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   REVIEW OF LITERATURE

   NEED/IMPORTANCE OF THE STUDY

   STATEMENT OF THE PROBLEM

   OBJECTIVES

   HYPOTHESES

   RESEARCH METHODOLOGY

   RESULTS & DISCUSSION

   FINDINGS

   RECOMMENDATIONS/SUGGESTIONS

   CONCLUSIONS

   SCOPE FOR FURTHER RESEARCH

   ACKNOWLEDGMENTS

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CONTRIBUTIONS TO BOOKS

- Sharma T., Kwatra, G. (2008) Effectiveness of Social Advertising: A Study of Selected Campaigns, Corporate Social Responsibility, Edited by David Crowther & Nicholas Capaldi, Ashgate Research Companion to Corporate Social Responsibility, Chapter 15, pp 287-303.

JOURNAL AND OTHER ARTICLES

- Schemenner, R.W., Huber, J.C. and Cook, R.L. (1987), "Geographic Differences and the Location of New Manufacturing Facilities," Journal of Urban Economics, Vol. 21, No. 1, pp. 83-104.

CONFERENCE PAPERS

- Garg, Sambhav (2011): "Business Ethics" Paper presented at the Annual International Conference for the All India Management Association, New Delhi, India, 19–22 June.

UNPUBLISHED DISSERTATIONS AND THESES

- Kumar S. (2011): "Customer Value: A Comparative Study of Rural and Urban Customers," Thesis, Kurukshetra University, Kurukshetra.

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- Garg, Bhavet (2011): Towards a New Natural Gas Policy, Political Weekly, Viewed on January 01, 2012 http://epw.in/user/viewabstract.jsp

IMPACT OF REFORMS ON CAPITAL ADEQUACY REQUIREMENTS OF INDIAN BANKS

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ABSTRACT

In this paper, an attempt is made to analyze the impact of reforms on the capital adequacy requirements of Indian Banks, which is divided into four sections. First section includes a brief review of the earlier studies. Second section covers the objectives, hypotheses and research methodology. In third section, an attempt is made to analyze the impact of reforms on the capital adequacy requirements of the Indian banks. To achieve the objectives of the study, the use is made of secondary data collected from the various sources like Report on Trends and Progress of Banking in India, Indian Banking Year Book, Performance Highlights of Public, Private and Foreign Banks in India, various journals such RBI Bulletin, IBA Bulletin, Professional Banker, Chartered Financial Analyst, ICFAI Journal of Bank Management and various websites. To test the statistical significance, ANOVA technique is used. The analysis clearly shows capital adequacy ratio has shown a significant improvement over the years in all the groups of the banks and is above the stipulated level {internationally accepted standard of 8 per cent and Indian standard of 9 per cent} during the period under study. But effective cost management, recovery management, technological intensity of banking, governance and risk management, financial inclusion are the areas, which will have a key bearing on the ability of Indian banks to remain competitive and enhance soundness. In this paradigm, improvement in policy framework, regulatory regime, market-perceptions and indeed, popular sentiments relating to governance in banks need to be on the top of the agenda to serve the society's needs and realities while being in harmony with the global perspective.

KEYWORDS

Liberalization, Capital Adequacy Ratio (CAR), Financial Inclusion, Market perceptions, Risk Management.

INTRODUCTION

After the set back of early nineties when the Government of India had to pledge the gold to acquire foreign currency to meet the severe problem of balance of payment temporarily, the Government planned to liberalize the Indian economy and open its door to the foreigners to speed up the development process as a long-term solution for the ailing economy. The economic liberalization move, which was initiated in 1991 when the new government assumed office, has touched all the spheres of national activity. Perhaps one area where the deregulatory policies had the maximum impact was the banking sector.

Until 1991, the banking in India was largely traditional. The bankers were prudent and cautious people who seldom took risks and were content with the normal banking activities i.e. accepting of deposits and lending against them. Labeled as "Agents of Social Change", their outlook was rigidly controlled by the policies of the Government, which were centered more on the alleviation of poverty and the upliftment of the downtrodden. The 1969 and 1980's nationalization of banks, bringing private banks under the state control, had the objective of realizing this government dream. Even as late as 1991-92, the profitability was a forbidden word in banking business. The banks were established to fulfill social objectives and their performance was evaluated on their 'task fulfillment' initiatives. Lending to the priority sectors, opening of rural branches, achievements in the implementation of Government sponsored schemes and adherence to the policies and programmes of the Government were the parameters considered for judging the performance of a bank.

