

# RURAL BANK RESILIENCE AND PERFORMANCE: A STUDY OF GOVERNANCE, RISK MANAGEMENT AND COMPLIANCE

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## Abstract

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The prevalence of bankruptcies among rural banks indicates corporate governance issues (Jallali & Zoghلامي, 2022). This study examines the influence of the functions of the board of commissioners, internal audit, risk monitoring, and compliance with credit banking stability in Indonesia. This study uses a quantitative methodology, utilizing data collected from rural banks in Indonesia with 300 respondents. This research is supported by utilizing partial least squares (PLS) for data analysis. The findings show that the role of the board of commissioners, risk monitoring, and compliance substantially positively impact the stability of credit banks in Indonesia. However, internal audits have a negligible effect on the stability of rural banks. This is evident from empirical evidence that highlights various shortcomings in supervising the internal audit function of credit banks. Therefore, the results of this study show that it is important to increase the authority of the board of commissioners, improve risk monitoring, and strengthen the compliance function to improve the stability and reliability of credit banking in Indonesia. This research is limited in terms of the scope, which exclusively concentrates on rural banking in Indonesia.

**Keywords:** Rural Bank, Board of Commissioners, Internal Audit, Risk Monitors, Compliance Function

**Authors' individual contribution:** Conceptualization — L.E. and H.; Methodology — L.E.; Software — H.G.F.; Validation — H. and G.N.A.; Formal Analysis — L.E.; Investigation — H.G.F.; Resources — L.E.; Data Curation — D.S.; Writing — Original Draft — H.G.F.; Writing — Review & Editing — H.G.F.; Visualization — D.S.; Supervision — H. and G.N.A.; Project Administration — H.G.F.; Funding Acquisition — L.E.

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## 1. INTRODUCTION

The financial performance and soundness of Bank Perkreditan Rakyat (BPR) or rural banks are crucial for promoting financial inclusion and supporting economic development in Indonesia, particularly in rural areas. Rural banks play a vital role in providing banking services and credit to underserved populations, contributing to poverty alleviation and improving the well-being of individuals (Jallali & Zoghلامي, 2022). However, the rural banking sector in Indonesia has faced various challenges, including fraud and financial crimes, which undermine public trust and the overall stability of the financial system.

To address these challenges, it is essential to examine the factors that contribute to the health and performance of rural banks, with a focus on the role of governance, risk management, and compliance practices. This research paper aims to provide insights into how rural banks in Indonesia can enhance their health level by implementing governance, risk management, and compliance frameworks (Tasman & Susanti, 2020).

Based on Indonesia's Banking Statistics data released by the Financial Services Authority (*Otoritas Jasa Keuangan*, OJK) recently, the rural banks industry posted a loss for the current year of IDR 55 billion in January 2024. This condition reversed to the same period the previous year, or January 2023, where rural banks posted a profit of IDR 240 billion. Meanwhile, at the end of last year, or December 2023, rural banks posted a profit of IDR 1.94 trillion. The profitability ratio of the rural banks industry has also declined. It was recorded that rural banks' return on assets (ROA) was -0.34% in January 2024, compared to 1.59% in January 2023. Then, the bank's return-on-equity (ROE) rate shrank to -2.98% from 13.92%. The non-performing loans (NPL) ratio of the rural banks industry also swelled to 10.25% in January 2024, compared to 8.34% in January 2023. Even so, rural banks' loan disbursement grew 9.26% year-on-year (yoy) to IDR 141.17 trillion in January 2024. Third-party funds (*dana pihak ketiga*, DPK) also grew 9.09% yoy to IDR 138.27 trillion in January 2024.

However, it remains uncertain whether these standards have been widely implemented in the banking industry as the integrated governance, risk, and compliance (GRC) standards, as is the situation in the Indonesian banking industry. The oversight and control of Indonesian banks is carried out by the Indonesian Financial Services Authority (IFSA) (Bastomi et al., 2017). The IFSA is responsible for regulating the performance of Indonesian banks, and the regulations they enforce are known as the IFSA regulation, or *Peraturan Otoritas Jasa Keuangan* (POJK). In addition, Indonesian banks have also implemented the Basel III framework, as stated in the OJK press release on December 8, 2017. From 2007 to 2009, the financial services industry experienced financial crises. In response, the Basel Committee on Banking Supervision (BCBS), which consists of central banks worldwide, created a set of regulations. These regulations were designed to enhance banks' supervision and risk management, enabling them to withstand future economic downturns. These measures ensured financial institutions maintained sufficient capital reserves to fulfill their obligations and withstand unforeseen losses (BCBS, 2014).

Research on governance, risk management, and compliance has been carried out, such as that

conducted by Hermawan and Novita (2021), Rohmatun et al. (2022), Mahendra and Ratna (2023), and Gede and Ratnawati (2020).

