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**AN ANALYSIS ON THE EFFECT OF MERGERS
ON COST AND OPERATIONAL EFFICIENCY OF
COMMERCIAL BANKS: A CASE STUDY OF
ODISHA**

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An Analysis on the Effect of Mergers on Cost and Operational Efficiency of Commercial Banks: A Case Study of Odisha

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Abstract – *The present paper examines the cost efficiency of commercial banks by using a non-parametric Data Envelopment Analysis Technique. The cost efficiency measures of banks are examined under both separate and common frontiers. This paper also empirically examines the impact of mergers on the cost efficiency of banks that have been merged during post liberalization period.*

Banks play an important role in the economic development of a state. The banks play the role of financial intermediaries in the economic development of a state. The commercial banks help in flow of investment capital throughout the market place. The main tool for resource allocation in the economy is credit disbursed by the banks. When we look at the performance of the banks and also the services provided to the larger societies, we often find a glaring bias of public sector (PS) banks only for the urban areas. But Odisha has a population of 4.20 crore, of which 3.50 crore (83.33%) live in (51313) villages (as per 2011 census). Out of 51313 villages of Odisha, commercial banks function only in 1724 villages. The banking system in Odisha consists of public sector banks, private banks, development banks, specialized banks, and cooperative banks.

Are the banks, operating Odisha, doing justice? Can the state bank on those banks for the socio-economic development of the masses? Against this background, authors have analysed the operational statistics of all the banks operating in Odisha, to make a comparative study of their role as well as the performance parameters of Regional Rural Banks (RRBs) and other PS banks.

Through this article an attempt has been made to assess whether the commercial banks functioning in Odisha have properly discharged their responsibilities towards the economic development of the state, especially rural Odisha (India).

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INTRODUCTION

Banks as financial intermediaries play a significant role in economic growth, provide funds for investments, and keep the cost of capital low. During the last few decades, structure of banking sector has turned from a controlled system into liberalized one. The efficiency of banks, which reflects the ability of banks in transforming its resources to output by making its best allocation, is essential for the growth of an economy. However, due to the major role played by banks in the development of economy, the banking sector has been one of the major sectors that have received renewed interest from researchers and economists.

The rapid advances in computer and communication technology have led to the development of new bank services and financial instruments. Therefore, the economies of world have experienced a revolutionary

change in the environment of banking sector. The competition among banks at domestic and global level has increased and it has compelled the banking industry to improve their efficiency and productivity. Moreover, the government and policy makers have adopted various policies and measures out of which consolidation of banks emerged as one of the most preferable strategy. There are diverse ways to consolidate the banking industry the most commonly adopted by banks is merger.

Merger of two weaker banks or merger of one healthy bank with one weak bank can be treated as the faster and less costly way to improve profitability than spurring internal growth. One of the major motive behind the mergers and acquisition in the banking industry is to achieve economies of scale and scope. This is because as the size increases the efficiency of the system also increases. Mergers also help in the

diversifications of the products, which help to reduce the risk as well.

Banks play an important role in the economic development of a state. The banking system plays the important role of promoting economic growth and development through the process of financial intermediation. The commercial banks help in flow of investment capital throughout the market place. The main tool for resource allocation in the economy is credit disbursed by the banks.

The commercial banking system in Odisha consists of public sector banks, private banks, and Regional Rural Banks. RRBs were set up by Government of India in 1975 with a view to providing banking services to the rural poor at their door steps.

Many changes have been brought about in the focus and operations of the commercial banking on the basis of the recommendations of the various committees, mainly by Financial Sector Reforms Committee -1991 and 1998 headed by Mr. M Narsimham. The aims and objectives of reforms were to strengthen the commercial viability of the banks so that they can contribute with vigor to the economic development of the nation. But in the name of commercial viability the commercial banks in general and the public sector banks in particular have been shying away from their responsibility of contributing to the economic development of the local community where they operate.

One of the outcomes of such reforms was the consolidation of the banking industry through mergers and acquisitions. Technological progress and financial deregulation have played an important role in accelerating the process of merger and acquisition in Indian banking industry. Due to technological progress, the scale at which financial services and products are produced has expanded which provide an opportunity for the banks to increase their size and scale of production. At that, time mergers of banking institutions emerged as an important strategy for growing the size of banks. Size of the bank plays a significant role to enter the global financial market.

