

TO WHAT EXTENT THE AUDITORS IN THE KINGDOM OF BAHRAIN RECOGNIZE AUDITING STRATEGIES IN THE LIGHT OF INFORMATION TECHNOLOGY AND WHAT IS ITS IMPACT ON THE AUDIT? A FIELD STUDY

Khaled M. Alqatanani

Accounting & Finance Department, Applied Science University, Bahrain

khaledqatanani@yahoo.com

Abdulqawi A. Hezabr 

Accounting & Finance Department, Applied Science University, Bahrain

hezabr2000@yahoo.com

The study aimed to measure the extent to what auditors in the Kingdom of Bahrain recognize the auditing strategies in light of information technology and its impact on the audit process. A field study was conducted on the audit offices in Bahrain. The study ended with a set of findings, most importantly: the lack of adequate level of awareness among auditors in the Kingdom of Bahrain on auditing strategies in light of information technology and its impact on audit, and the low level of use of information technology in various fields and the lack of material resources and software necessary for the implementation of audits. As well as the lack of an appropriate level of scientific and practical training of employees to carry out the audit in light of information technology, and the lack of confidence in electronic procedures and the fear of data loss and the inability to maintain protection, in addition to the fear among employees and the belief that the expansion through the use of information technology will lead to the lay-off of some employees. The study recommended the need to work to increase the level of awareness and knowledge of audit strategies in light of information technology and its impact on the audit process. Care should be taken to provide an appropriate level of scientific and practical training of employees to carry out the audit in light of information technology, and the need to increase the confidence of electronic data through legislation and provide job security and stability among workers.

Keywords: Auditing, Information Technology, Strategies, Awareness, Bahrain

INTRODUCTION

Rapid developments in information systems and technology used in business organizations resulted in significant implications for the audit process, the process requires scrutiny of accounting systems in the light of information technology, specialized skills and a high level of qualification and training on systems and applied software used in the implementation of audits on electronic systems to achieve a response suitable for customers who perform their work electronically, and the office needs to test and develop audit skills available based on the level of development of information systems with its customers and the level of efficiency and effectiveness of performance, which they are seeking to achieve.

This study is an attempt to measure the perception of auditors in the Kingdom of Bahrain to auditing strategies in light of information technology and its impact on the audit process, and to determine the extent of the use of auditors for information technology in the audit process, and the difficulties faced by auditors in the Kingdom of Bahrain in the use of information technology in the performance of the audit.

Statement of Problem

Because of the rapid developments in the field of information and uses technology in various fields of knowledge, information technology has become one of the most important tools used in the fields of accounting, auditing, and the problem of the study is both in determining the perception of auditors in the Kingdom of Bahrain to the approaches of audit in light of information technology and the extent of their conviction of the importance of the use of information technology to perform the audit process, and to identify the most important difficulties faced by auditors during the use of information technology in the performance of the audit. The study is trying to answer the following questions:

1. What is the perception of auditors in the Kingdom of Bahrain for auditing strategies in light of information technology and its impact on the audit process?
2. To what extent do the auditors in the Kingdom of Bahrain use the techniques of information technology to achieve a suitable auditor's opinion for their customers who use information technology?
3. What are the difficulties faced by auditors in the Kingdom of Bahrain during the use of information technology in the performance of audit functions?

Objectives of Study

This study aims in its theoretical framework to define the audit approaches and strategies in light of information technology.

But in practice, the study aims to: -

- Measure the perception of auditors in the Kingdom of Bahrain for auditing strategies in light of information technology and its impact on the audit process.
- Measure the extent of the use of auditors in the Kingdom of Bahrain for techniques of information technology to achieve a suitable audit opinion for their customers who use information technology.
- Identify the difficulties faced by auditors in the Kingdom of Bahrain during the use of information technology in the performance of the audit.

Importance of the Study

The importance of the study lies in its theoretical framework of the definition of audit approaches and strategies in light of the of information technology, and to describe the basic competencies and skills needed by the auditor to achieve a suitable audit opinion for their customers who use information technology. But in the practical side the importance of the study lies in an attempt to identify the extent of familiarity and knowledge of auditors in Bahrain with the audit approaches in light of information technology and measure the extent of their use of the techniques of information technology in achieving a suitable audit opinion for their customers who use information technology, and identify the problems and difficulties they face when auditing check electronic systems.

