, since the systems serve as a tool within internal control. It was concluded that the implementation of accounting information systems as an internal control tool is essential to improve efficiency, effectiveness and financial, administrative and operational management in the business sector of Ecuador.

Keywords: System, Accounting information, Internal control, Business sector.

INTRODUCTION

In this research work, it was sought to substantiate the topic of study through theoretical approaches to determine the reference points that allow obtaining results of the importance of Accounting Information Systems as an Internal Control tool in Ecuador. According to the company, one of the subsystems of the information system is that of accounting information, whose function is to supply elements to the general information system of the company or organization based on accounting. Well, accounting is a document-based discipline that allows commercial operations to be recorded in the corresponding books, providing the necessary information to allow proper planning, management, control and evaluation. (Lezanski & Merino, 2020)

In a related way, it defines an accounting information system or SIC as one that is dedicated to collecting, organizing and analyzing the information of all the economic events of the company, with the purpose of providing useful accounting information to allow the evaluation of the condition of the company and thus help in the decision-making of the managers. In addition, these systems include the methods, procedures, and resources that entities use to track financial activities and summarize decisions in a useful way. (Ruiz, 2018)

According to the most widely used accounting system in Ecuador are commercial software, the most recognized by all is the Dac Easy Accounting System Monica, which since the 70s has been known in the market as one of the most complete accounting software. This indicates that the institutions are coupled with the Monica system for the management of their economic activities. (Porras, 2011)

In accordance with the Constitution, it is important to maintain adequate internal control in organizations in order to avoid losses due to fraud or negligence and to detect deviations that affect the fulfillment of their objectives. All this responds to the need to design and implement security and risk management measures so that their activities are carried out in the best possible way and reduce the occurrence of events that negatively impact their performance in terms of efficiency, productivity and custody of all their operations, which will provide greater security, both customers and management. It is understood that the accounting information

provided by these systems must be understandable and useful for interpretation, analysis and based on it decision-making, being clear, pertinent, reliable and easy to understand, and sometimes it must be comparable based on the reports delivered. (Saltos, Macías, & Ceballos, 2019)

Internal control is understood to be the system made up of the organizational scheme and the set of plans, methods, principles, standards, procedures and verification and evaluation mechanisms adopted by an entity, in order to ensure that all activities, operations and actions, as well as the administration of information and resources, are carried out in accordance with the constitutional and legal norms in force. .(Alvarado, 2004)

Although controls are constantly carried out in companies to verify the correct development of their activities and management, he mentions that this is a tool arising from the imperative need to act proactively in order to eliminate and/or significantly reduce the multitude of risks to which the different types of organizations have been affected. whether these are private or public, with or without profit, being the basis where the activities and operations of an entity rest. . (Mendoza, Delgado, Berreiro, & García, 2018)(Ramón, 2001)

Therefore, it is necessary to apply internal control as a control measure in the prevention and detection of business risks and fraud, which allows verifying the performance of the company in comparison with the results that have been expected to be obtained.

Internal Control facilitates the assurance of reliable financial information and ensures that the entity complies with laws and regulations, avoiding reputational losses and other consequences. (Mendoza, Delgado, Berreiro, & García, 2018)

Optimizing the use of resources, internal control has been recognized as a tool for the management of all types of organizations to obtain reasonable assurance for the fulfillment of their institutional objectives and to be able to report on their management to the people interested in it. Internal Control is a tool that contributes to combating corruption. (Henao, 2017)

On the other hand, there are internal control standards that provide reasonable, absolute security regarding the correct development of administrative and accounting processes applied in entities as established by law as a fundamental factor to avoid corruption by detecting fraud. These internal control standards in an accounting information system of an organization have the basic purpose of providing useful information about an economic entity, to facilitate the decision-making of its different users such as shareholders, creditors, investors, administrators or the government authorities themselves. (Lopez, Matute, & Pinargote, 2020)

By obtaining quality information, it will be possible to obtain reliable financial information, controls and support on operations, for communication it is necessary to establish permanent channels to not only capture it but exchange it both internally and externally.

According to the fact that the internal control (Arroyo, Guzman, & Hurtado, 2019) is one of the most important administrative tools, It allows optimizing resources and achieving more efficient financial information, improving productivity, contributes to more accurate decision-making. In addition, the Internal control as a process carried out by the management and other personnel of an entity, is designed to provide a reasonable degree of security of the financial information that an institution holds.