Merger can be defined as a means of unification of two players into single entity. Merger is a process of combining two business entities under the common ownership. The Indian banking sector consists of the Reserve Bank of India, which is the central bank, commercial banks and co-operative banks. Commercial banks in India play dominate role in the Indian economy and accounted for 90% of the total assets of banking system. Commercial banks in India can be sub-divided into two major categories - scheduled banks, which are subject to statutory requirement, and non-scheduled banks, which are not. As on March 2009, commercial banks in India consisted of 162 scheduled commercial banks, comprised 84 Regional Rural Banks (RRBs), 27 Public

sector banks (PSBs), includes 20 nationalized banks and State Bank of India and its 6 subsidiaries.

ODISHA BACKGROUND AND ROLE OF BANKS IN ECONOMIC DEVELOPMENT

Odisha, a state rich in natural resources in Eastern India, has also a large coastline. One third of India's bauxite reserves, a quarter of its iron ore and a fifth of its coal are in Odisha. As a result Odisha has become a hotspot for national and international mining companies. Orissa was the second most preferred destination in the country for investments in 2009. Most of the investments are in power generation, mining, iron and steel sectors.

Odisha's GDP at current prices in 2010-11 is estimated to be Rs 186356 crore while its per capita income is at Rs 36,923 in the last fiscal, which is fourth from the bottom. The state is only ahead of Bihar, Jharkhand and Uttar Pradesh in per capita income. Its per capita income is 33% less than the national average which is Rs 54,358.

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The main tool for resource allocation in the economy is credit disbursed by the banks. Commercial banks mobilize deposits from the individuals through various deposit schemes like savings and term deposits and use them for lending or investment. In this way they help in generating individual wealth. Thus banks form the core of economic development in a community. Though banks should not be expected to finance developmental programs alone, they have a vital role along with the governmental agencies. But since the liberalization of the economy in 1991 and restructuring of Indian financial sector consequent on Narsimham Committee Report I and II, it seems the commercial banks have been ignoring local improvement efforts. In an increasingly focused effort on profitability, they looked for investments which provide highest rate of return with low risk. As a result resources mobilized from the local-less or under developed states- have been invested either in other prosperous and industrialized states or in alternate profitable avenues. In doing so they overlooked their responsibilities to the local communities in which they are based.

MERGERS IN INDIAN BANKING SECTOR

Mergers and acquisitions in Indian banking sector have initiated through the recommendations of Narasimham committee II in 1998, when its report recommended a drastic reduction in the number of public sector unit banks from the set of 27. The committee recommended that merger between strong banks/ financial institutions would make for greater

economic and commercial sense and would be a case where the whole is greater than the sum of its parts and have a “force multiplier effect”. (Narasimham committee II, chapter, para 5.13 -5.15). Mergers come with several benefits such as creation of synergies, economics of scale, cost reduction, and quickly acquire new technologies, skills, markets, and resources. There are several reasons for mergers the primary ones are deregulation and technology. Deregulation has given banks opportunities to explore new business markets and mergers seem an attractive route to them. Technology has helped rationalize costs and delivery channels. Therefore, technology and deregulation have been considered as the drivers for bank mergers.

Merger can be defined as a mean of unification of two players into single entity. Merger is a process of combining two business entities under the common ownership. According to Oxford Dictionary the expression, “Merger means combining two commercial companies into one.” Bank merger is an event when previously distinct banks are consolidated into one institution. A merger occurs when an independent bank loses its charter and becomes a part of an existing bank with one headquarter and a unified branch network. Mergers occurs by adding the active (bidder)

banks assets and liabilities to the target (Passive) bank's balance sheet and acquiring the bidder 's bank name through a series of legal and administrative measures Mergers and acquisitions in Indian banking sector have initiated through the recommendations of Narasimham committee II. The committee recommended that merger between strong banks/ financial institutions would make for greater economic and commercial sense and would be a case where the whole is greater than the sum of its parts and have a “force multiplier effect”. (Narasimham committee II, chapter, para 5.13 -5.15). Table 1 provides a list of banks that have been merged in India since post-liberalization in the country.