This research article examines the correlation between corporate governance, risk management, and the overall financial soundness of rural banks in the Indonesian environment. The results of this study can offer significant perspectives for policymakers, regulators, and rural bank management to improve the durability and long-term viability of these essential financial institutions. The novelty of this study is its emphasis on the significance of corporate governance, risk management, and compliance in rural banks in Indonesia.

The structure of this paper is as follows. Section 1 contains an introduction that explains the problems addressed in this study and the purpose of this research. Section 2 reviews relevant literature. Section 3 analyses the methodology used to conduct empirical research on GRC. Section 4 contains the results and findings of the research. Section 5 presents the discussion of the findings. Section 6 provides the conclusions and limitations of this research.

## 2. THEORETICAL BACKGROUND, LITERATURE REVIEW, AND HYPOTHESIS DEVELOPMENT

### 2.1. Governance, risk management, compliance

The Open Compliance and Ethics Group (OCEG) advocates integrating governance, risk management, internal control, assurance, and compliance into a single function known as the GRC capability model (Mitchell & Switzer, 2012; Norimarna, 2021). GRC combines functionalities to enable an organization to achieve its goals while managing uncertainty and behaving ethically (Organisation for Economic Co-operation and Development [OECD], 2019).

Darminto (2019), Iftikhar et al. (2024), and Racz et al. (2010) stated that GRC embodies a comprehensive strategy for addressing governance, risk, and compliance matters, ensuring that an organization adheres to its self-imposed regulations, risk tolerance, and external mandates. The statement proposes the implementation of horizontal and vertical integration and the utilization of cooperation in various processes and strategies. This can be achieved by focusing on the leadership position that management must assume, influencing their approach to carrying out their obligations (Marmen, 2022).

Effective GRC implementation necessitates amalgamating diverse fields and ideologies to attain principled performance. This involves establishing, assessing, and guaranteeing the fulfillment of objectives with accountability and honesty while also managing the impact of uncertainties on these objectives. Individuals involved in governance, strategy, performance management, risk management, audit, compliance, and ethics play vital roles in achieving an efficient GRC function (Zulfikar et al., 2020).

Corporate governance in financial institutions, especially banks, is notably different from that of non-bank financial institutions (Bothe, 2019; Fischer & Weißmüller, 2024). Managerial behavior and bank owners have evolved as significant dimensions to look out for in the corporate governance model (Sari & Lestari, 2022). The agency theory is often used in

corporate governance, but is hardly usable in the banking industry (Jallali & Zoghalmi, 2022). The banking industry has more information asymmetry than any other industry, so high complexity also comes from the possibility of this emerging. In turn, high information asymmetry can make it difficult for other parties to supervise the performance of bank governance (Brogi & Lagasio, 2022). In contrast, management control will be accessible when having a dominant shareholder, but it could be an opportunity for misconduct, fraud, or moral hazard to the management, which uses public funds for personal or group interests (Barakat & Hussainey, 2013; Hege et al., 2021).

According to Al-Yazidi et al. (2023), corporate governance is a process resulting from legal, regulatory, contractual, market-based mechanisms and best practices to create value for shareholders and other stakeholders.

Bothe (2019), Jamalnia et al. (2023) risk management refers to an organization's collection of rules and processes to effectively handle, monitor, and regulate potential hazards. Risks can be categorized into three main types: operational, financial, and information. Operational risk refers to the potential for adverse outcomes in an organization's day-to-day actions, which can hinder the achievement of targets within a specific timeframe (Losiewicz-Dniestrzanska, 2015; Sami et al., 2024). Financial risk can lead to the depletion of current financial resources and assets. Information risk is the potential for miscommunication and misunderstanding among individuals and organizations. Therefore, it is crucial to provide factual and precise information (Azizah, 2020).

Brink's modern internal auditing: A common body of knowledge. This study employs a research strategy that aims to elucidate the health status of rural banks by focusing on risk management. The study will specifically examine the role of risk monitors in this context (Marmen, 2022).

The research approach used in this study is to explain the health level of rural banks based on governance. The board of commissioners will describe governance variables and the role of internal audits. Previous research on governance, risk management, and compliance has been carried out by Tasman and Susanti (2020), Norimarna (2021), Ye et al. (2024), Marmen (2022), Nguyen and Dang (2022), Anatasy and Novita (2019), Hermawan and Novita (2021), and Pricillia (2021). This study diverges from previous research in terms of its research focus. While most prior studies have examined the financial performance of banks and companies, this research explicitly investigates rural banks' performance, an area that has received limited attention in previous research. The researcher studied rural banks due to their role as a minor economic catalyst, primarily serving clients with a moderate income. Rural banks specifically target micro, small, and medium enterprises (MSMEs).

## 2.2. Hypothesis development

### 2.2.1. The board of commissioners' role in the level of health of a bank

The board of commissioners is primarily responsible for overseeing all aspects of the board of directors' duties related to policy implementation. They are

also responsible for guiding the board of directors in implementing strategic policies in rural banks to ensure the company achieves its objectives through effective performance (Darwanto & Chariri, 2019).

