



An analytical study of profitability of selected private sector banks: Listed on NSE

Sagarkumar Bhikhalal Thakkar¹, Ashvinkumar Solanki²

¹ Research Scholar, Department of Commerce, Saurashtra University, Rajkot, Gujarat, India

² Associate Professor, Department of Commerce, Saurashtra University, Rajkot, India

Abstract

In India banking sector considered as backbone of Indian economy. After demonetization, use of banking services has been increased by citizen of India due to that there is a need to analyze profitability performance of private sector banks in India. In this study four private sector banks has been selected out of listed private sector banks on National Stock Exchange, named as HDFC bank, ICICI bank, KOTAK bank and Axis bank on the basis of Market Capitalization on 1st September 2021. For the study secondary data have been collected from the annual financial reports, bank's website, news papers and various stock exchange websites. For the identification of the profitability performance researcher used seven profitability ratios like Net Interest Margin Ratio, Net Profit Margin Ratio, Operating Profit Margin Ratio, Return on Capital Employed Ratio, Return on Assets, Return on Equity and Capital Adequacy Ratio for the study period of 2016-17 to 2020-21. For the study ratio analysis used as accounting tool and One Way Anova used as statistical tool. Major findings of the study are, profitability performance of KOTAK bank and HDFC bank are good as compared to ICICI bank and Axis bank.

Keywords: private sector banks, profitability, ratio analysis, one way anova, net profit margin ratio, return on capital employed ratio, return on assets, return on equity, capital adequacy ratio

Introduction

Banking sector in India is one of the prominent sector in Indian economy. There have been many changes in Indian banking sector in last few years. Credit, market and liquidation risk studies indicate that Indian banking sector is well maintained and have withstood the global downturn well. The Indian banking sector includes 12 public sector banks, 22 private sector banks, 46 foreign banks, 56 RRBs, 1485 urban Co-operative banks and 96,000 rural Co-operative credit institutions as on November 2020. Financial performance analysis is the process of identifying the financial strength and weakness of the firm by properly establishing the relationship between the items of balance sheet and profit & loss accounts. There are various methods available to analyze financial performance of a company or firm, out of which ratio analysis is the most used method by researchers. Based on ratio analysis this study will try to find out profitability of the selected private sector banks in India.

Literature Review

(Nataraja NS, 2018) ^[2] have analyzed Financial performance of private commercial banks in India: Multiple regression analysis. In their research, they have taken data for ten years from 2006 to 2017 of major three private sector banks listed on both NSE and BSE. They used financial ratios to determine performance of banks. Three important indicators, 1. Return on Assets to measure internal performance 2. Tobin's Q model to measure market based performance and 3. Return on Equity to measure profit available for shareholders, have been used in this research to determine financial performance of selected banks. In their research they have used Multiple regression Method to analyze financial performance of selected banking units.

Result from their research indicates, all the selected ratios have impact on financial performance of private commercial banks. (Mohd Taqi, 2018) ^[1] in their research titled Financial Analysis of Public and Private Sector Banks of India: A Comparative Study of Punjab National Bank and HDFC Bank for period of ten years from 2006-07 to 2015-16. In their research they have used various financial ratios related to management efficiency, liquidity and profitability. Result from study indicates, PNB is more financially sound than HDFC Bank but HDFC Bank has better managing efficiency than PNB in the context of deposits and expenditure. (Rai, 2020) ^[3] in his research titled A Comparative Study of The Selected Top Indian Public and Private Banks, researcher has compared the difference between private and public sector banks by taking data of top 3 banks from both public and private sector for five years starting from 2016 to 2020. By using different statistical tools, this study came on the conclusion that with private sector banks are performing way better than public banks. (Sunaina Dubey, 2021) ^[4] in their research titled A Study On Financial Performance of Selected Public and Private Sector Banks – A Comparative Analysis, Researchers have analyzed the financial performance of selected public sector and private sector banks in India using CAMEL model. Researchers have selected five public and five private banks based on their total assets for the time period of five years from 2015-20. The study find out that Kotak Mahindra has performed better among all selected banks and PNB performed worst among all selected banks. In public sector Bank of Baroda Performed best among all banks.

