| RESEARCH ARTICLE | The Impact of Applying Banking Governance Principles on the Effectiveness of Financial Performance — A Case Study of the National Savings and Reserve Fund Agency No. 303 in Annaba | | | | | |
|---------------------|---|--|--|--|--|--|
| Bahmed Abdelghani | Researcher | | | | | |
| | Badji Mokhtar University - Annaba, Faculty of Economic, Commercial and Management Sciences, Laboratory of Economic Intelligence and Sustainable Development | | | | | |
| Algeria | | | | | | |
| | Email: abdelghani.bahmed@univ-annaba.dz | | | | | |
| Khedadmia Amel | Researcher | | | | | |
| | Badji Mokhtar University - Annaba, Faculty of Economics, Business and Management , Laboratory of Economic Intelligence and Sustainable DevelopmentSciences | | | | | |
| • | Algeria | | | | | |
| | Email: amel.khedadmia@univ-annaba.dz | | | | | |
| Doi Serial | https://doi.org/10.56334/sei/8.7.5 | | | | | |
| Keywords | Banking governance, financial performance, transparency, shareholders, internal control. | | | | | |

Abstract

This study examined the impact of implementing banking governance principles on the financial performance of the National Savings and Reserve Fund Bank Agency No. 303 in Annaba. The researchers adopted a descriptive analytical approach using questionnaires and statistical analysis (SPSS). The results concluded that there is a strong positive relationship between good governance and improved financial efficiency. The principles related to transparency, accountability, and fair treatment among shareholders also showed the greatest impact. The study contributes to enhancing understanding of the relationship between governance and sustainable banking performance in Algeria. The study recommends expanding the application of governance to other government-owned banking institutions.

Citation

Bahmed A., Khedadmia A. (2025). The Impact of Applying Banking Governance Principles on the Effectiveness of Financial Performance – A Case Study of the National Savings and Reserve Fund Agency No. 303 in Annaba. *Science, Education and Innovations in the Context of Modern Problems*, 8(7), 31-55; doi:10.56352/sei/8.7.5. https://imcra-az.org/archive/365-science-education-and-innovations-in-the-context-of-modern-problems-issue-7-volviii-2025.html

Licensed

© 2025 The Author(s). Published by Science, Education and Innovations in the context of modern problems (SEI) by IMCRA - International Meetings and Journals Research Association (Azerbaijan). This is an open access article under the **CC BY** license (http://creativecommons.org/licenses/by/4.0/).

| Received: 17.01.2025 | Accepted: 27.04.2025 | Published: 01.06.2025 (available online) |
|----------------------|----------------------|--|

Introduction

Banking governance is considered one of the fundamental pillars that ensure the stability of the banking sector and the improvement of its financial and administrative performance, especially in light of the growing challenges facing banks both locally and globally. The application of sound governance principles contributes to enhancing transparency, protecting shareholders' rights, and ensuring sound decision-making, which positively reflects on the efficiency of banks and their ability to face financial and administrative risks.

This study aims to shed light on the role of banking governance and its impact on improving the financial performance of banks, focusing on the case of the National Savings and Reserve Fund - Agency No. 303 in Annaba. This bank is one of the most important financial institutions in Algeria that relies on governance practices to organize its operations.

Problem Statement:

Despite the growing importance of banking governance, questions remain regarding the effectiveness of applying governance principles in improving the financial performance of Algerian banks, especially in an environment characterized by various economic and regulatory challenges. So, how can effective banking governance contribute to improving the financial performance of the National Savings and Reserve Fund? And which principles are the most influential in this context?

This problem raises the following sub-questions:

- 1. What is the effectiveness of the banking governance system applied at the National Savings and Reserve Fund Agency No. 303 in Annaba?
- 2. How does the principle of ensuring an effective governance framework affect the improvement of financial performance?
- 3. What is the impact of protecting shareholders' and investors' rights on the bank's financial performance?
- 4. What role does the principle of fair and equal treatment of shareholders play in improving financial performance?
- 5. How do the principles of disclosure, transparency, and board responsibilities contribute to enhancing the bank's financial performance?

Study Objectives:

This study aims to:

- ✓ Evaluate the effectiveness of applying banking governance principles at the National Savings and Reserve Fund Agency No. 303 in Annaba.
- ✓ Measure the impact of ensuring an effective governance framework on improving financial performance.
- ✓ Analyze the role of protecting shareholders' and investors' rights in enhancing financial performance.
- ✓ Determine the effect of the principle of fair and equal treatment of shareholders on financial performance.
- ✓ Examine the contribution of disclosure, transparency for stakeholders, and board responsibilities to improving the bank's financial performance.

Significance of the Study:

The importance of this study lies in highlighting the role of banking governance in improving the financial performance of banks, particularly in an economic environment characterized by ongoing changes and challenges. The study provides a clear vision of the extent to which the application of governance principles affects the efficiency of financial management and control, thereby promoting transparency, protecting the rights of shareholders and investors, and increasing stakeholder trust. Additionally, the study's findings support the formulation of banking policies and regulatory reforms to ensure sustainable financial performance and enhance the quality of banking services, especially in Algerian public banks.

Methodology Used:

The study adopted a descriptive-analytical approach. Data were collected through questionnaires distributed to a sample of employees at the National Savings and Reserve Fund - Agency No. 303 in Annaba. Statistical tools such as mean analysis, standard deviations, correlation analysis, and simple regression were used to evaluate the relationship between governance principles and the improvement of financial performance. This approach allows for a precise and comprehensive exploration of effects and correlations, relying on statistical analysis software (SPSS).

Study Population and Sample:

The study population consists of employees and administrators at the National Savings and Reserve Fund Bank - Branch 303 in Annaba. A representative random sample from this population was selected to complete the study questionnaires. The sample size was determined based on statistical standards to ensure adequate representation and accuracy in the results, with a focus on diversity in positions and job functions to ensure a comprehensive analysis of participants' opinions.

I. Theoretical Framework and Previous Studies:

32 - www.imcra.az.org, | Issue 7, Vol. 8, 2025

The Impact of Applying Banking Governance Principles on the Effectiveness of Financial Performance - A Case Study of the National Savings and Reserve Fund Agency No. 303 in Annaba

Corporate Governance on Banking Performance of Commercial Banks in Bangladesh Effects of Mohammad Niaz Morshed, Sardar Md Humayun Kabir, Md Muhibbullah, Rafia Afroz, Fadhilah Binti Abdullah Asuhaimi and (2020).International Finance Banking. Vol. 7, This study investigated the impact of corporate governance on banking performance. Panel data analysis was conducted on the nine largest public and private commercial banks operating in Bangladesh from 2009 to 2017. Board size, the structure of the internal audit committee, and capital adequacy ratio were taken as independent variables to measure the effects of corporate governance, while return on assets, return on equity, and earnings per share were used as dimensions to measure bank performance. Correlation and regression analysis techniques were used to examine the relationships between corporate governance practices and bank performance. The results indicated that the capital adequacy ratio had the greatest impact on bank performance. The information derived from this study can be valuable and will help enhance the understanding of the administrative bodies of financial institutions to accelerate banking performance.

The Effect of Corporate Governance on Financial Performance of Commercial Banks in Ghana Alexander Owiredu, Mercy Kwakye, International Journal of Business and Social Science, Vol. 11, No. 5, May 2020

This study examined the impact of corporate governance principles on the financial performance of banks in Ghana. Data were collected from the annual reports and financial statements of the sampled banks for the period 2007-2016. A random effects model was used to analyze the data. The study found a significant positive relationship between board size and financial performance measured by return on assets and return on equity of the banks in Ghana. In addition, the study found a statistically significant positive relationship between foreign ownership and financial performance, measured by return on equity. Interestingly, the study results also indicated a positive but statistically insignificant relationship between board independence and institutional ownership with return on assets and return on equity of the sampled banks in Ghana. Overall, the study supports the view that enhanced corporate governance practices are key to improving a company's financial performance.

Good Corporate Governance Improves Banking Financial Performance, Dwi Fitrianingsih and Indra Sulistiana, Vol. 11 No. 4 (2024): March: Applied Finance and Business Studies

This study aimed to determine the impact of institutional ownership on the financial performance of banks listed on the Indonesia Stock Exchange, the impact of the independent board of commissioners on the financial performance of banks listed on the Indonesia Stock Exchange, and the impact of the audit committee on the financial performance of banks listed on the Indonesia Stock Exchange. The study population consists of all public banks listed on the Indonesia Stock Exchange for the period 2018–2022, totaling 43 banks. The sample was selected using a purposive sampling method. There were 27 banking companies that met the criteria as a research sample, resulting in 135 data observations. The data analysis method used is descriptive statistics, and the results of this study show that institutional ownership has a positive and significant impact on banking financial performance, the independent board of commissioners has a slight positive impact on the financial performance of banks, and the audit committee has a slight positive impact on banking financial performance.

Corporate Governance and Financial Performance of Banks in Nigeria, Abdullahi, M., & Isyaku, M. U. (2021). *The International Journal of Business & Management*, Volume 9, Issue 7, July

This study addressed the relationship between corporate governance policies and the financial performance of banks in Nigeria. The study population consists of 21 banks listed on the Nigerian Stock Exchange. The researchers used the entire population as a sample and adopted a secondary method for data collection. The annual reports of the sampled banks were used to verify financial performance, while structured interview schedules were given to the bank managers selected to assess corporate governance.

