

The International Conference "The Role of the Financial Sector in Promoting Economic Growth in Asia"
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The Current State of the Financial Sector and the Regulatory Framework in Asian Economies: Case of India

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The Role of Financial Sector in Promoting Economic Growth in Asia

Outline

- 1 Introduction & Motivation
- 2 Brief Overview of the Indian Financial Sector
- 3 Impact of the Global Financial Crisis
 - Impact of the Crisis on the Indian Financial Sector
 - Stabilization of the Financial Sector
 - Impact of the Crisis on MSMEs
- 4 Post Crisis Regulatory Response
- 5 Impact of the Proposed Basel III norms
- 6 Conclusion

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Introduction & Motivation

- The extent to which the recent global crisis dented India's growth prospects was significantly higher than was originally anticipated.
- Despite low dependence on exports a limited exposure to financial assets, a high level of financial integration exacerbated the impact of the crisis.
- The crisis particularly impacted certain sectors that were heavily dependent on finance.
- The gradualist approach towards financial liberalisation, introduction of countercyclical policies and proactive policymaking during the crisis mitigated its impact.

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Brief Overview of the Indian Financial Sector

- Foreign banks, which in many countries, suffered from currency mismatches, high OBS exposures and scaling down of operations, play a limited role. ▶ Banking
- The financial sector in India is subject to prudential regulations governing both capital and liquidity.
- Indian banks have significant liquid assets as they maintain CRR and SLR.
- Several measures were introduced to reduce non-collateralized borrowing and lending.
- The reliance on borrowed funds was discouraged and stable sources of funds were promoted through imposition of prudential limits.
- Incremental credit aggregates, including credit-deposit ratio were carefully monitored to identify signs of overheating.
- Investment in non-government securities is also regulated with short-term investment being limited to CDs and CPs, and subject to caps, credit rating and complete disclosure.
- There has been a continuous review of credit-conversion factors, risk weights and provisioning norms to strengthen capital requirements.

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- To preserve asset quality and insulate banks from asset volatility, additional prudential measures related to exposures to specific sectors were imposed.
- Regarding securitization, originators are prohibited from booking profits upfront at the time of the securitization.
- There is a need to maintain capital at the required minimum of 9 per cent on any credit enhancement provided.
- Derivatives were bought under the capital adequacy regime by laying down credit conversion factors that were linked to the maturities of contracts.
- To improve the capital cushion available for these derivatives, the conversion factors were doubled for certain residual maturities.
- In 2007, additional guidelines were introduced covering eligibility criteria, principles for undertaking derivative transactions, permissible derivative instruments as well issues related to suitability of a derivative product for a client.

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Impact of the Crisis on the Indian Financial Sector

- In the initial days of the sub-prime crisis, the Indian financial sector remained largely impervious to the effects.
- However, the crisis had a significant negative impact on some of the sub-sectors like money market, equity, foreign exchange and credit markets.
- After the collapse of the Lehman Bros there was a tightening of the money market with the call money rates rising to more than 20% in Oct 2008. **Impact**
- With the onset of the crisis a large part of the short-term liability that Indian corporates and banks had undertaken could not be rolled over.
- Given the shortage of dollar liquidity, Indian corporates and banks borrowed in rupees and then convert it into dollar, resulting in squeezing the money market in India.
- While initially, there was an uptick in domestic credit, both supply and demand side factors led to a sharp deceleration of credit. **Credit Growth**

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Impact of the Crisis on the Indian Financial Sector

- Overall credit to the commercial sector fell by nearly 15% with much of the collapse coming from foreign sources. [▶ Commercial Sector](#)
- ECBs, which were a major source of finance for the Indian corporate sector in the high growth period witnessed a stagnation.
- India also experienced a sell-off in domestic equity markets by foreign portfolio investors, reflecting deleveraging. [▶ Stock Market](#)
- In contrast, FDI remained resilient during most of the crisis, although there has been a dip in recent months.
- As corporates withdrew funds, some of the mutual funds also faced redemption pressures, which cascaded down the line to some of the NBFCs.
- The impact on NBFCs differed according to the extent of ALM and dependency on mutual funds, although most of them witnessed a worsening of asset quality.
- Substitution of overseas financing by domestic financing and reversal of capital flows led to a tightening of the forex market and a downward pressure on the Rupee.