Importance of Study

This study will indicate financial strength and weakness of

the private sector banks. This study will be helpful to the investors who are willing to invest in banking sector and also helpful to them who are related to banking sector. This study will also helpful to government to determine current financial position of private sector banks and for making policies for them.

Research Gap

For this research, many literature reviews have been done like Financial performance of private commercial banks in India: Multiple regression analysis (Nataraja NS, 2018) [2], Financial Analysis of Public and Private Sector Banks of India: A Comparative Study of Punjab National Bank and HDFC Bank (Dr. Mohd Taqi, 2018) [1], A Comparative Study of The Selected Top Indian Public and Private Banks (Rai, 2020) [3], A Study On Financial Performance of Selected Public and Private Sector Banks – A Comparative Analysis (Sunaina Dubey, 2021) [4] etc., but in all this research, Analytical Study Of Profitability And Liquidity has been not studied. Therefore the goal of this study is to do analytical study of profitability of selected private sector banks.

Research Design

Research design indicates the process through which we will get conclusion of the study. Following research design have been adopted for getting the conclusions of the study.

Objectives of The Study

The objectives of this study are following

- To know profitability situation of selected private banks.
- To analyze the financial performance of selected private banks in India.
- To make suggestion for management of the selected private banks based on the study.

Scope of the Study

Geographical Scope

The geographical scope of the study has been considered as whole India because selected banks are provided its products and services to whole India.

Functional Scope

Functional scope of the study has been considered as selected ratios of profitability like Net Interest Margin Ratio, Net Profit Margin Ratio, Operating Profit Margin Ratio, Return on Capital Employed Ratio, Return on Assets, Return on Equity and Capital Adequacy Ratio.

Technique of Analysis

The ANOVA is used as a technique of analysis for this study.

Hypotheses for The Study

H₀=There is no significant difference in Net Interest Margin Ratio among selected private sector banks during the study period.

H₀=There is no significant difference in Operating Profit Margin Ratio among selected private sector banks during the study period.

H₀=There is no significant difference in Net Profit Margin Ratio among selected private sector banks during the study period.

H₀ = There is no significant difference in Return on Equity

among selected private sector banks during the study period.
H₀=There is no significant difference in Return on Capital Employed Ratio among selected private sector banks during the study period.

H₀=There is no significant difference in Return on Assets Ratio among selected private sector banks during the study period.

H₀=There is no significant difference in Capital Adequacy Ratio among selected private sector banks during the study period.

Period of the Study

The data for the five years starting from 2016-17 to 2020-21 have been taken for this research work.

Selection of Samples

For this study Four Private Banks are selected on their Market Capitalization. The selected banks for this research are as follow:

1. HDFC Bank
2. ICICI Bank
3. Kotak Mahindra Bank
4. Axis Bank

Data Collection

Data is most important instrument in research study as it helps in reaching to the objective of the study. As this study is based on secondary sources of the data, Data for this study have been collected from annual reports of the banks, websites of the selected banks and other websites related to topic.

Data Analysis and Interpretation

Net Interest Margin Ratio: (In Percentage)

Table 1

Years	HDFC Bank	ICICI	Kotak	AXIS
2016-17	3.94	2.64	3.93	3
2017-18	3.88	2.48	3.74	2.7
2018-19	3.97	2.64	3.73	2.72
2019-20	3.79	2.91	3.96	2.77
2020-21	3.85	2.95	4.14	2.94
Average	3.886	2.724	3.9	2.826
Minimum	3.79	2.48	3.73	2.7
Maximum	3.97	2.95	4.14	3

(Source: www.moneycontrol.com)

Above table indicates Net Interest Margin Ratios of selected banks during the study period of 2016-17 to 2020-21. Net Interest Margin Ratio indicates Net interest earned by a bank from its loans and mortgages. As per above table Kotak Bank performing well among selected banks by having average rate of 3.9%.