The researchers' review of the relevant literature confirms that corporate governance variables can be measured using (CEO tenure, board size, audit committee size, financial leverage, bank age, and management change), and financial performance variables can also be measured using (asset value and capital base). The study determined the degree of the relationship between corporate governance and the financial performance of these banks in Nigeria with the help of multiple regression analysis.

The researchers concluded that there is a positive statistical relationship between asset value and management change in the sampled banks. Based on this finding, the paper calls for the implementation and improvement of management changes, which will translate into an increase in the bank's asset value, thereby leading to better financial performance in the long run.

Most previous foreign studies have focused on banking environments in countries such as Pakistan, Bangladesh, Saudi Arabia, the United Kingdom, and others. Therefore, the literature lacks in-depth studies focusing on the Algerian banking environment, which is characterized by different regulatory and institutional challenges, most notably:

- Dominance of the public sector
- Weak levels of transparency and disclosure
- Limited adoption of governance principles in an effective manner

Nature of the Studied Banking Sector (Algerian Public Banks)

While many studies have focused on private banks or those listed on stock exchanges, this study focuses on public banks in Algeria. These institutions face different regulatory constraints and operate within a more conservative legal framework, opening the door to testing the effectiveness of governance under these specific conditions.

This study also addresses a comprehensive set of banking governance principles (effective framework, shareholder rights, fairness, disclosure, board responsibilities...), analyzing the impact of each individually on financial performance. This provides a deeper analytical insight and broader comprehensiveness.

2. Theoretical Framework of Banking Governance

2.1 Concept of Banking Governance

Banking governance is defined as the framework through which banks are managed and monitored, with a focus on the relationships between the board of directors, executive management, shareholders, and other stakeholders. This governance aims to ensure effective risk management, regulatory compliance, and the achievement of the bank's objectives in a transparent and accountable manner '.

According to the corporate governance principles issued by the Basel Committee on Banking Supervision, corporate governance is defined as "a set of relationships between a company's management, its board, its shareholders, and other stakeholders, which provides the structure through which the company's objectives are set, and the means of attaining those objectives and monitoring performance".

In the banking context, banking governance refers to the oversight exercised by shareholders and other stakeholders over how banks are managed, focusing on how banks are financed and regulated, the negative consequences of bank failures, and the nature of their assets.

These definitions highlight the importance of banking governance in promoting financial stability, ensuring effective risk management, and achieving transparency and accountability in banking operations³.

2.2 Core Principles of Banking Governance

According to the Basel Committee on Banking Supervision (2015), the principles of banking governance include the following:

- Board responsibilities: The board is fully responsible for supervising the bank's strategy and ensuring its effective implementation.
- **Governance structure:** There should be a clear governance structure that defines roles and responsibilities within the bank.
- Risk management: Providing a comprehensive risk management framework that ensures the identification, assessment, and monitoring of risks.
- Internal control: The existence of an effective internal control system that ensures compliance with policies and procedures.

1

2

https://www.bis.org/fsi/fsisummaries/corp_gov_principles.htm

34 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

³ Allen, F., & Carletti, E. (2016). Bank Governance. European Corporate Governance Institute (ECGI) Finance Working Paper No. 446/2016.

⁴ Basel Committee on Banking Supervision. (2015). Corporate Governance Principles for Banks. Bank for International Settlements.

- **Disclosure and transparency:** Providing accurate and timely information to shareholders and stakeholders.
- Accountability: Clear definition of responsibilities to ensure accountability at all levels within the bank.
- **Independence**: Ensuring the independence of the board and its subcommittees from executive management.
- Shareholder rights: Protecting shareholder rights and providing effective mechanisms for their exercise.
- Legal compliance: Adherence to all applicable laws and regulations in the banking sector.
- **Periodic evaluation:** Conducting periodic evaluations of the performance of the board and executive management.

These principles aim to enhance the stability of the financial system and ensure effective management of banks.

3. Fundamental Concepts of Financial Performance

Financial performance is a central concept in financial and managerial analysis, as it reflects the extent to which an organization is efficient and effective in utilizing its resources to achieve its economic objectives. It is also used as a key indicator to measure the financial strength and sustainability of any institution, especially in the banking sector.

3.1 Definition of Financial Performance

Financial performance refers to an institution's ability to generate profits through its operational activities, manage its resources effectively, and maintain a balance between revenues and expenses. Brigham & Ehrhardt (2016) define it as:

"The firm's ability to generate earnings, maintain growth, and sustain value creation over time through efficient allocation of financial resources."

3.2 Indicators for Measuring Financial Performance

A range of indicators is used to measure and analyze financial performance. The most important include:

- Profitability: such as net profit, profit margin, return on assets (ROA), and return on equity (ROE) 7.
- Liquidity: measures the institution's ability to meet its short-term obligations, such as the current ratio and the quick ratio *.
- **Efficiency:** such as asset turnover and working capital cycle °.
- Solvency: measures the extent to which the institution relies on debt, such as the debt-to-equity ratio 10.

3.3 Importance of Financial Performance in Banks

In the banking sector, financial performance is linked to financial stability, the ability to face risks, and compliance with regulatory standards. It is a critical indicator used by investors, depositors, and regulatory bodies to evaluate the financial standing of a bank.

35 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

⁵ OECD. (2015). G20/OECD Principles of Corporate Governance. OECD Publishing. https://www.oecd.org/en/publications/2015/11/g20-oecd-principles-of-corporate-governance g1g56c3d.html

⁶ Brigham, E. F., & Ehrhardt, M. C. (2016). Financial Management: Theory & Practice, p. 102.

⁷ Brigham, E. F., & Ehrhardt, M. C. (2016). Financial Management: Theory & Practice (15th ed.). Boston: Cengage Learning, pp. 87–92

⁸ Ross, S. A., Westerfield, R. W., & Jordan, B. D. (2019). Fundamentals of Corporate Finance (12th ed.). McGraw-Hill Education, pp. 56–60.

⁹ Higgins, R. C. (2012). Analysis for Financial Management (10th ed.). McGraw-Hill/Irwin, pp. 124–130.

¹⁰ Palepu, K. G., Healy, P. M., & Wright, S. (2020). Financial Reporting, Financial Statement Analysis and Valuation (9th ed.). Cengage Learning, pp. 145–150.

I. Methodology and Procedures:

In order to collect the data necessary to infer the impact of applying banking governance principles on the effectiveness of banking performance Case Study: National Savings and Reserve Fund (CNEP Bank), Branch No. 303 in Annaba a questionnaire was designed and tested as the study instrument. The questionnaire was created based on the opinions of a group of researchers and professors with expertise in this field, in addition to reviewing various references and literature related to governance principles, banking performance, and previous studies. A five-point Likert scale was used, and all key aspects were considered in formulating the questions to ensure alignment with the study topic. The questionnaire was reviewed by a number of experts, and all their guidance and recommendations were taken into account.

Study Sample:

The study sample included all department heads and administrators of the National Savings and Reserve Fund Bank Branch No. 303 in Annaba — totaling 12 individuals at the agency. The questionnaire was also distributed to two other branches of the same bank in the same region. The studied sample is considered a "purposive sample," meaning that the questionnaire was distributed specifically to individuals related to banking governance. A total of 40 questionnaires were distributed across all departments. A census method was used, and one invalid questionnaire was excluded. Hence, 39 valid questionnaires were retrieved.

Study Instrument:

To achieve the study objective, the researcher designed a questionnaire form aimed at assessing the views of the surveyed sample on the topic: "The Impact of Applying Banking Governance Principles on the Effectiveness of Banking Performance Case Study: CNEP Bank, Branch No. 303 in Annaba." The form consists of two sections:

- **Section One:** Personal information of the study sample (gender, age group, current job field, academic qualification, years of service).
- **Section Two:** Includes two axes as follows:
- o Axis One: Related to banking governance principles, consisting of 15 items distributed across 5 domains.
- o Axis Two: Related to the effectiveness of banking performance, comprising 14 statements, as shown in the following table:

Table No. (02): Distribution of the Questionnaire Items

| Number of Items | Dimensions | Variables | | | |
|--------------------|--|--------------------------------------|--|--|--|
| 01 to 03 | Principle of Ensuring the Existence of an Effective Governance Framework | | | | |
| 04 to 06 | Principle of Protecting Shareholders' and Investors' Rights | | | | |
| 07 to 09 | Principle of Fair and Equal Treatment of All Shareholders | Banking Governance Principles | | | |
| 10 to 12 | Principle of Disclosure and Transparency Among Shareholders and Stakeholders | | | | |
| 13 to 14 | Principle of Board Responsibilities | | | | |
| 01 to 15 | Improving Financial Performance | Effectiveness of Banking Performance | | | |
| 29 | Total Items: | | | | |

Source: Prepared by the researchers based on SPSS version 26 outputs

Statistical Analysis:

In this research, we used the Statistical Package for the Social Sciences (SPSS) version 26 to analyze the study data. Percentages and frequencies were calculated to describe the study sample. We also used **Cronbach's Alpha coefficient** to test the reliability of the study instrument. Descriptive statistics (means and standard deviations) were used to identify the participants' attitudes toward the dimensions of the study variables. In addition, simple linear regression was conducted to test the impact.

