

# QUALITY OF INTERNAL AUDIT IN LIGHT OF APPLYING INSTITUTIONAL GOVERNANCE CONCEPTS IN JORDANIAN BANKS

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## ABSTRACT

*This study aimed to measure the impact of the application of the concepts of corporate governance on the quality of internal audit in Jordanian banks, the study community will be from all Jordanian banks, where a questionnaire has been distributed to the study sample, which included financial managers and heads of accounting departments and managers of internal audit and workers in the accounting and internal audit departments in these banks.*

*The results of the study concluded that there is an effect of applying the concepts of institutional governance (disclosure and transparency, accountability, responsibility, justice, independence, laws and regulations) to the quality of internal audit in these banks. In light of the results, the study made several recommendations, including stressing the importance of commitment to applying the pillars of institutional governance for its apparent impact on the quality of the internal audit, and working to develop the efficiency of the professional auditor for the internal auditor by holding training programs to keep up with the latest developments in his field of work and obtaining professional certificates.*

**Keyword:** Audit Internal, Governance Quality, Internal Audit.

## INTRODUCTION

Importance of institutional governance has come from economic and financial crises which the companies faced; in addition, these companies collapsed due to financial and administrative corruption plus the weakness of internal control systems. Hence, applying a set of policies and procedures has become a necessity in order to maintain the rights of stakeholders and achieve effectively the accountability and control. Effective institutional governance in the companies ensures the accuracy of financial reports on internal control procedures and financial reports plus the effectiveness of internal control procedures.

Internal audit is one of institutional administrative governance tools which can organize the companies in accordance with certain directions, thereby achieving the desired goals. Banks have highly taken interest in the capacity of internal audit due to the various services which can be performed by internal audit. Consequently, paying a high attention to develop the performance of internal auditors and improve internal audit quality has become necessary in order to achieve bank's goals. In Jordan, control authorities of central bank have taken an interest in applying the concepts of institutional governance because of its advantages of achieving the accountability and control. Hence, the study examining the relationship between the pillars of institutional governance and the quality of internal audit in one of the most significant sectors of national economy, the banks, is important.

## **Problem of Study**

The importance of institutional governance has recently increased due to the financial crises, collapses and scandals the global companies faced. In addition, focusing on the role of auditors has become a necessity in order to limit incorrect practices. Moreover, a lack of applying institutional governance in business organizations has undesirably affects at various levels and aspects including professional behaviors' and quality level of performance of internal auditors. The problem of the study can be limited through answering the main following question followed by sub-questions:

## **Main Question**

Does applying the pillars of institutional governance, namely disclosure, transparency, accountability, responsibility, equity, independence, laws and regulations contribute to the achievement of internal audit quality in Jordanian banks?

Sub-Questions:

1. Does applying disclosure and transparency contribute to the achievement of internal audit quality in Jordanian banks?
2. Does applying accountability contribute to the achievement of internal audit quality in Jordanian banks?
3. Does applying responsibility contribute to the achievement of internal audit quality in Jordanian banks?
4. Does applying equity contribute to the achievement of internal audit quality in Jordanian banks?
5. Does applying independence contribute to the achievement of internal audit quality in Jordanian banks?
6. Does applying laws and regulations contribute to the achievement of internal audit quality in Jordanian banks?

## **Purposes of Study**

Due to the importance of institutional governance which examines and evaluates operational activities and internal control systems and verifies the correctness of strategical instructions applied by administration, the study aims at identifying to which extent applying the pillars of institutional governance achieves internal audit quality. The study, therefore, illustrates the process of applying the pillars of institutional governance in Jordanian banks and their role in achieving internal audit quality.

## **Importance of Study**

The study is important because it examines the subject of institutional governance and its role in achieving internal audit quality. In addition, it is one of pioneering studies which touch upon the relationship between institutional governance and internal audit quality in Jordanian environment and banking sector. Thus, the results and recommendations of the study provide banks with significant services which can develop the capacity of internal audit and improve performance quality, thereby contributing to the success and continuity of these banks.

## **Theoretical Framework and Previous Studies**

### **Theoretical Framework**

## **Institutional Governance and Its Pillars**

International Finance Corporation (IFC) has defined the governance as ‘the systems and structures by which the companies are managed and controlled’ (Alamgir, 2007). The organisation for Economic Co-operation and Development (OECD) has defined it as ‘a set of relationships between company management, the board of directors and shareholders, among other’ (Freeland, 2007).

