Performance Analysis of State Bank of India before and after Merger

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Abstract

In this research paper an attempt is made to understand the performance of State Bank of India (SBI) based on selected performance indicators. The data is collected for nineteen years starting from financial year 1999 -2000 till the financial year 2017 -18. Year 2008-2009 is taken as the reference year. There are nine financial years each before and after mergers. On 13 August 2008, State Bank of Saurashtra, one of the seven associates of State Bank of India got merged with itself. The data required for the study is collected from annual reports of State Bank of India. The purpose of the study is to analyse the performance of State Bank of India before and after merger based on profitability, deposits mobilised, advances given to the borrowers, ROA, Investment to Assets Ratio, Credit Deposit Ratio and CAGR.

Key words : Bank Mergers, C/D Ratio, Deposits per Branch, Advances per Branch , Profit per Brach, Deposits per Employee, Advances per Employee, Profit per Employee.

Introduction

Indian banking system has played a pivotal role in the development of the economy of our country. Banks collect money from public in the form of various types of deposits and grant loans to needy people. The Bank of Hindustan was the first bank established in India in the year 1770 but was liquidated in the year 1829. State Bank of India is the largest and the oldest bank in existence in India. Modern banking system has adopted sophisticated technology to provide better services to its customers. Banking is one of the growing industries in our country.

Objectives of study

Following are the objectives of the study

- To understand the concept of mergers and acquisitions in India.
- To understand the benefits and drawbacks of bank mergers.
- To understand the banks merger wave in India
- To analyse the performance of State Bank of India during pre and post-merger period

RESEARCH METHODOLOGY

3.1 Population and Sample

The sample includes state bank of India and its subsidiaries. In total the data is gathered for 19 years in which 2008-2009 is taken as the base year.

3.2 Data and Sources of Data

The data required for the study is collected from annual reports of State Bank of India from the year 1999 to 2018. The research is purely descriptive and based on secondary data.

3.3 Theoretical framework

Mergers and Acquisitions in India

Basic purpose of any organisation, whether it is a manufacturing company or service organisation, is to grow year on year in terms of profits and customer base. To increase profit, the organisations will have to be efficient enough to handle their operations and delight their customers. To address ever increasing competition, reduce overall cost of operations, increase efficiency, increase profitability, organisations including banks are resorting to mergers and acquisitions. The basic purpose of merger and acquisition activity is to brig synergy between two entities. Though the merger wave started in India in the year 1988, the concept of merger existed in the banking sector since 1955 when Bank of Madras merged into Bank of Culcutta and Bank of Bombay to become Imperial Bank of India. Year 2008 is the year in which the first wave of merger took place with State Bank of India. Today SBI has the fame of being the largest public sector bank in India

Advantage of Mergers and acquisitions in banking sector in India

Following are the benefits of mergers and acquisitions in banking sectors in India

1. **Improved Performance**

   Performance efficiency of merged banks will improve drastically. Combined infrastructure will be much greater than it used to be before acquisition. The enhanced infrastructure and synergy created by merger would help banks to improve their overall performance.

2. **Reduction in Cost**

   Merger avoids spending by two banks on the same market. This avoids duplication of operating costs. Saving in cost of operations can better be utilised for serving the customers. Reduction of cost would mean increased profitability to the company.

3. **Exploration of New Markets**

   After merger the bank can explore new geographical areas. The bank can penetrate into potential rural areas as well. This helps in economic development of the country and the bank itself in mobilising potential deposits from rural customers.

4. **Increased Scale**

   After merger the bank will be in a position to consolidate their assets and strengthen their processes. Bank will be strong enough to spend more on quality services to its customers. Customers of both the banks would be under one umbrella. This increases customer base of the bank.

5. **Talent Acquisition**

   Every bank will get an advantage because of merger. Qualified employees are the assets of any organisation and the banks are no exception to this. The merged bank will have pool of efficient employees who can take leadership position to manage the bank.

Drawbacks of Bank Merger

1. **Long process**

   The process of merger is not an easy task. It involves tedious process. Consolidating the accounts, marketing the bank will all take herculean task.

2. **Problem of Culture fit**

   It is often very difficult to merge the working culture of two different banks. If the employees are not flexible enough to adjust to the new culture, the very purpose of merger is defeated.

3. **Employee Discontentment**

   Though the new positions are created after merger, many existing roles may be abolished. This creates lot of discontentment among the bank employees. This might impact customer service.