That is why internal control is a plan associated with a set of methods, processes and procedures that aim to safeguard your assets, verify the accuracy and security of accounting data, develop the efficiency of operations and promote adherence to administrative policy.

With respect to the policies for the use of a company's accounting system, it mentions that they refer to the principles, bases, conventions, rules and specific practices adopted by the company for the purposes of the preparation and presentation of its financial statements. Accounting policies are the backbone of a company's accounting and financial reporting processes. (Blanco, Solano, & Contreras, 2018)

Accounting policies are established in declarative manuals that are generally handled by senior management. A policy refers to all actions for the development, planning, formulation and evaluation of decisions. The policies are established for the purpose of setting the objectives and general methods of management according to which the Company's operations must be managed.

According to the Internal Control of Accounting Information Systems, the internal control of accounting information systems gives veracity, quality to a plan of techniques and procedures in which all the administrative and accounting measures of the company will be foreseen for the achievement of the objectives, in order to safeguard the resources it has, verify the accuracy and veracity of the information to promote efficiency in operations and promote the application of policies for the achievement of programmed goals and objectives. (Aguirre, 2011)

The veracity and relevance of accounting information systems gives the effectiveness of internal control, which will depend to a large extent on the integrity and ethical values of the personnel who design, manage and monitor the internal control of an entity.

(Serrano, 2017) an Internal Control System becomes an important factor in the purpose of using resources efficiently and effectively, thus reducing losses caused by various factors such as diversion, waste and fraud. All companies must have adequate internal control, because thanks to their correct management it is also possible to evaluate the quality of administrative management.

The author determines internal control as the basis on which the reliability of an accounting system rests, the degree of strength will determine whether there is reasonable security of the operations reflected in the financial statements. A major weakness in internal control, or an unreliable internal control system, represents a negative aspect within the accounting system.(Chacón, 2002)

As stated by the accounting system, as a receiver of elements (data, information, files, documentation) from other subsystems such as purchases, payments, orders, human resources and capital goods, it revolves around the information system in order to obtain reports for adequate decision-making and the fulfillment of objectives and goals. Therefore, since the accounting information system is a facilitator of information for the management of the company, it is of utmost importance that this information is used as a tool in internal control to ensure reasonable compliance with the objectives and goals of the companies. (Castañeda, 2013)

MATERIALS AND METHODS

The research was developed through a bibliographic review of the main accounting information systems as an internal control tool in the business sector. The research design is non-experimental, as indicated (Hernández, Collado, Baptista, 2014) "A non-experimental research design is one in which the researcher does not manipulate or control the study variables, instead the researcher observes and analyzes the phenomena as they occur in their natural context. The approach is quantitative and qualitative: quantitative due to the survey applied to obtain percentage data in the study and qualitative due to the data collected in different sources of information.

Subsequently, a study of information collection is deployed through the survey where the degree of knowledge of the accounting computer system as an internal control tool was manifested, this instrument allows the collection of certain data that facilitate statistical analysis and thus achieve satisfactory results, these data are analyzed using statistical and mathematical tools to identify correlations and trends.(Chávez, Zula , Bósquez, & Pacheco, 2024)

For the processing of results, Microsoft Excel was used for tabulation and graphic visualization and the Word word processor to perform the respective analysis and interpretation of the information, since the research was clearly descriptive in nature.

RESULTS AND DISCUSSION

Question 1. Do you know an Accounting Information System?

Board 1 Accounting Information System

Surveyed	Number	Relative frequency	Percentage relative frequency (%)
YES	148	0,66	66%
NO	76	0,34	34%
TOTAL	224	1	100%

Source: Survey applied to experts in the accounting area.

It can be seen that the number of people who know what an Accounting Information System is is within 34%, while 66% do not know this type of Systems. To carry out this research, it must be framed according to the people who do not know about an Accounting Information System and the importance it has as a tool of internal control in the institution.

Question 2. Which of the following Accounting Information Systems do you know?