Another study by Intia and Azizah (2021) a study revealed that an independent board of commissioners has a notable and favorable impact on the financial performance of Islamic banking in Indonesia. This indicates that the autonomous board of commissioners is crucial in enhancing the bank's financial performance. The presence of independent commissioners in banks can boost transparency, accountability, and internal control, ultimately leading to improved health and performance of the bank. Findings derived from (Zulfikar et al., 2020; Barakat & Hussainey, 2013; Nguyen & Dang, 2022; Battaglia & Gallo, 2015; Kingston & Wang, 2023) state that the board of commissioners affects the health of rural banks.

*H1: The involvement of the board of commissioners has an impact on the level of health of rural banks.*

### 2.2.2. The role of internal audit on the level of health of a bank

The internal audit function shall generally support the management in attaining its objectives by assessing the risk management process, internal control, and effective governance, and also providing recommendations to the various users of internal rural banks where they need guidance that ensures the achievement of company goals with good performance without any violations (Ahmad et al., 2009; Arum, 2015; Jamalnia et al., 2023). A study conducted by Jallali and Zoghalmi (2022) through their study results was that audit committee independence and financial knowledge relate to the operational performance of banks in the Kingdom of Saudi Arabia, and whether this relationship varies according to disclosure context. Results of the study show that the audit committee's effectiveness significantly affects company performance as measured by operational performance.

The results of the other study by Zulfikar et al. (2020) indicate that the audit committee's attributes significantly impacted the company's performance. Therefore, these discoveries enhance the robustness of research on the correlation between audit committee features and firm success. As previously studied, the results highlight the importance of the audit committee's role in the company's performance.

*H2: There is an influence of internal audit on the health level of rural banks.*

### 2.2.3. Effects of risk monitoring on the level of health of a bank

Risk monitors shall develop, concerning the characteristics, activities, and complexity of rural banks' business activities, a risk monitoring system and an accurate and informative reporting system on rural banks' financial condition, functional activity performance, and risk exposure. The purpose is to prevent potential risks in rural banks early so the company can take appropriate steps to minimize existing risks. Improving performance is the research conducted by Aziza and Aviola (2024), Intia and Azizah (2021).

Other studies were conducted by Aziza and Aviola (2024) and Chaniago and Widyantoro (2017). According to these studies, risk management has a significant influence on the health level of banks. If the concept of “risk management” indeed acts as one of the drivers of a healthy bank, it will be conducive for banks to realize, measure, and manage risks by reducing potential losses to their business and improving their business continuity. Banks can mitigate such risks by improving operational, credit, liquidity, and market risks related to the business by adopting good risk management practices (Achim et al., 2023).

*H3: Risk monitoring plays a significant role in determining the health level of rural banks.*

#### 2.2.4. The role of the compliance function on the bank's health level

The compliance function is a department primarily responsible for preventing violations and ensuring that all policies, terms, systems, procedures, and undertakings implemented by rural banks align with the current regulations, including OJK regulations and other laws. Additionally, it ensures the safety of bank operations by promoting fair and responsible practices that benefit the entire financial ecosystem and enhance rural banks' performance. A study conducted by Jallali and Zoghلامي (2022), Racz et al. (2010), and Utama and Musa (2011). The study's results stated that corporate governance practices improve performance, so these findings support the efforts by the central banks to implement the improvement of corporate governance practices in the banking sector.

More research was done by Bastomi et al. (2017), Shahim et al. (2012), and Tasman and Susanti (2020). The study's findings revealed that corporate governance significantly positively affected financial performance. These results indicate that good corporate governance (GCG), regarding firms' policies, processes, guidelines, and frameworks, is non-overlapping and non-confusing for entrepreneurs.

Hermawan and Novita (2021) reported that the study's results showed a moderate increase in the perception of quality, regulation, and importance of risk management and corporate governance in banking companies.

*H4: The compliance function significantly impacts the health level of rural banks.*

### 3. RESEARCH METHODOLOGY

This study is a verification investigation characterized by explanatory or causal research.

This study seeks to assess the magnitude of the association between two or more variables and determine the specific direction of the link between independent factors and dependent variables (Ghozali & Kusumadewi, 2023). However, this study prompts inquiries on causality. This study elucidates the extent of the impact that governance, risk management, and compliance variables have on the degree of health of rural banks.

The study focuses on administering 81 rural banks in *Daerah Khusus Ibukota* (DKI) Jakarta and Banten Province in 2022. The study has a total of 300 respondents. The author employed the non-probability sampling approach, explicitly using the purposive sampling technique. Based on Sekaran and Yon (2014), non-probability sampling is a means of selecting individuals for a study based on specific criteria or the availability of relevant information.