Numerous studies in the literature have shown that institutional governance includes a set of main pillars contributing to the achievement of its following goals:

### **Disclosure and Transparency**

They provide information for the purpose of protecting shareholder future; in addition, they make a society acknowledge that the company seeks to fulfil its obligations (Japan Committee, 2001). Disclosure and transparency are main pillars which ensure the equity, integrity and trust of the procedures of managing the organizations and their personnel (Khoury, 2003). The importance of discourse and transparency has emerged when the economic role of financial markets has increased and the financial report has become an important source of information required for making decisions (Mata, 2003; Al-Tamimi, 1998). The information disclosed and financial reports are provided in the form of attached notes or tables; or the information may be provided in financial statements in which this information is an integral part of these statements. The information shall fairly, impartially and honestly be disclosed and provided to the stakeholders in a timely manner.

### **Accountability**

It means that the concerned parties, namely shareholders, employees and society, monitor and evaluate continuously organization management through using a control structure inside the organization; this control structure includes independent audit committees plus internal audit bodies which aim at performing independently their duties (Rittenberg & Hermanson, 2003).

### **Responsibility**

It indicates that the company has a moral mission which shall be performed in order to serve the society; and managers acknowledge that they have a responsibility to conserve and protect the environment and employees; in addition, they shall improve the services provided (Schwartz & Carroll, 2003).

### **Equity**

It means that the rights of stakeholders of the company shall be respected; tasks, duties and responsibilities shall be distributed among the employees on the basis of equity and equality. The organization for Economic Co-operation and Development (OECD) has confirmed the need of developing a system which prevents the managers from using their positions for private interests; and board members must declare any financial interest in the operations performed by the organization (Hill et al., 2003).

### **Independence**

It aims at reducing or eliminating interest conflicts through forming independent committees and recruiting an auditor and avoiding any influence on the decisions of the board of the directors (Al-Khoury, 2003). Internal audit standards issued by Institute of Internal Auditors in The United State of America ensure the independence and objectivity of the performance of internal auditors who relate to the highest department of the organization. In addition, the auditors shall be impartial and unbiased (Mutchler, 2003; Al-Essawy, 2003).

### **Laws and Regulations**

It means that institutional governance rules shall be inserted in various laws such laws of companies, capital markets, accountancy, auditing, among other, which clarify the rights and duties of shareholders and urge to the existence of compliance control in most companies. The importance of institutional control comes from the legal side which overcomes the negative aspects of implementing the contracts concluded between the concerned parties in the organization; it also protects the rights of each party from the negative practices which violate the formulas of the contracts concluded (Zingales, 1998).

### **Quality of Internal Audit**

Institute of Internal Auditors (IIA) defined internal audit in the bulletin of the institute in 1999 as ‘a consultative, assertive and targeted activity or profession created by the organization in order to improve its goals through following a clear and defined approach which evaluates and improves the effectiveness of operations, control and guidance’ (IIA, 1999).

Internal audit is an administrative control evaluating the appropriateness and effectiveness of all kinds of control in the organization. In addition, this profession is a safety value for the administration. It is also described as the eyes and ears of the management’ (IIA, 1999). Internal audit profession plays an important role in governance process which is a part of governance system; the company becomes accountable to the citizens; the activities done by internal auditors increase the credibility and fairness, improve employees’ behavior and decrease the risks of administrative and financial corruption (Archambeault, 2002). Moreover, professional and organizational authorities have acknowledged the importance role of internal audit profession in governance process and the mutual relationship with each other. For example, Cadbury committee emphasized the importance of internal auditor’s responsibility for preventing and detecting fraud and forgery. In order to achieve the goal of internal audit profession, it shall be independent and well organized; it shall also depend on a special legislation. Consequently, the independence of this profession is strengthened when its reports are directly submitted to audit committee. The role of internal audit profession has been expanded due to the increase of the requirements enforced by Sarbanes-Oxley Act of 2002; these requirements aim at improving the quality of company governance; section No. 404 obliges the management to document, evaluate and report the effectiveness of internal control; it also obliges external auditor to evaluate management procedures of internal control evaluation and express his/her opinion. In addition, Central Bank of Jordan obliges internal and external auditors to express their opinion on the effectiveness and efficiency of internal control systems in the banks.

### **Quality of Internal Audit**

Quality means the extent of conformity to the requirements; the companies seek to reach the highest level of quality through monitoring daily performance, activities and works. The companies, therefore, shall reduce the errors and detect the perversions in order to meet the needs of the management. Internal audit quality depends on the good performance of internal control system and the appropriateness of applied accounting system; it shall reach the appropriate effectiveness and efficiency of the processes and restrictions inside the organization in order to serve its goals and protect the assets.