Table 2. *Types of Accounting Information Systems*

Surveyed	Number	Relative frequency	Percentage relative frequency (%)
Monica	99	0,527	52,7%
FITBANK	62	0,330	33%
Esigef	27	0,144	14,4%
TOTAL	224	1	100%

Source: Survey applied to experts in the accounting area.

As can be seen, the accounting information system best known by the people surveyed is Monica since it represents 52.7%, followed by the FITBANK program with a small difference to which 33% corresponds and finally the eSIGEF system has 14.4%. As a form of internal control in Ecuador, some institutions choose to have an Accounting Information System, as is the case of the Monica System, which is more used by private companies for the management of their businesses and the registration of all their transactions, in the same way the FITBANK system is a tool used by Savings and Credit Cooperatives in the development of their operations and in the public sector, as a control measure, institutions are obliged to upload all economic and financial information to eSIGEF.

Question 3. Do you consider that the implementation of internal control is important to prevent and avoid deficiencies that may affect administrative management?

Table 3 Importance of Internal Control

Surveyed	Number	Relative frequency	Percentage relative frequency (%)
YES	219	0,98	98%
NO	5	0,02	2%
TOTAL	224	1	100%

Source: Survey applied to experts in the accounting area.

Of the survey carried out on the 224 people, 98% consider that the implementation of internal control is important to prevent and avoid deficiencies that can affect administrative management and on the other hand, 2% people said that this implementation is not important. Considering that internal control in institutions is of utmost importance for the prevention, mitigation and correction of activities and processes in administrative management, this research emphasizes that entities apply internal control standards that improve efficiency, effectiveness and quality in processes.

Question 4. Do you consider that an organization's Accounting Information System, its methods and procedures for its management provide reliable accounting records?

Table 4Reliability of Accounting Information Systems

Surveyed	Number	Relative frequency	Percentage relative frequency (%)
YES	204	0,91	91%
NO	20	0,09	9%
TOTAL	224	1S	100%

Source: Survey applied to experts in the accounting area.

According to surveys of people, 91% consider that an organization's Accounting Information System provides reliable records, while 9% disagree. In reference to the results obtained, it is evident that not all the people surveyed are aware that when using a CIS, the accounting reports obtained provide reasonableness, reliability and efficiency when carrying out economic and financial analyses, mitigating risks and applying corrective measures.

Question 5. Do you know the rules and procedures for internal control in public sector institutions?

Table 5 Rules and procedures

Surveyed	Number	Relative frequency	Percentage relative frequency (%)
YES	105	0,47	47%
NO	119	0,53	53%
TOTAL	224	1	100%

Source: Survey applied to experts in the accounting area.

According to the results obtained, 119 people representing 53% are unaware of the rules and procedures of internal control of the public sector, unlike 105 people who represent 47% claim to know about them. The rules and procedures for internal control in the public sector are provided by the Office of the Comptroller General of the State, which indicates that all officials in this sector must use it as mandatory in the administration of public resources.

Question 6. Do you think that in an institution the financial department should define policies for the management of the Accounting Information System?

Table 6Policies for the management of the Accounting Information System

Surveyed	Number	Relative frequency	Percentage relative frequency (%)
YES	204	0,91	91%
NO	20	0,09	9%
TOTAL	224	1	100%

Source: Survey applied to experts in the accounting area.

It was observed that most people define that there should be policies for the management of the accounting system, taking into account 91% of people who affirm it and 9% who do not know them or do not agree. Nowadays in an institution it is advisable to define policies since this is one of the first steps to have useful information and improve efficiency in the financial management of the organization.

7. Do you consider that the internal control of an entity allows certain non-conformities to be corrected by increasing the degree of confidence in financial information?

Table 7Confidence in Financial Information

Surveyed	Number	Relative frequency	Percentage relative frequency (%)
YES	188	0,84	84%
NO	36	0,16	16%
TOTAL	224	1	100%

Source: Survey applied to experts in the accounting area.

Based on the results obtained, 84% of people surveyed are considering that internal control allows certain non-conformities to be corrected by increasing the degree of confidence in financial information, as opposed to 9% who do not agree. By increasing the level of confidence in financial information through the use of an accounting information system that can show that internal control in entities does allow for the correction of non-conformities and irregularities that have been detected in the presentation of information. Therefore, it improves the image of companies, increases the degree of confidence of investors and external customers.