Indian banking system has made commendable progress in extending its geographical spread and functional reach. The nationalization of banks helped in increasing the number of branches, volume of deposits and ensured wider dispersal of the advances. Despite impressive quantitative achievements in resource mobilization and in extending the credit reach, some deficiencies have, over the years, crept into the financial system such as decline in the productivity and efficiency of the system, erosion of the profitability of the system, directed lending played a critical role in depressing the profits, the directed investments in the form of SLR and CRR hindered income earning capability and potentials, portfolio quality suffered due to political and administrative interference in credit decision-making, increase in cost structure due to technological backwardness, average ratio of capital funds to RWAs remained low which created problems in international operations and the system remained de-linked from sound international banking practices.

Realizing all these ill effects, the efforts were made to bring reforms in the financial system of the country. The seed of the reforms in India were sown by the Narasimham Committee appointed by the RBI under the chairmanship of M. Narasimham, the former Governor of RBI, to examine the aspects relating to the structure, organization, functions and procedures of the financial system and suggest remedial measures. The Committee submitted its reports in November 1991 and thus, began a new chapter in Indian banking. The financial system reforms were based on twin principles of operational flexibility and functional autonomy so as to enhance the efficiency, productivity and profitability of the financial institutions continuously. It aimed at providing a diversified, efficient and competitive financial system with ultimate objective of improving the efficiency of available resources, increasing the return on investments in promoting an accelerated growth of the real sector of the economy. The specific goals of the reforms were the development of transparent and efficient capital and money markets, promotion of competition through free entry/exit in financial sector, improvement in access of financial savings, improvement of financial health of banks by recapitalizing, restructuring etc. of weaker banks, improvement in the level of managerial competence and quality of human resources, and building up financial institutions and infrastructure relating to supervision, audit, technology and legal framework.

Induced by the forgoing revelations, an attempt is made to analyze the impact of reforms on the capital adequacy requirements of Indian Banking, which is divided into four sections. First section includes a brief review of the earlier studies. Second section covers the objectives, hypotheses and research methodology. In third section, an attempt is made to analyze the impact of reforms on the capital adequacy requirements of Indian banks. Fifth section presents the conclusions and policy implications of the study.

REVIEW OF LITERATURE

The articles published on different facets of Indian banking reforms are restrictive in nature and have been found wanting in terms of the assessment of the impact of the reforms. A brief review of some of them is as follows:

Reddy and Yuvaraja (2001) viewed that financial sector reforms cover every sector of the economy. The adoption of international capital adequacy and accounting standards, deregulation of interest rates and entry of private and foreign banks underline that the speed of the financial sector reforms and sequencing of the reforms should take into account the realities of the Indian economy.

Patra (2002) suggested that several fundamentals must come together in order to make the Indian banking system stronger, efficient and low cost like strengthening of prudential norms and market discipline; adoption of international benchmarks as appropriate to the Indian situation; management of organizational change and consolidation within the financial system; and human resource development as the catalyst of the transformation.

Rao (2002) concluded that the Indian banking system has transformed itself from banking to the international banking. Regulations are forcing the banks to adopt better operational strategies and upgrade their skills. The system requires a combination of new technologies, well-guarded risk and credit appraisal,

treasury management, product diversification, internal control, external regulation as well as skilled human resources to achieve the heights of the international excellence to play its role critically in meeting the global challenges.

Reddy and Reddy (2003) are of the view that the new challenges faced by the banks are forcing to attempt all new things with the same old rigid structure and system. What required is more managerial and administrative freedom to the management with commensurate and result oriented accountabilities. They stressed that the banks should move towards professional banking with requisite freedom to operate freely in the market within the regulatory and prudential framework prescribed by the RBI.

Muniappan (2003) focused on two areas - firstly, challenges faced by the banks and secondly, the management of these challenges. Every aspect of the functioning of the banking industry, be it profitability, NPA management, customer service, risk management, HRD, etc. has to undergo the process of transformation of aligning with the international best practices. He concluded that the future of Indian banking system needs a long term strategy, which would broadly cover areas like structural aspects, business strategies, prudential control systems, integration of markets technology issues, credit delivery mechanism, information sharing, etc.

Aggarwal and Sharma (2005) analyzed the existing banking environment and suggested the strategies to build up a more strong and vibrant banking system. They stated that the evolution of banking sector in India is likely to take the form of emergence of universal or quasi-universal banks and therefore, risk management and development of an appropriate regulatory system will remain the main challenge to be faced by the banking industry in future.