In addition, internal and external audit standards have illustrated the necessary factors which determine and guarantee internal audit quality. And audit standard list No. 65 issued by American Institute of Certified Public Accountants (AICPA 1991) has identified quality factors of internal audit profession; quality factors include the eligibility measured by education and professional certificates, the objectivity measured by the authority receiving internal audit reports and recruiting and laying off the internal auditors, quality of task performance and measured by the accuracy and adequacy of audit scope and programs. Moreover, factors of internal audit profession quality according to the standards issued by Institute of Internal Auditors are the independence, objectivity, professionalism and due diligence (IIA, 2003b; Al-Qadi, 2008).

In this study, quality of internal audit is measured in accordance with audit standard list No. 65 issued by American Institute of Certified Public Accountants mentioned previously.

## Previous Studies

Relevant previous studies have been surveyed in order to create a conceptual framework the current study relies on for illustrating the main aspects of its subject. These studies are as follows:

1. Mangena & Pike's study, 2005 focused on detecting the relationship between institutional governance and disclosure level. It, therefore, examined the effect of some properties of company's shareholders, audit committee size and financial affair experience. The study concluded that there has been a statistically significant relationship between disclosure level and properties of company's shareholders, audit committee size and financial affair experience.
2. Joshua's study 2010 provided a proposal to reform company governance through ensuring the risks of financial statements and excluding the conflict of interests which threatens permanently the relationship between the auditor and his / her clients. Consequently, the quality of financial statements increases (Derdas, 2010).
3. Zoelph & Johar (2007) analyzed the relationship between the elements of internal control and the pillars of institutional governance; it also identified to which extent the stated elements have played a role in strengthening these pillars. Most importantly, the study concluded that the organizations should adopt the elements of internal control in order to achieve the success of institutional governance. In addition, these elements played an important role in strengthening all pillars of institutional governance.
4. Matar & Nour's study, 2007 aimed at evaluating to which extent Jordanian public joint-stock companies working in banking and industry sectors have committed to the principals of institutional governance. The study indicated that the level of commitment of public joint-stock companies working in these sectors has ranged between strong and very weakness. However, the level of this commitment has been in favour of banking sector.
5. Fateh & Oishi's study, 2008 has highlighted the importance of company governance as a regulatory frame ensuring the validity and integrity of financial information; the study has sought to limit the negative use of financial information which may negatively affect the interests of permanent parties and right holders in the company. In addition, the study showed that if the information is impartial and true and the accounts presented are valid, the effectiveness of the accounting systems used will be guaranteed.

6. Issa's study, 2008 study has touched upon the factors of the quality of internal audit profession and its relationship to the quality of company governance. The study concluded that increasing the eligibility and objectivity of internal auditors and improving the performance of their works improve the quality of internal audit profession. In addition, there has been a positive relationship between the quality of internal audit profession and company governance.
7. Al-Abdali's study, 2012 has touched upon the impact of applying the pillars of governance on internal audit quality in Kuwaiti industrial companies; the population of study has composed of 114 respondents. The study concluded that applying the pillars of governance has affected the quality of audit in Kuwaiti industrial companies. The researcher recommended that commitment to disclosure and transparency is a necessity; in addition, the commitment to the laws and regulations shall be necessarily achieved.
8. Kerzan, 2013 aimed at identifying to which extent the internal audit has contributed to the application of the governance in public and private Syrian banks; the study also was to identify the differences of the contribution of applying the governance among public and private banks. The population of study has been composed of the members of the board of directors and executive directors working in these banks; a questionnaire has been used for collecting preliminary data. The study concluded that internal audit has contributed to the application of the governance of Syrian banks (both private and public). However, it has contributed more to private banking sector. The study recommended that legislations appropriate for public banks shall necessarily be issued in order to reach to the level of private banks; in addition, higher departments of public banks shall support internal audit sections and give them necessary powers; internal audit section shall subordinate to audit committee in order to ensure its independence and appropriately supervise the effectiveness of governance in public banks.

Al-Bastawi's study, 2012 aimed at identifying the role and tasks of institutional governance in committee in order to strengthen internal auditor's performance; it also examined the method of ensuring the independence of internal auditor and preserving the interests of all concerned parties. The population of the study has been composed of certified public accountants; and the sample of the study has consisted of 200 auditors. The study concluded that the performance of internal auditor becomes more effective if the effectiveness of internal control systems and administrative and accounting control increases. It also recommended that the independence of internal auditor in Jordan shall necessarily be guaranteed and he/she shall be scientifically and practically qualified. In addition, internal auditor shall have powers for take auditing procedures in order to build client trust and confidence in the information provided and monitor the performance of executive management plus the decisions of the board of the directors. As a result, the rights of all concerned parties are preserved.