Hypotheses

1. There is not enough realization by the auditors in the Kingdom of Bahrain for auditing strategies in light of information technology and its impact on the audit process.
2. Auditors in the Kingdom of Bahrain do not use information technology to achieve suitable audit opinions for their customers who use information technology.
3. There are no difficulties facing auditors in the Kingdom of Bahrain during the use of information technology in the performance of the audit.

PREVIOUS STUDIES AND THEORETICAL FRAMEWORK

There are many studies that have addressed auditing in an environment of information technology and electronic systems. In a study conducted by (Shanti, 2011) in order to measure the role of information technology in the development of the auditing profession in the Hashemite Kingdom of Jordan, the researcher pointed out that the use of information technology contributes positively in audits despite the existence of many of the problems and constraints caused by the use of information technology in the audit process. The researcher

recommended the need for the auditor to have the practical experience and efficiency, leading to an increased and raised efficiency of the audit profession. And the need for the auditor to have the experience and educational qualification is what would result in the wider and use of information technology.

As pointed by (Al-Sharaa, 2009), there are many factors that affect the objectivity of the external auditor in the performance of work in light of information technology, including auditing approach, the size of the samples, the educational qualifications and practical experience for the auditor. As well as the nature of the accounting system for banking operations and how their implementation has an effect in finding the determinants in light of information technology. The researcher recommended the need to reconsider the traditional methods of external audit in line with technological development, and the rehabilitation of auditors through continuous training, leading to the understanding of the banking business, and the nature of banking operations. In addition to the development of standards and clear rules to organize the relationship between banks and auditors to enhance the degree of objectivity and independence.

In a study conducted by (Hamdona, Hamdan, 2008), the researchers pointed out that the auditors in Palestine use electronic audit in planning, control, and documentation to an extent below the average, and that the use of electronic audit helps to improve the quality of audit evidence. The researchers also recommended the need for regulators of the audit profession to ensure the continuous use of electronic methods in audit offices through the enactment of legislation and quality control. The international professional bodies and organizations have focused on providing the foundation and guidance on audit in light of information technology, especially the International Federation of Accountants, which issued a set of standards and data relating to international audit scrutiny in light of information technology.

What is meant by electronic auditing is the process of applying any sort of operating system by using information technology to assist the auditor in planning, control and documentation of the audit. Therefore, the electronic auditing approach alongside the traditional and conventional approach are embodied in the use of informational technology in the audit process to help the auditor across different audit phases of planning, control and documentation (Thomas, Henki, 2009).

Despite the benefits and advantages provided by information technology which contributed to the development of the data collection process, its operation, and the preparation of financial and accounting reports automatically, but at the same time, it involves many risks in regards to control, responsibility and narrowing of new concepts to traditional concepts of control. Principles and auditing standards do not differ in the light of information

technology than in conventional approaches (manual), in all cases the responsibility of the auditor is determined by giving opinions regarding the trueness of the financial statements and the extent of fairness in representation of the actual financial position and results of the business. The differentiation between them is based on how the auditor applies those principles, standards and audit procedures that vary widely with the greater level of technology used in data processing, where the auditor should use the most suitable tools and techniques to achieve the accepted auditing goals (Thunaibat 0.2009).

Audit strategies

The audit procedures and methods differ in light of information technology depending on the strategy adopted by the Auditor. There are three basic strategies:

First: Audit round the computer Strategy

According to this approach the auditor ignores the presence of the electronic systems used in data operations and does not use it in the review process, and does not show interest in examining the processing through the CPU and regulatory tools, to assume that the accuracy of inputs and output is a sufficient indicator of the trueness of the treatment methods, and the auditor tracks the audit path up to the entry of data into the computer and then they follow-up with the output in form of printed reports, where the auditor examines the elements of financial statements and assessment of the internal control system, following the same generally accepted procedures in conventional approaches by examining the original documents of operations manually and compare the results with the data of a financial point for the customer. This requires the need to retain the originals documents and all necessary financial reports for the audit process for long enough in the form of readable paper and not computerized. If the existence of this requirement is possible in small enterprises, in light of the large scale of the processes in large enterprises, this represents economic and technical constraints which call for the need to search for alternative means of this approach for the implementation of the review process. Also, the implementation audits manually does not help the auditor to conduct an extensive and comprehensive review, but limited to the examination of a small percentage of them, which confirms the need to use alternative means to elevate the level of scrutiny and follows to show the efficiency of the audit process steps on the computer.