4. **Unmanageable**

   After merger bank may plan for increasing number of branches. The bank many not be in a position to monitor the activities of all the branches under its umbrella. Due to this the bank may gradually lose control on these branches resulting into customer unrest or even the closure of such branches in the coming days.

Performance of State Bank of India pre and post-merger

SBI group is the biggest financial institution in India. It has 195 offices abroad spread across thirty six countries. The common man is the focal point of this bank. The products and services are designed to meet the needs of every Indian citizen. The bank has adopted advanced technology to enhance its operational efficiency and to serve its customer more satisfactorily.

In total the data is collected for 19 years from 1999 –2000 to 2017 – 2018. The year 2008-2009 is taken as base year in which State Bank of Saurashtra, one of the seven associates of State Bank of India got merged with itself. Therefore, there are nine years before the merger event and nine years after the merger.

Performance of SBI before and after merger is analysed on the basis of profitability, deposits mobilised, advance given to the borrowers, ROA, Investment to Assets Ratio, Credit to Deposit Ratio and Compound Annual Growth Rate.

3.4 Statistical tools

To analyze the data descriptive statistics, tables and graphs are used. Regression analysis is used to know whether the profitability of State Bank of India is influenced by number of branches, number of employees, deposits collected by the banks and advances granted by the bank.

A) Performance Measure based on Profitability (Before Merger)

Table 1 provides the data regarding the number of branches, number of employees, deposits collected by the bank, total advances granted, volume of business, and percentage of change in profit.

Table 1: Profitability of SBI before merger

Year	Number of Branches	Number of Employees	Net Profit (Rs Crores)	Deposits (Rs Crores)	Advances (Rs Crores)	Volume of Business (Rs Crores)	% Change in Profit
1999-2000	9050	235810	2052	196821	98102	294923	-
2000-2001	9078	214845	1604	242828	113590	356418	-21.83%
2001-2002	9085	209462	2433	270560	120806	391366	51.68%
2002-2003	9081	208998	3105	296123	137759	433882	27.62%
2003-2004	9087	207039	3681	318619	157934	476553	18.55%
2004-2005	9036	205515	4304	367048	202374	569422	16.92%
2005-2006	9143	198774	4407	380046	261641	641687	2.39%
2006-2007	9270	185388	4541	435521	337336	772857	3.04%
2007-2008	10183	179205	6729	537404	416768	954172	48.18%
2008-2009 (Base Year)	11472	205896	9121	742073	542503	1284576	35.55%
Total	83013	1845036	32856	3044970	1846310	4891280	
Average (Pre-merger)	9224	205004	3651	338330	205146	543476	
CAGR	**2.40%**	**-1.35%**	**16.09%**	**14.19%**	**18.65%**	**15.85%**	

Source: Compilation from Annual Reports of State Bank of India

From Table 1, it is observed that SBI, in total, had about 9050 branches in the financial year 1999-2000 and is increased to 11472 branches in the year 2008-2009. Number of branches has shown an increase of about 27% between these years. Compound Annual Growth Rate (CAGR) for these periods is found to be 2.40%. Number of employees came down by 13% between these periods. Between these periods, the growth of net profit is found to be close to 345% with CAGR of 16.09%. There has been an increase of 277% in the deposit amount collected by the bank between these periods with a CAGR of 14.19% Advances granted by the bank have grown to 453% between these periods with a CAGR of 18.65%. Total volume of business of the bank between these periods has grown close to 336% with a CAGR of 15.85%. The change in profit did show an assaulting trend between these two periods. It stood between 2% to 52%. Between 1999-2000 and 2000-2001, the profit percentage came down by 21.83%. Excepting couple of years, the bank has shown tremendous progress on all the parameters mentioned in the table.

Table 2: Regression Analysis

	Coefficients	*Standard Error*	*t Stat*	*P-value*
Intercept	-197.3148	4162.9032	-0.0474	0.9640
Number of Branches	-0.4254	0.8144	-0.5224	0.6237
Number of Employees	0.0110	0.0208	0.5281	0.6200
Deposits (Rs Crores)	0.0159	0.0065	2.4391	0.0587
Advances (Rs Crores)	0.0007	0.0063	0.1053	0.9202

Adjusted R Square	0.954927876

Source: Excel output

Regression analysis is run to know whether there is any relationship between profitability and the number of employees, number of branches, deposits, and advances. None of the variable is found to be significant in determining the profitability, as the p-value of these variables is more than 0.05.None the less, volume of deposits found to be significant because the p –value is close to 0.05

I. B) Performance Measure based on Profitability (After Merger)

Table 2 provides the data regarding the number of branches, number of employees, deposits collected by the bank, total advances granted, volume of business and percentage of change in profit.

