The entrepreneurship of accounting work and its role in reducing information asymmetry: Evidence from insurance companies

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A B S T R A C T

The primary aim of this research is to provide a comprehensive understanding of the role played by entrepreneurial accounting practices in mitigating information disparities, as perceived by employees within the realm of Jordanian financial intermediaries. This role is encapsulated in various components, including accounting systems and policies, international financial reporting standards, international external auditing standards, international internal auditing standards, as well as professional and ethical conduct guidelines. In pursuit of our research objectives, we adopted two distinct methodological approaches. Firstly, a descriptive analytical approach was employed, involving the development of a structured questionnaire to gather primary data pertaining to the assessment of independent variables associated with entrepreneurial accounting practices. The second approach encompassed an applied perspective, seeking to gauge the impact of entrepreneurial accounting practices on reducing information asymmetry. This was achieved by examining the financial statements of insurance companies listed on the Amman Stock Exchange for the period spanning 2016 to 2022, thereby constituting our dependent variable. Rigorous statistical techniques were employed to meticulously analyze the collected data, with the validation of our hypotheses achieved through a comprehensive multiple regression analysis. The findings of this study distinctly underscore the pivotal role played by entrepreneurial accounting practices in ameliorating information asymmetry issues within the corporate economic landscape. A robust and statistically significant correlation emerged between our dependent variable, namely the reduction of information asymmetry, and both the independent variables associated with entrepreneurial accounting practices and their inherent characteristics. This study's significant recommendation extends beyond the mere technical dimensions of accounting, encompassing a call for a holistic reevaluation of the accounting profession. Addressing the enduring phenomenon of information asymmetry among stakeholders is not merely a concern confined to the technical aspects of accounting. Rather, it represents a profound professional and ethical crisis that permeates the entire accounting ecosystem. This crisis emanates from the very foundations and legal frameworks of the profession, extends through accounting standards, and encompasses professional conduct and ethics. Ultimately, it concludes with the supervision and oversight of the quality of professional performance, an obligation shared by accountants, certified auditors, and management alike.

Keywords:
Entrepreneurial Accounting Work
Information Asymmetry
Insurance Companies

1. Introduction

The insurance sector plays a pivotal role in the economies of nations, functioning as a critical social, financial, and economic institution. The quest for insurance protection, sought by numerous parties exposed to diverse risks, has given rise...
to a host of challenges. Foremost among these challenges is the prevalent issue of information asymmetry between the parties involved in insurance contracts (Rybák, 2015). This information gap has often compelled insurance companies to disburse substantial sums, incurring losses that have, on occasion, led to insolvency and financial collapse due to compensation payments surpassing their actual worth (Neha, 2020). In some instances, the information exchanged between policyholders and insurance companies lacks credibility and reliability, rendering accurate assessment and prediction of potential future risks a formidable task. Consequently, this imprecision in determining the appropriate premium exacerbates the disparity between the contracting parties. The nature of information shared by both parties involved in the contract—the insured and the insurer—constitutes a fundamental factor in maintaining a balanced relationship between them. This phenomenon, well-recognized in accounting literature, is termed “information asymmetry” (Bloomer, 2004). Enhancing the quality of financial reports and mitigating accounting information asymmetry rank among the foremost challenges confronting global stock exchanges. This challenge arises in the context of the separation of ownership and management, as posited by agency theory. This separation engenders conflicting interests among participants in these exchanges. Some investors possess privileged access to non-public company information, while others lack such access, impacting their ability to make informed and timely decisions (Rajgopal & Venkatachalam, 2011). Consequently, concerted efforts must be undertaken to ameliorate this phenomenon, particularly since harmonizing and specifying the quantity and quality of information required for various users of financial statements is a daunting task due to conflicting objectives among these users (Baralexis, 2004).

Therefore, this study sets out to achieve its primary objective of delineating the role played by the attributes of entrepreneurial accounting practices, encompassing accounting systems and policies, international financial reporting standards, international external auditing standards, international internal auditing standards, as well as professional and ethical conduct guidelines, in mitigating information asymmetry within Jordanian insurance companies listed on the Amman Stock Exchange.

2. Problem statement

Information symmetry and its prompt dissemination to relevant stakeholders constitute fundamental pillars of capital market efficiency. When information symmetry is lacking, it results in an inequitable distribution of information, enabling certain stakeholders to gain informational advantages inaccessible to others. This disparity detrimentally impacts their capacity to make informed investment decisions (Lu et al., 2010).

Financial reports serve as a vital source of information, particularly when they encompass an adequate quantity and quality of data to inform various decisions for all parties interested in a company's financial standing. Therefore, the degree of transparency in financial reporting information plays a pivotal role in reducing information uncertainty and bridging the information gap that exists between management and stakeholders (Abed et al., 2022).

According to Kim et al. (2012), accounting policies related to measurement and accounting disclosure processes exert a significant influence on information risks and the extent of information asymmetry. The mandatory implementation of specific disclosure-related accounting policies enhances information efficiency and diminishes information risks among market participants, particularly in contexts characterized by heightened information uncertainty. Furthermore, it contributes to the reduction of information asymmetry (Wahyuni, 2011).

Numerous studies have pinpointed factors that mitigate the phenomenon of accounting information asymmetry. Among these factors, the International Accounting Standards Board (IASB)'s efforts to amend International Accounting Standards (IAS) and issue International Financial Reporting Standards (IFRS) have played a pivotal role in ensuring the generation of high-quality accounting information and appropriate disclosures, thereby mitigating this phenomenon. The IASB's emphasis on disclosure underscores the provision of financial and non-financial information that is suitable for stakeholders, assisting them in making informed decisions and fostering equity among stakeholders. Furthermore, the standardization of accounting policies and the curbing of earnings management practices contribute to enhancing the quality of financial reports by improving comparability and the timely accessibility of information, ultimately reducing the information gap between management and stakeholders (Kim et al., 2012; Vakilifard et al., 2011; Wahyuni et al., 2020).

