

Impact of Non-Performing Assets on Financial Stability: Evidence from the Indian Banking Sector

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Peer Review Information	Abstract
<p>Type: Article Received: 26 March 2026 Revised: 23 April 2026 Accepted: 09 May 2026 Published: 01 June 2026</p>	<p>The stability of a nation's financial system largely depends on the soundness of its financial services sector. In India, the continued prevalence of Non-Performing Assets (NPAs) has posed significant challenges to economic growth and financial resilience. This study evaluates the impact of NPAs on the stability of the financial system in India's banking sector from 2014 to 2024. Using secondary data sourced from the Reserve Bank of India (RBI), Ministry of Finance, and annual reports of leading banks, the research employs descriptive statistics, correlation, and regression analysis. Crucial financial metrics, including Return on Assets (ROA), Regulatory capital Ratio (CAR), and Credit Growth are analyzed to evaluate the systemic implications of NPAs. The findings reveal a clear inverse association between NPAs and profitability, capital adequacy, and credit expansion. The research also highlights the positive role of policy interventions such as the Insolvency and Bankruptcy Code (IBC) and the SARFAESI Act in strengthening asset soundness and improving loan recovery frameworks. The research concludes that robust NPA management practices essential for ensuring long-term financial stability and sustained economic prosperity in India.</p> <p>Keywords: Non-Performing Assets; Financial Stability; Indian Banking Sector; Credit Risk; ROA; CAR; Insolvency and Bankruptcy Code; RBI.</p>

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Introduction

Background of the Study

The banking industry acts as a foundation of economic growth through its functions of financial intermediation, savings mobilization, and effective capital distribution. However, the stability and efficiency of banks depend significantly on the quality of their loan portfolios. When borrowers fail to repay principal or interest within the stipulated period, such loans are classified as Non- Performing Assets (NPAs). According to the Reserve Bank of India, a loan is categorized as an NPA when payments remain overdue for more than 90 days.

The rising level of NPAs has been one of the most critical challenges confronting the Indian banking sector, particularly since the early 2010s. Excessive lending to infrastructure, power, and real estate sectors, coupled with economic slowdowns and governance issues, contributed to a surge in bad loans. These developments have adversely affected profitability, liquidity, and credit expansion.

Problem Statement

Despite regulatory reforms and recovery mechanisms, NPAs continue to threaten the stability and efficiency of Indian banks. This study seeks to examine the extent to which NPAs influence key financial stability indicators.

Research Question

How do Non-Performing Assets affect the solvency and stability of the Indian banking sector?

Objectives of the Study

- To study the pattern over time of NPAs in India from 2014 to 2024.
- To understand the interaction between NPAs and capital market stability indicators such as ROA, CAR, and Credit Growth.
- To review the efficiency of regulatory reforms in managing NPAs.
- To suggest measures for strengthening financial stability.

Hypotheses

- H₁: NPAs have led to a notable decline in bank profitability (ROA).
- H₂: NPAs adversely affect the Regulatory Capital Ratio (CAR).
- H₃: NPAs negatively influence credit growth.
- H₄: Policy reforms have improved asset quality and financial stability.

Significance of the Study

This research provides valuable insights for policymakers, banking professionals, investors, and academicians by linking asset quality with systemic financial stability.

Literature Review

A comprehensive review of existing literature establishes the theoretical and empirical foundation of the study.

Ranjan and Dhal [10] Demonstrated that major economic variables, such as GDP growth and the inflation rate significantly influence NPAs. Beck et al. [1] concluded that high NPAs weaken financial stability across countries. Klein (2013) [6] highlighted that economic downturns contribute to rising bad loans.

In the Indian scenario, Bhatia (2018) [3] emphasized the effectiveness of The National Insolvency and Bankruptcy Legislation in improving recovery rates. Das and Ghosh (2007) [4] identified inefficiencies in credit appraisal as a key determinant of NPAs. Kaur and Singh (2019) [5] demonstrated that rising NPAs reduce profitability and capital adequacy.

Mishkin (2015) [8] argued that financial stability is vital for long-term economic growth. Similarly, Sengupta and Vardhan (2019) [11] examined structural issues in India's banking system, highlighting the "twin balance sheet problem" involving stressed banks and indebted corporates.

Research Gap

A large proportion of research addresses the causes and determinants of NPAs, while limited research examines their direct impact on financial stability using empirical analysis. This study attempts to bridge this gap by linking NPAs with profitability, solvency, and credit growth.

Research Methodology

Research Design

The present study applies a quantitative and descriptive research design using secondary data. This approach aligns with IMCC guidelines for finance-based research.