36 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

IV. Presentation and Discussion of Results:

Reliability of the Study Instrument:

To measure the reliability of the study instrument, Cronbach's Alpha coefficient was used, as shown in Table No. (03).

Table No. (03): Cronbach's Alpha Coefficient for Measuring the Reliability of the Questionnaire

| Axes | Dimensions | Cronbach's Alpha | Reliability |
|------------------------------|---|------------------|-------------|
| Ba | Ensuring an Effective Governance Framework | 0.693 | 0.832 |
| nki ng | Protecting Shareholders' and Investors' Rights | 0.649 | 0.805 |
| Go | Fair and Equal Treatment of All Shareholders | 0.719 | 0.847 |
| ver nan | Disclosure and Transparency Among Shareholders and Stakeholders | 0.665 | 0.815 |
| ce Pri nci ple s | Board Responsibilities | 0.641 | 0.800 |
| | Overall reliability of governance principles axis | 0.763 | 0.873 |
| | Overall reliability of financial performance improvement axis | 0.757 | 0.870 |
| | Overall reliability of the entire questionnaire | 0.856 | 0.925 |

Source: Prepared by the researchers based on SPSS version 26 outputs

The overall Cronbach's Alpha for all questionnaire items reached (0.856), which is greater than 0.600, and the corresponding reliability reached (0.925), which is greater than 0.700, indicating that the study instrument is reliable, valid in its statements, and ready to be applied to the study sample.

Internal Consistency Validity:

The internal consistency validity of this questionnaire was calculated by estimating the correlation between the score of each item and the total score of the dimension it belongs to. The table below shows the correlation coefficient between each item of the **Banking Governance Principles** and **Financial Performance Effectiveness** fields and the total score of their respective fields.

Table No. (04): Pearson Correlation Coefficient for Banking Governance Principles and Financial Performance Effectiveness

| Axes | Dimensions | Pearson Correlation Coefficient | Significance Level |
|---|---|------------------------------------|-----------------------|
| | Ensuring an Effective Governance Framework | 0.487* | 0.002* |
| Pauline Communica | Protecting Shareholders' and Investors' Rights | 0.608* | 0.000* |
| Banking Governance Principles | Fair and Equal Treatment of All Shareholders | 0.773* | 0.000* |
| | Stakeholders | 0.785* | 0.000* |
| | Board Responsibilities | 0.666* | 0.000* |
| Financial Performance Improvement Financial Performance Improvement | | 0.925* | 0.000* |

37 - www.imcra.az.org, | Issue 7, Vol. 8, 2025

The Impact of Applying Banking Governance Principles on the Effectiveness of Financial Performance - A Case Study of the National Savings and Reserve Fund Agency No. 303 in Annaba

^{**}Reliability: The positive square root of Cronbach's Alpha coefficient ***It is observed from the table above that both Cronbach's Alpha coefficient and the reliability values are high across all questionnaire axes. The values of Cronbach's Alpha range between (0.641) as the lowest and (0.856) as the highest. As for the reliability values, they range between (0.800) as the lowest and (0.925) as the highest.

Source: Prepared by the researchers based on SPSS V26 outputs. Statistically significant at a significance level of $\alpha \le 0.05$

The previous table shows that the correlation coefficients between each of the variables forming the questionnaire and the questionnaire as a whole are statistically significant at a significance level of ($\alpha \le 0.05$), as the p-values are less than 0.05. The correlation coefficients range between 0.487 and 0.925, indicating a **positive and strong direct relationship** between the variables and the overall questionnaire. This reflects the **validity** of the questionnaire in measuring what it was designed to assess.

1. Sample Characteristics:

Table No. (05): Relative Frequency Distribution of the Study Sample Based on Their Personal Information.

| Personal Data | Variable | Frequency | Percentage % | Personal Data | Variable | Frequency | Percentage % | |
|------------------|-----------------------|-------------------|------------------------|---------------------|-------------------------|--------------------|--------------|------|
| | | | Vocational Training | 13 | 33.3 | | | |
| Gender | Male | 19 | 48.7 | Educational | Bachelor's Degree | 21 | 53.8 | |
| | Level | Master's Degree | 5 | 12.8 | | | | |
| | Female | 20 | 51.3 | 51.3 | Postgraduate Studies | 0 | 0 | |
| | Under 30 | _ | - | | Director | 0 | 0 | |
| | 30 to <40 years | - | ı | Current Position | Assistant Director | 3 | 7.7 | |
| Age Group | 40 to <50 years | _ | - | | | Department Head | 13 | 33.3 |
| | 50 years and above | _ | _ | | Administrator | 23 | 59 | |
| Years of Service | | Less than 5 years | | | | | 10.3 | |
| | | | 5- | 15 | 38.5 | | | |
| | | | 10- | 7 | 17.9 | | | |
| | | | 15 yea | 13 | 33.3 | | | |
| | Total 39 100 | | | | | | | |

Source: Prepared by the researchers based on SPSS V₂₆ outputs.

The table above shows the distribution of the sample according to gender. There are 19 male participants, representing 48.7% of the total sample size, while the number of female participants is 20, representing 51.3% of the total sample. The higher number of females compared to males in the institution under study can be attributed to the nature of the work.

Regarding the distribution of the sample based on **educational level**, it is noted that the majority of the study sample holds a **bachelor's degree**, accounting for **53.8%** of the total participants, followed by those with **vocational training**, representing **33.3%**, while those holding a **master's degree** make up about **12.8%** of the total sample. As for individuals with **postgraduate degrees**, none were present in the study sample. This indicates that the institution under study recruits staff with university-level education, which is justified by the sensitive nature of the tasks assigned to them.

As for the **age variable**, the highest proportion falls within the 30-40 **age group**, representing 48.7% of the total sample, followed by the 40-50 **age group** with 33.3%. The two age groups **over** 50 **years** and **under** 30 **years** accounted for 12.8% and 5.1% respectively. These results suggest that the bank aims to enhance its workforce with young professionals capable of keeping up with the evolving environment and acquiring skills and experience more rapidly.

Regarding the distribution of the sample based on **professional experience**, the majority of employees have **medium-level experience** (5-10 years), representing 38.5%, followed by those with **more than 15 years** of experience at 33.3%. Next are

individuals with 10-15 years and less than 5 years of experience, representing 17.9% and 10.3%, respectively. These results indicate that the bank possesses a decent level of professional experience among its staff.

Regarding the distribution of the study sample according to **job title**, it is observed that the majority are **administrative staff**, representing **59%** of the total sample. This is followed by **heads of departments** and **assistant directors**, with respective percentages of **33.3%** and **7.7%**.

As for the **director position**, there are no participants holding this title in the study sample, as due to their numerous obligations, the questionnaire was answered by their assistants instead.

Analysis of the Study Instrument Axes

This section analyzes the study axes related to the **implementation of banking governance principles** and the **effectiveness of financial performance**, using statistical methods such as **mean** and **standard deviation**.

4.1 Analysis of the Banking Governance Principles Axis

In this axis, we present and analyze the results obtained by calculating the **mean** and **standard deviation** for each principle of banking governance as follows:

- Principle of Ensuring an Effective Governance Framework

The following table shows the results related to the principle of ensuring the existence of an effective governance framework as follows:

Table No. 06: Means and Standard Deviations of Respondents' Opinions Regarding the Principle of Ensuring an Effective Governance Framework.

| No. | Statement | Mean | Standard Deviation | Level of Agreement | Rank by Importance |
|-----|---|------|-----------------------|-----------------------|-----------------------|
| 01 | The banking governance system in the bank is characterized by effectiveness | 3.85 | 0.432 | High | 3 |
| 02 | Banking governance is the best system for overseeing public funds | 3.87 | 0.570 | High | 2 |
| 03 | The banking governance system is updated periodically | 3.92 | 0.623 | High | 1 |
| C | Overall - Principle (Ensuring an Effective Governance Framework) | | 0.386 | High | / |

Source: Prepared by the researchers based on SPSS V26 outputs.

Based on the results in the table above, it is evident that all statements received a **mean score exceeding 3.85**, indicating a **high level of agreement** among the respondents. This also suggests that the employees at the agency under study are aware of the existence of an effective governance framework within the institution.

The highest mean was recorded for **statement three** (3.92), reflecting a strong conviction that the governance system is updated periodically. This is a positive indicator of ongoing engagement with developments in the banking sector and the evolution of good governance practices.

As for the **standard deviations**, the values ranged between **0.386 and 0.623**, which are all relatively low, indicating **low variability** in the respondents' opinions. In other words, most respondents were relatively consistent in their perception of governance effectiveness. The greatest variation appeared in **statement three (0.623)**, which may be attributed to differences in experience, job positions, or varying levels of awareness regarding system updates.