Merger Year	Acquirer Bank	Target Bank	Motive of merger	Type of Merger
1993	Punjab National Bank	New Bank of India	Restructuring of Weak Bank	Forced Merger
1993	Bank of India	Bank of Karad Ltd.	Restructuring of weak bank	Forced Merger
1995	State Bank of India	Kashinath Seth Bank	Restructuring of weak bank	Forced Merger
1997	Oriental Bank of Commerce	Punjab Co-operative Bank Ltd.	Restructuring of weak bank	Forced Merger
1997	Oriental Bank of Commerce	Bari Doab Bank Ltd.	Restructuring of weak bank	Forced Merger
1999	Union Bank of India	Sikkim Bank Ltd.	Restructuring of weak bank	Forced Merger
2000	HDFC Bank Ltd.	Times Bank	To achieve scale and scope economies	Voluntary Merger
2001	ICICI Bank	Bank of Madura	To achieve scale and scope economies	Voluntary Merger
2002	ICICI Bank	ICICI Limited	To achieve the objective of universal banking	Voluntary Merger
2002	Bank of Baroda	Benaras State Bank Ltd.	Restructuring of weak bank	Forced Merger
2003	Punjab National Bank	Medungadi Bank Ltd.	Restructuring of weak bank	Forced Merger
2004	Bank of Baroda	South Gujarat Local Area Bank	Restructuring of weak bank	Forced Merger
2004	Oriental Bank of Commerce	Global Trust Bank	Restructuring of weak bank	Forced Merger
2005	Centurion Bank	Bank of Punjab	To achieve scale and scope economies	Voluntary merger
2006	Federal Bank	Ganesh Bank of Kurandwad	Restructuring of weak bank	Forced merger
2006	IDBI Bank	United western Bank	Restructuring of weak bank	Forced merger
2006	Centurion Bank of Punjab	Lord Krishna Bank	Expansion of size	Voluntary merger
2007	ICICI Bank	Sangli Bank	Expansion of size	Voluntary merger
2007	Indian Overseas Bank	Bharat overseas Bank	Restructuring of weak bank	Compulsory merger
2008	HDFC Bank	Centurion Bank of Punjab	Expansion of size and benefits of scope economics	Voluntary merger

Table 1.Banks Merged in India since Liberalization.

LITERATURE REVIEW

The literature available in the field of contribution of commercial banks in the economic development of Odisha is very limited. The literature obtained by the researchers are in the form Agenda Notes for SLBC Meetings of the State, State Focus Papers prepared by Regional Office of the NABARD, Govt of Odisha Budget papers and articles published in various newspapers.

The pace of bank mergers and acquisitions is increasing all over the world and it has given rise to an extensive economic research. Today, there is quite an abundance literature available on the subject of bank mergers. Berger et.al (1999) provided a comprehensive review of studies evaluating mergers and acquisitions in banking industry.

In literature, there has been number of studies conducted on the impact of mergers on the efficiency

of banks. The studies that have been conducted to analyze the impact of mergers and acquisitions on bank performance can be classified as ex-ante studies and ex-post studies. Ex-ante studies assess the effect of merger on bank performance by analyzing the stock market reaction to merger announcement. Ex-ante studies are also called the event studies as the announcement of merger is considered as an event in the stock price history of the merging entity. Ex-post studies, on the other hand assess the effect of merger on banks' performance by comparing, pre and post-merger performance of banks. This comparison can be made by using either traditional financial ratio analysis or by econometric and frontier analysis. There is voluminous literature on mergers and acquisitions in developed economies like US but there is dearth of literature in developing economies like India and other Asian countries. The literature suggests that there is mixed empirical evidence regarding the impact of mergers and acquisitions on the efficiency and performance of banks.

Cost efficiency gains from merger may be arise from the fact that merged banks gain access to cost saving technologies or spread their fixed cost over a larger base, thus reducing average cost.