Ghosh and Das (2005) focused on whether, and to what extent, governments should impose capital adequacy requirements on banks, or alternately, whether market forces could also ensure the stability of banking systems. The study contributes to this debate by showing how market forces may motivate banks to select high capital adequacy ratios as a means of lowering their borrowing costs. Empirical tests for the Indian public sector banks during the 1990s demonstrate that better capitalised banks experienced lower borrowing costs.

Arora and Kaur (2006) stated that banking sector in India has given a positive and encouraging response to the financial sector reforms. Entry of new private banks and foreign banks has shaken up public sector banks to competition. Changing financial scenario has opened up opportunities for the banks to expand their global presence through self expansion, strategic alliances, etc. Banks are diverting their focus on retail banking so as to attain access to low cost funds and to expand into relatively untapped potential growth area.

Sinha (2006) considered the three alternative paradigms - values at risk, expected shortfall and expected excess loss, which may be used to determine the regulatory capital. Furthermore, it outlined the Indian banking scenario in respect of capital adequacy for the period 1996-97 to 2002-03. The results also showed that Tier-I capital of Indian commercial banks is positively related to operating efficiency and has negative relationship with NPA ratio. But no definite relationship between the CAR and bank size could be determined from the analysis.

Mandira and Yuko (2007) presented an analytical review of the capital adequacy regime and the present state of capital to risk-weighted asset ratio (CRAR) of the banking sector in India. In the regime of Basel I, Indian banking system is performing reasonably well, with an average CRAR of about 12 per cent, which is higher than the internationally accepted level of 8 per cent as well as India's own minimum regulatory requirement of 9 per cent.

Thiagarajan, Ayyappan and Ramachandran (2011) analyzed the role of market discipline on the behaviour of commercial banks with respect to their capital adequacy. The study showed that the Capital Adequacy Ratio (CAR) in the Indian Commercial Banking sector shows that the commercial banks are well capitalized and the ratio is well over the regulatory minimum requirement. The private sector banks show a higher percentage of Tier-I capital over the public sector banks. However the public sector banks show a higher level of Tier-II capital. The study indicates that market forces influence the banks' behaviour to keep their capital adequacy well above the regulatory norms. The NPAs significantly influenced the cost of deposits for both public and private sector banks. The return on equity had a significant positive influence on the cost of deposits for private sector banks. The public sector banks can reduce the cost of deposits by increasing their Tier-I capital.

OBJECTIVES, HYPOTHESES AND RESEARCH METHODOLOGY

OBJECTIVES OF THE STUDY

The present study is conducted to examine the impact of reforms on the group-wise/year-wise capital adequacy requirements of the public, private and foreign banks in India during the period 1997-98 to 2010-11.

RESEARCH HYPOTHESES

To achieve the above objective of the study, the following hypotheses are formulated and tested:

H0: There is no significant difference in the group-wise/year-wise capital adequacy ratio of public, private and foreign banks in India.

Ha: There is a significant difference in the group-wise/year-wise capital adequacy ratio of public, private and foreign banks in India.

RESEARCH METHODOLOGY

To achieve the objectives of the study, the use is made of secondary data collected from the various sources like Report on Trends and Progress of Banking in India, Indian Banking Year Book, Performance Highlights of Public, Private and Foreign Banks in India, various journals such RBI Bulletin, IBA Bulletin, Professional Banker, Chartered Financial Analyst, ICFAI Journal of Bank Management and various websites. To test the statistical significance, ANOVA technique is used.

IMPACT OF REFORMS ON CAPITAL ADEQUACY REQIREMENTS

The question of building up adequate level of capital and resources in PSBs did not receive enough attention in the past. The Government ownership of the banks, commanding about 90 percent of the business, was considered adequate for maintaining public confidence. The level of international banking business was also limited and there was little pressure to conform to the international norms. More importantly, with low level of profits, the banks could not plough back adequate resources to shore up their net worth. As far back as 1961, the RBI had advised the banks to aim at a ratio of 6 percent of paid-up capital and reserves to total deposits because banks had been increasing their assets without a corresponding augmentation of their capital base. The ratio had declined from 9 percent in 1950 to 4 percent in 1960 and further to 1.5 percent by 1978 (for PSBs). Since income was recognized on accrual basis rather than on actual recovery of cash and banks were not required to make sufficient provisions for non-performing loans (the system of classifying advances as per health code was itself subjective), the actually deteriorating financial health of banks did not get reflected in banks' balance-sheets. In addition, the recession in the industrial sector increased industrial sickness, which added to the burden on the financial sector. It was only after the introduction of prudential and accounting norms in 1992-93 following the Ghosh Committee recommendations did the losses show up clearly on banks' balance sheets. By 1992-93, 20 nationalized banks (now 19 after the merger of NEWBK with PNB in 1993-94) reported combined losses of Rs.3648.92 crore with equity nearly being wiped out or becoming negative in case of several banks. Against this, the Government accepted the Narasimham Committee recommendations for adoption of the BIS norms on capital adequacy to improve the financial health of the banks and enable them to compete both at home and abroad. The RBI introduced the norms in a phased manner from April 1992, covering all banks (PSBs, PSIBs and FBs) by March 1996.