Second: Audit through the Computer Strategy

According to this approach the computer and its programs are the target of the audit process, and it requires the need for the auditor to examine the programmed and the customized control

procedures in order to determine their adequacy and determine the methods that will be used by the computer to perform the audit process. The curriculum also includes the inspection and testing of the components of the system including the tools that input and read the data and ensure the accuracy and integrity of the CPU, in addition to the accuracy and integrity of the storage and filing tools. The auditor uses a range of approaches in the audit process, among them the test cases, rebooting and programs system analysis.

Third: Computer Aided Audit

Under this approach the auditor uses the computer and its software as an audit tool, and because of the continuous development in electronic accounting systems it has become most common and convenient approach used at the present time to review these systems and they use the versatile Generalized Auditing Programs (GAP) due to their efficiency in the implementation of operations, where these programs help the auditor to deal effectively with the large amounts of data and customer files. GAPS conduct automated audits through including a set of commands that guide the system to perform operations, and Parallel Simulation Programs represent one of the most important public audit programs used where it simulates the actual operations using the same key files and processes for the client, and comparing the output resulting from the simulation of the client system process and a statement of the differences found (Thunaibat, 2009).

RESEARCH METHODOLOGY

The Study

The researcher adopted a descriptive analytical approach in the collection and analysis of the study data and test hypotheses and the formulation of previous studies on the subject of the review of electronic information systems.

Sample

In addition to published research and studies relevant to the study, the researcher adopted in the practical part, the questionnaire method of data collection from 40 respondents.

Data Analysis Methods

The researcher used statistical package for humanities and social sciences (SPSS) to analyze the study data, where the measure of central tendency and measures of variation are used in order to display the results of the study, and describing the answers by finding the arithmetic

mean and standard deviation. One sample T-Test was used to check the hypotheses of the study.

Data Collection tool

The researcher adopted a Quintet Likert Scale to determine the degree of the relative importance of each item of the questionnaire, with center-pivot adoption by three degrees to be the borderline in interpreting the results.

Table 1. Degrees of relative importance according to the Quintet Likert Scale

| Score | Importance | Arithmetic Mean | Level of Importance |
|-------|-------------------|-----------------|---------------------|
| 1 | Strongly Disagree | 4.5 – 5 | Very high level |
| 2 | Disagree | 3.75 – 4.5 | High level |
| 3 | Neutral | 3 – 3.75 | Medium level |
| 4 | Agree | 2 – less than 3 | Low level |
| 5 | Strongly Agree | 1 – less than 2 | Very low level |

Internal Consistency and Reliability of Study Tool

The researcher calculates the internal consistency of the questionnaire, through the correlation coefficients between each part of the areas of the questionnaire, the total score of the field itself, and in the following manner:

Table 2. The correlation coefficient between each axis of the questionnaire and the total score of the questionnaire

| Questionnaire Axes | | Total Score |
|--------------------|-------------------------|-------------|
| First Axes | Correlation Coefficient | 0.794 |
| | Significance | 0.000 |
| Second Axes | Correlation Coefficient | 0.873 |
| | Significance | 0.000 |
| Third Axes | Correlation Coefficient | 0.947 |
| | Significance | 0.000 |

** Indicated correlation at the level of 0.01 percent

Shown in Table (2) correlation coefficient values for each axis of the questionnaire is positive and statistically significant at the level of 0.01 or less, indicating that the questionnaire terms enjoy a good degree of accuracy can be relied upon to perform the research.

Further, Table (3) shows that the questionnaire a high volatility factor, where the stability ratio ranges between (0.973, 0.786), while the total Cronbach's Alpha coefficient for all axes

(0.871), which is high and appropriate rate to use the search tool as a tool to collect necessary answer for all the study questions.

Table 3. The stability of the questionnaire using Cronbach's Alpha coefficient was calculated

| Axes | No. of Components | Cronbach's Alpha Coefficient |
|---------------------|-------------------|------------------------------|
| First Axes | 7 | 0.855 |
| Second Axes | 10 | 0.973 |
| Third Axes | 7 | 0.786 |
| Total Questionnaire | 24 | 0.871 |

ANALYSIS AND FINDINGS

Demographic characteristics of the sample

The following table (4) shows the personal characteristics of the study sample, where the table data indicate that 70% of the total study sample are individuals who hold an undergraduate degree (BA) or below, while the masters holders accounted for 10%, which can be considered as an negative indicator which indicates a low level of qualification of employees in pharmaceutical companies and medical industries, must be rectified by improving the educational qualification level.