Operating Profit Margin

(In Percentage)

Table 2

Years	HDFC	ICICI	KOTAK	AXIS
2016-17	3.28	-67.47	-30.05	-18.71
2017-18	2.93	-76.74	-29.98	-24.45
2018-19	3.32	-74.51	-29.81	-16.31
2019-20	1.97	-63.32	-24.74	-22.69
2020-21	3.51	-58.1	-42.93	-13.75
Average	3.002	-68.028	-31.502	-19.182
Minimum	1.97	-76.74	-42.93	-24.45
Maximum	3.51	-58.1	-24.74	-13.75

(Source: www.moneycontrol.com)

Above table indicates operating profit margin ratios of selected banks during the study period of 2016-17 to 2020-21. Operating Profit Margin Ratio indicates a percentage of profit produced by a bank from its core operations. As per above table, HDFC Bank performing well amongst selected banks by having average of 3.002%.

**Net Profit Margin
(In Percentage)**

Table 3

Years	HDFC	ICICI	KOTAK	AXIS
2016-17	20.86	18.6	22.17	8.78
2017-18	21.76	14.63	24.46	0.99
2018-19	21.34	7.9	23.78	9
2019-20	22.33	13.23	25.71	2.94
2020-21	24.78	22.83	30.17	11.2
Average	22.214	15.438	25.258	6.582
Minimum	20.86	7.9	22.17	0.99
Maximum	24.78	22.83	30.17	11.2

(Source: www.moneycontrol.com)

Above table indicates Net Profit Margin Ratios of selected banks during the study period of 2016-17 to 2020-21. Net Profit Margin Ratio indicates a net profit produced by a bank as a percentage of its revenue. As per above table, KOTAK Bank performing well among selected banks by having average of 25.258%.

**Return On equity
(In Percentage)**

Table 4

Years	HDFC	ICICI	KOTAK	AXIS
2016-17	16.61	10.03	12.83	7.1
2017-18	16.88	7.16	12.28	0.7
2018-19	14.53	3.72	12.46	7.43
2019-20	15.45	7.78	12.89	2.14
2020-21	15.17	11.9	11.84	6.94
Average	15.728	8.118	12.46	4.862
Minimum	14.53	3.72	11.84	0.7
Maximum	16.88	11.9	12.89	7.43

(Source: www.moneycontrol.com)

Above table no 4 indicates Return on Equity Ratios of selected banks during the study period of 2016-17 to 2020-21. Return on Equity Ratio indicates the profitability of business in relation to the equity. As per above table, HDFC Bank performing well among selected banks by having average of 15.728%.

**Return on Capital Employed
(In Percentage)**

Table 5

Years	HDFC	ICICI	KOTAK	AXIS
2016-17	3.28	3.75	3.14	3.09
2017-18	3.32	3.1	3.15	2.38
2018-19	3.45	0	3.08	2.51
2019-20	3.43	2.95	3.29	2.71
2020-21	3.57	3.37	3.62	2.77
Average	3.41	2.634	3.256	2.692
Minimum	3.28	0	3.08	2.38
Maximum	3.57	3.75	3.62	3.09

(Source: www.moneycontrol.com)

Above table no 5 indicates Return on Capital Employed Ratios of selected banks during the study period of 2016-17 to 2020-21. Return on Capital Employed Ratio indicates how well business is generating profits from its capital. It is used to assess company's profitability and capital efficiency. As per above table, HDFC Bank performing well among selected banks by having average of 3.41%.

**Return on Assets
(In Percentage)**

Table 6

Years	HDFC	ICICI	KOTAK	AXIS
2016-17	1.7	1.03	1.78	0.64
2017-18	1.67	0.68	1.83	0.06
2018-19	1.72	0.34	1.82	0.61
2019-20	1.72	0.69	1.93	0.19
2020-21	1.76	1.16	2.08	0.71
Average	1.714	0.78	1.888	0.442
Minimum	1.67	0.34	1.78	0.06
Maximum	1.76	1.16	2.08	0.71

(Source: www.moneycontrol.com)

Above table no 6 indicates Return on Assets Ratios of selected banks during the study period of 2016-17 to 2020-21. Return on Assets Ratio indicates profitability of business in relation to its total assets. As per above table, KOTAK Bank performing well among selected banks by having average of 1.888%.

