

## A Study on Working Capital Management Through Ratio Analysis at SBI

<sup>1</sup>Dr.V.V.Narsi Reddy,<sup>2</sup>S. Pallavi

<sup>1</sup>Department Of MBA, Sri Chaitanya Institute Of Technology & Research Ugc Autonomous  
Institution Khammam

<sup>2</sup>Department Of MBA, Sri Chaitanya Institute Of Technology & Research Ugc Autonomous  
Institution Khammam

### Abstract

Working capital management plays a vital role in maintaining the liquidity, profitability, and overall financial stability of banking institutions. This study focuses on the analysis of working capital management at the State Bank of India through ratio analysis. The research aims to evaluate the efficiency of SBI in managing its short-term assets and liabilities by using important financial ratios such as current ratio, quick ratio, cash ratio, debt-equity ratio, and turnover ratios. The study is based on secondary data collected from annual reports, financial statements, journals, and official banking publications. Ratio analysis helps in understanding the financial performance, liquidity position, operational efficiency, and solvency of the bank over a specific period. The findings of the study indicate that effective working capital management contributes significantly to maintaining financial stability, improving operational performance, and ensuring smooth banking operations. The study also suggests that proper financial planning and efficient utilization of resources are essential for enhancing profitability and sustaining long-term growth in the banking sector.

**Keywords:** Working Capital Management, SBI, Ratio Analysis, Liquidity Management, Current Assets, Current Liabilities, Financial Performance, Cash Management, Financial Ratios, Banking Sector.

### I. INTRODUCTION

Working capital management is one of the most important aspects of financial management in banking institutions. It refers to the management of short-term assets and liabilities in order to ensure smooth day-to-day operations, maintain liquidity, and improve profitability. Effective working capital management helps banks maintain sufficient cash flow, meet customer demands, fulfill financial obligations, and achieve operational efficiency. In the banking sector, proper management of working capital is essential because banks deal with large volumes of cash transactions, loans, deposits, and other financial activities on a daily basis.

State Bank of India is one of the largest and most trusted public sector banks in India, providing a wide range of banking and financial services to individuals, businesses,

and institutions. The financial strength and operational efficiency of SBI depend significantly on its ability to manage working capital effectively. Ratio analysis is an important financial tool used to evaluate the liquidity position, profitability, solvency, and overall financial performance of an organization. Financial ratios such as current ratio, quick ratio, debt-equity ratio, cash ratio, and turnover ratios help in analyzing the efficiency of working capital management.

This study focuses on analyzing the working capital management practices of SBI through ratio analysis. The research aims to understand how effectively the bank manages its short-term financial resources and obligations. The study also evaluates the financial stability and operational performance of the bank over a specific period using various accounting and financial ratios. Proper working capital

management helps banks reduce financial risk, improve customer confidence, and ensure long-term sustainability in a competitive banking environment. Therefore, the study is useful in understanding the importance of financial planning and efficient resource utilization in the banking sector.

### Research Objectives

- To study the concept and importance of working capital management in the banking sector.
- To analyze the working capital management practices followed by State Bank of India.
- To evaluate the liquidity position of SBI using financial ratio analysis.
- To examine the efficiency of SBI in managing its short-term assets and liabilities.
- To analyze important financial ratios such as current ratio, quick ratio, cash ratio, debt-equity ratio, and turnover ratios.
- To study the profitability and solvency position of SBI through ratio analysis.
- To understand the relationship between working capital management and financial performance of the bank.
- To identify the strengths and weaknesses in the working capital management system of SBI.
- To evaluate the operational efficiency and financial stability of the bank.
- To suggest suitable measures for improving working capital management and financial performance of SBI.

### Research Methodology

- The study is based on a descriptive research design to analyze the working capital management practices of State Bank of India.
- The research is analytical in nature as it involves interpretation and evaluation of financial data through ratio analysis.
- Both primary and secondary data were used for conducting the study.