## **Hypotheses of Study**

The study relies on a set of hypotheses:

*First Hypothesis: Jordanian banks do not commit to provide the factors contributing to the quality of internal audit in accordance with the international standard.*

*Second Hypothesis: There is no a statistically significant relationship of the impact of applying the disclosure and transparency on the quality of internal audit in Jordanian banks.*

*Third Hypothesis: There is no a statistically significant relationship of the impact of applying accountability on the quality of internal audit in Jordanian banks.*

*Fourth Hypothesis: There is no a statistically significant relationship of the impact of applying responsibility on the quality of internal audit in Jordanian banks.*

*Fifth Hypothesis: There is no a statistically significant relationship of the impact of applying equity on the quality of internal audit in Jordanian banks.*

*Sixth hypothesis: There is no a statistically significant relationship of the impact of applying independence on the quality of internal audit in Jordanian banks.*

*Seventh hypothesis: There is no a statistically significant relationship of the impact of applying the rules and regulations on the quality of internal audit in Jordanian banks.*

## **Population and Sample of Study**

Population of study consists of 24 Jordanian banks (website of the Central Bank of Jordan). These banks have been chosen due to their important role they play in national economy. 96 questionnaires have been distributed to financial managers, heads of accounting and internal control departments, managers of internal audit and employees working in accounting and internal audit departments. Total number of retrieved questionnaires has reached 94; 2 questionnaires have been excluded due to a lack of information. Thus, 92 questionnaires have been analysed, namely 96% of questionnaires distributed.

## **Results of Field Study**

### **Statistical Methods used in Data Analysis**

Statistical package for social science (SPSS) has been used in order to analyse and test the hypotheses; then, the following statistical methods have been used:

1. Cronnback's Alpha Test: It aims at testing the internal consistency of measurement tool and ensuring its reliability.
2. Arithmetic means: They are used for determining questionnaire response rate.
3. Standard deviations: They are used for measuring the degree of absolute dispersion of answers' values of athematic means.
4. One Sample T-Test: It is used for testing study hypotheses.

To test study hypotheses, Likert five-point scale has been used to answer questionnaire questions; this scale uses 5. Strongly agree, 4. Agree, 3. Neither agree nor disagree, 2. Disagree and 1. Strongly disagree. To explain the results, the range (1-1.79) indicates that applying the pillars of institutional governance does not contribute to the improvement of the quality of internal audit; the range (1.8-2.59) indicates that applying the pillars of institutional governance contributes slightly to the improvement of the quality of internal audit; the rang (2.60-3.39) indicates that applying the pillars of institutional governance contributes moderately to the improvement of the quality of internal audit; the range (3.40-4.19) indicates that applying the pillars of institutional governance contributes highly to the improvement of the quality of internal audit; the range (4.20-5) indicates that applying the pillars of institutional governance contributes very highly to the improvement of the quality of internal audit. SPSS, percentages and arithmetic means have been used for analysing the data.

## **Reliability of Study Tool**

Cronbach's alpha coefficient has been used for testing internal reliability; Table 1 outlines the required statements; the percentages have been considered appropriate for the purposes of this study.

Internal Reliability	Field
0.94	Disclosure, Transparency, and fields of improving internal audit
0.95	Accountability, improvement of the quality of internal audit in the banks
0.92	Responsibility and improvement of the quality of internal audit
0.95	Contribution of applying the variable of equity to the improvement of the quality of internal audit.
0.94	Contribution of applying the variable of independence as one of the pillars of governance to the improvement of the quality of internal audit.
0.92	Contribution of applying the variable of the application of laws and regulations to the improvement of the quality of internal audit in Jordanian banks
0.94	Factors of the quality of internal audit in Jordanian banks
0.94	Total

### Properties of Study Sample

Table 2 indicated that accounting specialization has the highest percentage, reaching 50%, followed by business administration 26% and finance and banking 21%. Thus, sample individuals are qualified for working in accounting and financial field and answering study questions.

In addition, table 2 showed that 36%, 44% and 20% of sample individuals hold bachelor degree, master degree and PhD degree, respectively. Thus, it is noted that academic achievement is high and sample individuals are able to answer study questions.

Table 2 also indicated that internal audit and financial managers and internal auditors reach 25% and 17% of sample individuals, respectively. It is noted that the number of specialists of internal auditors and governance is higher than the specialists of the rest of other professions; it, therefore, benefits the study.

Table 2 showed clearly that 40 % of sample individuals, forming the highest percentage, have 11-15-year experience; 31 % of sample individuals have less than 10year experience; 26% of sample individuals have 16-20 year or more. Consequently, sample individuals' experience is good and sufficient to answer study's questions.