In light of these foundational principles, the study's research problem can be succinctly framed by addressing the following inquiries:

1. To what extent does the application of International Financial Reporting Standards (IFRS) within Jordanian insurance companies contribute to the reduction of information asymmetry, as perceived by employees in Jordanian financial intermediaries?

2. How does the latitude to select alternative accounting policies within Jordanian insurance companies influence the reduction of information asymmetry, from the viewpoint of employees in Jordanian financial intermediaries?
3. To what extent does the external auditor's adherence to international auditing standards within Jordanian insurance companies play a role in reducing information asymmetry, as perceived by employees in Jordanian financial intermediaries?

4. How does the internal auditor's compliance with international auditing standards within Jordanian insurance companies impact the reduction of information asymmetry, as perceived by employees in Jordanian financial intermediaries?

5. To what extent does management's adherence to professional conduct standards within Jordanian insurance companies contribute to the reduction of information asymmetry, as perceived by employees in Jordanian financial intermediaries?

3. Literature review

3.1 The Accounting Profession and the Information Asymmetry Phenomenon

In the realm of practicality within the accounting profession and financial markets, a pronounced crisis of confidence has surfaced concerning the accuracy and reliability of corporate data and accounting information. This unsettling situation has not spared auditing firms, as periodic collapses of prominent global audit firms serve as glaring testimonies to this growing concern (Krishnan, 2003). Concurrently, the accounting profession has witnessed significant interventions from stakeholders, financial experts, and policymakers in shaping accounting standards and regulations tailored to specific economic and financial circumstances (Christensen et al., 2015), (Kinani, 2023). The ongoing collapses of major global entities such as Silicon Valley Bank and Citigroup only serve to compound the prevailing lack of trust in accounting data (Alshehadeh, 2021).

The bedrock of the accounting process is formed by a well-established set of rules, principles, and assumptions. Altering accounting methods and concepts in response to market events is not a prudent course of action. Modifying accounting standards based on economic, financial, regulatory, or organizational inadequacies within companies would ultimately leave the accounting profession devoid of any coherent accounting standards (Wahyuni et al., 2020). The paramount concerns for professional bodies and organizations are to ensure the quality of the accounting process and to alleviate the information asymmetry phenomenon. Accounting reports are anticipated to furnish investors with pertinent and valuable information to facilitate various decision-making processes. This entails combating accounting misconduct, thus enhancing the overall quality of the accounting process, ultimately mitigating the risks associated with information asymmetry for users of financial reports (Vakilifard et al., 2011). Elevated information asymmetry among market participants precipitates a decline in market efficiency, liquidity, and trading volume. The primary contributor to reduced liquidity in capital markets is information asymmetry, and its adverse repercussions on trade volume and liquidity are readily understandable, given the dwindling number of market participants. This liquidity contraction can be attributed to various factors (Van & Vanstraelen, 2005; Benito et al., 2008).

Disparities in the ability to assess securities risks invariably lead to escalated transaction and operational costs. Information asymmetry arises from the divergence between parties, wherein some possess information that is inaccessible to others. This informational imbalance engenders heightened costs as those lacking information endeavor to bridge the gap. The information encapsulated within the financial statements of companies should exhibit characteristics such as clarity, objectivity, and relevance, while adhering to various information-specific attributes. Failure to meet these criteria adversely affects stakeholders' capacity to make predictions concerning profits and future returns. Conflicts of interest that arise between management and users of financial statements frequently result in the preparation of deceptive financial reports. The distortion of financial statements serves the self-interest of management, creating an unfair scenario for financial statement users who rely on these reports to gauge a company's financial health and make informed decisions. Various forms of misconduct by facility management in presenting asymmetric information include (Akenbor & Tennyson, 2014; Rybák, 2015):

- Management's manipulation of actual operations, such as controlling the timing or terms of transactions.
- Management's interference with generally accepted accounting principles (GAAP) by selectively choosing, applying, altering, or categorizing accounting policies to obscure financial realities.
- Management's dissemination of false information regarding year-end accounting profits, as well as deviations from accepted accounting principles, including instances of fraud and forgery (Bartov Mohanram, 2004).

3.2 Accounting as a Tool for Unifying Economic Systems

Numerous studies, including the research conducted by Leuz and Verrecchia (2000) and the study conducted by Healy and Palepu (2001), have consistently highlighted the advantages of international accounting standards over local ones. These advantages are evident not only in the quality but also in the quantity of information generated. These studies emphasize...
that the disclosure of both quantitative and qualitative information yields economic benefits, particularly in addressing the challenge of information asymmetry, which often exists between corporate management and shareholders. Consequently, this disclosure can lead to a reduction in the cost of borrowed capital and the expenses associated with shareholders monitoring managerial activities.

The accounting profession, while sharing the foundational role of many other professions in society, is unique due to its distinct principles and regulations. Accounting, essentially a specialized discipline, serves the purpose of quantifying the financial position and performance of economic activities. It maintains an intrinsic relationship with economics as it records these activities and conveys the interrelationships among organizations. For organizations to efficiently manage their financial position and performance of economic activities, it is essential to maintain an accurate and reliable accounting system. Accounting knowledge has evolved based on a set of written standards promulgated by professional bodies, which primarily pertain to the technical aspects of the accounting process. These standards are instrumental in elucidating changes in the financial status of an economic entity during a specific reporting period (Callao & Jarne, 2010).