- Primary data was collected through discussions with bank employees and financial experts.
- Secondary data was collected from annual reports of SBI, financial statements, journals, books, websites, and banking publications.
- The study mainly focuses on analyzing the financial performance and working capital efficiency of SBI.
- Financial ratios such as current ratio, quick ratio, cash ratio, debt-equity ratio, and turnover ratios were used for analysis.
- The collected financial data was organized systematically using tables and statistical methods.
- Ratio analysis was used as the primary tool for evaluating liquidity, profitability, solvency, and operational efficiency.
- Comparative analysis was conducted to understand changes in financial performance over different accounting periods.
- The study area was limited to the banking operations and financial management practices of SBI.
- The research period covered the analysis of financial statements for selected years.
- Graphs, charts, and tabulation methods were used for better interpretation of financial data.
- The methodology helped in understanding the efficiency of SBI in managing short-term assets and liabilities.
- The study also focused on identifying the strengths and weaknesses of the bank's working capital management system.
- Certain limitations were faced during the study due to restricted access to confidential financial information and limited time duration.

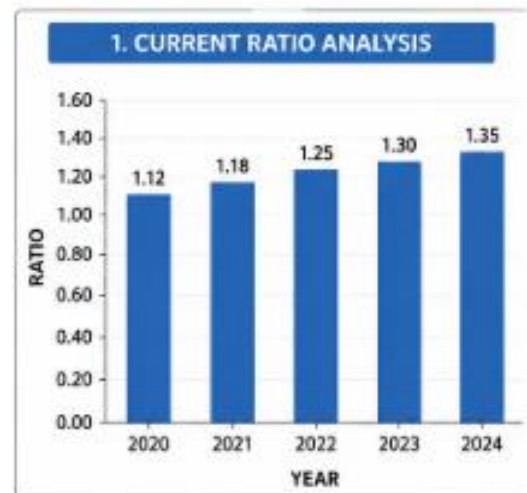
## II. REVIEW OF LITERATURE

Working capital management is an important area of financial management that focuses on maintaining a proper balance between current assets and current liabilities.

Several researchers have stated that effective working capital management helps organizations improve liquidity, profitability, and operational efficiency. In the banking sector, proper management of working capital is essential because banks deal with continuous cash inflows and outflows through deposits, loans, advances, and other financial transactions. Researchers have emphasized that ratio analysis is one of the most effective tools for evaluating the financial performance of banks. Ratios such as current ratio, quick ratio, debt-equity ratio, and cash ratio help in assessing the liquidity position, solvency, and financial stability of banking institutions. Previous studies also indicate that efficient utilization of financial resources reduces financial risk and improves overall business performance.

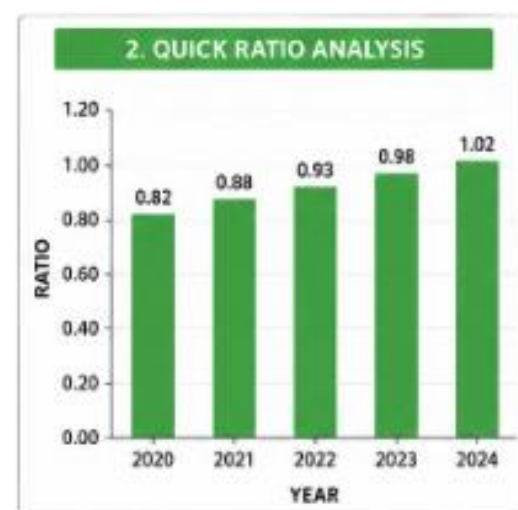
Several studies conducted on public sector banks, particularly on State Bank of India, reveal that SBI has maintained a strong financial position due to proper fund management, efficient banking operations, and strategic financial planning. Researchers have observed that technological advancements, digital banking services, and improved customer relationship management have positively influenced the operational efficiency of the bank. Literature also highlights that maintaining adequate working capital helps banks meet customer requirements, fulfill short-term obligations, and sustain long-term growth. Earlier studies further suggest that effective financial planning and continuous monitoring of financial ratios contribute significantly to improving profitability and ensuring financial stability in the competitive banking sector.