Percentage %	Frequency	Category and Designation	Variable
52	50	Accounting	Academic specialization
26%	25	Finance and Banking	
22%	21	Business Administration	
36%	35	Bachelor degree	Academic Level
44%	42	Master Degree	
20%	19	PhD Degree	
25%	24	Financial manager	Designation
25%	24	Internal Auditor Manager	
17%	16	Head of Accounting Department	

16%	15	Accountant	
17%	17	Internal Auditor	
31%	30	10 year and less	
42%	40	11-15 year	Years of Experience
27%	26	16-20 year	
27%	26	CMA	
21%	20	CPA	Vocational certifications
32%	31	CIA (Internal Audit)	
20%	19	Other	
100%	96		
			Total

## Results of Descriptive Statistics of Study Variables and Hypotheses Testing

### First: Variable of Internal Audit Quality

Table 3 indicated that variable of internal audit quality includes a set of questions relating to factors of audit quality, eligibility, objectivity and quality of professional performance and care. Table stated below illustrates the following:

1. Arithmetic means of eligibility factor of internal audit department have ranged between 4.5-4.9; a paragraph stating 'the contribution of academic level of internal auditor to improve the quality of his/her performance' has the highest arithmetic mean, reaching 4.9; total arithmetic mean and standard deviation of all responses have reached 4.6 and 0.49, respectively. Thus, it is noted that responses of sample individuals have been close and similar, thereby providing highly the eligibility.
2. Arithmetic means of objectivity factor in audit departments of Jordanian banks have ranged between 4.7 – 4.9; total arithmetic mean has reached 4.8. Thus, close agreement of responses of sample individuals indicated that objectivity of internal audit is necessary and important. Internal auditor shall, therefore, connect with audit committee and board of directors.
3. Arithmetic means of the quality of work performance and due professional care ranged between (4.4 – 4.9); total arithmetic mean has reached (**4.79**); standard deviation has reached (**0.501**). Thus, a homogeneity among responses of sample individuals is provided to some extent. Total arithmetic mean of statements of variable of internal audit quality has reached (**4.79**); standard deviation has reached **0.501**. Thus, these results indicated that there is a convergence of responses of sample individuals regarding a high importance of indicators of internal audit quality.

### First Hypothesis Testing

Table 3 ARITHMETIC MEANS AND STANDARD DEVIATIONS OF VARIABLE OF FACTORS OF INTERNAL AUDIT QUALITY IN JORDANIAN BANKS			
Response Orientation	Standard deviation	Arithmetic mean	Statements
Following statements measure the availability of eligibility factor of internal audit quality in Jordanian banks			
Very highly	0.44	4.4	Adopting continuous education programs for internal auditor in the banks improves the quality of his/her performance
Very highly	0.57	4.9	Availability of educational level of internal audit contributes the improvement of the quality of his/her performance
Very highly	0.47	4.7	professional certificate which internal audit obtains improves the quality of his/her performance
Very highly	0.56	4.5	A knowledge of processes and procedures of banking work which internal auditor has improves the quality of his/her performance
Very highly	0.42	4.5	Professional experience of internal audit works contributes to the improvement of the quality of performance of internal auditor

<b>Very highly</b>	<b>0.49</b>	<b>4.6</b>	<b>Total average of factor of eligibility as a factor of achieving internal audit quality in Jordanian banks</b>
The following statements measure the objectivity factor for the internal auditor in Jordanian banks			
Very highly	0.5	4.9	Employing, rewarding, promoting and laying off the internal auditors by the board of the directors and audit committee contribute to the improvement of quality of internal audit performance
Very highly	0.6	4.7	Reporting on internal audit to senior management and audit committee contributes to the improvement of the quality of internal audit performance
Very highly	0.5	4.9	Associating the internal auditor with audit committee increases his/her performance level
<b>Very highly</b>	<b>0.533</b>	<b>4.8</b>	<b>Total average of objectivity variable</b>
<b>The following statements measure the variable of vocational performance quality for the internal auditor as a factor achieving internal audit quality in Jordanian banks</b>			
Very high	0.5	4.5	Preparing accurately and efficiently internal audit programs improves the quality of internal audit performance
Very high	0.5	4.9	Providing a suitable scope of internal audit process contributes to the achievement of performance quality
Very high	49	4.7	Examining the quality of internal audit performance through a participation in the peer examination program contributes to the improvement of quality of internal audit profession
Very high	42	4.8	Supporting the board of directors and audit committee for internal audit profession contributes to the improvement of internal audit performance
Very high	5	4.45	Applying the concept of due professional care in internal audit tasks contributes to the improvement of the quality of internal audit performance
<b>Very high</b>	<b>0.48</b>	<b>4.67</b>	<b>Total average of the variable of professional performance of internal auditor</b>

In addition, arithmetic mean of the statements has been compared with standard mark 3 - hypothesis acceptance standard- by using t-test as stated in table 4.