The Committee on Banking Regulations and Supervisory Practices (Basel Committee or Basel-I) in July 1988 released a framework on international convergence of capital measure and capital standards. The fundamental objectives that underline the Committee's work on capital convergence were: firstly, that the new framework shall serve to strengthen the soundness and stability of the banking system, and secondly, the framework shall be fair and for a high degree of consistency in its application to banks in different countries with a view to ensure equality among the international banks. The Basle Committee has defines capital in two tiers: Tier-I and Tier-II. Tier-I capital, otherwise known as core capital, provides the most permanent and rapidly available support to a bank against unexpected losses, whereas Tier-II capital contains elements that are less permanent in nature or less rapidly available.

In order to strengthen the capital base of Indian banks, RBI introduced in April 1992, a system of assigning risk weights for different kinds of assets and relating capital strength to Risk Weighted Assets (RWA) of commercial banks. Capital Adequacy Ratio is defined as ratio of Capital Funds to Risk Weighted Assets. It was stipulated that all the Indian banks with international presence should the achieve Capital Adequacy Ratio (CAR) of 8 percent by 31st March, 1994 (later extended to 31st March, 1995), foreign banks by 31st March 1993, other banks to achieve 4 percent by 31st March, 1993 and 8 percent by 31st March, 1996. Although it only

addressed credit risk, it reflected the thinking that the amount of the capital required to protect against loses in an asset should vary depending upon the riskiness of the asset. In 1996, market risk was added as an area for which capital was required.

The banking industry has changed in many ways since the implementation of Basel-I in 1988. Two specific changes - the expanded use of securitization and derivatives in secondary markets, and vastly improved risk-management systems had significant implications for Basel-I. It has been criticized to be a "one size fits all" model, lacking in sophisticated measurement and management of risks. The capital regime recommended by Basel-I could not keep pace with either due to the complex nature of the operations of the large banks or the substantial changes in both the concepts and technology of risk management. It has also been criticized as being inflexible due to its focus on primarily credit risk, ignoring market risk and operational risk and treating all types of borrowers under one risk category regardless of credit worthiness.

From 1993-2003, the government for the purpose of recapitalization pumped Rs. 20446.12 crores, which is an indication of the extent of capital erosion faced by the banks in post reforms period. The experience of bank recapitalization in several parts of the world has demonstrated that the exercise of recapitalization does not necessarily prevent banks from getting into trouble again. Recapitalization of weak banks using public money is also a costly and unsustainable option in view of the increasing strains on the government exchequer. The State Bank of India Act 1955 was amended to enhance the scope of the provision for partial private shareholding. The Banking Companies (Acquisition and Transfer of Undertakings) Acts 1970/1980 have also been amended in order to enable the public to subscribe to the capital of nationalized banks to 49 per cent of their total capital. The Governments' decision to reduce its equity stake in PSBs to 33 percent while retaining the public sector characteristics is an enabling provision for the banks to access the capital market in case of need. Therefore, the issues arise how much should be the adequate capital? Having achieved the capital adequacy ratio, will the PSBs, especially the nationalized banks, be able to sustain it? Should all the banks hold the same level of capital or should the weaker banks be asked to hold more? Moreover, in focusing too narrowly on capital alone as a measure of banks' health, there is a danger of overlooking other important aspects of banks' well being. Therefore, capital should be regarded as a part of overall risk management and there is a need to evolve a single measure that will help the banks to judge the right amount of capital to cover all the risks being faced by the banks.

The Basel Committee on Banking Supervision (BCBS) released the New Basel Capital Accord (Basel-II) in July 2003, applicable to all member countries from January 1, 2007 including India, which aims to ensure effective risk management and security systems in the financial sector with a greater emphasis in banks. The improved capital adequacy framework is more intended towards fostering a strong emphasis on risk management and encouraging ongoing improvements in the risk assessment capabilities of a bank. The framework of Basel II can be viewed from a three-pillar format. The fist pillar is compatible with the credit risk, market risk and operational risk. The minimum regulatory capital (MRC) focused on these three risks. The second pillar gives the bank responsibility to exercise best ways to manage the risk specific to that bank. The third pillar emphasize on market discipline for greater transparency, disclosure and encouraging best international practices.