Mukherjee et al. (2002) examined the technical efficiency of 68 Indian commercial banks for the period 1996-1999 and found that public sector banks are more efficient than both private and foreign banks.

Ram and Ray (2004) also found that public sector banks performed better than private sector banks but not differently from foreign banks. All these studies have compared the efficiency of public, private, and foreign banks by using a common frontier and such comparisons are not justified on the ground that public, private, and foreign banks are operated under different legal and regulatory frameworks.

Chen (2004) conducted a study to examine the efficiency difference between Taiwan's publicly, private owned banks, and the impact of the Asian financial crisis on the efficiency of Taiwan banking sector. He used data envelopment analysis and panel data ranging from 1994 to 2004 on 44 banks to measure cost, allocative and technical efficiency of Taiwan's banks. He employed intermediation approach and conducted sensitivity analysis to determine the appropriate inputs and outputs. He found that Asian financial crisis has depreciated cost, allocative and technical efficiency in Taiwanese banks and suggested that banks rate of return and bank loans on bad loans are major reason for this.

Ariff and Can (2008) attempted to investigate the cost and profit efficiency of Chinese commercial banks over the period from 1995 to 2004. They used non-parametric data envelopment analysis technique to obtain the cost efficiency and profit efficiency of banks. The study is based on unbalanced panel data of 28 Chinese banks, totaling 230 observations. They also used Tobit regression analysis to study the influence

of ownership type, profile, profitability, and key environmental changes on the efficiency of china's banks. Tobit regression analysis suggests that banks that are more profitable tend to be more efficient. The relationship between non-interest income to total income and efficiency also turned out to be significant.

Gourlay et al. (2010) analyzed the efficiency gains from mergers among Indian banks over the period 1991-92 to 2004-05 and observed that the merger led to improvement of efficiency for the merging banks. R.B.I (2008) also drives the same conclusions and found that public sector banks have been able to get higher level of efficiency than private sector banks during post-merger period.

An overview of the studies taken up so far shows that thy either, use the parametric SFA, or a non-parametric DEA model to estimate efficiency. Typically under parametric frontier estimation, the functional form with respect to a subset of the regressors i.e. the density of the errors is not fully known. To overcome this problem in estimation we attempt to use a Semi Parametric Estimators as proposed by '(Sickles 2005)', explained in detail subsequently. Data on inputs, outputs and other related variables for Indian scheduled commercial banks (excluding regional rural banks) for the period 1979- 2008 are obtained from Reserve Bank of India's research department publication: Statistical Tables Relating to Banks in India – 1979 through 2008. Following the standard classification of RBI banks are grouped into four different groups: 1) The Nationalized Banks (NB). 2) The State Bank and its Associates (SB&A). 3) Domestic private banks (PB). 4) Foreign Banks (FB).

CONCLUSION

The purpose of reforming financial sector was to strengthen and reposition the banking industry, so that it will enable it contribute effectively to the development of the real sector through its intermediation process. The banking sector reform results in improved financial services which lead to reduced cost. More and more people can access banks to meet their financial needs at a reasonable cost. It will increase aggregate demand for goods and services. Rising aggregate demand will have positive impact on the output and employment generation resulting in poverty reduction – the ultimate goal of economic development. The aim of reform is increased risk management not risk aversion. The aim of liberalization is to make the banking system stronger so that it can play a greater role in the economic development of the nation instead of shying away from its responsibility.

Banking is a driver of GDP growth and employment. They have also great role in equitable distribution of resources for inclusive growth of a state. If they give importance to one sector and ignore another or focus on one region and neglect the other regions the economy of the state may grow but the growth will be

imbalanced and skewed. One section of the population will be benefiting from the banking facilities while the other section of the society will be languishing in poverty. So the banking sector by focusing on the economic development of the local community can become a much greater driver of equitable GDP growth and employment and large sections of the population gain access to quality banking products and services. It does not mean that banks alone are responsible for the development of the people and the economy of the state. The government and its agencies are also equally responsible for growth of the economy. The government should frame favorable policies which should create conducive environment for credit delivery and its utilization. The banking system, together with active support of the government agencies can usher a path of economic prosperity for the people of Odisha.

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