The age of the study sample groups were centered between (30-40 years) with a percentage of 50%, which is appropriate with the age groups of the Career Center and the nature of the work.

With regard to the years of experience, the presence of 75% of the workers have less than five years of experience is a negative indicator, it does not achieve high efficiency in the management of information systems in spite of the presence of 25% of respondents with expertise in the field of appropriate specialty.

Finally, there are 62.5% of the study sample with an employment time in the company of less five years, which indicates the status of job insecurity and it's a negative indicator in the employment policy for these companies.

Table 4. Personal characteristics of workers in financial circles in the pharmaceutical companies and medical industry (study sample)

| Items | Frequency | % | |
|--|-----------|-----|----|
| Educational Qualification Accountancy - Audit | Diploma | 6 | 15 |
| | Bachelors | 28 | 60 |
| | Masters | 4 | 10 |
| | Doctorate | 2 | 5 |
| Total | 40 | 100 | |

| | | | |
|---|--------------------|----|------|
| Age | Less than 30 years | 10 | 25 |
| | 30-40 years | 20 | 50 |
| | 41-50 years | 8 | 20 |
| | More than 50 years | 2 | 5 |
| Total | | 40 | 100 |
| Years of Experience in Field of Accountancy/Finance | Less than 5 years | 30 | 75 |
| | 5-10 years | 4 | 10 |
| | 10-15 years | 4 | 10 |
| | More than 15 years | 2 | 5 |
| Total | | 40 | 100 |
| Years of Employment in the Company | Less than 5 years | 25 | 62.5 |
| | 5-10 years | 10 | 25 |
| | More than 10 years | 5 | 12.5 |
| Total | | 40 | 100 |

Test of The Hypotheses

Axis I: The extent to which the auditors are aware of audit strategies in light of information technology and its impact on the audit process

Table 5. The extent to which the auditors are aware of audit strategies in light of information technology and its impact on the audit process

| N | Item | Arithmetic Mean | Standard Deviation | Level of Sign. |
|-------|--|-----------------|--------------------|----------------|
| 1 | The workers are provided with the sufficient knowledge of audit strategies in light of information technology and the importance of its use in the audit process | 2.453 | 0.468 | Medium |
| 2 | Workers are aware that the use of information technology in the audit process contributes to increase the efficiency of the audit in terms of accuracy and speed | 3.326 | 0.490 | High |
| 3 | The use of information technology in the audit process protects data and reduce the risk of loss | 3.322 | 0.883 | High |
| 4 | The use of information technology aids in audit process by providing more suitable evidence for target audit goals | 2.693 | 0.768 | Medium |
| 5 | The use of information technology to improve the ability to audit the largest amount of data checking process and the possibility of increasing the size of the test specimens, which increases the efficiency of the evidence supported the auditor's opinion | 3.298 | 0.871 | High |
| 6 | The use of information technology contributes to the audit process by improving the ability of the auditor to understand and study the internal control system of the client and its effectiveness | 3.235 | 0.553 | High |
| 7 | The use of information technology contributes to the audit process by improving the ability of the auditor to improve the process of documentation and updating client files | 3.269 | 0.742 | High |
| Total | | 2.942 | 0.682 | Medium |

The data in the table above indicates the presence of a medium degree of awareness among auditors in the Kingdom of Bahrain to audit strategies in light of information technology and its impact on the audit process, the arithmetic average of the total study sample answers reached (2.942), which is the level of medium significance at less than 60%, the standard deviation of the total responses reached (0.682), suggesting heterogeneity of views about the answers and non-dispersion. It highlights the lack of sufficient level of awareness among auditors in the Kingdom of Bahrain for auditing strategies in light of information technology and its impact on the audit process.

The One sample T-test confirms that as the value of t reaches the arithmetic mean of the responses tested which is (1.436), which is a statistical value at the level of (P less than 0.05), where P's calculated value was (0.018), which calls for the rejection of the hypothesis nihilism.