Economic activities exhibit distinct characteristics that vary across countries and economic systems. Notwithstanding these variations, economic activities share fundamental functions such as production, distribution, income generation, consumption, savings, and investment. Accounting has strived to simplify the intricacies inherent in economic organizations to reduce the ambiguity surrounding financial reports that encapsulate dynamic economic activities. This simplification has been achieved by adhering to fundamental principles when preparing financial statements (Balaciu et al., 2011). Accounting principles and practical tools for application facilitate the interpretation of complex economic phenomena, even in the presence of differences in prevailing economic systems and the intricate dynamics of economic activity at both macroeconomic and microeconomic levels. Accounting literature has introduced practical measures that contribute to the simplification of accounting measurements. These measures encompass the following fundamental concepts (Ball, 2006; Graham et al., 2005):

- The concept of cash measurement, which streamlines the multifaceted aspects of economic activity, with a primary focus on its monetary dimension.
- The concept of financial statement preparation, elucidating the composition of financial statements, the constituent elements, and the methodologies of presentation. These statements serve as a simplified model of the intricate nature of economic activity.
- The formulation of international auditing and accounting standards that serve as comprehensive guidelines. Despite occasional objections and criticisms, the majority of accountants and members of the financial community universally recognize these standards as enduring theories, methods, and definitions (Al-Khawaja et al., 2023).

3.3 Creative Accounting and Flexibility in Accounting Policies

In recent years, the concept of creative accounting has come under scrutiny, particularly following the infamous Enron scandal. The subsequent partial attribution of blame to Arthur Andersen for manipulating the company's financial data through specific accounting treatments shed light on this practice, ultimately leading to the enactment of the Sarbanes-Oxley Act in 2002 by the U.S. Congress (Yadav et al., 2014).

Creative accounting refers to the presentation of income, assets, and liabilities by business entities in an inaccurate and misleading manner. Such practices have been implicated in numerous financial collapses and scandals involving major economic institutions, including Enron, WorldCom, Harcon, Meryl Indico, and Lehman Brothers (Efiok & Eton, 2012). The successive collapses of these companies had far-reaching global economic repercussions, with fingers pointing towards the accounting profession, accusing it of allowing management to manipulate financial data and disregard accounting principles and standards (Healy & Wahlen, 1999).

Over the past two decades, the accounting community has extensively investigated this phenomenon, offering various insights. From the standpoint of the accounting profession, Tassadaq and Malik, (2015) and Alshehadeh et al. (2023) underscore that accounting inherently involves addressing myriad issues requiring judgment and reconciling conflicts arising from different accounting methods used to portray the outcomes of financial events and transactions. The flexibility inherent in these methods presents opportunities for manipulation and the presentation of an inaccurate depiction of an entity's condition. These activities, coupled with a diminished confidence in the accounting profession, collectively fall under the umbrella of creative accounting. (Jebril et al., 2023; Barqawi, 2023)

Creative accounting has significantly influenced the accounting landscape since the Enron collapse, precipitating recurrent financial crises, challenging established accounting standards, and necessitating the establishment of new corporate governance foundations grounded in ethical conduct within accounting practices (Al-Shahadah et al., 2023).

In the 1970s, the emergence of agency theory prompted certain management teams to prioritize their self-interest over the interests of shareholders. This gave rise to new methods of manipulating accounting standards, profit determination,
depreciation, and revenue recognition. Legal means were utilized to exploit the flexibility in choosing accounting alternatives, culminating in what is commonly referred to as innovative accounting, known by various names (Christensen et al., 2002; Blake & Salas, 2001).

Discretionary accounting entails the deliberate selection of accounting methods with the aim of achieving desired outcomes, particularly higher profits. Income smoothing is one such method employed to mitigate earnings volatility across financial years, effectively transferring profits from prosperous periods to offset anticipated challenging ones.

Earnings management, as the culmination of preceding methods, involves the manipulation of figures. It encompasses both intentional and unintentional choices, involving both deceptive and non-deceptive application of recognized accounting principles. Management can exploit the flexibility offered by accounting principles and standards to report profits and financial measurements, potentially compromising the quality of financial information contained in reports (Ball, 2006).

The flexibility inherent in accounting principles and standards is now universally acknowledged and accepted by all organizations and professional bodies governing the accounting and auditing professions. Disregarding this flexibility would entail ignoring the diverse circumstances surrounding each company. The flexibility in the application of accounting principles and standards seeks to provide high-quality financial information that supports informed economic decision-making. Management can leverage this flexibility to achieve specific objectives, such as influencing stock markets, increasing executive compensation, or evading government intervention. Consequently, earnings management has become a subject of extensive financial debate (Makar et al., 2000).

Sun and Rath (2009) argue that managerial incentives for earnings management often arise from current stockholders' desire to maximize stock value at the expense of future stockholders. Scott (2003) posits a positive aspect of earnings management, suggesting that it can serve as a means of conveying internal information within companies to the market, thereby enabling the stock price to accurately reflect the company's future. Parfet (2000) distinguishes between good and bad earnings management, with the former entailing the creation of stable and consistent financial performance through acceptable choices, while the latter involves the fabrication of unrealistic accounting records. Jiraporn et al. (2008) argue that earnings management can be beneficial and not necessarily harmful, contrary to some suggestions. They found a negative relationship between earnings management and agency costs and a positive relationship between earnings management and firm earnings value (Sawalha, 2022).

The researchers of this study contend that earnings management hinges on the ethical behavior of management in utilizing the available flexibility. When used to convey information more effectively to the market and contribute to the economic growth of the company, earnings management can be deemed beneficial. However, if the practice of earnings management serves self-interest and deceives stakeholders about the true performance of the company, it is considered unethical due to its potential harm to the interests of other parties and wealth distribution.

Various classifications of earnings management have been proposed. A study by Cheng and Warfield (2005) categorizes them as follows:

1. Legitimacy: Earnings management can be categorized as legitimate or illegitimate. Legitimate management adheres to generally accepted accounting principles and allows for choices and accounting estimates, while illegitimate management contravenes these principles or laws in pursuit of management's goals, often bordering on fraud.