The statements were ranked based on their mean scores, with the statement "The banking governance system is updated periodically" ranked first. This highlights the importance of system dynamism in the respondents' views. Meanwhile, "The banking governance system is characterized by effectiveness" came in third place, which may suggest a general acknowledgment of effectiveness, but also the presence of some challenges or shortcomings that affect the overall assessment.

-Principle of Protecting Shareholders' and Investors' Rights

The following table presents the results related to the principle of protecting shareholders' and investors' rights as follows:

Table No. (07): Means and Standard Deviations of Respondents' Opinions Regarding the Principle of Protecting Shareholders' and Investors' Rights

| No. | Statement | Mean | Standard Deviation | Level of Agreement | Rank by Importance |
|-----|---|------|-----------------------|-----------------------|-----------------------|
| 04 | The banking governance system leads to achieving the benefits of public funds privatization | 3.67 | 0.737 | High | 3 |
| 05 | Banking governance systems are influenced by the implications of globalization | 3.90 | 0.680 | High | 1 |
| 06 | Banking governance systems are influenced by the implications of privatization | 3.72 | 0.605 | High | 2 |
| Ove | rall - Principle (Protecting Shareholders' and Investors' Rights) | 3.76 | 0.396 | High | / |

Source: Prepared by the researchers based on SPSS V26 outputs.

Based on the results in **Table No. (07)**, it is evident that all statements received **mean scores ranging between 3.67 and 3.90**, indicating a **high level of agreement** among respondents regarding all items related to this principle. The **highest mean** was recorded for the statement concerning the **impact of globalization on banking governance systems (3.90)**, reflecting employees' awareness of the connection between governance and the global economic environment.

The **lowest mean** was related to the statement about **achieving the benefits of public funds privatization (3.67)**, which may indicate some reservation or ambiguity in understanding the specific impact of governance on privatization.

Regarding the standard deviations, the values ranged between 0.605 and 0.737, indicating moderate to relatively high variability in opinions—especially for statement 04—which may reflect differences in background or perceptions regarding the relationship between governance and privatization.

The overall standard deviation for the axis (0.396) indicates an acceptable degree of consistency in respondents' understanding of the principle of protecting shareholders' and investors' rights.

In terms of the importance ranking, the statement "Banking governance systems are influenced by the implications of globalization" ranked first, reflecting increasing interest in the international dimension of governance and recognition of the external environment's impact on local governance. The statement on the influence of privatization came in second, while the statement "Achieving the benefits of public funds privatization" ranked last, possibly reflecting skepticism about the presumed positive role of governance in this context.

Table No. (08): Means and Standard Deviations of Respondents' Opinions Regarding the Principle of Fair and Equal Treatment of All Shareholders

| No. | Statement | Mean | Standard Deviation | Level of Agreement | Rank by Importance |
|-----|---|------|-----------------------|-----------------------|-----------------------|
| 07 | Governance systems work to combat internal corruption within the bank | 3.97 | 0.628 | High | 3 |
| 08 | Governance systems aim to ensure integrity for all bank employees | 4.00 | 0.725 | High | 2 |
| 09 | Governance systems contribute to increasing investor confidence | 4.10 | 0.718 | High | 1 |
| Ove | rall - Principle (Fair and Equal Treatment of All Shareholders) | 4.02 | 0.553 | High | / |

Source: Prepared by the researchers based on SPSS V26 outputs.

From **Table (08)**, it is clear from the mean scores that all statements received a **high level of agreement (above 3.90)**, indicating strong consensus among respondents on the importance of this principle in governance practices.

The highest-rated statement is "Governance systems contribute to increasing investor confidence" with a mean of 4.10, reflecting respondents' awareness of the vital role of governance in building trust and transparency.

The lowest-rated statement, although still high, is "Governance systems work to combat internal corruption" with a mean of 3.97, indicating a moderate to strong belief in governance effectiveness in addressing internal corruption.

The standard deviations ranged from 0.628 to 0.725, indicating moderate variability in respondents' opinions particularly regarding the statement on ensuring integrity (0.725), which could be attributed to differences in employee experiences, job positions, or variation in the implementation of integrity practices within the institution.

The overall mean for this axis was 4.02, one of the highest in the study so far, reflecting a very high level of trust in governance's effectiveness in achieving fairness among shareholders. Accordingly, the results suggest that employees perceive the existence of a real culture of fairness and equality within the bank, which strengthens institutional credibility and the sense of belonging.

- Principle of Disclosure and Transparency Among Shareholders and Stakeholders

The following table presents the results related to the principle of disclosure and transparency among shareholders and stakeholders as follows:

Table No. (09): Means and Standard Deviations of Respondents' Opinions Regarding the Principle of Disclosure and Transparency Among Shareholders and Stakeholders.

| No. | Statement | Mean | Standard Deviation | Level of Agreement | Rank by Importance |
|-----|---|------|-----------------------|-----------------------|-----------------------|
| 10 | Governance systems contribute to achieving a high level of liquidity | 3.97 | 0.707 | High | 3 |
| 11 | Governance systems contribute to achieving a high level of profitability | 3.97 | 0.668 | High | 2 |
| 12 | Banking governance contributes to providing stakeholders with the necessary information and clarifications for their financial security | 4.23 | 0.583 | Very High | 1 |
| | Overall - Principle (Stakeholders) | 4.05 | 0.506 | High | / |

Source: Prepared by the researchers based on SPSS V26 outputs.

From Table (09), it is clear that all the mean scores fall within the high level of agreement, with statement (12) exceeding the "very high" threshold a strong indicator of the importance of transparency and disclosure in the eyes of employees. The mean for statement (12) was 4.23, the highest in this axis, reflecting a strong consensus on the importance of providing accurate and transparent information to stakeholders in order to ensure their financial security.

Statements (10) and (11) received the same mean of 3.97, indicating agreement that governance plays a role in improving financial performance through liquidity and profitability, though they were rated slightly lower than the transparencyrelated statement.

Regarding standard deviations, they ranged between 0.583 and 0.707, which are moderate to low values, indicating a good degree of consistency in respondents' views particularly for statement (12), which had the lowest deviation, reflecting a broad collective agreement on the importance of disclosure.

The overall mean of 4.05 shows that the principle of disclosure and transparency is highly valued by the employees of the institution and is considered one of the most strongly supported governance principles in the study.

Based on the table results, the key insights can be summarized as follows:

- The principle of disclosure and transparency is considered one of the most effective governance principles by the respondents.
- The data indicates that employees are aware of the strong link between transparency and the quality of financial performance (liquidity and profitability), which enhances stakeholder trust and institutional stability.

- Principle of Board Responsibilities

The following table presents the results related to the **principle of board responsibilities** as follows:

41 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

Table No. (10): Means and Standard Deviations of Respondents' Opinions Regarding the Principle of Board Responsibilities.

| No. | Statement | Mean | Standard Deviation | Level of Agreement | Rank by Importance |
|-----|--|------|-----------------------|-----------------------|-----------------------|
| 13 | Banking governance systems protect stakeholders | 4.13 | 0.732 | High | 2 |
| 14 | Banking governance contributes to reforming internal control systems within the bank | 4.15 | 0.540 | High | 1 |
| | Overall - Principle (Board Responsibilities) | 4.14 | 0.499 | High | / |

Source: Prepared by the researchers based on SPSS V26 outputs.

From Table (10), it is clear that both statements received mean scores above 4.10, reflecting a very strong level of agreement among respondents regarding the importance of the board of directors' role in fulfilling governance requirements.

Statement (14), related to reforming internal control systems, achieved the highest mean (4.15), indicating a clear awareness of the significance of administrative responsibility in enhancing internal oversight and organizational control.

Statement (13), related to protecting stakeholders, also received a high mean (4.13), demonstrating strong trust in the board's vital role in safeguarding the rights of concerned parties both inside and outside the institution.

As for **standard deviations**, the overall standard deviation was **0.499**, which is relatively low and indicates a clear **homogeneity** in respondents' opinions.

Statement (14) had the **lowest variability (0.540)**, further reinforcing the general confidence in the board's role in control and supervision. Meanwhile, the **higher variability** in statement (13) (**0.732**) may suggest **some divergence** in how respondents perceive the extent to which stakeholders are protected.

The **overall mean score** for this principle was **4.14**, ranking among the highest in the study, and reflecting **a strong consensus** that the board of directors plays an essential role in the success of banking governance.

Accordingly, the results suggest that:

- Employees at the agency view the **board of directors as an active and responsible body** in protecting the institution and regulating its internal operations, fostering an atmosphere of institutional **trust and discipline**.
- The high recognition of the board's role in **reforming control systems** reflects a conviction that the board is not merely a supervisory body but an **active partner** in administrative and financial modernization.
- Despite the high evaluation, the **slight variability** in opinions regarding the statement "**protecting stakeholders**" points to a need for **strengthening communication and engagement** with various stakeholders to ensure a real sense of protection and participation.