In order to confirm the result reached by the test, a (T-test) was conducted. The value of T reached (18.645), a value that is not statistically significant at the level of (0.05), as it reached the level of significance (0.068 = sig, 2 tailed), which is greater than the acceptable level of (0.05). This means that the effect of the total elements of the group level is less than the normal level, which represents the experimental value of (3), which calls for the acceptance of the hypothesis nihilism: "There is not enough awareness of the auditors in the Kingdom Bahrain to audit strategies in light of information technology and its impact on the audit process."

Table 6. T-Test Results for Sample Study

| Interval of the Difference | | Mean Difference | Sig (2-tailed) | df | T |
|----------------------------|--------|-----------------|----------------|----|--------|
| Lower | Upper | | | | |
| 1.8545 | 2.3023 | 3.4277 | .068* | 39 | 18.645 |

Note : * Sign at .05 level

The second axis: the extent to which auditors use information technology in the audit process

Table 7. The extent to which auditor's use of information technology in the audit process

| N | Item | Arithmetic Mean | Standard Deviation | Level of Significance |
|-------|--|-----------------|--------------------|-----------------------|
| 1 | Information technology is used in planning the audit for the client | 2.328 | 0.621 | Medium |
| 2 | Information technology is used in determining the schedule for the clients audit | 2.214 | 0.743 | Medium |
| 3 | Information technology is used for distribution of tasks among the audit team | 1.823 | 0.694 | Low |
| 4 | Information technology is used to understand the clients internal control policies and its effectiveness | 3.173 | 0.763 | High |
| 5 | Information technology is used to estimate the audit risks of each client | 2.975 | 0.459 | Medium |
| 6 | Information technology is used in the preliminary analytical audit procedures for the client | 2.517 | 0.786 | Medium |
| 7 | Information technology is used in the processes of documentation and update of clients files | 2.118 | 0.744 | Medium |
| 8 | Information technology is used in data protection and reduce the risk of loss | 2.764 | 0.911 | Medium |
| 9 | Information technology is used in determining the size of the test samples in order to obtain evidence that are appropriate to the audit goals | 1.968 | 0.862 | Low |
| 10 | Information technology is used in evaluating the accounting system for clients in order to ensure the safety of the programs used | 3.018 | 0.547 | High |
| Total | | 2.168 | 0.713 | Medium |

Table (8) confirms the results that the value of T reached (12.233), its a value that isn't of statistically significant at a level of (0.05) as it reached the level of significance (sig=0.094, 2 tailed), a value less than our acceptable level of (0.05). This means that the effect of the total elements of the group level is greater than the normal level, which represents the experimental value (3) which confirms the acceptance of the hypothesis of nihilism: "The auditors in the Kingdom of Bahrain's don't use information technology to achieve a suitable audit opinion for their clients using information technology."

Table 8. T-Test Results for Sample Study (2)

| Test Value = 3 | | | | | | |
|---|--------|-----------------|----------------|----|--------|--|
| 95% Confidence Interval of the Difference | | Mean Difference | Sig (2-tailed) | df | t | |
| Lower | Upper | | | | | |
| 1.9830 | 2.7621 | 3.0824 | 0.94 | 39 | 12.233 | |

The third axis: the difficulties faced by auditors at the use of information technology in the performance of the audit process

Table 9. The difficulties faced by auditors at the use of information technology in the performance of the audit process

| N | Item | Arithmetic Mean | Standard Deviation | Level of Significance |
|-------|--|-----------------|--------------------|-----------------------|
| 1 | Lack of the financial resources needed to implement the audit using Information Technology | 4.274 | 0.782 | Very High |
| 2 | Lack of the necessary software to perform the audit using information technology | 4.493 | 0.831 | Very High |
| 3 | Lack of the appropriate level of educational qualifications and experience of auditors to carry out the audit in light of information technology | 3.784 | 0.733 | High |
| 4 | Lack of attention to training and developing the auditors, as well as a lack of continuous education programs to keep up with the rapid pace of developments in information technology | 4.216 | 0.763 | Very High |
| 5 | Lack of confidence in electronic procedures, fear of data loss, and the inability to protect data | 3.768 | 0.489 | High |
| 6 | Fear of job loss due to the expansion of information technology which would lead to downsizing | 4.962 | 0.532 | High |
| 7 | Lack of adequate legislation concerning the reliability of electronic data | 3.812 | 0.442 | High |
| Total | | 4.187 | 0.653 | Very High |

Table (9) above shows the main difficulties and obstacles faced by auditors at the use of information technology in the performance of the audit process. Where the problem of lack of software suitability to perform the audit is the biggest challenge, accompanied by the lack of financial resources, the lack of an appropriate level of educational qualifications and experience among auditors to carry out audit processes in light of information technology, the lack of sufficient attention to the training and development of auditors, and lack of continuing education programs to keep up with the rapid pace of development in the field of information technology,

the lack of confidence in electronic procedures, and the fear of job loss due to the belief that the expansion of information technology would lead to downsizing. This is applicable in light of the inadequacy of legislation concerning the reliability of electronic data from the sample study's point of view.