Data Sources

- Reserve Bank of India (RBI) Reports
- Ministry of Finance Publications
- Economic Survey of India
- Annual Reports of SBI, HDFC Bank, ICICI Bank, and PNB
- CMIE Prowess and Statista

Period of Study

2014–2024

Variables

Table 1. Variables Used in the Study and Their Measurement

Type	Variable	Measurement
Independent	NPA Ratio	Gross NPAs as % of Advances
Dependent	ROA	Net Profit / Total Assets
Dependent	CAR	Capital to Risk-Weighted Assets Ratio
Dependent	Credit Growth	Annual Growth in Bank Credit

Analytical Tools

- Descriptive Statistics
- Correlation Analysis
- Regression Analysis
- Trend Analysis

Conceptual Framework

NPAs → Earnings performance, capital sufficiency, and loan expansion → Financial Stability

Results and Discussion

Trend Analysis (2014–2024)

The Gross NPA ratio increased significantly between 2014 and 2018, followed by a gradual decline due to regulatory reforms and improved recovery mechanisms.

Table 2. Trend Analysis of NPA and Financial Stability Indicators (2014–2024)

Year	NPA (%)	ROA (%)	CAR (%)	Credit Growth (%)
2014	3.5	1.02	12.5	14.0
2018	7.7	0.42	11.2	9.6
2024	3.9	1.24	16.0	15.6

*Descriptive Statistics**Table 3. Descriptive Statistics of Key Financial Indicators*

Indicator	Mean	Std. Dev.
NPA Ratio	5.45	1.39
ROA	0.87	0.26
CAR	13.05	1.67
Credit Growth	10.21	3.35

*Correlation Analysis**Table 4. Correlation Analysis Between NPA Ratio and Financial Stability Indicators*

Variables	NPA	ROA	CAR	Credit Growth
NPA Ratio	1.00	-0.898	-0.688	-0.504

Interpretation

- NPAs exhibit a strong negative association with ROA.
- Moderate negative relationship with CAR and Credit Growth.
- Rising NPAs weaken banking stability.

Discussion of Findings

- Higher NPAs significantly reduce profitability due to provisioning requirements.
- Capital adequacy declines as banks absorb credit losses.
- Credit growth contracts when banks adopt cautious lending policies.
- Reforms such as IBC and SARFAESI have improved recovery and asset quality. All hypotheses (H₁–H₄) are supported by empirical evidence.

Conclusion and Recommendations*Conclusion*

The study establishes that NPAs are a critical determinant of financial stability in India's banking sector. Rising NPAs adversely affect profitability, solvency, and lending capacity. However, regulatory reforms and improved governance have strengthened the resilience of the financial system. Effective NPA management remains essential for sustainable economic growth.

Recommendations

1. Strengthen Credit Appraisal Systems using AI-driven risk assessment tools.
2. Enhance the Effectiveness of IBC by reducing resolution timelines.
3. Improve Monitoring Mechanisms through early warning systems.
4. Increase Capital Buffers to absorb financial shocks.
5. Promote Transparency and Disclosure to enhance investor confidence.
6. Adopt Advanced Analytics and FinTech Solutions for credit risk management.
7. Diversify Loan Portfolios to reduce sectoral concentration risks.

Scope for Future Research

- Comparative studies across emerging economies
- Integration of primary data through surveys and interviews.
- Application of machine learning techniques to predict NPAs.
- Development of a composite Financial Stability Index.

References

1. Beck, R., Jakubik, P., & Piloju, A. (2015). Determinants of non-performing loans. *Open Economies Review*, 26(3), 525–550.
2. Bernanke, B., & Gertler, M. (1989). Agency costs and business fluctuations. *American Economic Review*, 79(1), 14–31.
3. Bhatia, A. (2018). The insolvency code and the changing NPA landscape in India. *Economic & Political Weekly*, 53(42), 23–29.
4. Das, A., & Ghosh, S. (2007). Determinants of credit risk. *Economic & Political Weekly*, 42(41), 4069–4078.
5. Kaur, P., & Singh, H. (2019). Impact of NPAs on financial performance. *International Journal of Banking and Finance*, 13(1), 1–10.
6. Klein, N. (2013). Non-performing loans in CESEE. *IMF Working Paper*.
7. Louzis, D. P., Vouldis, A. T., & Metaxas, V. L. (2012). Determinants of NPLs. *Journal of Banking & Finance*, 36(4), 1012–1027.
8. Mishkin, F. S. (2015). *The Economics of Money, Banking and Financial Markets*. Pearson.
9. Nkusu, M. (2011). Non-performing loans and macro-financial vulnerabilities. *IMF Working Paper*.
10. Ranjan, R., & Dhal, S. C. (2003). Non-performing loans in India. *RBI Occasional Papers*, 24(3), 81–121.
11. Sengupta, R., & Vardhan, H. (2019). The twin balance sheet problem. *NIPFP Working Paper*.