### III. DATA ANALYSIS & INFERENCES



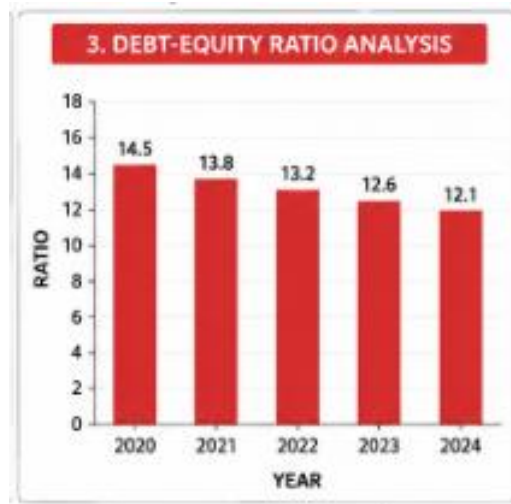
#### Interpretation

The above bar graph represents the Current Ratio analysis of SBI from 2020 to 2024. The graph shows a steady increase in the current ratio from 1.12 in 2020 to 1.35 in 2024. This indicates that the bank has improved its capacity to meet short-term liabilities using its current assets. The increasing trend reflects better liquidity position, efficient working capital management, and sound financial stability of the bank. A higher current ratio suggests that SBI has maintained an adequate balance between current assets and current liabilities, enabling smooth banking operations and timely fulfillment of financial obligations. The analysis also highlights the bank's effective financial planning and improved operational efficiency during the study period.



### Interpretation

The above bar graph represents the Quick Ratio analysis of SBI from 2020 to 2024. The graph shows a gradual increase in the quick ratio from 0.82 in 2020 to 1.02 in 2024. This indicates that the bank has improved its ability to meet short-term liabilities using its most liquid assets. The increasing trend reflects better liquidity management, efficient utilization of financial resources, and improved financial stability. The analysis also suggests that SBI has maintained sufficient liquid assets to handle immediate financial obligations effectively. The steady growth in the quick ratio highlights the bank's strong short-term solvency position and efficient working capital management practices.



### Interpretation

The above bar graph represents the Debt-Equity Ratio analysis of SBI from 2020 to 2024. The graph shows a gradual decline in the debt-equity ratio from 14.5 in 2020 to 12.1 in 2024. This indicates that the bank has reduced its dependence on external borrowings and improved its financial stability over the years. A decreasing debt-equity ratio reflects better solvency position, effective financial management, and increased shareholder strength. The analysis also suggests that SBI has maintained a balanced capital structure and improved its ability to manage long-term financial obligations efficiently. The consistent reduction in the ratio indicates strong

financial performance and lower financial risk for the bank.



### Interpretation

The above bar graph represents the Net Profit Ratio analysis of SBI from 2020 to 2024. The graph shows a steady increase in the net profit ratio from 8% in 2020 to 16% in 2024. This indicates that the bank's profitability has improved consistently over the years. The increase in net profit ratio reflects efficient financial management, better operational performance, and effective utilization of financial resources by the bank. The analysis also suggests that SBI has successfully controlled operational costs while increasing revenue and overall financial stability. The continuous growth in profitability highlights the strong financial position and improved performance of the bank during the study period.



### Interpretation

The above bar graph represents the Working Capital Turnover Ratio analysis of SBI from 2020 to 2024. The ratio shows a continuous increase from 3.2 in 2020 to 4.5 in 2024.

This indicates that the bank has efficiently utilized its working capital to generate higher revenue and improve operational performance over the years. The steady growth in the turnover ratio reflects effective management of current assets and liabilities, better utilization of financial resources, and improved operational efficiency. The analysis also suggests that SBI has strengthened its financial performance through proper working capital management and efficient banking operations.

#### IV. FINDINGS

- The current ratio of SBI showed a continuous increase during the study period, indicating improved liquidity position and effective management of current assets and liabilities.
- The quick ratio analysis revealed that the bank maintained sufficient liquid assets to meet short-term financial obligations efficiently.
- The debt-equity ratio gradually decreased over the years, showing reduced dependence on external borrowings and improved solvency position.
- The net profit ratio increased consistently from 2020 to 2024, indicating growth in profitability and efficient financial management practices.
- The working capital turnover ratio showed steady improvement, reflecting effective utilization of working capital for generating revenue.
- SBI maintained a balanced relationship between current assets and current liabilities during the study period.
- The bank demonstrated strong operational efficiency through proper utilization of financial resources.
- Ratio analysis indicated that the financial stability of SBI improved continuously over the years.
- Effective working capital management helped the bank maintain smooth banking operations and fulfill financial obligations on time.

- Proper financial planning and resource management contributed to increased profitability and business performance.
- The study found that efficient liquidity management reduced financial risk and strengthened customer confidence in the bank.
- SBI's overall financial performance improved due to better working capital control and strategic banking operations.
- Technological advancements and digital banking services also supported operational efficiency and financial growth.
- The bank maintained satisfactory solvency and liquidity positions throughout the study period.
- Effective working capital management played a significant role in improving the long-term sustainability and financial strength of SBI.