The research is supported by utilizing the data analysis technique known as partial least squares (PLS) (Hair et al., 2019). PLS analysis is a viable alternative to ordinary least squares (OLS) regression, as it relies on the covariance between the independent variable system and the response of structural equation modeling (SEM).

Alternative methods that can be used other than using SEM PLS are by using logistic data regression with EViews software applications or Stata, or can also conduct qualitative research.

## 4. RESULTS

### 4.1. Research result

The data processing technique used was the PLS method, version 4.0, with reflective indicators. The stages of structural model analysis are as follows:

#### 4.1.2. Analysis of measurement model (outer model)

The inner model analysis was performed to assess the dependability and accuracy of the data. The tests conducted on the external model using reflected indicators are as follows:

#### Validity test

Convergent validity. Convergent validity in the assessment model with reflecting indicators is evaluated by examining the correlation between item scores obtained using SmartPLS version 4.0. As said by Hair et al. (2019), a loading value between 0.5–0.6 in the outer model is deemed adequate to fulfill the criteria for convergent validity.

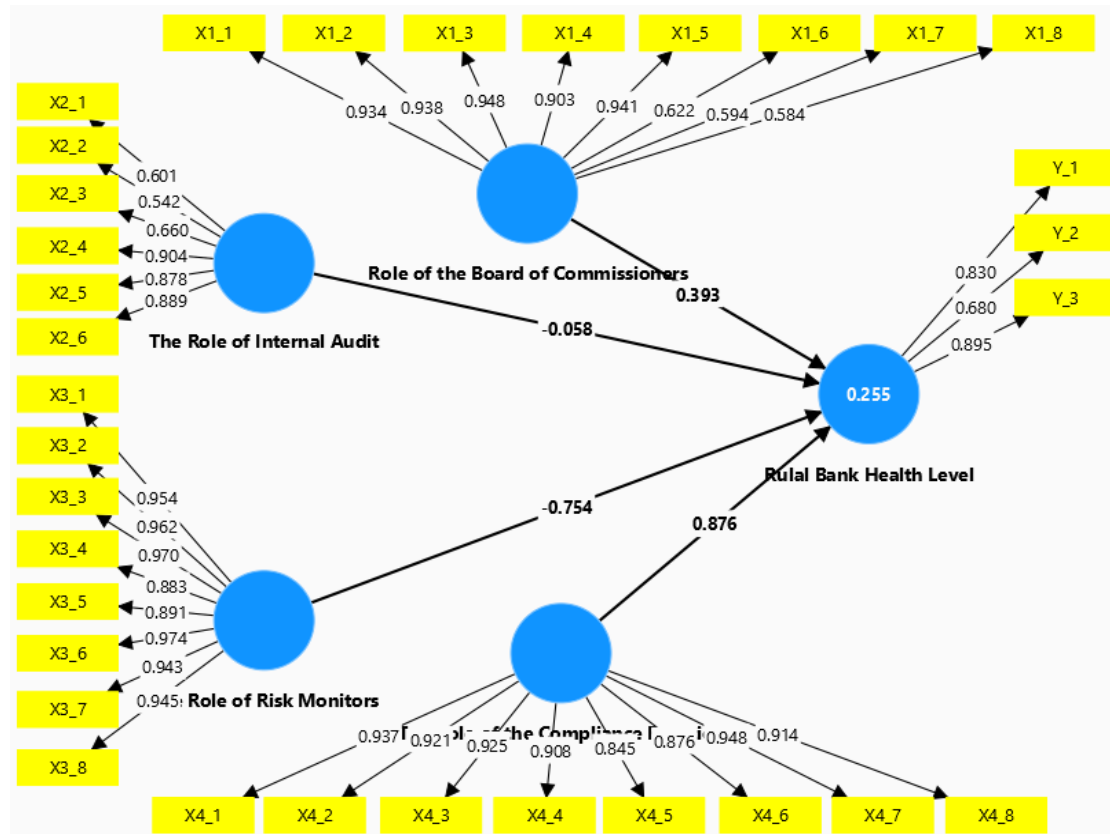
**Table 1.** Convergent validity test results (Part 1)

Construct	Indicator	Outer loadings	Critical points	Conclusion
X1	X1_1 ← role of the board of commissioners	0.968	0.5	Valid
	X1_2 ← role of the board of commissioners	0.958	0.5	Valid
	X1_3 ← role of the board of commissioners	0.969	0.5	Valid
	X1_4 ← role of the board of commissioners	0.948	0.5	Valid
	X1_5 ← role of the board of commissioners	0.969	0.5	Valid
	X1_6 ← role of the board of commissioners	0.634	0.5	Valid
	X1_7 ← role of the board of commissioners	0.624	0.5	Valid
	X1_8 ← role of the board of commissioners	0.636	0.5	Valid
X2	X2_1 ← the role of internal audit	0.529	0.5	Valid
	X2_2 ← the role of internal audit	0.553	0.5	Valid
	X2_3 ← the role of internal audit	0.616	0.5	Valid
	X2_4 ← the role of internal audit	0.921	0.5	Valid
	X2_5 ← the role of internal audit	0.915	0.5	Valid
	X2_6 ← the role of internal audit	0.922	0.5	Valid