Statistical Significance	Freedom Degree	T-Value	Standard Deviation	Arithmetic Mean	Number	Factors of quality of internal audit in Jordanian banks
0	38	64.41	0.501	4.79	96	

Table 4 has indicated that there are statistical differences at (-0.05) between arithmetic mean and standard mark 3; T-value has been 64.41; statistical significance has been 0.000. thus, this hypothesis has been rejected; and alternative hypothesis stating that 'Jordanian banks commit to provide the factors contributing to the quality of internal audit in accordance with the international standard' has been accepted.

## **Second Hypothesis Testing**

### **Disclosure, Transparency and The Fields of Improvement of Internal Audit**

Table 5 indicated that the levels of importance and impact of disclosure and transparency variables and the improvement of internal audit quality have ranged from moderate to high; their

arithmetic means have ranged 3.5–4.8. The study showed that applying the pillars of governance, namely disclosure and transparency, affects very highly the quality of internal audit in Jordanian banks according to the responses of sample individuals; total arithmetic mean has reached 3.87; and standard deviation has reached 0.8. Thus, this low value has indicated that responses of sample individuals are close and similar to some extent.

Impact	Standard Deviation	Arithmetic Mean	Statements
High	0.6	4.18	Committing to fair and impartial disclosure improves the performance of internal audit performance
High	0.7	4.16	Performing carefully and professionally internal audit tasks contributes to the commitment of the administration to disclose objectively, honestly and impartially important information
High	1	4	An existence of internal audit department contributes to the disclosure of important information in a timely manner
Moderate	1	3.39	A commitment of the auditor to the objectivity of providing information pertaining to the board of the directors achieves audit quality
Moderate	1	3.2	A commitment of the auditor to the objectivity of providing information pertaining to the executive managers achieves audit quality
High	0.6	4.1	Obtaining educational and practical qualification of disclosure requirements contributes to the achievement of internal audit quality
High	0.7	4.1	Auditor's independence can achieves the requirements of disclosure and transparency relating to the governance
High	0.8	3.87	Total Average

In addition, arithmetic mean of the statements has been compared with standard mark 3-hypothesis acceptance standard- by using t-test as stated in Table 6.

Statistical Significance	Freedom Degree	T-Value	Standard Deviation	Arithmetic Mean	Number	Disclosure, Transparency and Audit Quality
0	38	43.31	8	3.87	96	

Table 6 has indicated that there are statistical differences at (-0.05) between arithmetic mean and standard mark 3; T-value has been 43.31; statistical significance has been 0.000. thus, this hypothesis has been rejected; and alternative hypothesis stating that 'there is a statistically significant relationship of the impact of applying the disclosure and transparency on the quality of internal audit in Jordanian banks' has been accepted.

### Third Hypothesis Testing

#### Accountability and Improvement of Internal Audit in the Banks

Table 7 indicated that levels of importance of accountability variable have ranged from moderate to high; arithmetic means have ranged (3.38-4). Here, responses of sample individuals showed generally that accountability as one of governance pillars affects highly the process of internal audit in Jordanian banks; total arithmetic mean and standard deviation have reached 3.69 and .88, respectively. These results indicated that there is a homogeneity among responses of sample individuals to some extent.

Response Orientation	Standard Deviation	Arithmetic Mean	Statements
Moderate	96407	3.38	Applying the processes of evaluating and assessing works of executive management contributes to the improvement of audit quality
High	72253	4	Implementing and following up internal control systems contribute to the improvement of audit quality
High	1.0069	4	Committing to submit a periodical report on work results contributes to the improvement of audit quality
Moderate	86146	3.38	Assessing the periodical reports contributes to the improvement of internal audit
High	0.88	3.69	Total

In addition, arithmetic mean of the statements has been compared with standard mark 3 - hypothesis acceptance standard- by using t-test as stated in table 8.

Statistical Significance	Freedom Degree	T-Value	Standard Deviation	Arithmetic Mean	Number	Accountability Variable and Audit Quality
0	38	40.31	40.31	3.69	96	

Table 8 has indicated that there are statistical differences at (-0.05) between arithmetic mean and standard mark 3; T-value has been 40.31; statistical significance has been 0.000. thus, this hypothesis has been rejected; and alternative hypothesis stating that 'there is a statistically significant relationship of the impact of applying accountability on the quality of internal audit in Jordanian bank' has been accepted.