4-2. Improving Financial Performance

This section presents and analyzes the results obtained by calculating the mean and standard deviation for each statement under this axis, as shown in the following table:

 Table (11): Means and Standard Deviations of Respondents' Opinions Regarding Improving Financial Performance.

| No. | Statement | Mean | Standard Deviation | Level of Agreement | Rank by Importance |
|-----|--|------|-----------------------|-----------------------|-----------------------|
| 01 | Banking governance distributes rights and responsibilities between the board of directors and executives | 3.82 | 0.556 | High | 14 |
| 02 | Governance achieves integration between the bank and its surrounding environment | 4.00 | 0.607 | High | 8 |
| 03 | Banking governance supports transparency in all bank operations | 4.15 | 0.670 | High | 4 |

42 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

| | | | | | 1 |
|-----|---|------|-------|------|----|
| 04 | Banking governance helps avoid banking crises | 3.87 | 0.833 | High | 12 |
| 05 | Banking governance improves the financial efficiency of banks | 4.18 | 0.506 | High | 1 |
| 06 | Financial oversight is considered the most important aspect of banking governance | 4.18 | 0.601 | High | 2 |
| 07 | Accountability is considered the most important aspect of banking governance | 4.05 | 0.724 | High | 7 |
| 08 | One of the main foundations of banking governance in Algeria is clarity of responsibility | 4.05 | 0.686 | High | 6 |
| 09 | Banking governance in Algerian banks pays particular attention to rights | 3.79 | 0.615 | High | 15 |
| 10 | Banking governance achieves banking efficiency in Algerian public banks | 3.85 | 0.540 | High | 13 |
| 11 | Professional diligence is one of the main pillars of financial performance in Algerian public banks | 3.95 | 0.793 | High | 11 |
| 12 | Good financial performance requires a precise definition of the scope of work in public banks | 3.97 | 0.707 | High | 9 |
| 13 | Financial performance in Algerian public banks is measured by the quality of audit task execution | 4.15 | 0.630 | High | 3 |
| 14 | Financial performance in Algerian public banks focuses on managing the internal audit function | 3.97 | 0.873 | High | 10 |
| 15 | Financial performance in Algerian public banks is measured by the overall quality of auditing | 4.10 | 0.754 | High | 5 |
| Ove | rall - Axis (Improving Financial Performance) | 4.00 | 0.324 | High | / |

Source: Prepared by the researchers based on SPSS V₂₆ outputs.

From Table (11), it is evident that all statements received mean scores exceeding 3.75, which falls within the "high" range. This indicates a generally positive evaluation by the respondents regarding the extent to which governance contributes to improving financial performance. Statement No. (05) - "Improving financial efficiency" ranked first with a mean score of 4.18.

It was followed in second place by Statement No. (06) "Financial oversight as the most important dimension of governance" with a mean score of 4.18, and then Statement No. (13) "The quality of audit task performance as an indicator of financial performance" with a mean score of 4.15. Accordingly, these results reflect a deep understanding of the direct links between governance and efficiency, oversight, and auditing as key drivers for improving financial performance.

The relatively lower-rated statements were Statement No. (01) and (09). This does not necessarily indicate weakness in implementation but may suggest a lack of clarity regarding their direct impact or weak practical application of certain aspects related to rights distribution or special care for rights.

As for the standard deviations, the low overall deviation (0.324) indicates a high level of agreement and consistency in the respondents' views regarding this axis. The highest deviation was observed in Statement (14), which concerns internal auditing (0.873), indicating a relative divergence in employees' opinions regarding the effectiveness of this function in

improving financial performance. This may be due to varying levels of implementation or employees' awareness of the internal audit function.

The classifications reveal that practical and oversight-related aspects (efficiency, auditing, accountability) hold higher priority and weight in assessing financial performance, while conceptual aspects (such as rights distribution and care for rights) are considered less influential from the respondents' perspective.

5- The Impact of Applying Banking Governance Principles on the Effectiveness of Banking Performance

This section aims to test the hypotheses on which this study is based, through the application of statistical methods to the collected data. Therefore, the main hypothesis and the sub-hypotheses will be examined. To verify the validity of these hypotheses, both multiple and simple linear regression methods were used, in addition to presenting the obtained results.

5.1 Testing the Main Hypothesis:

The hypothesis states: "There is no statistically significant effect of banking governance principles on improving financial performance at a significance level of ($\alpha \ge 0.05$)."

To test this, multiple linear regression was used. The results of the statistical analysis can be summarized as follows:

- Correlation Analysis (Correlation Coefficient):

The following table shows the correlation between banking governance principles (ensuring an effective governance framework, protecting shareholders' and investors' rights, fair and equal treatment of all shareholders, stakeholders, board responsibilities) as the independent variable, and the improvement of financial performance as the dependent variable, as follows:

Table (12): Correlation Between Banking Governance Principles and the Improvement of Financial Performance

| Vari | ables | | Coefficient of | | | |
|-------------------------------------|--|--------------------------------|---------------------------------|---------------------------------------|-------------------|--|
| Independent Variable | Dependent Variable | Correlation Coefficient (R) | Determination (R ²) | Adjusted Coefficient of Determination | Standard Error | |
| Banking Governance Principles | Improvement of Financial Performance | 0.809 | 0.654 | 0.602 | 0.20491 | |

Source: Prepared by the researchers based on SPSS V26 outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

The following can be observed from Table (12):

Correlation Coefficient (R = 0.809): This is a very high value, indicating a strong positive correlation between the application of banking governance principles and the improvement of the bank's financial performance. It also shows that the more effectively governance is applied, the more significantly financial performance improves.

Coefficient of Determination ($R^2 = 0.654$): This indicates that 65.4% of the variance in financial performance is explained by the application of governance principles. This is considered a high percentage and suggests that governance plays a central role in enhancing financial outcomes.

Adjusted Coefficient of Determination (Adjusted $R^2 = 0.602$): This adjusts R^2 by accounting for the number of variables in the model and indicates that the model is sufficiently generalizable, even beyond the sample under study.

Standard Error (Standard Error = 0.20491): This is a relatively low value, indicating that the data points were close to the regression line, meaning that the statistical model used was appropriate and accurate.

Accordingly, the causal relationship between governance and financial performance becomes clear through the results, which show that improving governance systems (such as transparency, accountability, disclosure, distribution of responsibilities...) leads to better financial outcomes for the bank in terms of efficiency, profitability, and sustainability. The results also indicate that governance is not merely a regulatory framework but a strategic tool that directly impacts financial performance, which aligns with the modern literature on governance in global banking systems.

5-2 Statistical Testing of the Sub-Hypotheses

- Statistical Test of the First Sub-Hypothesis:

44 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

The Impact of Applying Banking Governance Principles on the Effectiveness of Financial Performance - A Case Study of the National Savings and Reserve Fund Agency No. 303 in Annaba

The hypothesis states: "There is no statistically significant effect of the principle of ensuring an effective governance framework on the improvement of banking financial performance at the significance level ($\alpha \ge 0.05$)."

To test this, simple linear regression was used. The results of the statistical analysis can be summarized as follows:

- Correlation Analysis (Correlation Coefficient):

The following table illustrates the correlation between the principle of ensuring an effective governance framework as the independent variable and the improvement of banking financial performance as the dependent variable:

Table (13): Correlation Between the Principle of Ensuring an Effective Governance Framework and the Improvement of Banking Financial Performance

| Variabl | Variables | | | Adjusted | |
|--|--|--------------------------------|--------------------------------------|------------------------------|-------------------|
| Independent Variable | Dependent Variable | Correlation Coefficient (R) | Coefficient of Determination (R²) | Coefficient of Determination | Standard Error |
| Principle of Ensuring an Effective Governance Framework | Improvement of Banking Financial Performance | 0.366 | 0.134 | 0.110 | 0.30627 |

Source: Prepared by the researchers based on SPSS V26 outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

Based on Table (13), which presents the correlation between the principle of ensuring an effective governance framework and the improvement of financial performance, the following can be observed:

- Correlation Coefficient (R = 0.366): This indicates a weak but positive correlation between the principle of "ensuring an effective governance framework" and the improvement of financial performance. This means that enhancing the general regulatory framework of governance contributes only to a relatively limited extent to financial performance improvement when compared to other principles.
- Coefficient of Determination ($\mathbb{R}^2 = 0.134$): This shows that only 13.4% of the change in financial performance can be explained by this principle. This relatively low percentage indicates that having a governance framework alone is insufficient if it is not activated and translated into practical practices.
- Adjusted Coefficient of Determination (Adjusted $R^2 = 0.110$): This reinforces the idea that the relationship is not strong enough, and that there may be intermediate or common variables that were not considered.
- Standard Error (Standard Error = 0.30627): This is relatively high compared to previous results, which implies a noticeable variation in respondents' answers or in the effectiveness of implementing this principle across different branches or among staff.

Although the presence of an effective governance framework is structurally important, its impact on financial performance remains limited unless it is complemented by elements such as transparency, accountability, and daily practices. It is also likely that the framework exists theoretically within the bank under study, but its practical implementation may be insufficient or not clearly recognized by employees.