Table 3: Profitability of SBI after merger

Year	Number of Branches	Number of Employees	Net Profit (Rs Crores)	Deposits (Rs Crores)	Advances (Rs Crores)	Volume of Business Rs Crores)	% Change in Profit
2008-2009 (Base Year)	11472	205896	9121	742073	542503	1284576	
2009-2010	12437	200299	9166	804116	631914	1436030	0.49%
2010-2011	13284	222933	7370	933933	756719	1690652	-19.59%
2011-2012	14902	222945	11686	1043647	867579	1911226	58.56%
2012-2013	15564	228296	14839	1202740	1045617	2248357	26.98%
2013-2014	16059	222033	10891	1394409	1209829	2604238	-26.61%
2014-2015	16333	213238	13102	1576793	1300026	2876819	20.30%
2015-2016	16784	207739	9951	1730722	1463700	3194422	-24.05%
2016-2017	17170	209567	10484	2044751	1571078	3615829	5.36%
2017-2018	22414	278872	-6547	2706344	19,34,880	4641224	-162.45%
Total	144947	2005922	80942	13437455	10781342	24218797	
Average (Post-merger)	16105	222880	8994	1493051	1197927	2690977	
CAGR	**6.93%**	**3.08%**	**-3.26%**	**13.81%**	**13.56%**	**13.71%**	

Source: Compilation from Annual Reports of State Bank of India

From Table 3, it is observed that SBI, in total, had about 11472 branches in the financial year 2008-2009 and is increased to 22414 branches in the year 2017-2018. Number of branches has shown an increase of about 95% between these years. Compound Annual Growth Rate (CAGR) for these periods is found to be 6.93%. Number of employees was increased by 3.08% between these periods. Between these periods, the growth of net profit did show fall close to 28%. CAGR was recorded at 13.81%. There has been an increase of 265% in the deposit amount collected by the bank between these periods with a CAGR of 13.81% Advances granted by the bank have grown to 257% between these periods with a CAGR of 13.56%. Total volume of business of the bank between these periods has grown close to 261% with a CAGR of 13.71%. The change in profit did show an assaulting trend between these two periods. It stood between 0% - 59%. For many years after merger profit showed negative change between financial years. Only in couple of years, the bank has shown remarkable progress on all the parameters mentioned in the table.

Table 4: Regression Analysis

	Coefficients	*Standard Error*	*t Stat*	*P-value*
Intercept	-14375.4	7435.263632	-1.93341	0.111004
Number of Branches	3.118623	2.25467104	1.383183	0.225186
Number of Employees	-0.03002	0.088289683	-0.34006	0.747632

Deposits (Rs Crores)	0.001044	0.012585422	0.082973	0.937092
Advances (Rs Crores)	-0.01554	0.022885483	-0.67903	0.527275
Adjusted R Square 0.888				

Regression analysis is run to know whether there is any relationship between profitability and the number of employees, number of branches, deposits, and advances. None of the variable is found to be significant in determining the profitability, as the p-value of these variables is more than 0.05.

Table 5: Performance per branch and per employee

Year	Deposits Per Branch	Advances Per Branch	Net Profit Per Branch	Deposits Per Employee	Advances Per Employee	Net Profit Per Employee
1999-2000	21.7482	10.8400	0.2267	0.8347	0.4160	0.0087
2000-2001	26.7491	12.5127	0.1767	1.1302	0.5287	0.0075
2001-2002	29.7810	13.2973	0.2678	1.2917	0.5767	0.0116
2002-2003	32.6091	15.1700	0.3419	1.4169	0.6591	0.0149
2003-2004	35.0632	17.3802	0.4051	1.5389	0.7628	0.0178
2004-2005	40.6206	22.3964	0.4763	1.7860	0.9847	0.0209
2005-2006	41.5669	28.6165	0.4820	1.9120	1.3163	0.0222
2006-2007	46.9818	36.3901	0.4899	2.3492	1.8196	0.0245
2007-2008	52.7746	40.9278	0.6608	2.9988	2.3256	0.0375
2008-2009	64.6856	47.2893	0.7951	3.6041	2.6348	0.0443
2009-2010	36.6806	22.2412	0.3958	1.6504	1.0007	0.0178
2010-2011	64.6551	50.8092	0.7370	4.0146	3.1549	0.0458
2011-2012	70.3051	56.9647	0.5548	4.1893	3.3944	0.0331
2012-2013	77.2770	67.1818	0.9534	5.2683	4.5801	0.0650
2013-2014	86.8304	75.3365	0.6782	6.2802	5.4489	0.0491
2014-2015	96.5403	79.5951	0.8022	7.3945	6.0966	0.0614
2015-2016	103.1174	87.2081	0.5929	8.3312	7.0459	0.0479
2016-2017	119.0886	91.5013	0.6106	9.7570	7.4968	0.0500
2017-2018	120.7435	86.3246	-0.2921	9.7046	6.9382	-0.0235