**Capital Adequacy
(In Percentage)**

Table 7

Years	HDFC	ICICI	KOTAK	AXIS
2016-17	15	17	17	15
2017-18	15	18	18	17
2018-19	17	17	17	16
2019-20	19	16	18	17.53
2020-21	18.79	19.12	22.26	19.12
Average	16.958	17.424	18.452	16.93
Minimum	15	16	17	15
Maximum	19	19.12	22.26	19.12

(Source: www.moneycontrol.com)

Above table no 7 indicates Capital Adequacy Ratios of selected banks during the study period of 2016-17 to 2020-21. Capital Adequacy Ratio indicates how much capital a bank has available with relation to its risk weighted assets. As per above table, KOTAK Bank performing well among selected banks by having average of 18.452%.

Statistical Test One Way ANOVA

For the testing of hypothesis, One Way Anova Test at 5% level of significant has been used. The results of the test are as follow.

Table 8

Ratio	F-Value	F-Crit	P-Value	H ₀ Accept/Reject
Net Interest Margin Ratio	90.47638	3.238871522	3E-100	H ₀ Rejected
Operating Profit Margin	140.7362	3.238871522	1.04E-11	H ₀ Rejected
Net Profit Margin	21.98541	3.238871522	6.4E-06	H ₀ Rejected
Return On Equity	21.82369	3.238871522	6.71E-06	H ₀ Rejected
ROCE	1.287329	3.238871522	0.31269	H ₀ Accepted
Return On Assets	47.82571	3.238871522	3.27E-08	H ₀ Rejected
Capital Adequacy	0.814383	3.238871522	0.504506	H ₀ Accepted

(Source: Calculated from MS Excel in Microsoft)

Findings

- Net Interest Margin Ratio for selected banks indicates average performance during the study period. Out of all bank's ratios, KOTAK bank has highest average Net Interest Margin Ratio and ICICI bank has lowest average Net Margin Ratio during the study period.
- Operating Profit Margin Ratio for selected banks indicates negative performance during the study period. Out of all bank's ratios, only HDFC bank has average positive rate of Operating Profit Margin Ratio. ICICI bank has lowest average Operating Profit Margin Ratio during the study period.
- Net Profit Margin Ratio for selected banks indicates fluctuant performance during the study period. Out of all bank's ratio, KOTAK bank has highest average Net Profit Margin Ratio and Axis bank has lowest Net Profit Margin Ratio.
- Average Return on Equity Ratio for HDFC bank indicates highest and Axis bank indicates lowest ratio during the study period.
- Average Return on Capital Employed Ratio for HDFC bank indicates highest and ICICI bank indicates lowest ratio during the study period.
- Average Return on Assets Ratio for KOTAK bank indicates highest and Axis indicates lowest ratio during the study period.
- Average Capital Adequacy Ratio for KOTAK bank indicates highest and Axis indicates lowest ratio during the study period.

Suggestions

- Out of selected banks, HDFC bank and KOTAK bank maintain their performance and it is advice to ICICI bank and Axis bank to improve their performance as compare to HDFC bank and KOTAK bank.
- In concern with Operating Profit Margin Ratio, it is advice to ICICI bank, KOTAK bank and Axis bank to increase operating efficiency as compare to HDFC bank.

References

1. Mohd Taqi M. Financial Analysis of Public and Private Sector Banks of India: A Comparative Study of Punjab National Banks and HDFC Bank. *International Academic Journal of Business Management*, 2018, 26-47.
2. Nataraja NS, N.R. Financial Performance of Private Commercial Banks in India: Multiple Regression Analysis. *Academy of Accounting and Financial Studies Journal*, 2018, 1-13.
3. Rai NK. A Comparative Study of the Selected Top Indian Public and Private Banks. *International Journal of Management*, 2020, 636-644.
4. Sunaina Dubey YP. A Study on Financial Performance of Selected Public and Private Sector Banks – A Comparative Analysis. *International Journal of Research in Engineering, Science and Management*, 2021, 162-164.
5. Website: www.moneycontrol.com