- F-Test (Model Significance Indicator):

At this stage, the quality of the model representing the relationship between the principle of ensuring an effective governance framework as an independent variable and the improvement of banking financial performance as a dependent variable will be tested. This is illustrated in the following table:

Table (14): Simple Linear Regression Model Estimates for the Effect of the Principle of Ensuring an Effective Governance Framework on the Improvement of Banking Financial Performance

| Model | Sum of Squares | Degrees of Freedom | Mean Square | Test Value (F-Test) | Significance Level (Sig) | Statistical Decision |
|------------|-------------------|-----------------------|-------------|------------------------|-----------------------------|-------------------------|
| Regression | 0.536 | 1 | 0.536 | 5.719 | *0.022 | Rejected the Null |

45 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

The Impact of Applying Banking Governance Principles on the Effectiveness of Financial Performance - A Case Study of the National Savings and Reserve Fund Agency No. 303 in Annaba

| | | | | | Hypothesis |
|-------|-------|----|-------|--|------------|
| Error | 3.471 | 37 | 0.097 | | |
| Total | 4.007 | 38 | | | |

Source: Prepared by the researchers based on SPSS V26 outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

The above table shows the following:

- **F-Test (F = 5.719):** The F value measures whether the statistical model as a whole is **significant** and explains a real variation in the dependent variable (financial performance). Since the value of F > 1, this indicates that the model has a tangible effect.
- Significance Level (Sig. = 0.022): This is less than 0.05, which means the model is statistically significant at the 95% confidence level. We conclude that there is a statistically significant relationship between the existence of an effective governance framework and the improvement of banking financial performance.
- Statistical Decision: Reject the null hypothesis H_0 , which states that there is no significant relationship. Therefore, the alternative hypothesis is accepted, confirming that this principle does have an effect on financial performance.
- T-Test (Significance Indicator of the Parameters):

The following table presents the T-Test to assess the significance of the parameters and to derive the regression model specific to the study as follows:

Table (15): T-Test Results

| Model | Regression Coefficient | Standard Error | ВЕТА | Test Value (T-Test) | Significance Level (Sig) | Statistical Decision |
|---|---------------------------|-------------------|-------|------------------------|-----------------------------|------------------------------------|
| Constant (a ₀) | 2.813 | 0.502 | | 5.606 | 0.000* | Rejected the Null Hypothesis |
| Principle of Ensuring an Effective Governance Framework (a ₁) | 0.308 | 0.129 | 0.366 | 2.391 | 0.022* | Rejected the Null Hypothesis |

Source: Prepared by the researchers based on SPSS V26 outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

Based on the table, it is shown that the **T-Test value** for the principle of ensuring an effective governance framework is **2.391**, with a corresponding significance level (**Sig = 0.022**), which is less than the significance threshold ($\alpha \le 0.05$). Therefore, the hypothesis stating that the parameter is not significant ($a_1 = 0$) is rejected.

As for the constant, the **T-Test value** is **5.606**, with a **Sig = 0.000**, also less than ($\alpha \le 0.05$), which leads to the rejection of the hypothesis stating that the constant is not significant ($a_0 = 0$).

From the above, the regression equation can be formulated as:

$Y_{i}=2.813+0.308x+\varepsilon_{i}$

Where:

Yi: the dependent variable, i.e., improvement of banking financial performance

X: the independent variable, i.e., the principle of ensuring an effective governance framework

 εi : the random error term

This means that every unit increase or improvement in the principle of ensuring an effective governance framework by **0.308** in the bank under study leads to a one-unit increase in the improvement of banking financial performance within the scope of this study.

46 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

The Impact of Applying Banking Governance Principles on the Effectiveness of Financial Performance - A Case Study of the National Savings and Reserve Fund Agency No. 303 in Annaba

Statistical Test of the Second Sub-Hypothesis:

The hypothesis states: "There is no statistically significant effect of the principle of protecting shareholders' and investors' rights on the improvement of banking financial performance at the significance level ($\alpha \ge 0.05$)." To test this, simple linear regression was used. The results of the statistical analysis can be summarized as follows:

- Correlation Analysis (Correlation Coefficient):

The following table illustrates the correlation between the principle of protecting shareholders' and investors' rights as the independent variable and the improvement of banking financial performance as the dependent variable:

Table (16): Correlation Between the Principle of Protecting Shareholders' and Investors' Rights and the Improvement of Banking Financial Performance

| Variab | oles | | Coefficient of | Adjusted | | |
|--|--|--------------------------------|---------------------------------|------------------------------|-------------------|--|
| Independent Variable | Dependent Variable | Correlation Coefficient (R) | Determination (R ²) | Coefficient of Determination | Standard Error | |
| Principle of Protecting Shareholders' and Investors' Rights | Improvement of Banking Financial Performance | 0.185 | 0.034 | 0.008 | 0.32338 | |

Source: Prepared by the researchers based on SPSS V26 outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

According to Table (16), it is clear that:

- Correlation Coefficient (R = 0.185): This indicates a very weak positive correlation between the principle of protecting shareholders' and investors' rights and banking financial performance. While the relationship is positive, it is **minimal and not strong**.
- Coefficient of Determination (R² = 0.034): This means that this principle explains only 3.4% of the variation in banking financial performance, while 96.6% of the variation is attributed to other factors, indicating a weak explanatory power of this independent variable.
- Adjusted R² (0.008): After adjusting for the number of variables and sample size, the explanatory power becomes even weaker, confirming that the relationship is not substantial.
- Relatively High Standard Error (0.32338): This indicates significant dispersion around the regression line, meaning that the model is not accurate in prediction.

Accordingly, these results suggest that the principle of protecting shareholders' and investors' rights, in the studied context (Agency No. 303 of the National Savings and Reserve Fund in Annaba), has not been effectively translated into a tangible financial impact.

This may be due to weak implementation of the principle, limited shareholder participation in decision-making, or the absence of effective channels for influencing financial performance.

- F-Test (Model Significance Indicator):

At this stage, the quality of the model representing the relationship between the principle of protecting shareholders' and investors' rights as an independent variable and the improvement of banking financial performance as a dependent variable will be tested. This is illustrated in the following table:

Table (17): Simple Linear Regression Model Estimates for the Effect of the Principle of Protecting Shareholders' and Investors' Rights on the Improvement of Banking Financial Performance

| Mode | Sum of Squares Degrees of Freedom | | Mean Square | Test Value (F-Test) | Significance Level (Sig) | Statistical Decision |
|----------|-----------------------------------|---|-------------|------------------------|-----------------------------|-------------------------|
| Regressi | on 0.138 | 1 | 0.138 | 1.317 | *0.258 | Accepted the Null |

47 - www.imcra.az.org, | Issue 7, Vol. 8, 2025

The Impact of Applying Banking Governance Principles on the Effectiveness of Financial Performance - A Case Study of the National Savings and Reserve Fund Agency No. 303 in Annaba

| | | | | | Hypothesis |
|-------|-------|----|-------|--|------------|
| Error | 3.869 | 37 | 0.105 | | |
| Total | 4.007 | 38 | | | |

Source: Prepared by the researchers based on SPSS V26 outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

From the above table, the following can be observed:

- **F** Value (**F** = 1.317): This indicates the model has weak explanatory power regarding variations in the dependent variable. The low value suggests that the model is **not suitable for explaining the relationship between the two variables**.
- Significance Level (Sig = 0.258): This is much higher than the accepted significance threshold ($\alpha \le 0.05$), meaning the result is not statistically significant. Therefore, there is no significant effect of the principle of protecting shareholders' and investors' rights on the improvement of banking financial performance.
- Statistical Decision: The null hypothesis (H₀) is accepted, which means that the independent variable does not have a statistically significant effect on the dependent variable.

Statistical Test of the Third Hypothesis:

The hypothesis states: "There is no statistically significant effect of the principle of fair and equal treatment of all shareholders on the improvement of banking financial performance at the significance level ($\alpha \ge 0.05$)."

To test this, simple linear regression was used. The results of the statistical analysis can be summarized as follows:

- Correlation Analysis (Correlation Coefficient):

The following table illustrates the correlation between the principle of fair and equal treatment of all shareholders as the independent variable and the improvement of banking financial performance as the dependent variable:

Table (18): Correlation Between the Principle of Fair and Equal Treatment of All Shareholders and the Improvement of Banking Financial Performance

| Variable | S | | Coefficient of | | | |
|---|---|--------------------------------|---------------------------------|---------------------------------------|----------------|--|
| Independent Variable | Dependent Variable | Correlation Coefficient (R) | Determination (R ²) | Adjusted Coefficient of Determination | Standard Error | |
| Principle of Fair and Equal Treatment of All Shareholders | Improvement of Banking Financial Performance | 0.682 | 0.466 | 0.451 | 0.24059 | |

Source: Prepared by the researchers based on SPSS V26 outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

From Table (18), the following can be observed:

- The **correlation coefficient** is **(0.682)**, indicating a strong positive relationship between the principle of fair and equal treatment of all shareholders and the improvement of banking financial performance.
- The coefficient of determination (R2) shows that 46.6% of the changes in banking financial performance improvement are due to the principle of fair and equal treatment of all shareholders, while the remaining 53.4% are caused by other variables not included in the scope of the study.
- The adjusted coefficient of determination (Adjusted R²) reached 0.451, meaning that the study model explains the phenomenon by 45.1%.