Source: Compilation from Annual Reports of State Bank of India

Table 5 indicates that the deposit per branch has shown steady growth year after year with an exception of financial year 2009-2010. Between 2008-2009 and 2009 – 2010, the deposits per branch came down by 43%. Similarly deposits per branch between 2016-2017 and 2017-2018 came down by 6%. Advances per branch also did show steady growth year on year during the study period. However, advances per branch in the financial year 2009-2010 came down by 50% when compared to 2008-2009. Net profit per branch also did show steady growth except for the year 2009-2010. Also it is observed that the net profit per branch came down by 148% in the year 2017-2018 compared to 2016-2017. Similar patterns were seen for deposit per employee, advances per employee and net profit per employee.

RESULTS AND DISCUSSION

Table 6: Pre and Post-merger ROA, Investment to asset and CD Ratio of SBI

Year	Assets	N/P	Investment	ROA	Investment to Assets Ratios	C/D Ratio (Advances÷Deposits)
1999-2000	261505	2052	91879	0.78%	35%	50%
2000-2001	315644	1604	122876	0.51%	39%	47%
2001-2002	348228	2433	145142	0.70%	42%	45%
2002-2003	375877	3105	172348	0.83%	46%	47%
2003-2004	407815	3681	185676	0.90%	46%	50%
2004-2005	459883	4304	197098	0.94%	43%	55%
2005-2006	493870	4407	162534	0.89%	33%	69%
2006-2007	566565	4541	149149	0.80%	26%	77%
2007-2008	721526	6729	189501	0.93%	26%	78%
2008-2009	964432	9121	275954	0.95%	29%	73%
2009-2010	1053414	9166	285790	0.87%	27%	79%
2010-2011	1223736	7370	295601	0.60%	24%	81%
2011-2012	1335519	11686	312198	0.88%	23%	83%
2012-2013	1566261	14839	350927	0.95%	22%	87%
2013-2014	1792748	10891	398800	0.61%	22%	87%
2014-2015	2048080	13102	481759	0.64%	24%	82%
2015-2016	2357618	9951	575652	0.42%	24%	85%
2016-2017	2674381	10484	765990	0.39%	29%	77%
2017-2018	3429904	-6547	1060987	-0.19%	31%	71%