2. Cash Flow Impact: Earnings management can impact cash flows or not. Economic earnings management involves real business activities that affect income and impact cash flows, while earnings management through accrual management leverages flexibility in accounting estimates and alternatives to impact income without affecting cash flows. Opportunistic earnings management aims to manipulate financial results to serve management's self-interests at the expense of other parties, constituting opportunistic behavior (Bergstresser & Philippon, 2006).

Another study by Noronha and Zeng (2008) reveals that companies employ a variety of methods for earnings management, including adjustments to bad debt and doubtful accounts, changes in depreciation methods, modifications of gains and other revenues, settlement of investment operations, transactions with related parties, and adjustments to operating revenues. Furthermore, the study by Cheng and Warfield (2005) suggests that management often shifts earnings from one period to another to influence stock prices, particularly when compensation is tied to stock options. This practice results in earnings management that surpasses analyst expectations as management's share of stocks increases. Bergstresser and Philippon (2006) provide evidence of managers manipulating earnings through optional accruals, particularly when executive compensation is substantial. In such cases, executive managers and large stockholders tend to sell a significant number of shares.
3.4 The Accounting Profession and Business Ethics

In the aftermath of economic collapses and financial crises that afflicted numerous global economies, and within the context of the expanding reach of financial markets and private sector companies driving economic growth worldwide, there arises an imperative need to lay down new ethical foundations and standards for professionals. These standards and ethical principles are now encapsulated in the concept of Corporate Governance, which aims to mitigate the prevalence of creative accounting practices and the potential harm stemming from them due to a lack of essential transparency. The goal is to uplift both global and local economies (Afolabi & Oluseye, 2013).

Given that a company's financial health hinges on factors such as the management of its economic resources, its financial structure, liquidity, financial adaptability, and its ability to navigate changes in its external environment, accountants may, in certain cases, maneuver international accounting standards to address the company's financial challenges. In these instances, they seek to persuade auditors of their innovative approach, making use of the flexibility inherent in these standards (Okafor, 2006).

However, if we consider profit management as part of the accountant's responsibilities, solely holding the accountant accountable for manipulating figures in contravention of professional ethics would be incomplete. It is widely recognized that negotiations transpire between auditors and executive management regarding the reported profit figure. Therefore, understanding the accountant's actions in service of the company entails involvement and endorsement of these actions by the management itself (Van & Vanstraalen, 2005). Consequently, the necessity arose to establish regulations governing various professions, encompassing codes of ethics and codes of practice. These regulations encompass principles, duties, rights, and prohibitions that professionals must adhere to when engaging in their respective fields. Hence, unethical conduct by accountants largely originates from within and from their obligation to uphold their profession's ethical standards, enforced by the professional institutions to which they belong (AL-Kassem, 2012).

From the perspective of the researchers in this study, unethical conduct in accounting manifests when accountants engage in deception or illicit activities that harm others, particularly their clients. The primary purpose of creative accounting should not involve deceiving clients for the sole benefit of the company. Measures to curb the misuse of certain accounting practices encompass (Bartov & Mohanram, 2004; Akenbor & Tennyson, 2014):

1. Activation of the "Consistency" Principle: Consistency denotes the steadfast use of accounting policies chosen by financial statement preparers. This implies that once a company selects an accounting policy suitable for a specific year, it should continue to apply it in subsequent years, even if circumstances suggest otherwise. While changing accounting policies is permissible, it should only occur under exceptional circumstances, and the financial ramifications of such changes should be transparently disclosed.

2. Strengthening Auditor, Controller, and Audit Committee Oversight: Competent and skilled auditors bear the responsibility of devising audit procedures that yield reasonable assurance regarding distortions stemming from creative accounting, which are pivotal for the accuracy of financial statements.

3. Activation of Professional Organizations: Professional bodies overseeing the accounting and auditing profession play a vital role in formulating codes of professional conduct and establishing ethics committees. One of their paramount functions is the establishment of behavioral guidelines that accountants and auditors must adhere to (Okafor, 2006).

3.5 Audit Process and the Responsibilities of External and Internal Auditors

The pivotal role of external auditors resides in their ability to instill confidence in financial statements, thereby relying on the assessments made by users of these financial reports. The effectiveness of the audit hinges on the independence of the auditor and the expertise of the audit team. These factors directly influence management's capacity to engage in profit management practices. Research by Alshehadeh and Atieh (2020) underscores the substantial role played by external auditing in mitigating opportunistic profit management practices. Additionally, studies conducted by Ebrahim (2001) and Kassem (2012) have delved into the influence of audit quality on the reduction of profit management practices. The theoretical framework of these studies postulates that higher audit quality correlates with a decrease in managerial practices related to profit management, while lower audit quality is linked to an increase in such practices (Al-Khabash & Al-Thuneibat, 2009).

However, it is imperative to acknowledge that audit processes do not provide an infallible guarantee of detecting all irregular practices, as they are not devoid of imperfections. Even with the most meticulous execution of audit procedures in accordance with Professional Auditing Standards (Al-Khabash & Al-Thuneibat, 2009), certain creative accounting practices may go unnoticed. The pursuit of identifying all creative accounting practices would potentially lead to exorbitant audit costs. Consequently, auditors are advised to concentrate their efforts on areas characterized by significant risks of distortions or manipulations. The execution of the audit process itself offers a high level of assurance in detecting such
practices, though it does not offer absolute confirmation. Nonetheless, this high level of assurance significantly bolsters the accuracy of financial information across companies operating in efficient markets (Caramanis & Lennox, 2008).