#### V. CONCLUSION

The study on working capital management through ratio analysis at State Bank of India concludes that effective management of working capital plays a crucial role in maintaining liquidity, profitability, and financial stability in the banking sector. The ratio analysis revealed that SBI has shown continuous improvement in its liquidity position, operational efficiency, solvency, and profitability during the study period from 2020 to 2024. The increasing current ratio and quick ratio indicate that the bank has maintained sufficient current and liquid assets to meet short-term obligations effectively. Similarly, the declining debt-equity ratio reflects reduced financial risk and improved capital structure. The steady increase in net profit ratio and working capital turnover ratio demonstrates efficient utilization of financial resources and improved operational performance. Overall, the study highlights that proper financial planning, effective resource utilization, and efficient working capital management have contributed significantly to the financial growth and long-term sustainability of SBI in the competitive banking sector.

- Working capital management plays an important role in maintaining financial stability and operational efficiency in banks.
- SBI showed improvement in liquidity position through increasing current and quick ratios.
- The declining debt-equity ratio indicates reduced dependency on external borrowings and improved solvency.
- The net profit ratio analysis reflects consistent growth in profitability during the study period.
- The working capital turnover ratio indicates efficient utilization of financial resources for revenue generation.
- Technological advancements and digital banking services contributed to improved efficiency and customer satisfaction.
- Efficient working capital management reduced financial risk and strengthened the financial position of the bank.
- The study concludes that SBI has maintained strong financial performance and long-term sustainability through effective working capital management practices.

## VI. FUTURE SCOPE

The future scope of studying working capital management through ratio analysis at State Bank of India (SBI) is significant because effective management of liquidity and short-term financial resources is essential for maintaining financial stability in the banking sector. Future studies can analyze changes in liquidity, profitability, efficiency, and solvency ratios over a longer period to identify trends and assess the financial health of SBI. Such analysis can help management make better decisions regarding the utilization of short-term resources.

The increasing adoption of digital banking and financial technologies provides new opportunities for improving working capital and liquidity management. SBI can make greater use of Artificial Intelligence (AI), data analytics, and automated financial

monitoring systems to forecast cash requirements, monitor transactions, and identify potential liquidity risks. Future research can examine how technology-driven financial management influences operational efficiency and the accuracy of financial decision-making.

Another important area of future research is liquidity and risk management. Changes in interest rates, deposit patterns, credit demand, regulatory requirements, and economic conditions can influence the financial position of a bank. Future studies can examine current ratio, quick ratio, cash ratio, loan-to-deposit ratio, and other relevant financial indicators to evaluate SBI's ability to maintain adequate liquidity while generating sustainable returns.

Future studies can also focus on conducting a comparative analysis of SBI with other public-sector and private-sector banks. Comparing liquidity ratios, profitability ratios, asset quality indicators, operational efficiency, and financial performance can provide a clearer understanding of SBI's relative position in the banking industry. Such research can identify areas where working capital and financial resources can be managed more efficiently.

Finally, future research can incorporate advanced financial analytics and predictive models to forecast SBI's liquidity requirements and financial performance. Economic factors such as inflation, interest rates, GDP growth, financial market conditions, and regulatory changes can be included in the analysis. These developments can help SBI strengthen liquidity management, reduce financial risks, improve resource utilization, and maintain stable long-term financial performance.

## VII. REFERENCES

- [1] S. Roy, A. K. Misra, P. C. Padhan, and M. R. Rahman, "Interrelationship among liquidity, regulatory capital and profitability—A study on Indian banks," *Cogent Economics & Finance*, vol. 7, no. 1,

2019, Art. no. 1664845, doi:  
10.1080/23322039.2019.1664845.

[2] F. Abbas, S. Iqbal, B. Aziz, and Z. Yang, "The impact of bank capital, bank liquidity and credit risk on profitability in postcrisis period: A comparative study of US and Asia," *Cogent Economics & Finance*, vol. 7, no. 1, 2019, Art. no. 1605683, doi: 10.1080/23322039.2019.1605683.

[3] V. V. Acharya and N. Mora, "A crisis of banks as liquidity providers," *The Journal of Finance*, vol. 70, no. 1, pp. 1–43, 2015, doi: 10.1111/jofi.12182.

[4] V. Acharya and H. Naqvi, "The seeds of a crisis: A theory of bank liquidity and risk taking over the business cycle," *Journal of Financial Economics*, vol. 106, no. 2, pp. 349–366, 2012, doi: 10.1016/j.jfineco.2012.05.014.