**Table 1.** Convergent validity test results (Part 2)

Construct	Indicator	Outer loadings	Critical points	Conclusion
X3	X3_1 ← the role of risk monitors	0.964	0.5	Valid
	X3_2 ← the role of risk monitors	0.903	0.5	Valid
	X3_3 ← the role of risk monitors	0.975	0.5	Valid
	X3_4 ← the role of risk monitors	0.891	0.5	Valid
	X3_5 ← the role of risk monitors	0.923	0.5	Valid
	X3_6 ← the role of risk monitors	0.96	0.5	Valid
	X3_7 ← the role of risk monitors	0.953	0.5	Valid
	X3_8 ← the role of risk monitors	0.965	0.5	Valid
X4	X4_1 ← the role of the compliance function	0.946	0.5	Valid
	X4_2 ← the role of the compliance function	0.948	0.5	Valid
	X4_3 ← the role of the compliance function	0.944	0.5	Valid
	X4_4 ← the role of the compliance function	0.931	0.5	Valid
	X4_5 ← the role of the compliance function	0.866	0.5	Valid
	X4_6 ← the role of the compliance function	0.922	0.5	Valid
	X4_7 ← the role of the compliance function	0.953	0.5	Valid
	X4_8 ← the role of the compliance function	0.928	0.5	Valid
Y	Y_1 ← rural bank health level	0.795	0.5	Valid
	Y_2 ← rural bank health level	0.683	0.5	Valid
	Y_3 ← rural bank health level	0.83	0.5	Valid

Source: Authors' elaboration using SmartPLS 4.0.

**Figure 1.** Construction diagram

Source: Authors' elaboration using SmartPLS 4.0.

Upon retesting based on the data mentioned above, it is evident that none of the variable indicators have an outer loading value below 0.5. Therefore, all indicators are deemed viable and valid for research purposes and can be utilized for future investigations.

**Discriminant validity.** This section will describe the results obtained from the discriminant validity test. The discriminant validity test employs a cross-loading value. An indicator is considered to have discriminant validity if its cross-loading value on the variable is the highest among all the variables.

**Table 2.** Cross-loading value results

Construct	The role of internal audit	The role of the board of commissioners	The role of the compliance function	The role of risk monitors	Rural banks' health level
X1_1	0.828	0.768	0.752	0.739	0.367
X1_2	0.825	0.757	0.771	0.787	0.324
X1_3	0.83	0.769	0.771	0.778	0.321
X1_4	0.847	0.748	0.725	0.708	0.364
X1_5	0.842	0.769	0.775	0.788	0.353
X1_6	0.508	0.433	0.451	0.446	0.283
X1_7	0.463	0.325	0.416	0.401	0.28
X1_8	0.54	0.435	0.46	0.468	0.269
X2_1	0.527	0.437	0.485	0.496	0.295
X2_2	0.551	0.442	0.556	0.574	0.193
X2_3	0.618	0.48	0.543	0.52	0.254
X2_4	0.921	0.832	0.861	0.886	0.321
X2_5	0.916	0.789	0.737	0.718	0.231
X2_6	0.923	0.795	0.735	0.72	0.269
X3_1	0.839	0.771	0.934	0.964	0.361
X3_2	0.76	0.718	0.839	0.901	0.158
X3_3	0.821	0.762	0.929	0.974	0.303
X3_4	0.746	0.654	0.876	0.892	0.321
X3_5	0.853	0.705	0.901	0.923	0.253
X3_6	0.834	0.726	0.952	0.96	0.387
X3_7	0.851	0.742	0.91	0.953	0.32
X3_8	0.878	0.729	0.935	0.966	0.307
X4_1	0.834	0.724	0.946	0.97	0.289
X4_2	0.874	0.715	0.948	0.942	0.434
X4_3	0.891	0.736	0.943	0.954	0.342
X4_4	0.814	0.745	0.931	0.922	0.435
X4_5	0.84	0.788	0.865	0.788	0.422
X4_6	0.693	0.59	0.923	0.878	0.387
X4_7	0.799	0.709	0.953	0.884	0.37
X4_8	0.763	0.725	0.928	0.86	0.385
Y_1	0.23	0.274	0.361	0.223	0.88
Y_2	0.418	0.373	0.352	0.364	0.7
Y_3	0.245	0.305	0.302	0.259	0.835

Source: Authors' elaboration using SmartPLS 4.0.

According to the results obtained, it can be concluded that the indicators utilized in this study demonstrate discriminant solid validity in measuring their respective variables.