In this vein, it is pertinent to assert that auditing engenders various economic advantages. Auditors furnish management with recommendations that facilitate cost reduction through enhanced operational efficiency and the reduction of distortions, manipulations, or fraudulent activities. The implementation of audit procedures also incentivizes individuals within the organization to perform at a higher standard, thus diminishing opportunities for fraud and misconduct.

Owing to the escalating complexity of the business landscape, the expansion of entities and corporations, the broadening scope of financial transactions, the intricacies of international trade, and the challenges associated with procuring direct information for decision-makers, auditing has assumed a critical role in mitigating information risks. These risks pertain to the potential inaccuracies in information pertaining to an entity's business risks or financial statements (Rabin, 2001).

To attain reasonable assurance, auditors must adhere to several mechanisms and conditions that enhance their ability to unearth improper practices. Among the most salient mechanisms and conditions are as follows: (Al Momani & Obeidat, 2013; Yaseen et al., 2023).

1. Availability of Qualified and Trained Human Resources: Competent professionals are indispensable for the successful execution of audits. Prioritizing training, continuous education, knowledge dissemination, and experience sharing within the auditing ecosystem is imperative.

2. Specific Qualifications for Auditors: Auditors should possess distinct qualifications, including a comprehensive understanding of various economic activities, awareness of developments in the business environment, and an appreciation of factors that could impact their clients' financial positions or business resources. Furthermore, attributes such as independence, the ability to conduct accurate audits, and a profound understanding of the significance of their work are essential.

Researchers contend that adept auditors consistently seek sufficient and appropriate evidence to validate the absence of distortions or errors. Importantly, it should be noted that inherent limitations in the auditing process introduce risks associated with failing to uncover significant distortions in financial statements resulting from creative accounting practices. Even when adhering to core principles and requisite audit procedures, auditors may still encounter certain discrepancies and distortions in financial statements.

4. Method

4.1 Study Population

The study population comprises two distinct categories:

Category 1: This category encompasses licensed financial intermediary companies in Jordan, totaling 53 companies. Our analysis unit consisted of 325 individuals who hold senior management positions (CEOs and their deputies) as well as middle management roles (Directors of the Equity Investment Department, financial brokers, and operations officers) within these companies. In total, we distributed 325 electronic questionnaires and successfully collected 302 valid and complete responses, thus forming our final study sample of 302 participants.

Category 2: This category pertains to insurance companies listed on the Amman Stock Exchange, totaling 20 companies. From this pool, we selected a sample of 18 companies based on the availability of financial data pertaining to the dependent variable throughout the study period spanning from 2015 to 2022.

Our research approach involved two key methodologies: the descriptive-analytical approach, which involved the development of a questionnaire for gathering primary data related to the measurement of independent variables, and the applied approach for gauging the dependent variable. For the latter, we relied on financial statements from insurance companies listed on the Amman Stock Exchange during the period from 2015 to 2022.

4.2 Study Variables and Measurement

Dependent Variable (Y): The dependent variable, which signifies information asymmetry, was quantified using the Price-to-Book Value Ratio. Existing studies (Ruhland, 2006; Nuryaman, 2014) have identified the Price-to-Book Value Ratio as a conventional and widely accepted metric for evaluating information asymmetry. A higher Price-to-Book Value Ratio, accompanied by a greater disparity between market value and book value, is indicative of an increased information gap between management and investors. This, in turn, serves as evidence of heightened information asymmetry in the market. The book value of the company is derived from publicly available financial reports prepared and disclosed by the management, while the market value reflects investors' current and future investment prospects.
Independent Variables (X): The independent variable of our study pertains to attributes of accounting business leadership and encompasses the following components:

- X1: Accounting Systems and Policies
- X2: International Financial Reporting Standards (IFRS)
- X3: International External Audit Standards
- X4: International Internal Audit Standards
- X5: Professional and Ethical Codes of Conduct

These attributes were assessed through a questionnaire composed of two sections: the first section gathered general information about the respondents, while the second section encompassed 30 items related to the attributes of accounting business leadership.

Control Variables (Z): Our study incorporates control variables that may influence the relationship between the characteristics of accounting business leadership and the mitigation of information asymmetry. These control variables consist of company size, measured by the natural logarithm of total assets (Ji et al., 2017), return on assets, computed as net profit divided by total assets (Lee et al., 2017), and financial leverage, quantified by total liabilities divided by total assets (Chen & Zhang, 2014). We conducted data analysis using statistical software (SPSS) and examined hypotheses through multiple regression analysis. The comprehensive model for multiple regression analysis can be articulated using the following equation:

\[ Y_{i,t} = \alpha + \beta_0 + \beta_1 X_{1,i,t} + \beta_2 X_{2,i,t} + \beta_3 X_{3,i,t} + \beta_4 X_{4,i,t} + \beta_5 Z_{1,i,t} + \beta_6 Z_{2,i,t} + \beta_7 Z_{3,i,t} + \epsilon_{i,t} \]

5. Results

5.1 Examination of Study Variables’ Data Behavior and Characteristics

In order to gain insights into the behavior and characteristics of the data underpinning our study, we conducted an analysis to calculate the means of the values associated with the study variables. Additionally, we computed the deviations of the data values from these means. The results of this analysis, encompassing the arithmetic means and standard deviations of the study variables' data, are presented in Table 1:

<table>
<thead>
<tr>
<th>Code</th>
<th>Variable</th>
<th>Mean</th>
<th>SD</th>
</tr>
</thead>
<tbody>
<tr>
<td>X1</td>
<td>Accounting Systems and Policies</td>
<td>0.526</td>
<td>0.947</td>
</tr>
<tr>
<td>X2</td>
<td>International Financial Reporting Standards (IFRS)</td>
<td>0.537</td>
<td>0.845</td>
</tr>
<tr>
<td>X3</td>
<td>International External Audit Standards</td>
<td>0.428</td>
<td>0.954</td>
</tr>
<tr>
<td>X4</td>
<td>International Internal Audit Standards</td>
<td>0.143</td>
<td>0.674</td>
</tr>
<tr>
<td>X5</td>
<td>Professional and Ethical Codes of Conduct</td>
<td>0.659</td>
<td>0.554</td>
</tr>
<tr>
<td>Z1</td>
<td>Company Size</td>
<td>0.174</td>
<td>0.873</td>
</tr>
<tr>
<td>Z2</td>
<td>Return on Assets</td>
<td>0.764</td>
<td>0.443</td>
</tr>
<tr>
<td>Z3</td>
<td>Financial Leverage</td>
<td>0.535</td>
<td>0.776</td>
</tr>
<tr>
<td>Y</td>
<td>Information Asymmetry</td>
<td>0.497</td>
<td>0.663</td>
</tr>
</tbody>
</table>

Table 1 presents an overview of the average values of the independent variables and control variables in our study. It's important to note that these values shed light on the central tendencies within our dataset, providing valuable insights into the characteristics of our sampled companies and the study population. Variable X5, which pertains to professional and ethical behavior standards, exhibited the highest mean with a value of 0.659. This suggests that there is a notable emphasis on professional and ethical conduct within the accounting domain. On the other hand, variable X4, associated with international internal auditing standards, displayed the lowest mean, standing at 0.143. This implies that the focus on adhering to international internal auditing standards may not be as prominent among the sampled companies. Company size (Z1) was assessed, resulting in a mean of 0.174 for the sampled companies. This metric provides an indication of the scale and magnitude of these firms. The return on assets (Z2) exhibited a mean of 0.764 for the sampled companies. This measure helps us gauge the financial performance of these companies concerning their total assets. Financial leverage (Z3) was examined, with a mean of 0.535 among the sampled companies. This variable offers insights into the financial risk and structure of these entities. Lastly, when it comes to information asymmetry (Y), the mean for the companies within the study population was 0.497. Information asymmetry reflects the variance in information accessibility between different stakeholders within these firms.
5.2 Testing the Role of Accounting Business Leadership Characteristics in Reducing Information Asymmetry for Study Population Companies

Moving on to the analysis, we conducted a Pearson Correlation analysis (Table 2) to assess the relationships among our independent study variables (X), control variables (Z), and the dependent variable (Y). This analysis aims to validate our main hypothesis, which posits that there exists a significant relationship between accounting business leadership characteristics and the reduction of information asymmetry. The independent variables under scrutiny encompass accounting systems and policies, international financial reporting standards, international external audit standards, international internal audit standards, and professional and ethical codes of conduct. By examining these correlations, we can better understand the interplay between these elements and their impact on information asymmetry within the study population's companies.

Table 2
The relationship between the independent study variables (X) and the control variables (Z) with the dependent variable (Y)

<table>
<thead>
<tr>
<th>Code</th>
<th>Variable</th>
<th>(Y) Information Asymmetry</th>
<th>P-Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>X1</td>
<td>Accounting Systems and Policies</td>
<td>0.0532</td>
<td>0.000</td>
</tr>
<tr>
<td>X2</td>
<td>International Financial Reporting Standards (IFRS)</td>
<td>-0.796</td>
<td>0.000</td>
</tr>
<tr>
<td>X3</td>
<td>International External Audit Standards</td>
<td>-0.684*</td>
<td>0.041</td>
</tr>
<tr>
<td>X4</td>
<td>International Internal Audit Standards</td>
<td>-0.123</td>
<td>0.214</td>
</tr>
<tr>
<td>X5</td>
<td>Professional and Ethical Codes of Conduct</td>
<td>-0.412</td>
<td>0.000</td>
</tr>
<tr>
<td>Xs</td>
<td>All Variables of Entrepreneurial Accounting Characteristics</td>
<td>-0.571</td>
<td>0.001</td>
</tr>
<tr>
<td>Z1</td>
<td>Company Size</td>
<td>0.602</td>
<td>0.002</td>
</tr>
<tr>
<td>Z2</td>
<td>Return on Assets</td>
<td>-0.024</td>
<td>0.641</td>
</tr>
<tr>
<td>Z3</td>
<td>Financial Leverage</td>
<td>0.050</td>
<td>0.831</td>
</tr>
<tr>
<td>Zs</td>
<td>All Governing Variables</td>
<td>0.548*</td>
<td>0.003</td>
</tr>
</tbody>
</table>

The findings presented in Table 2 reveal a noteworthy inverse correlation between the independent variables, namely X1, X2, X3, X4, and X5, and the reduction of information asymmetry (Y). This relationship holds statistical significance, with variables X1, X2, and X5 exhibiting a remarkable significance level of 1%, while variable X3 demonstrates significance at a level below 5%. Conversely, the relationship for variable X4 reaches significance at a level exceeding 5%. Moreover, the results underscore a significant and inverse correlation at the 1% significance level between all the attributes associated with accounting business leadership (X) and the mitigation of information asymmetry (Y). In examining the role of control variables in mitigating information asymmetry, Table 2 reveals a positive influence, particularly in the case of control variables Z2 and Z, which exhibit a significant reduction in information asymmetry (Y) at the 1% significance level for variable 1Z. Furthermore, a noteworthy positive effect is observed at a significance level below 5% across all control variables (Z) in reducing information asymmetry (Y). These findings suggest that the characteristics of accounting business leadership (X) are poised to elucidate the dependent variable, which, in this context, is the reduction of information asymmetry (Y).

It is essential to highlight that among the independent variables, 2X, representing international financial reporting standards, emerges as the most influential, boasting a robust correlation strength of 79.6%. Following closely is 3X, signifying international external audit standards, with a correlation strength of 68.4%. In contrast, the least impactful independent variable in terms of reducing information asymmetry is 4X, representing international internal audit standards, with a comparatively modest correlation strength of 0.123%.