[5] A. V. Sidhu, S. Rastogi, R. Gupte, and V. M. Bhimavarapu, "Impact of liquidity coverage ratio on performance of select Indian banks," *Journal of Risk and Financial Management*, vol. 15, no. 5, 2022, Art. no. 226, doi: 10.3390/jrfm15050226.

[6] F. A. Almaqtari, E. A. Al-Homaidi, M. I. Tabash, and N. H. Farhan, "The determinants of profitability of Indian commercial banks: A panel data approach," *International Journal of Finance & Economics*, vol. 24, pp. 168–185, 2019, doi: 10.1002/ijfe.1655.

[7] S. Rajdeep and B. Patra, "Does Basel III—Liquidity Coverage Ratio affect the profitability of Indian public sector banks?" *Journal of Emerging Market Finance*, vol. 16, no. 4, 2025, doi: 10.1177/09763996231192027.

[8] A. A. Attarwala, "A study on liquidity management and profitability of selected public sector banks in India," *Journal of Information Systems Engineering and Management*, vol. 10, no. 11s, 2025, Art. no. 1649, doi: 10.52783/jisem.v10i11s.1649.

[9] G. Shahria and N. Jahan, "The impact of liquidity regulation on financial performance of banking industry," *Cogent Business & Management*, vol. 13, no. 1, 2026, Art. no. 2656522, doi: 10.1080/23311975.2026.2656522.

[10] J. Kanoujiya, A. Pushp, S. Rastogi, and V. M. Bhimavarapu, "Impact of bank's liquidity on financial distress of Indian banks under the influence of profitability and competition," *Humanities and Social Sciences Communications*, vol. 12, 2025, Art. no. 1731, doi: 10.1057/s41599-025-06015-z.

[11] T. H. Vu, "Liquidity coverage ratio and profitability: An inverted U-shaped pattern," *Cogent Economics & Finance*, vol. 12, no. 1, 2024, Art. no. 2426532, doi: 10.1080/23322039.2024.2426532.

[12] "Issues in liquidity management in banking system: An empirical evidence from Indian commercial banks," *Cogent Economics & Finance*, 2022, Art. no. 2122190, doi: 10.1080/23322039.2022.2122190.

[13] O. I. Olaleye, M. A. Adesina, and S. A. Yusuf, "Effect of liquidity management on profitability of commercial banks in Nigeria," *American Journal of Finance*, vol. 6, no. 2, pp. 25–34, 2021, doi: 10.47672/ajf.859.

[14] V. Acharya, S. M. Schaefer, and Y. Zhang, "Liquidity risk and correlation risk: A clinical study of the General Motors and Ford downgrade of May 2005," *Quarterly Journal of Finance*, vol. 5, no. 2, 2015, doi: 10.1142/S2010139215500068.

[15] D. Diamond and P. Dybvig, "Bank runs, deposit insurance, and liquidity," *Journal of Political Economy*, vol. 91, no. 3, pp. 401–419, 1983, doi: 10.1086/261155.

[16] R. C. Merton, "An analytic derivation of the cost of deposit insurance and loan guarantees: An application of modern option pricing theory," *Journal of Banking & Finance*, vol. 1, no. 1, pp. 3–11, 1977, doi: 10.1016/0378-4266(77)90015-2.

[17] A. N. Berger and L. J. Mester, "Inside the black box: What explains differences in the efficiencies of financial institutions?" *Journal of Banking & Finance*, vol. 21, no. 7, pp. 895–947, 1997, doi: 10.1016/S0378-4266(97)00010-1.

[18] A. Demirgüç-Kunt and H. Huizinga, "Determinants of commercial bank interest margins and profitability: Some international evidence," *The World Bank Economic Review*, vol. 13, no. 2, pp. 379–408, 1999, doi: 10.1093/wber/13.2.379.

[19] M. Athanasoglou, S. N. Brissimis, and M. D. Delis, "Bank-specific, industry-specific and macroeconomic determinants of bank profitability," *Journal of International Financial Markets, Institutions and Money*, vol. 18, no. 2, pp. 121–136, 2008, doi: 10.1016/j.intfin.2006.07.001.

[20] A. N. Berger and R. DeYoung, "Problem loans and cost efficiency in commercial banks," *Journal of Banking & Finance*, vol. 21, no. 6, pp. 849–870, 1997, doi: 10.1016/S0378-4266(97)00003-4.