#### **Fourth Hypothesis Testing**

##### **Responsibility and the improvement of Internal Audit Quality in Jordanian Banks**

Table 9 indicated that levels of importance of responsibility variable have ranged from very high to very low; arithmetic means have ranged (2.89 – 4.5). Here, responses of sample individuals showed generally that responsibility as one of governance pillars affects moderately the process of internal audit in Jordanian banks; total arithmetic mean and standard deviation have reached 3.7 and .8954, respectively. These results indicated that there is an agreement among the responses of sample individuals to some extent.

Response Orientation	Standard Deviation	Arithmetic Mean	Statements
Moderate	9	2.89	Paying attention to the ethical aspects of employees working in the bank contributes to the improvement of audit quality
Very low	8770	2.58	Commitment of management to perform its responsibilities toward the society contributes to the improvement of audit quality
High	0.1	4	Commitment to identify the responsibilities and duties within the organizational structure contributes to the achievement of audit quality
Very high	0.7	4.5	Commitment of the company to develop continuous education programs including auditor performance contributes to the achievement of audit quality
Moderate	0.9	2.89	Commitment to perform the responsibilities toward shareholders and achieve the appropriate returns increases the objectivity and efficiency of internal audit.
moderate	0.8954	3.37	Total

In addition, arithmetic mean of the statements has been compared with standard mark 3 - hypothesis acceptance standard- by using t-test as stated in Table 10.

Statistical Significance	Freedom Degree	T-Value	Standard Deviation	Arithmetic Mean	Number	Responsibility Variable and Audit Quality
0	38	40.31	0.8953	3.37	96	

Table 10 has indicated that there are statistical differences at (-0.05) between arithmetic mean and standard mark 3; T-value has been 49.31; statistical significance has been 0.000. Thus, this hypothesis has been rejected; and alternative hypothesis stating that 'there is a statistically significant relationship of the impact of applying responsibility on the quality of internal audit in Jordanian banks' has been accepted.

### **Fifth Hypothesis Testing**

#### **Equity and Improvement of internal Audit Quality**

Table 11 indicated that levels of importance of equity variable have been high; arithmetic means have ranged (2.59 – 4.30). Here, responses of sample individuals showed generally that equity as one of governance pillars affects highly the quality of internal audit in Jordanian banks; total arithmetic mean and standard deviation have reached 3.79 and 0.97, respectively. These results indicated that the responses of sample individuals are close and similar to some extent.

Response Orientation	Standard Deviation	Arithmetic Mean	Statements
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High	1	4	Availability of policy respecting the rights of various groups of stakeholders in the banks contributes to the improvement of internal audit efficiency.
Very high	88	4.3	Distributing the tasks and duties among the employees working in internal audit department on the basis of equity and equality contributes to the achievement of audit quality
Low	1	2.59	Applying the equality to the shareholders contributes to the achievement of audit quality
Very high	1.01	4.3	Distributing the annual increments on the basis of equality, equity and performance contributes to the achievement of audit quality
High	0.97	3.79	Total

In addition, arithmetic mean of the statements has been compared with standard mark 3 - hypothesis acceptance standard- by using t-test as stated in Table 12.

Statistical Significance	Freedom Degree	T-Value	Standard Deviation	Arithmetic Mean	Number	Equity Variable and Audit Quality in Jordanian Banks
0	38	55.01	0.97	3.79	96	

Table 12 has indicated that there are statistical differences at (-0.05) between arithmetic mean and standard mark 3; T-value has been 55.01; statistical significance has been 0.000. Thus, this hypothesis has been rejected; and alternative hypothesis stating that 'there is a statistically significant relationship of the impact of applying equity on the quality of internal audit in Jordanian banks' has been accepted.

### Sixth Hypothesis Testing

#### Independence and Improvement of Internal Audit Quality

Table 13 indicated that levels of importance of independence variable have been moderate; arithmetic means have ranged (4.3 – 4.6). Here, responses of sample individuals showed generally that independence as one of governance pillars affects highly the quality of internal audit in Jordanian banks; total arithmetic mean and standard deviation have reached 4.524 and 0.936, respectively.

Response Orientation	Standard Deviation	Arithmetic Mean	Statements
Very high	1	4.6	Internal auditor is independent of the bank.
Very high	1	4.6	Internal auditor performs objectively his/her tasks without bias or conflict of interests
Very high	0.88	4.3	Internal auditor has an intellectual independence regarding his/her tasks
Very high	0.1	4.57	Due professional care shall be provided by internal auditor in order perform well his/her tasks
Very high	0.8	4.55	Existing an audit committee associating with internal auditor contributes to the improvement of internal audit quality

Very high	0.936	4.524	Total
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In addition, arithmetic mean of the statements has been compared with standard mark 3 - hypothesis acceptance standard- by using t-test as stated in table 14.