Source: Compilation from Annual Reports of State Bank of India

Graph 1: Pre and Post-merger ROA, Investment to asset and C/D Ratio of SBI

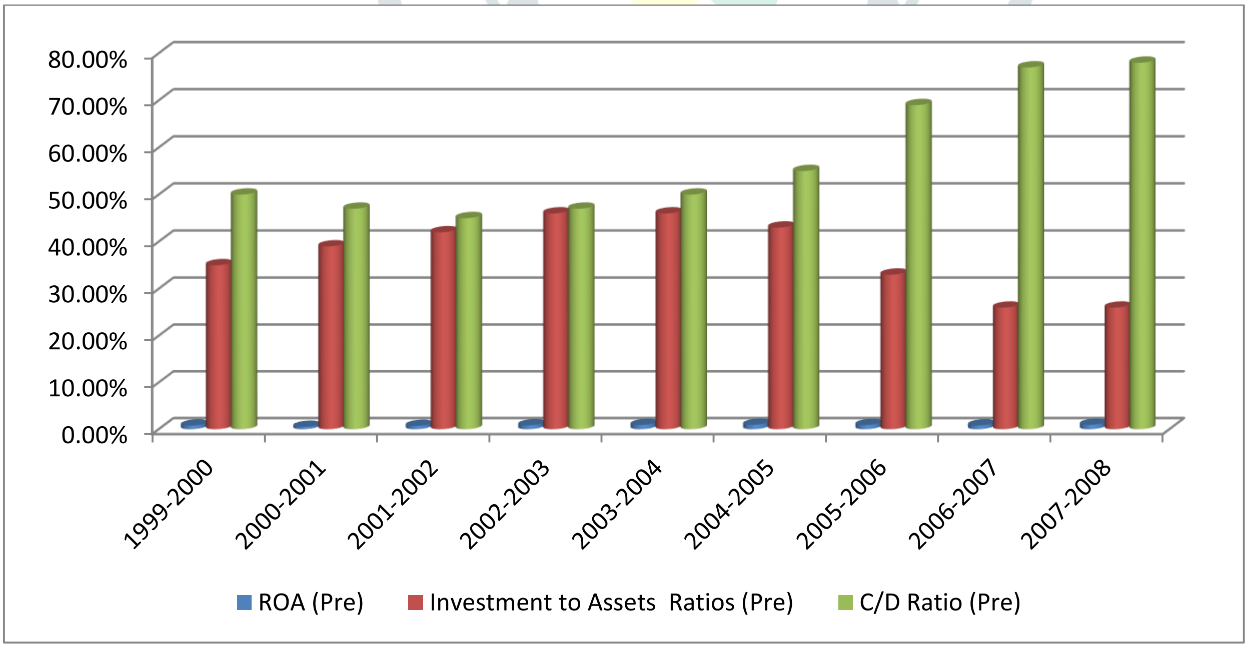

Table 6 reveals that the ROA, Investment to Assets, and advances to deposits have shown wavering trend from 1999-2000 to 2017-1018. Though the wavering pattern was not enormous for C/D ratio, an enormous variation is seen in case of investments to assets ratio. On an average, ROA of SBI before merger was better compared to ROA of SBI post-merger

Findings of the study

Following are the findings of the study

1. Performance of SBI in terms of number of branches and number of employees has shown consistent growth from 1999 to 2018. There has been a good improvement of these parameters after the merger.
2. Performance of SBI in terms of deposits and advances has shown consistent growth from 1999 to 2018. There has been a good improvement of these parameters after the merger.
3. In terms of profitability, there has been mixed pattern before and after merger activity
4. In terms of deposit per branch, advances per branch, net profit per branch on an average has shown good performance.
5. In terms of net deposit per employee, advances per employee, profit per employee on an average has shown good performance.
6. ROA and Investment to assets showed declining trend after merger.
7. C/D ratio showed increasing trend constantly between 2010-2011 and 2015-16, and showed declining trend till 2017-2018.
8. Number of branches, number employees, deposits and advances were not the only parameters that helped SBI to perform better before and after merger.

References

1. Annual reports of State Bank of India from 1999-2000 to 2017-2018
2. Aktas, N., Bodt, E., & Roll, R., (2012). Learning from repetitive acquisitions: Evidence from the time between deals, Journal of Financial Economics, 108(1). 99-117.
3. Ashutosh, Dash (2005), "The post – merger performance Puzzle: An evaluation of long – term profitability of Indian firms ", The ICFAI Journal of Accounting Research, January 2015, pp.no. 6-22.
4. Banu, Hasan S, The impact of Mergers and Acquisitions on the Stakeholders of Banking Sectors, pp 80- 85, IBA Bulletin Special Issue, Jan 2005
5. Cain, M., Denis, D., & Denis, D.,(2011). Earnouts: A study of financial contracting in acquisition agreements, Journal of Accounting and Economics, 51(1), 151-170.
6. Kumar, Ashwani and Kishore, Deep (2003), "An Assessment of Banking Sector Reforms in India", Indian Journal of Public Enterprise, June, pp.no. 87-101.
7. Kumar Rajesh, Suhas (2010)" An Analytical study on value creation in Indian bank mergers" AfroAsian Journal of Finance and Accounting, vol.2, No.2, 2010. Pp.107-131
8. Sharma MC, Mahima Rai. Post-Merger performance of Indian Banks, The Indian Journal of Commerce, 2012; 65(3), ISSN: 0019-512x.
9. Sinha Pankaj, Gupta Sushant. Mergers and Acquisitions: A Pre-Post Analysis for the Indian Financial Services Sector, 2011. Retrieved From mpra. Ub. Uni -Muenchen.
10. Swain, B.K., Consolidation in the Banking Industry: Some view points, IBA Bulletin, a Journal of Indian Banks Association, Jan 2005 pp 86-88.