#### Composite reliability

A variable can possess composite reliability if its composite reliability value exceeds 0.6. The subsequent values represent the composite reliability of each variable utilized in this study:

**Table 3.** Results of composite reliability values

	Composite reliability (rho_a)	Composite reliability (rho_c)	Critical points	Results
The role of internal audit	0.868	0.888	0.6	Reliable
Role of the board of commissioners	0.964	0.954	0.6	Reliable
The role of the compliance function	0.980	0.981	0.6	Reliable
The role of risk monitors	0.989	0.984	0.6	Reliable
Rural banks' health level	0.807	0.849	0.6	Reliable

Source: Authors' elaboration using SmartPLS 4.0.

These results indicate that each variable has achieved the composite reality, concluding that the overall variable exhibits high realism.

#### 4.2. Uji inner model

The test of this model was taken to see the values of  $R^2$ ,  $Q^2$ , goodness of fit (GoF), and the influence test between variables.

##### 4.2.1. R-square analysis

This analysis is to determine the percentage of endogenous construct variability that may be explained by exogenous construct variability.

**Table 4.** R-squared value results

	$R^2$	$R^2$ adjusted
Rural banks' health level	0.430	0.417

Source: Authors' elaboration using SmartPLS 4.0.

The adjusted  $R^2$  value for the rural bank's health level variable is 0.417. The adjusted  $R^2$  value indicates that 41.7% of the rural bank's health level construct variability can be accounted for by the variability in the internal audit role, the role of the board of commissioners, the compliance function role, and the risk monitoring role. The remaining variability is attributed to other variables not included in the study. Based on Ghazali and Latan (2015), the  $R^2$  values of 0.67, 0.33, and 0.19 indicate that the model is robust, moderate, and weak, respectively. Based on this, it may be concluded that the impact is mild.

##### 4.2.2. Predictive relevance ( $Q^2$ )

The subsequent stage in evaluating the structural model involves the utilization of predictive relevance ( $Q^2$ ). The predictive relevance ( $Q^2$ ) values for the model indicate its strength. The values are 0.35 for a robust model, 0.15 for a moderate model, and 0.02 for a weak model (Ghozali & Latan, 2015).

**Table 5.** Q-square value results

	<i>SSO</i>	<i>SSE</i>	<i>Q<sup>2</sup> (= 1-SSE / SSO)</i>
The role of internal audit	780.000	443.230	0.432
Role of the board of commissioners	1040.000	422.005	0.594
The role of the compliance function	1040.000	234.275	0.775
The role of risk monitors	1040.000	159.381	0.847
Rural banks' health level	390.000	272.032	0.302

Source: Authors' elaboration using SmartPLS 4.0.

The test findings indicate that the  $Q^2$  value for the rural bank's health level is 0.302. Since  $Q^2 = 0.302 > 0$ , it can be inferred that the role of internal audit, board of commissioners, compliance function, and risk monitor has predictive relevance for a rural bank's health level. Based on the fact that  $Q^2 = 0.302$ , which exceeds 0.15, it may be inferred that the prediction accuracy is moderate.

#### 4.2.3. Effect size ( $f^2$ )

If the value of  $f^2$  is 0.02, it indicates a minor effect. A value of 0.15 suggests a medium effect, while 0.35 indicates a strong influence of the exogenous latent variable (Ghozali & Latan, 2015). The output is as follows.

**Table 6.** Results of the f-squared value

	<i>The role of internal audit</i>	<i>Role of the board of commissioners</i>	<i>The role of the compliance function</i>	<i>The role of risk monitors</i>	<i>Rural banks' health level</i>
<i>The role of internal audit</i>	0.044				0.044
<i>Role of the board of commissioners</i>	0.012				0.127
<i>The role of the compliance function</i>	0.095				0.095
<i>The role of risk monitors</i>	0.007				0.076
<i>Rural banks' health level</i>					

Source: Authors' elaboration using SmartPLS 4.0.

Based on the output above, the following information may be deduced: 1) the coefficient of the board of commissioners' role on the health level of rural banks f square is 0.12, which is greater than 0.02, indicating a small effect. The internal audit role variable on the rural banks' health level, with an f-square value of 0.044 is determined to have a significant impact as it is above the threshold of 0.35. The compliance function variable significantly impacts rural banks' health level, with a squared correlation coefficient of 0.095 above the threshold of 0.02. However, the impacts observed are minimal.

#### 4.2.4. Goodness of fit

The last stage in assessing the internal model involves examining the GoF metric. GoF is a metric

used to assess a model's overall level of suitability. The GoF value is calculated by taking the square root of the average communalities index and multiplying it by the average value of the  $R^2$  model. The GoF value ranges from 0 to 1, and its interpretation is separated into three categories: a value of 0.1 is considered minor, 0.25 is considered moderate, and 0.36 is considered high. MS Excel calculates the GoF test. A result of 0.267 was obtained, so the GoF was moderate.

#### 4.3. Hypothesis testing

The criterion for accepting or rejecting the presented hypothesis is to utilize a significance level of 0.05.