- F-Test (Model Significance Indicator):

At this stage, the quality of the model representing the relationship between the principle of fair and equal treatment of all shareholders as an independent variable and the improvement of banking financial performance as a dependent variable will be tested. This is illustrated in the following table:

48 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

Table (19): Simple Linear Regression Model Estimates for the Effect of the Principle of Fair and Equal Treatment of All

Shareholders on the Improvement of Banking Financial Performance

| Model | Sum of Squares | Degrees of Freedom | Mean Square | Test Value (F-Test) | Significance Level (Sig) | Statistical Decision |
|------------|-------------------|-----------------------|----------------|------------------------|-----------------------------|------------------------------------|
| Regression | 1.865 | 1 | 1.865 | 32.224 | *0.000 | Rejected the Null Hypothesis |
| Error | 2.142 | 37 | 0.058 | | | |
| Total | 4.007 | 38 | | | | |

Source: Prepared by the researchers based on SPSS V26 outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

From the above table, the following can be concluded:

The **F-Test value** indicates the quality of the model representing the relationship between the principle of fair and equal treatment of all shareholders as an independent variable and the improvement of banking financial performance as a dependent variable. The value of $\mathbf{F} = 32.224$, and the significance level is (Sig = 0.000), which is less than the accepted significance level ($\alpha \le 0.05$).

Accordingly, the model is statistically significant, and we conclude by rejecting the hypothesis that states: "There is no statistically significant effect of the principle of fair and equal treatment of all shareholders on the improvement of banking financial performance at the significance level ($\alpha \ge 0.05$)."

- T-Test (Significance Indicator of the Parameters):

The following table presents the T-Test to assess the significance of the parameters and to derive the regression model specific to the study as follows:

Table (20): T-Test Results

| Model | Regression Coefficient | Standard Error | ВЕТА | Test Value (T-Test) | Significance Level (Sig) | Statistical Decision |
|---|---------------------------|-------------------|-------|------------------------|-----------------------------|------------------------------------|
| Constant (a ₀) | 2.395 | 0.286 | | 8.362 | 0.000* | Rejected the Null Hypothesis |
| Principle of Fair and Equal Treatment of All Shareholders (a ₁) | 0.400 | 0.071 | 0.682 | 5.677 | 0.000* | Rejected the Null Hypothesis |

Source: Prepared by the researchers based on SPSS V₃₆ outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

From the table, it is shown that the **T-Test value** for the principle of fair and equal treatment of all shareholders is **5.677**, with a corresponding significance level (Sig = 0.000), which is less than the significance threshold ($\alpha \le 0.05$). Therefore, the hypothesis stating that the parameter is not significant $(a_1 = 0)$ is rejected.

As for the constant, the **T-Test value** is **8.362**, with Sig = 0.000, also less than $(\alpha \le 0.05)$. Accordingly, the hypothesis that the constant is not significant $(a_0 = 0)$ is also rejected.

From the above, the regression equation can be formulated as:

 $Y_i=2.395+0.400x+\varepsilon_i$

Where:

49 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

The Impact of Applying Banking Governance Principles on the Effectiveness of Financial Performance - A Case Study of the National Savings and Reserve Fund Agency No. 303 in Annaba

Yi: the dependent variable, i.e., improvement of banking financial performance

X: the independent variable, i.e., the principle of fair and equal treatment of all shareholders

εi: the random error term

This means that every increase or improvement in the principle of fair and equal treatment of all shareholders by 0.400 in the studied institution leads to a one-unit increase in the improvement of banking financial performance within the scope of the study.

1. Statistical Test of the Fourth Sub-Hypothesis:

The hypothesis states: "There is no statistically significant effect of the principle of disclosure and transparency among shareholders and stakeholders on the improvement of banking financial performance at the significance level ($\alpha \ge 0.05$)."

To test this, simple linear regression was used. The results of the statistical analysis can be summarized as follows:

Correlation Analysis (Correlation Coefficient):

The following table illustrates the correlation between the principle of disclosure and transparency among shareholders and stakeholders as the independent variable and the improvement of banking financial performance as the dependent variable:

Table (21): Correlation Between the Principle of Disclosure and Transparency Among Shareholders and Stakeholders and the Improvement of Banking Financial Performance

| Variables | | | Coefficient of | Adjusted | |
|---|---|--------------------------------|---------------------------------|------------------------------|-------------------|
| Independent Variable | Dependent Variable | Correlation Coefficient (R) | Determination (R ²) | Coefficient of Determination | Standard Error |
| Disclosure and Transparency Principle among Shareholders and Stakeholders | Improvement of Banking Financial Performance | 0.584 | 0.341 | 0.323 | 0.26712 |

Source: Prepared by the researchers based on SPSS V₂₆ outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

From Table (21), the following can be observed:

- The **correlation coefficient** is **(0.584)**, which indicates a moderate positive relationship between the principle of disclosure and transparency among shareholders and stakeholders and the improvement of banking financial performance.
- The **coefficient of determination (R²)** shows that **34.1%** of the changes in banking financial performance improvement are explained by the principle of disclosure and transparency among shareholders and stakeholders, while the remaining **65.9%** are due to other variables not included in the scope of the study.
- \bullet The adjusted coefficient of determination (Adjusted R^2) is 0.323, meaning that the study model explains 32.3% of the phenomenon.

- F-Test (Model Significance Indicator):

At this stage, the quality of the model representing the relationship between the principle of disclosure and transparency among shareholders and stakeholders as an independent variable and the improvement of banking financial performance as a dependent variable will be tested. This is illustrated in the following table:

Table (22): Simple Linear Regression Model Estimates for the Effect of the Principle of Disclosure and Transparency Among Shareholders and Stakeholders on the Improvement of Banking Financial Performance

| Model | Sum of Squares | Degrees of Freedom (df) | Mean Square | F-Test value | Significance Level (Sig) | Statistical Decision |
|-------|-------------------|----------------------------|-------------|--------------|-----------------------------|-------------------------|
|-------|-------------------|----------------------------|-------------|--------------|-----------------------------|-------------------------|

50 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

| Regression | 1.367 | 1 | 1.367 | 19.159 | *0.000 | Rejected the Null Hypothesis |
|------------|-------|----|-------|--------|--------|------------------------------------|
| Error | 2.640 | 37 | 0.071 | | | |
| Total | 4.007 | 38 | | | | |

Source: Prepared by the researchers based on SPSS V₂₆ outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

From the above table, the following can be concluded:

The **F-Test value** indicates the quality of the model representing the relationship between the principle of disclosure and transparency among shareholders and stakeholders as an independent variable and the improvement of banking financial performance as a dependent variable. The **F value is 19.159**, and the **significance level (Sig = 0.000)** is less than the accepted significance level ($\alpha \leq 0.05$). Therefore, the model is statistically significant, and the decision is to **reject the hypothesis** that states: "There is no statistically significant effect of the principle of disclosure and transparency among shareholders and stakeholders on the improvement of banking financial performance at the significance level ($\alpha \geq 0.05$)."

- T-Test (Significance Indicator of the Parameters):

The following table presents the **T-Test** used to assess the significance of the parameters and to derive the regression model specific to the study:

Table (23): T-Test Results

| Model | Regression Coefficient | Standard Error | ВЕТА | T-Test Value | Significance Level (Sig) | Statistical Decision |
|--|---------------------------|-------------------|-------|-----------------|-----------------------------|------------------------------------|
| Constant (a ₀) | 2.487 | 0.350 | | 7.106 | 0.000* | Rejected the Null Hypothesis |
| Disclosure and Transparency Principle among Shareholders and Stakeholders (a ₁) | 0.374 | 0.086 | 0.584 | 4.377 | 0.000* | Rejected the Null Hypothesis |

Source: Prepared by the researchers based on SPSS $V_{\mbox{\tiny M}}$ outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

From the table, it is shown that the **T-Test value** for the principle of disclosure and transparency among shareholders and stakeholders is **4.377**, with a corresponding **significance level (Sig = 0.000)**, which is less than the significance threshold ($\alpha \le 0.05$). Therefore, the hypothesis stating that the parameter is not significant ($a_1 = 0$) is rejected.

As for the constant, the **T-Test value** is **7.106**, with Sig = 0.000, also less than ($\alpha \le 0.05$). Accordingly, the hypothesis that the constant is not significant ($a_0 = 0$) is also rejected.

Based on the above, the regression equation can be formulated as:

 $Y_{i=2.487+0.374x+\varepsilon_{i}}$

Where:

Yi: the dependent variable, i.e., improvement of banking financial performance

X: the independent variable, i.e., the principle of disclosure and transparency among shareholders and stakeholders

εi: the random error term

This means that every increase or improvement in the principle of disclosure and transparency among shareholders and stakeholders by **0.374** in the studied institution leads to a one-unit increase in the improvement of banking financial performance within the scope of the study.