Question 8. Do you consider that the Accounting Systems ensure the quality, relevance, veracity of the information obtained for internal control?

Table 8 *Quality, relevance, veracity of Accounting Information Systems*

Surveyed	Number	Relative frequency	Percentage relative frequency (%)
YES	195	0,87	87%
NO	29	0,13	13%
TOTAL	224	1	100%

Source: Survey applied to experts in the accounting area.

As can be seen, of the 224 people who were surveyed, 87% consider that the Accounting Systems ensure the quality, relevance, veracity of the information obtained for internal control, on the other hand, 13% consider that they do not. The advantage of using an accounting system is that it allows useful information to be obtained to evaluate the condition in which the company is, therefore, by using this information in the internal control system, the effectiveness and efficiency of various operations is being ensured, as well as compliance with the legislation and regulations applicable to the company. This research aims to provide information that allows people to consider that a SIC does help to have truthful and quality information.

Question 9. Do you think that Accounting Information Systems allow documenting and monitoring the risks detected in internal control?

Table 9. Risk detection

Surveyed	Number	Relative frequency	Percentage relative frequency (%)
YES	206	0,920	92%
NO	18	0,080	8%
TOTAL	224	1	100%

Source: Survey applied to experts in the accounting area.

TOTAL

224

1

Of the survey of 224 people, 92% consider that it is allowed to document and follow up on the risks detected in internal control and on the other hand, 8% do not consider this advantage. The function of the internal control system in institutions is to establish corrective measures necessary for the fulfillment of planned goals and objectives in addition to risk management, internal auditing and regulatory compliance, therefore, having an Accounting Information System allows documenting and monitoring the risks that have been detected. by safeguarding information from previous years that help identify the company's economic events in different accounting periods.

Question 10. Considering the above questions, do you think that Accounting Information Systems are a fundamental tool for Internal Control in an organization?

SurveyedNumberRelative frequencyPercentage relative frequency (%)YES2180,97397,3%NO60,0272,7%

Table 10. SIC and Internal Control

Source: Survey applied to experts in the accounting area.

100%

Of the survey carried out on the 224 people, 97.3% consider that they are a fundamental tool for Internal Control in an organization and on the other hand, 2.7% do not consider it as a fundamental tool. This research deals with how accounting information systems can be an internal control tool, consequently, it will be argued that by performing internal control activities to the most significant processes, the risk of presenting distorted and unreliable financial information can be reduced. In addition, the SIC tool when applying internal control standards helps to identify the appropriate or illicit use of resources.

By carrying out the research on accounting information systems as an internal control tool, different activities were carried out such as the respective frequency tables, graphs, analysis and interpretation, this in order to determine if the topic discussed is of knowledge to all respondents or not, since it was possible to collect varied information from different people who contributed with their point of view on the topic under study where a total of 10 different questions could be developed for our respondents.

On the question if you know an Accounting Information System; It could be seen that the majority with 66% did not know about the subject in question, while 34% knew about it, which shows that of the 100% that should be expected from the results, most of them do not know about an accounting information system and about the importance it has within an organization since this system serves as a tool within internal control.

Among some of the results obtained through this survey, we reached certain conclusions, such as whether it is important to define policies for the correct management of the Accounting Information System in the institutions within the financial department, since it could be seen that this question was well accepted by the respondents, since most of them accepted the policies for the management of the accounting system. but it cannot be ignored that there was a certain percentage that did not accept it, it should be emphasized that this procedure within an institution is of vital importance for a correct performance by the workers within it.

CONCLUSIONS

Accounting information systems as an internal control tool in the business sector of Ecuador improve efficiency and effectiveness in companies, since a well-defined internal control system contributes to improving operational and administrative processes. An adequate internal control system is essential to strengthen financial management in commercial enterprises, guaranteeing a margin of reliability in the performance of their activities and the achievement of the proposed goals.

The proper use of the information obtained through an accounting system is crucial for decision-making within an economic entity, allowing the activities carried out to be visualized and evaluated more accurately. In addition, accounting information systems facilitate the realization of accounting records in companies, allowing operations to be executed more easily and quickly.

In summary, the implementation of accounting information systems as internal control tools is essential to improve efficiency, effectiveness, and financial management in Ecuador's business sector.

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