**Table 7.** Hypothesis test based on the path coefficient

	<i>Hypothesis</i>	<i>Std. value coefficient</i>	<i>t-statistics</i>	<i>p-values</i>	<i>Information</i>
<i>H1</i>	The role of the board of commissioners → rural banks' health level	0.309	2.039	0.042	Hypothesis accepted
<i>H2</i>	The role of internal audit → rural banks' health level	-0.236	1.187	0.235	Hypothesis rejected
<i>H3</i>	The role of the compliance function → rural banks' health level	1.167	3.581	0.000	Hypothesis accepted
<i>H4</i>	The role of risk monitoring → rural banks' health level	-1.030	3.304	0.001	Hypothesis accepted

Source: Authors' elaboration using SmartPLS 4.0.

Based on the results of the hypothesis test with the SmartPLS tool, the following results were obtained:

1. The board of commissioners' role influences rural banks' health level. This is evidenced by the t-value calculated  $> t$  table ( $2.039 > 1.96$ ) or p-values  $< 0.05$  ( $0.042 < 0.05$ ) so that  $H_0$  is rejected and  $H1$  is accepted.

2. The role of internal audit does not influence the health level of rural banks. This is evidenced by the t-value of the t calculation  $< t$ -table ( $1.187 < 1.96$ ) or p-values  $< 0.05$  ( $0.235 > 0.05$ ), so that  $H_0$  is accepted and  $H2$  is rejected.

3. The role of the compliance function influences the health level of rural banks. This is evidenced by the t-value of the t calculation  $> t$ -table ( $3.581 > 1.96$ ) or p-values  $< 0.05$  ( $0.000 < 0.05$ ), so that  $H_0$  is rejected and  $H3$  is accepted.

4. Risk monitoring influences the health level of rural banks. This is evidenced by the t-value calculated  $> t$ -table ( $3.304 > 1.96$ ) or p-values  $< 0.05$  ( $0.001 < 0.05$ ), so that  $H_0$  is rejected and  $H4$  is accepted.

## 5. DISCUSSION

### 5.1. The influence of the role of the board of commissioners on the health level of rural banks

The research findings indicate a correlation between the board of commissioners' role and rural banks' health level. The data processing findings indicate that the computed *t* values are more significant than the *t* table value ( $2.039 > 1.96$ ). The derived *p*-values are also less than 0.05 ( $0.042 < 0.05$ ). As a result, *H1* is accepted. The impact of the positive factor is directly correlated with the coefficient value, implying that an increase in the role of the board of commissioners will increase the health level of rural banks. This demonstrates that *H1* has been substantiated and can be officially acknowledged as a validated hypothesis.

The commissioner, acting as a representative shareholder, assumes a crucial role and carries significant obligations, particularly with the management of rural banks, to foster the organization's growth and well-being. As a supervisor, the commissioner is responsible for closely monitoring and overseeing the operation of rural banks to prevent any conflicts of interest that may arise between the director and shareholders or other associated parties. Therefore, it can be asserted that the integration of GCG in rural banks is closely linked to the supervisory role performed by the commissioner.

Thus, the study's results proved that the board of commissioners positively and significantly affects the health level of rural banks. The results of this study are in line with the results of research conducted by Intia and Azizah (2021), Zulfikar et al. (2020), Al-Kubaisi and Khalaf (2023), and Hermawan and Novita (2021) state that the board of commissioners has an influence and significance on the financial performance of banking.

### 5.2. The influence of the role of internal audit on the health level of rural banks

Based on the data processing results from the research, it is known that there is no influence on the role of internal audits on health levels. The results of data processing of *t*-values calculated  $< t$  table ( $1.187 < 1.96$ ) in other results obtained *p*-values  $> 0.05$  ( $0.235 < 0.05$ ), then *H2* was rejected. This shows that *H2* is not proven and can be stated as a rejected hypothesis.

This study shows that the effectiveness of internal audits does not solely depend on their existence but on specific factors that affect their operational capabilities. These factors can include the quality of the internal audit team, the independence of the internal audit function, and the level of support and resources the organization provides.

In the context of rural banks, where resources and expertise may be more limited, the ability of the internal audit function to effectively monitor and address risks may be further limited. As a result, the impact of internal audits on rural banks' health and overall financial performance can be reduced.

The results of testing the hypothesis of this research are in line with the results of research conducted by Ardina and Novita (2023), Rahayuningsih et al. (2024), Flayyih et al. (2024), Nguyen et al. (2024), and Pricillia (2021), which states that internal audit has no effect on financial

performance because the audit committee is responsible for its profession, so financial performance can be adequately supervised, and thus, performance in the company will also increase.