51 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

The Impact of Applying Banking Governance Principles on the Effectiveness of Financial Performance - A Case Study of the National Savings and Reserve Fund Agency No. 303 in Annaba

2. Statistical Test of the Fifth Sub-Hypothesis:

The hypothesis states: "There is no statistically significant effect of the principle of board responsibilities on the improvement of banking financial performance at the significance level ($\alpha \ge 0.05$)." To test this, simple linear regression was used. The results of the statistical analysis can be summarized as follows:

- Correlation Analysis (Correlation Coefficient):

The following table illustrates the correlation between the principle of board responsibilities as the independent variable and the improvement of banking financial performance as the dependent variable:

Table (24): Correlation Between the Principle of Board Responsibilities and the Improvement of Banking Financial Performance

| Variables | | | Coefficient of | Adjusted | |
|--|--|--------------------------------|---------------------------------|------------------------------|-------------------|
| Independent Variable | Dependent Variable | Correlation Coefficient (R) | Determination (R ²) | Coefficient of Determination | Standard Error |
| Board Responsibilities Principle | Improvement of Banking Financial Performance | 0.400 | 0.160 | 0.137 | 0.30167 |

Source: Prepared by the researchers based on SPSS V₂₆ outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

From Table (24), the following can be observed:

- The **correlation coefficient** is **(0.400)**, which indicates a weak positive relationship between the principle of board responsibilities and the improvement of banking financial performance.
- The **coefficient of determination (R²)** shows that **16%** of the changes in banking financial performance improvement are explained by the principle of board responsibilities, while the remaining **84%** are due to other variables not included in the scope of the study.
- The adjusted coefficient of determination (Adjusted R²) is 0.137, meaning that the study model explains 13.7% of the phenomenon.

- F-Test (Model Significance Indicator):

At this stage, the quality of the model representing the relationship between the principle of board responsibilities as an independent variable and the improvement of banking financial performance as a dependent variable will be tested. This is illustrated in the following table:

Table (25): Simple Linear Regression Model Estimates for the Effect of the Principle of Board Responsibilities on the Improvement of Banking Financial Performance

| miprovement of Burning Financial Ferrormance | | | | | | | | |
|--|-------------------|----------------------------|-------------|-----------------|-----------------------------|------------------------------|--|--|
| Model | Sum of Squares | Degrees of Freedom (df) | Mean Square | F-Test Value | Significance Level (Sig) | Statistical Decision | | |
| Regression | 0.640 | 1 | 0.640 | 7.033 | *0.012 | Rejected the null hypothesis | | |
| Error | 3.367 | 37 | 0.091 | | | | | |
| Total | 4.007 | 38 | | | | | | |

Source: Prepared by the researchers based on SPSS V₂₆ outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

From the above table, the following can be concluded:

The **F-Test value** indicates the quality of the model representing the relationship between the principle of board responsibilities as an independent variable and the improvement of banking financial performance as a dependent variable. The **F value** is 7.033, and the significance level (Sig = 0.012) is less than the accepted significance level ($\alpha \le 0.05$).

Therefore, the model is statistically significant, and the decision is to **reject the hypothesis** that states: "There is no statistically significant effect of the principle of board responsibilities on the improvement of banking financial performance at the significance level ($\alpha \ge 0.05$)."

- T-Test (Significance Indicator of the Parameters):

The following table presents the **T-Test** used to assess the significance of the parameters and to derive the regression model specific to the study:

Table (26): T-Test Results

| Model | Regression Coefficient | Standard Error | ВЕТА | T-Test Value | Significance Level (Sig) | Statistical Decision |
|--|---------------------------|-------------------|-------|-----------------|-----------------------------|------------------------------|
| Constant (a ₀) | 2.931 | 0.409 | | 7.170 | 0.000* | Rejected the null hypothesis |
| Board Responsibilities Principle (a ₁) | 0.260 | 0.098 | 0.400 | 2.652 | 0.012* | Rejected the null hypothesis |

Source: Prepared by the researchers based on SPSS V₂₆ outputs.

Statistically significant at a significance level of $\alpha \le 0.05$

From the table, it is shown that the **T-Test value** for the principle of board responsibilities is 2.652, with a corresponding significance level (Sig = 0.012), which is less than the significance threshold ($\alpha \le 0.05$). Therefore, the hypothesis stating that the parameter is not significant ($a_1 = 0$) is rejected.

As for the constant, the **T-Test value** is **7.170**, with Sig = 0.000, also less than ($\alpha \le 0.05$). Accordingly, the hypothesis that the constant is not significant ($a_0 = 0$) is also rejected.

Based on the above, the regression equation can be formulated as:

$Y_{i}=2.931+0.260x+\varepsilon_{i}$

Where:

- Yi: the dependent variable, i.e., improvement of banking financial performance
- X: the independent variable, i.e., the principle of board responsibilities
- **εi**: the random error term

This means that every increase or improvement in the principle of board responsibilities by **0.260** in the institution under study leads to a one-unit increase in the improvement of banking financial performance within the scope of the study.

Conclusion:

The study results revealed that banking governance principles play an important and effective role in improving the financial performance of banks. All principles recorded high levels of agreement from the respondents, reflecting their awareness of the importance of governance. It was found that the principle of ensuring an effective governance framework has a positive and significant effect on financial performance, although its impact level was moderate. In contrast, the principle of fair and equal treatment of all shareholders showed a strong and clear effect on improving financial performance, highlighting the importance of fairness and transparency in strengthening the trust of investors and shareholders.

The principle of disclosure and transparency among shareholders and stakeholders also significantly contributed to achieving balanced financial performance, as accurate information enhances control and accountability. On the other hand, the effect of the principle of protecting shareholders' and investors' rights was less statistically clear, indicating the

53 - <u>www.imcra.az.org</u>, | Issue 7, Vol. 8, 2025

need to reinforce this principle within the banking environment. As for the responsibilities of the board of directors, it was proven that they positively influence financial performance, confirming the importance of the board's supervisory and administrative role in achieving governance objectives.

Overall, the study confirms that banking governance is not merely a regulatory framework, but rather a strategic tool for improving financial performance and elevating the management level of banks. This calls for the effective application of governance principles to ensure the sustainability of financial and economic growth in public banks.

Recommendations:

Based on the findings of this study regarding the impact of banking governance principles on improving financial performance, the following key recommendations can help strengthen the governance system, thereby positively affecting financial performance and economic sustainability of banks:

- ✓ Strengthening an effective governance framework: It is necessary to regularly develop and update the banking governance framework to ensure its alignment with international best practices, which supports effective oversight and enhances transparency within banks.
- ✓ Enhancing fairness and equality among shareholders: Emphasis should be placed on applying the principle of fair and equal treatment to build shareholder and investor confidence, given its proven strong impact on improving financial performance.
- ✓ Improving disclosure and transparency levels: Adopting clear policies for regular and accurate disclosure to all stakeholders to ensure they receive the necessary information, thereby enhancing control and reducing financial risks.
- ✓ Developing the tasks and responsibilities of the board of directors: Preparing the board to perform its supervisory and administrative roles effectively, focusing on accountability and sound decision-making to ensure sustainable financial performance.
- ✓ Focusing on protecting shareholders' rights: Strengthening mechanisms that protect the rights of shareholders and investors through laws and regulations that safeguard them from risks and protect their interests, positively impacting the bank's stability.
- ✓ Training and awareness for employees: Organizing continuous training programs for employees on governance principles and the importance of adherence to ensure effective application at all levels.
- ✓ Enhancing the role of internal control: Supporting internal control systems that detect corruption and ensure transparency and integrity in banking operations.
- ✓ Encouraging active participation: Promoting the involvement of all stakeholders in decision-making processes to improve performance and transparency.

References and Footnotes

- 1. Khairiah, N. ., & Inayah, N. . (2024). The Effect of Implementing Good Corporate Governance (GCG) on the Financial Performance of Islamic Banks in Indonesia. *Accounting and Sustainability*, 2(2).
- 2. Krissanti, K., & Atahau, A. D. R. (2010). The influence of implementing corporate governance principles towards corporate financial performance in banking sector. *Journal of Economics, Business, and Accountancy Ventura*, 13(2), 165-174.
- 3. Allen, F., & Carletti, E. (2016). *Bank Governance*. European Corporate Governance Institute (ECGI) Finance Working Paper No. 446/2016.
- 4. Basel Committee on Banking Supervision. (2015). *Corporate Governance Principles for Banks*. Bank for International Settlements.
 - https://www.bis.org/fsi/fsisummaries/corp_gov_principles.htm?utm_source=chatgpt.com
- 5. OECD. (2015). *G20/OECD Principles of Corporate Governance*. OECD Publishing https://www.oecd.org/en/publications/2015/11/g20-oecd-principles-of-corporate-governance_g1g56c3d.html?utm_source=chatgpt.com
- 6. Brigham, E. F., & Ehrhardt, M. C. (2016). Financial Management: Theory & Practice, p. 102
- 7. Brigham, E. F., & Ehrhardt, M. C. (2016). *Financial Management: Theory & Practice* (15th ed.). Boston: Cengage Learning, pp. 87–92
- 8. Ross, S. A., Westerfield, R. W., & Jordan, B. D. (2019). Fundamentals of Corporate Finance (12th ed.). McGraw-Hill Education, pp. 56–60

- 9. Higgins, R. C. (2012). Analysis for Financial Management (10th ed.). McGraw-Hill/Irwin., pp. 124–130:
- 10. Palepu, K. G., Healy, P. M., & Wright, S. (2020). Financial Reporting, Financial Statement Analysis and Valuation (9th ed.). Cengage Learning., pp. 145–150