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Stabilization of the Financial Sector

- While the CRR was lowered from 9% to 5%, the repo and the reverse repo rate were reduced from 9% to 4.75% and 6% to 3.25%.
- The SLR was reduced from 25% to 24%.
- The RBI also resorted to conventional OMOs involving an outright purchase of government securities in the secondary market as well as provision of liquidity through repos under its daily liquidity adjustment facility.
- A large volume of MSS bonds were unwounded to inject liquidity.
- Several refinance windows were opened to allow easy access to credit to real estate, SMEs and exporters.
- Overall release of liquidity was in the range of 9.2% of GDP. **Liquidity**
- On the external front, the rupee was allowed to depreciate in a controlled manner and part of the outflow of capital was met by drawing down reserves. **Stabilization**
- The RBI also provided foreign exchange swap facility with a three month tenor, to Indian banks having overseas branches and subsidiaries.

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Stabilization of the Financial Sector

- While the CRR was lowered from 9% to 5%, the repo and the reverse repo rate were reduced from 9% to 4.75% and 6% to 3.25%.
- The SLR was reduced from 25% to 24%.
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Stabilization of the Financial Sector

- Interest rates on NRI deposits were progressively raised by 100 to 175 basis points.
- The cap on foreign investment in corporate bonds was raised from \$3 billion to \$15 billion, while norms for FIIs and ECBs were relaxed.
- Securitisation volumes continued to decline in India in 2009-10 with issuance volumes declining by nearly 22% due to tight liquidity, redemption pressures faced by mutual funds and minimum requirements.
- OBS exposures as a percentage of total balance sheet declined significantly from 218% to 178% during 2009-10.
- Most domestic banks, hold traditional OBS items like financial and performance guarantees, endorsements and forward exchange rate contracts. [Exposures](#)
- The financial soundness of the Indian banking sector is exemplified by looking at some of the key indicators. [Indicators](#)
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Outline

- 1 Introduction & Motivation
- 2 Brief Overview of the Indian Financial Sector
- 3 Impact of the Global Financial Crisis**
 - Impact of the Crisis on the Indian Financial Sector
 - Stabilization of the Financial Sector
 - Impact of the Crisis on MSMEs**
- 4 Post Crisis Regulatory Response
- 5 Impact of the Proposed Basel III norms
- 6 Conclusion

Impact of the Crisis on MSMEs

- The MSME sector is an important contributor to the Indian economy accounting for 45% of manufacturing output, 40% of exports and employing 59 million persons.
- The industrial growth was hit hard by the global meltdown. ▶ Industrial Growth
- Some of the labour intensive sectors were hit hard and this adversely affected employment.
- Gems and jewellery, an export intensive sector, witnessed a drop in employment of 0.16 million between October and December 2008 at a monthly rate of 10.3%.
- Textiles, another labour intensive sector, also witnessed a fall in employment by 0.11 million during October to December 2008, with spinning, weaving and finishing of textiles being worst affected.
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Policy Measures

- Some of the broad measures such as additional plan expenditure and full utilization of funds already provided, helped stimulate aggregate demand of the SME sectors also.
- Pre and post-shipment export credit was provided for labour intensive exports, i.e., textiles, leather, gems & jewels and marine products.
- The SME sector was provided an interest subvention of 2% subject to minimum rate of interest of 7% per annum.
- To alleviate financing problems and facilitate flow of credit to SMEs, the RBI announced a refinance facility of Rs. 70 billion for SIDBI.
- To boost collateral free lending, the existing guarantee cover under Credit Guarantee Scheme for SMEs on loans has been extended from Rs. 5 million to Rs. 10 million with guarantee cover of 50%.

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Revival of the SME Sector?