### 5.3. The effect of the role of risk monitoring on the health level of rural banks

The research findings indicate that risk monitoring significantly impacts the health level of rural banks. The data processing findings indicate that the computed *t*-values are more significant than the *t*-table value ( $3.304 > 1.96$ ). The derived *p*-values are also less than 0.05 ( $0.001 < 0.05$ ). As a result, *H3* is accepted. The positive impact is directly correlated with the coefficient value, assuming a rise in the risk monitor will likewise increase the rural bank's health level. This demonstrates that *H3* has been substantiated and can be deemed an accepted theory.

Risk monitors are primarily accountable for overseeing risks by creating a management information system customized to match the specific traits, operations, and intricacy of rural banks' business activities. They are also responsible for establishing a precise and informative reporting system that details the rural bank's financial status, functional performance, and risk exposure. The objective is to proactively mitigate any risks in rural banks and implement measures to reduce existing risks and enhance rural banks' performance.

According to research conducted by Anatasya and Novita (2019), the risks faced by financial institutions such as rural banks are not low-level, but the risks faced by rural banks are pretty high. Fierce business competition and rural banks must continue to maintain liquidity and manage other risks properly for the sake of creating healthy corporate conditions.

This research is in line with research by Tasman and Susanti (2020), Sugiyanto and Rahayu (2019), Papazafeiropoulou and Spanaki (2016), Mahmoud et al. (2024), and Eyalsalman et al. (2024), which state that risk management affects rural banks.

### 5.4. The Influence of the role of compliance function on the health level of rural banks

The research findings indicate that the compliance function significantly impacts the health level of rural banks. The data processing findings indicate that the estimated *t*-values (3.581) are more significant than the critical value from the *t*-table (1.96). Additionally, the generated *p*-values (0.000) are less than the significance level of 0.05. Therefore, *H4* is accepted. The magnitude of the positive impact is directly correlated with the coefficient value under the assumption that an increase in the compliance function will result in a corresponding increase in the health level of rural banks. This demonstrates that *H4* has been substantiated and can be deemed an accepted theory.

Adhering to legislation and best practices can significantly affect the general well-being and effectiveness of rural banks in Indonesia. Complying with regulatory norms can provide significant benefits to these financial firms. Firstly, it can enhance financial stability by ensuring companies successfully mitigate risk and maintain robust internal controls. Consequently, this can foster increased confidence among clients and stakeholders in the security and dependability of banking



services. In addition, adhering to regulations helps safeguard rural banks from possible legal and regulatory sanctions, which may harm their financial standing and operational sustainability.

Following previous research conducted by Sari and Lestari (2022), the study analyzed the impact of risk-based bank rating (RBBR) and Sharia compliance on Bubalus Resources' (BUS's) financial performance. The findings indicate that Sharia compliance, as measured by the profit-sharing ratio, has a detrimental effect on financial performance. The unfavorable link between profit-sharing-based financing and financial performance is attributed to banks' vigilance when providing credit based on profit-sharing. This is also supported by the opinions of Riyadh et al. (2020), Azizah (2020), Vicente and Mira da Silva (2011), Brogi and Lagasio (2022), Jones et al. (2021), Ghimire et al. (2024), and Handoko et al. (2020).

## 6. CONCLUSION

In this respect, the paper will investigate the role of governance, risk management, and compliance in the soundness of rural banks. This study will give heuristic justification due to limited empirical investigations regarding governance, risk management, and compliance influence on rural banks' health. This research is important because it will go a long way in bringing out how effective the governance, risk management, and compliance practices in the rural banking sector are, which is essential for policymakers and regulators to come up with suitable regulations and supervisory frameworks for promoting the overall soundness and resilience of the rural banking system.

The empirical findings confirm that the board of commissioners, risk monitors, and compliance functions have a significant and positive effect on

the health level of rural banks, while internal audits do not affect the rural banks' health level. Further research on the board of commissioners, internal audit, risk monitoring, and compliance functions, and their contribution to the management and accountability of rural banks and financial institutions is urgently required. This can contribute to the effectiveness of governance, risk management, and compliance practices in enhancing rural banking sectors. This research is expected to be material for decision-making to improve the condition of rural banks in Indonesia today.

This research has several limitations that need to be considered. First, the scope of the research is geographically limited only to People's Credit Banks (BPR) operating in the Special Capital Region (DKI) area of Jakarta and Banten Province. Therefore, the results of this study may not be fully generalized to BPRs in other regions of Indonesia that have different characteristics. Second, this study uses a quantitative approach with survey methods and data analysis using partial least squares (PLS). While this method is powerful for testing relationships between latent variables, it is limited in providing an in-depth understanding of the context and processes behind the findings. Additional qualitative research can provide richer insights. Third, this study only covers 2022, so it may not capture the dynamics of changes in governance, risk management, and compliance (GRC) practices and their impact on the health of banks over a longer period of time. Finally, although the study found that the internal audit function had no significant effect on the health of BPR banks, limitations may stem from the specification of the indicators or the size of the variables used, which may not fully capture the complexity of the role of internal audit in the context of BPR.

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