<b>Table 14</b> <b>ARITHMETIC MEANS, STANDARD DEVIATIONS AND T-TEST OF STATEMENTS IN COMPARISON WITH STANDARD MARK 3</b>						
Statistical Significance	Freedom Degree	T-Value	Standard Deviation	Arithmetic Mean	Number	Independence and Audit Quality in Jordanian Banks
0	38	53.01	0.936	4.524	96	

Table 14 has indicated that there are statistical differences at (-0.05) between arithmetic mean and standard mark 3; T-value has been 53.01; statistical significance has been 0.000. Thus, this hypothesis has been rejected; and alternative hypothesis stating that 'there is a statistically significant relationship of the impact of applying independence on the quality of internal audit in Jordanian banks' has been accepted.

### Seventh Hypothesis Testing

Table 15 indicated that levels of importance of variable of laws and regulations have been high; arithmetic means have ranged (3.9 -4.1). Here, responses of sample individuals showed generally that variable of laws and regulations as one of governance pillars affects highly the quality of internal audit in Jordanian banks; total arithmetic mean and standard deviation have reached 3.9 and 0.925, respectively.

<b>Table 15</b> <b>ARITHMETIC MEANS AND STANDARD DEVIATION OF VARIABLE OF LAWS AND REGULATIONS IN INTERNAL AUDIT QUALITY</b>			
Response Orientation	Standard Deviation	Arithmetic Mean	Statements
High	0.9	3.9	Commitment of the bank to the requirements of relevant laws and regulations improves the quality of internal audit
High	1	4.1	Laws and regulations illustrating the rights of internal auditor are available
High	0.9	3.7	Systems illustrating the duties of internal auditor are available
High	0.9	3.9	Instructions issued by the Central Bank which organize internal auditor performance are available
High	0.925	3.9	Total

In addition, arithmetic mean of the statements has been compared with standard mark 3 - hypothesis acceptance standard- by using t-test as stated in table 16.

<b>Table 16</b> <b>ARITHMETIC MEANS, STANDARD DEVIATIONS AND T-TEST OF STATEMENTS IN COMPARISON WITH STANDARD MARK</b>						
Statistical Significance	Freedom Degree	T-Value	Standard Deviation	Arithmetic Mean	Number	Applying the laws and regulations and internal audit quality in Jordanian banks
0	38	53.01	0.925	3.9	96	

Table 16 has indicated that there are statistical differences at (-0.05) between arithmetic mean and standard mark 3; T-value has been 53.01; statistical significance has been 0.000. Thus, this hypothesis has been rejected; and alternative hypothesis stating that 'there is a statistically significant relationship of the impact of applying the rules and regulations on the quality of internal audit in Jordanian banks' has been accepted.

## **RESULTS AND RECOMMENDATIONS**

### **Study Results**

Depending on the analysis and discussion of study results, the most important findings are summarized as follows:

1. Jordanian banks commit very highly to provide the factors contributing to the quality of internal audit in accordance with the international standard; and arithmetic mean has reached 4.79.
2. There is a highly statistically significant relationship of the impact of applying the disclosure and transparency on the quality of internal audit in Jordanian banks; and arithmetic mean has reached 3.87.
3. There is a highly statistically significant relationship of the impact of applying accountability on the quality of internal audit in Jordanian banks; and arithmetic mean has reached 3.69.
4. There is a moderately statistically significant relationship of the impact of applying responsibility on the quality of internal audit in Jordanian banks; and arithmetic mean has reached 3.37.
5. There is a highly statistically significant relationship of the impact of applying equity on the quality of internal audit in Jordanian banks; and arithmetic mean has reached 3.79.
6. There is a very high statistically significant relationship of the impact of applying independence on the quality of internal audit in Jordanian banks; arithmetic mean has reached 4.524.
7. There is a highly statistically significant relationship of the impact of applying the rules and regulations on the quality of internal audit in Jordanian banks; arithmetic mean has reached 3.9.

### **Recommendations**

The study has reached a set of recommendations as follows:

1. Continuous commitment of Jordanian banks to apply the pillars of institutional governance is importance because they affect clearly the quality of internal audit; they also shall hold training courses in order to develop the professional efficiency of internal auditor and encourage him/her to keep up with the latest developments of his/her work field.
2. Developing a manual for ethics of internal audit profession is a necessity; ethical policies shall be determined and distributed; auditors shall be trained in order to enhance their abilities of facing the difficult ethical problems.
3. Elements of pillars of institutional governance shall be examined, understood and analyzed by internal auditor since they are the most important factors ensuring audit success.

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