The primary objective of Basel-II is to introduce greater risk sensitivity into the calculation of the amount of capital that a bank needs to hold. The revised Accord has retained the current definition of capital i.e. Tier-I, Tier-II and Tier-III capital. Tier-I Capital (Core Capital) include Paid up capital, Disclosed free reserves (statutory reserves, share premium, other revenue reserves), Capital reserve (surplus from sale of capital assets) and unallocated surplus (P & L balance carried over). Tier-II Capital include Undisclosed reserves and cumulative perpetual preference shares, Revaluation reserves (at discount of 55 percent), Investment fluctuation reserve, General provisions and loss reserves (up to a maximum of 1.25 percent risk weight assets), Hybrid debt capital instruments and Subordinated debt (maturity of above 5 years, fully paid-up, unsecured, subordinate to claims of other creditors, not redeemable at the initiative of the holder or without the consent of RBI). Tier-I capital should not be less than 50 percent of total capital. Tier-II capital cannot exceed 100 percent of Tier-I capital. Investment by banks in the subordinated debt of other banks should not exceed 10 percent of a bank's capital funds and will carry 100 percent risk weight. Tier-III Capital has the same characteristics of subordinated debt as in Tier-II Capital except for original maturity of at least two years and lock in clause i.e. no repayment if bank fails in its minimum capital requirement. Tier-III capital is limited to 250 percent of Tier-I capital. Unused Tier-I capital may be substituted for Tier-III up to the limit of 250 percent.

The Minimum Regulatory Capital (MRC) is set by the Capital Ratio which is defined as "(Total Capital -Tier-I + Tier-II + Tier-III)/(Credit Risk + Market Risk + Operational Risk)". Basel-I provided for only a credit risk charge. A market risk charge was implemented in 1996. The Committee has proposed operational risk capital of 12 per cent of minimum regulatory capital is provided i.e., MRC will be 9 per cent + 12 per cent of 9 per cent i.e. 10.08 per cent. In this ratio, the denominator represents the bank's assets weighted according to the three separate types of risk: *Credit Risk* - the risk of loss to the bank due to failure of borrowers/ counter-parties in meeting their commitments, *Market Risk* - the risk associated with market fluctuations in instruments such as futures, options, foreign exchange, etc. and *Operational Risk* - the risk of loss resulting from inadequate or failed internal processes, people and systems, or from external events.

TABLE 1: BANK GROUP-WISE CAPITAL TO RISK WEIGHTED ASSETS RATIO

Years	SBI Group	Nationalized	PSBs	Old PSIBs	New PSIBs	FBs	SCBs
1997-98	14.0	10.3	11.6	12.3	13.2	10.3	11.5
1998-99	12.3	10.3	11.3	12.1	11.8	10.8	11.3
1999-00	11.6	10.1	10.7	12.4	13.4	11.9	11.1
2000-01	12.7	10.2	11.2	11.9	11.5	12.6	11.4
2001-02	13.3	10.9	11.8	12.5	12.3	12.9	12.0
2002-03	13.4	12.2	12.6	12.8	11.3	15.2	12.7
2003-04	13.4	13.1	13.2	13.7	10.2	15.0	12.9
2004-05	12.4	13.2	12.9	12.5	12.1	14.0	12.8
2005-06	12.3	12.2	12.2	11.7	12.6	13.0	12.3
2006-07	12.3	12.4	12.4	12.1	12.0	12.4	12.3
2007-08	13.2	12.1	12.5	14.1	14.4	13.1	13.0
2008-09	12.7	12.1	12.3	14.3	15.1	15.1	13.2
2009-10	12.1	12.1	12.1	13.8	17.3	18.1	13.6
2010-11	11.0	12.1	11.8	13.3	15.5	17.7	13.0

Anova Value (F-ratio): Bank group-wise: 2.75 (significant at 5% level), Year-wise: 3.45 (significant at 5% level).

Source: Compiled from Performance Highlights of Various Banks, IBA, Mumbai.