5.3 Results of Multiple Regression Analysis on the Role of Accounting Business Leadership Characteristics in Reducing Information Asymmetry for Sampled Companies

To assess the validity of our study's hypothesis, which posits a significant relationship between accounting business leadership characteristics (X) and the reduction of information asymmetry, we conducted a multiple regression analysis. This analysis aimed to elucidate the extent to which accounting business leadership characteristics (X) contribute to explaining the variability in the reduction of information asymmetry (Y), while accounting for the presence of certain control variables (Z). Specifically, we included company size, return on assets, and financial leverage as control variables in our analysis.

The outcomes of this multiple regression analysis are presented in Table 3, which summarizes the findings regarding the role of accounting business leadership characteristics (X) and their interaction with these control variables in the context of reducing information asymmetry. Table 3 provides compelling evidence regarding the overall significance of our model in assessing the impact of accounting business leadership characteristics, encompassing elements such as accounting systems and policies, international financial reporting standards, international external audit standards, international internal audit standards, and professional and ethical codes of conduct, on the reduction of information asymmetry. The analysis yielded an F-value of 23.724 and a corresponding p-value of 0.000, well below the conventional significance threshold of 0.05. This outcome signifies the model's validity in predicting the dependent variable's value. In addition, our examination of multicollinearity reveals that the variance inflation factors (VIF) are comfortably below the threshold of 10, while tolerance
values exceed 0.01. These favorable indicators suggest the absence of multicollinearity issues within our study model, thereby reinforcing its capacity to explicate the influence of accounting business leadership characteristics (X) on diminishing information asymmetry (Y).

### Table 3
Results of Multiple Regression Analysis on the Role of Accounting Business Leadership Characteristics in Reducing Information Asymmetry

<table>
<thead>
<tr>
<th>Code</th>
<th>Variable</th>
<th>Unstandardized Coefficients</th>
<th>Beta</th>
<th>T</th>
<th>P. Value (sig.)</th>
<th>Toler.</th>
<th>VIF</th>
</tr>
</thead>
<tbody>
<tr>
<td>X1</td>
<td>Accounting Systems and Policies</td>
<td>-0.425</td>
<td>0.201</td>
<td>2.168</td>
<td>0.035</td>
<td>0.514</td>
<td>2.01</td>
</tr>
<tr>
<td>X2</td>
<td>International Financial Reporting Standards</td>
<td>-0.277</td>
<td>0.124</td>
<td>2.584</td>
<td>0.010</td>
<td>0.414</td>
<td>2.41</td>
</tr>
<tr>
<td>X3</td>
<td>International External Audit Standards</td>
<td>-0.094</td>
<td>0.030</td>
<td>2.931</td>
<td>0.004</td>
<td>0.414</td>
<td>2.41</td>
</tr>
<tr>
<td>X4</td>
<td>International Internal Audit Standards</td>
<td>-0.241</td>
<td>0.165</td>
<td>-1.45</td>
<td>0.149</td>
<td>0.414</td>
<td>2.41</td>
</tr>
<tr>
<td>X5</td>
<td>Professional and Ethical Codes of Conduct</td>
<td>-0.431</td>
<td>0.132</td>
<td>-2.13</td>
<td>0.035</td>
<td>0.414</td>
<td>2.41</td>
</tr>
<tr>
<td>Z1</td>
<td>Company Size</td>
<td>1.136</td>
<td>0.260</td>
<td>4.326</td>
<td>0.000</td>
<td>0.722</td>
<td>1.38</td>
</tr>
<tr>
<td>Z2</td>
<td>Return on Assets</td>
<td>0.025</td>
<td>0.174</td>
<td>0.170</td>
<td>0.868</td>
<td>0.623</td>
<td>1.60</td>
</tr>
<tr>
<td>Z3</td>
<td>Financial Leverage</td>
<td>0.274</td>
<td>0.128</td>
<td>2.317</td>
<td>0.023</td>
<td>0.623</td>
<td>1.60</td>
</tr>
</tbody>
</table>

Turning our attention to the model's explanatory power, denoting the extent to which the independent variables clarify the dependent variable, we observe a multiple correlation coefficient (R) of 0.873. This is congruent with the coefficient of determination (R²), which stands at 0.873, and the adjusted R-squared value (Adj R) of 0.753. These statistics collectively imply that, in the presence of selected control variables, accounting business leadership characteristics (X) can account for a substantial 75.3% of the variance seen in the reduction of information asymmetry (Y).

Furthermore, the multiple regression analysis, as detailed in Table 3, underscores the significance of all independent variables (accounting systems and policies, international financial reporting standards, international external audit standards, international internal audit standards, and professional and ethical codes of conduct) in exerting an inverse effect on the dependent variable (Y), namely, the reduction of information asymmetry, at a significance level lower than 0.05%. Nevertheless, it is worth noting that the variable representing international internal audit standards (4X) does not wield a statistically significant impact on information asymmetry reduction.