Table (10) confirms the validity of the outcome, The value of T reached (13.659), a statistically significant value at the level of (0.05), as it reached the level of significance (sig=0.000 , 2 tailed), a value less than our acceptable level of (0.05). This means that the effect of the total elements of the group level is greater than the normal level, which represents the experimental value (3), which confirms the need to reject the hypothesis of nihilism: "There are no difficulties facing auditors in the Kingdom of Bahrain at the use of information technology in the performance of the audit function." And accept the alternative hypothesis: "There are difficulties facing auditors in the Kingdom of Bahrain at the use of information technology in the performance of audit."

Table 10. T-Test Results for Sample Study (3)

| 95% Confidence Interval of the Difference | | Mean Difference | Sig (2-tailed) | Df | t |
|---|--------|-----------------|----------------|----|--------|
| Lower | Upper | | | | |
| 1.8062 | 2.4291 | 4.9521 | 0.000 | 39 | 13.659 |

SUMMARY OF THE FINDINGS

1. Lack of sufficient level of awareness among auditors in the Kingdom of Bahrain for auditing strategies in light of information technology and its impact on the audit process.
2. Low level of use of information technology in various fields.
3. Lack of financial resources needed to implement the audits under information technology.
4. Lack of appropriate software for the implementation of audits under the information technology.
5. The lack of an appropriate level of educational qualification and experience of auditors to carry out the audit in light of information technology.
6. The lack of sufficient attention to the training and development of staff and lack of continuing education programs to keep pace with the rapid developments in the field of information technology.
7. Lack of confidence in electronic programs and the fear of data loss and the inability to maintain data protection.

8. Fear of job loss and the belief that the expansion of information technology will lead to downsizing.
9. Inadequate legal legislation concerning the reliability of electronic data.

RECOMMENDATIONS

1. The need to increase the level of awareness and knowledge of audit strategies using information technology and its impact on the audit process in the Kingdom of Bahrain.
2. The need to expand the use of information technology in various fields to carry out audits.
3. The need to provide financial resources and software necessary to implement the audits in light of information technology.
4. Care should be taken to provide an appropriate level of educational qualifications and experience of auditors to carry out the audit in light of information technology, increased attention to training and development of auditors, and continuing education programs to keep up with the rapid pace of developments in information technology.
5. The need to increase the confidence in electronic programs, through legislation concerning the reliability of electronic data.
6. Provide the auditors with job security and stability; the expansion of information technology will not lead to layoffs.

REFERENCES

Al Shanti, Ayman (2011), The Role of Information Technology in the Development of the Auditing Profession - Empirical Study on Audit Firms in the Hashemite Kingdom of Jordan, Journal of Baghdad College of Economic Sciences, issue number 27, p. 325-354.

Annual Reporting, (2014), King Dom of Bahrain, Professional Services, and Audit Company List.

Hamdona, Talal Hamdan, Allam (2008) The Extent of the use of Information Technology in the Audit Process (Electronic Audit) in Palestine, and the Impact of it on Obtaining High-Quality Evidence to Support the Unbiased Audit Opinion About the Fairness of the Financial Statements, Journal of the Islamic University (Humanities Series), Volume 16, 1st edition, p. 913 - p. 958, January 2008.

Shara, Majid (2009), Electronic External Audit in the Banking Business and the Determinants of Implementation - Applied study to the Jordanian Banks, Management and Economics Magazine, Issue number 76.

Thomas, William, Henki, Emerson (2009), Review of Theory and Practice, translation and localization Ahmed Haggag and Kamaluddin Saeed, Mars Publishing House, Saudi Arabia, p. 436-438.

Thunaibat, Ali (2009), the Audit in Light of International Standards - Theory and Application, Rice Press, 2nd edition, p. 317-334.