Table clearly shows that the ratio of capital to risk weighted assets increased from 11.5 per cent (1997-98) to 13.0 per cent (2010-11) in scheduled commercial banks in India, which is above the internationally accepted standards and registering a rising trend during this period except last year in which a slight decline is observed. But this ratio is higher in new private sector Indian banks (PSIBs) and foreign banks (FBs) than the public sector banks (PSBs) and old private sector Indian banks (Old PSIBs). The ratio increased from 10.3 to 12.1 in nationalized banks, from 11.6 to 12.1 in public sector banks, from 12.3 to 13.3 in old private sector Indian banks, from 13.2 to 15.5 in new private sector Indian banks, from 10.3 to 17.7 in foreign banks during the period of 1997-98 to 2010-11. However in SBI group, this ratio decreased from 14.0 to 11.0 during the same period. Bank group-wise calculated F-ratio (2.91) is greater than critical ratio (2.34) and likewise, year-wise calculated F ratio (2.53) is greater than the critical ratio (1.90) at 5 per cent level of significance. *Therefore, the null hypothesis that there is no significant difference in group-wise/year-wise ratio of capital to risk weighted assets in public, private and foreign banks can't be accepted.*

In view of the financial crisis at the international level, the issues still exist, i.e. Having achieved the capital adequacy ratio, will the PSBs, especially the nationalized banks, be able to sustain in the new regime? Should all the banks hold the same level of capital or should the weaker banks be asked to hold more? These issues clearly show that there is a need of third generation reforms in Indian banking to face the challenges of crisis at the international level.

CONCLUSIONS AND POLICY IMPLICATIONS

Capital adequacy ratio has shown a significant improvement over the years in all the groups of the banks and is above the stipulated level {internationally accepted standard of 8 per cent and Indian standard of 9 per cent} during the period under study. Therefore, it can be concluded that banking reforms have indeed transformed Indian banks into strong, stable and prosperous entities with an adequate capital base. But effective cost management, recovery management, technological intensity of banking, governance and risk management, financial inclusion are the areas, which will have a key bearing on the ability of Indian banks to remain competitive and enhance soundness. In this paradigm, improvement in policy framework, regulatory regime, market-perceptions and indeed, popular sentiments relating to governance in banks need to be on the top of the agenda to serve the society's needs and realities while being in harmony with the global perspective.

REFERENCES

1. Reddy, B. Ram Chandra and Yuvaraja, B. (2001), "Some Aspects of Financial Sector Reforms", Banking Theory and Financial System, 2002, Kalyani publication, p. 208-215, Ludhiana.
2. Patra, M. D. (2002), "Strengthening Indian Banking and Finance - Progress and Prospects", www.rbi.org.in
3. Rao, D. Nageswara (2002), "Indian Banking in the New Scenario", Front Line, October-November 2002.
4. Reddy, B. Rama Chandra and Reddy, S Vijayulu (2003), "Banking Sector Reforms in India – A Review", Internet Edition, Business Line, Nov 19.
5. Muniappan, G. P. (2003), "Management of Challenges in Banks", NIBM Annual Day Celebration, Pune.
6. Aggarwal, Monica and Sharma, Rishi Raj (2005), "Indian Banking: Present and Future", the Indian Journal of Commerce, Vol. 58, No. 3, July-September.
7. Ghosh, S. and A. Das (2005), "Market Discipline, Capital Adequacy and Bank Behaviour." Economic and Political weekly, Vol. 40, pp. 1210 -1215.
8. Arora, Sangeeta and Kaur, Shubpreet (2006), "Financial Performance of Indian Banking Sector in Post Reforms Era", The Indian Journal of Commerce, Vol. 59, No. 1, Jan-March.
9. Sinha, Ram Pratap (2006), "Capital Adequacy of Indian Commercial Banks: Some Empirical Results", The ICFAI Journal of Financial Economics, Vol. IV, Issue-1, p 26-44.
10. Sharma, Mandira and Nikaido, Yuko (2007) "Capital Adequacy Regime in India: An Overview." Indian Council for Research on International Economic Relations, Working Paper No. 196.
11. Somanadevi Thiagarajan, Ayyappan, S. & Ramachandran, A. (2011) "Market Discipline, Behavior and Capital Adequacy of Public and Private Sector Banks in India" European Journal of Social Sciences, Vol. 23, Number 1, pp. 109-115.
12. RBI, "Report on Trends and Progress of Banking in India", RBI publication, Mumbai, (various issues).
13. IBA, "Performance Highlights of Public, Private and Foreign Banks in India", IBA publication, Mumbai (various issues).
14. IBA, "Indian Banking Year Book", IBA publication, Mumbai (various issues).

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