Additionally, our findings reveal that two control variables, namely company size (1Z) and financial leverage (3Z), play a significant and positive role in reducing information asymmetry at a significance level below 0.05%. Conversely, the variable return on assets (2Z) does not manifest a statistically significant influence on the reduction of information asymmetry. This culmination of results culminates in the formulation of the regression equation as follows:

\[ Y = -1.735 - 0.425X_1 - 0.277X_2 - 0.094X_3 - 0.241X_4 - 0.431X_5 + 1.136Z_1 + 0.025Z_2 + 0.274Z_3 \]

### 6. Discussion

A key finding underscored in the results is the statistically significant inverse relationship between the application of International Financial Reporting Standards (IFRS) and the reduction of information asymmetry, as perceived by employees in Jordanian financial intermediaries. This aligns with the literature review's assertion that international accounting standards can enhance the quality and quantity of information provided to stakeholders, thereby addressing information asymmetry between management and shareholders (Rybák, 2015; Tassadaq & Malik, 2015; Alshehadeh et al. 2023; Ruhland, 2006; and Nuryaman, 2014). The empirical evidence supports the notion that IFRS adoption mitigates information asymmetry. However, a discrepancy emerges concerning the latitude in selecting alternative accounting policies. The literature posits that such flexibility presents opportunities for earnings management and creative accounting that can obscure financial realities (Tassadaq & Malik, 2015; Alshehadeh et al., 2023). In contrast, the results reveal that the ability to choose among accounting policies contributes significantly to reducing information asymmetry. This suggests that prudent use of accounting policy flexibility can convey organization-specific nuances effectively.

With regards to external auditing standards, the findings reaffirm the literature's stance. Both contend that external auditors play a pivotal role in constraining opportunistic earnings management by verifying the accuracy of financial statements (Alshehadeh & Al-Khawaja, 2022; Ebrahim, 2001). The empirical evidence demonstrates a robust inverse relationship between compliance with international external auditing standards and information asymmetry. This alignment highlights the importance of independent external audits. However, divergence resurfaces concerning internal auditing standards. The literature emphasizes that skilled internal auditors provide safeguards against misreporting and fraud (Al Momani & Obeidat, 2013; Yaseen et al., 2023). Yet, the results reveal that adherence to international internal auditing standards does not significantly influence information asymmetry reduction. A potential explanation is that external audits already constrain manipulative reporting, rendering incremental benefits from internal audits less substantial.
Finally, the findings confirm the literature's proposition that management's professional and ethical conduct is integral to high-quality financial reporting that reduces information asymmetry (Afolabi & Oluseye, 2013). The empirical evidence demonstrates a pronounced inverse relationship, underscoring that sound ethical codes effectively limit distortions. This alignment spotlight's management's critical role in upholding integrity. Beyond the independent variables, the control variables provide further insights. The results reveal that larger firms face greater pressure for transparent reporting, hence the positive association between company size and reduced information asymmetry. Moreover, higher financial leverage compels companies to reduce manipulative practices to avoid default risks. However, return on assets did not exhibit statistical significance, implying that profitability does not necessarily constrain earnings management.

The findings largely corroborate the literature, affirming that ethical conduct, stringent auditing, and transparent reporting via IFRS adoption mitigate information asymmetry. However, the results suggest that judicious flexibility in accounting policies could better capture company-specific circumstances. Furthermore, while external audits are impactful, internal audits do not substantially enhance information symmetry beyond external verification. The study makes a valuable empirical contribution by testing these dynamics within Jordan's insurance industry. The results have meaningful implications for insurance sector regulations and governance in Jordan. Firstly, mandatory IFRS adoption appears warranted given its benefits for transparency. Secondly, prudent oversight on accounting policy flexibility is advisable to balance transparency aims and business needs. Thirdly, bolstering external auditing independence and scope could enhance monitoring. Fourthly, while internal controls are undoubtedly beneficial, mandating more stringent internal audits may offer limited additional advantages. Finally, instilling and enforcing codes of ethics is imperative to curtail misleading reporting. However, some limitations provide avenues for further research. The reliance on employee perceptions, while insightful, incorporates subjectivity. Supplementing with objective indicators could enrich the analysis. Moreover, incorporating qualitative data could provide contextual insights into the impact of accounting policies and auditing processes. Extending the research to other industries could offer comparisons to the insurance sector. Finally, a longitudinal study could assess improvements over time with successive accounting and auditing reforms.

7. Conclusion

This study sought to emphasize the pivotal role played by accounting business leadership characteristics in mitigating information asymmetry within insurance companies listed on the Amman Stock Exchange. Our statistical analysis has illuminated how these attributes, along with the information they yield, carry significant credibility, thereby contributing to the alleviation of information asymmetry among stakeholders deeply vested in corporate economics. Moreover, our research has underscored the ethical dimension of accounting, a foundational aspect that cannot be underestimated. Ethical principles serve as the guiding force behind the accounting profession, elevating it to a higher echelon and bestowing upon it a more substantial role within the realms of economics and finance. This elevation, in turn, contributes significantly to the reduction of information asymmetry. In the face of considerable challenges, auditors find themselves in a demanding position, grappling with the intricacies of large corporations, their multifaceted operations, and the ever-evolving landscape of production, marketing, and financial practices. Given these complexities, audit firms must invest in enhancing the competencies of their personnel, equipping them to meticulously assess the reliability of data and information supplied by the entities they audit. This diligence is instrumental in preventing any potential manipulations, distortions, or financial improprieties. Furthermore, our research sheds light on the escalating information risks resulting from the intricacies of the contemporary business environment. Factors such as the proliferation of entities and companies, the magnitude of financial transactions, and the intricate nature of exchange operations have collectively heightened these risks. Consequently, auditors often find it challenging to gain a comprehensive understanding of all transactions and events within a company. Consequently, the auditing process, while essential, cannot guarantee the detection of all irregular practices.

One of the pivotal recommendations emanating from this study emphasizes the need to broaden our focus beyond the technical dimensions of accounting, encompassing the promulgation of local and international accounting standards and guidelines. Instead, we must undertake a comprehensive reevaluation of the various facets of the accounting profession. The persistent challenge of information asymmetry among stakeholders is not solely an accounting crisis; it represents a broader issue concerning professional and ethical conduct. This challenge permeates every layer of the profession, starting from the regulatory frameworks and legal principles, progressing through accounting standards, professional conduct, and ethics, and culminating in the quality control of professional performance, which accountants and certified auditors must rigorously adhere to, alongside management.

References


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