- As a result of these measures the industrial sector started witnessing signs of revival from mid 2009, recording an average growth of 13.7% since June 2009.
- However, the employment data paints a different scenario.
- While 1.46 million jobs were added between Jul 2009 and Sep 2010, more than 95% of these jobs were created in two industry group - textiles and IT/BPO. ▸ Employment
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Post Crisis Regulatory Response

- As discussed, policymakers reacted proactively to the crisis emanating from advanced countries.
- In addition a number of countercyclical measures were also introduced.
- Some of the additional risk weights and provisioning norms that were introduced during a period of high credit growth were withdrawn and restored to previous levels.
- NBFCs were permitted to issue perpetual debt instruments qualifying for regulatory capital.
- NBFC's deadline to raise their CRAR from 12% to 15% was postponed by one year and some of the existing disclosure norms for the NBFCs were also strengthened.
- In case of securitization, to ensure that the originators do not compromise on due diligence of assets, a minimum lock-in period of one year for bank loans is required before these can be securitised.
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- India has also moved cautiously on currency and interest rate futures.
- Banks were allowed to become direct trading-cum-clearing members of the currency futures exchanges subject to certain prudential criteria such as minimum net worth, CRAR, profitability, etc.
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- While credit derivatives were sought to be introduced in a gradual manner in 2007, with the role of these credit derivatives coming under spotlight in the recent financial crisis the issuance of the final guidelines have been postponed.
- The current proposal envisages the introduction of plain vanilla OTC single-name CDS for corporate bonds for resident entities subject to appropriate safeguards.
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- While some changes in standard deduction are not likely to have a major impact, others will have an affect on the banking system. ▶ Deductions
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- Basel III attempts to increase the resilience of banks to liquidity stresses by enforcing the LCR and NSFR.
- With most Indian banks following a retail business model whereby there is limited dependence on short term or overnight funding, and having possession of a large amount of liquid assets they will enable them to meet new standards.
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Conclusion

- Despite limited exposure to subprime assets and toxic assets, the Indian financial sector was affected by the financial turmoil due to India's increased integration with global capital markets.
- The global crisis resulted in significant tightening in the some markets, and led to reduction in output and employment in several sectors.
- Indian policymakers reacted in a proactive manner and introduced a host of measures to assuage the impact of the crisis.
- While, these measures mitigated the impact of the crisis and the Indian economy started exhibiting signs of recovery from mid-2009. the recovery is not uniform and several sectors as well as certain financial markets are yet to recover from the crisis.
- Regarding the Basel III norms, while India is in a comfortable position to meet some of the proposed norms, the implementation of the others would be a challenge.

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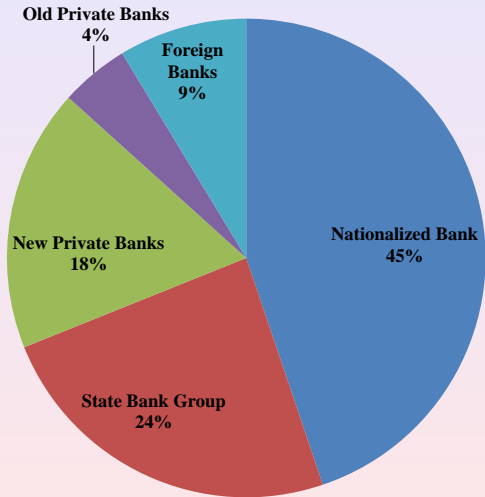
THANK YOU !!

Appendix Outline

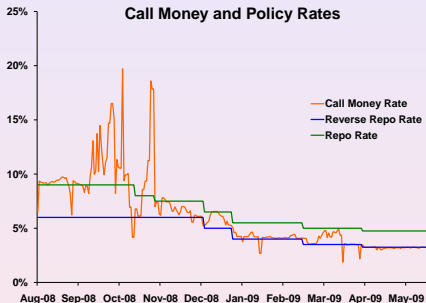
7 Appendix

- Composition of the Banking System
- Impact on Banking Sector
- Credit Growth
- Credit to Commercial Sector
- FII Investment and Equity
- Intervention and Exchange Rate
- Release of Liquidity
- Fiscal Measures
- OBS Exposure of Indian Banks
- Indicators of the Banking Sector
- Average Annual Growth Rates of Key Industries
- Impact on Employment
- Deductions from Capital
- Capital Buffer
- Capital Adequacy

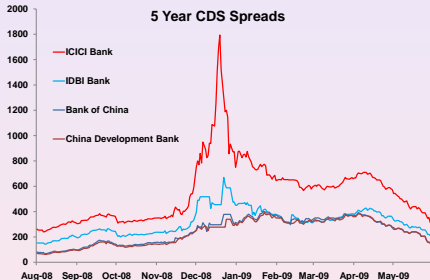
Composition of the Banking System



Impact on Banking Sector



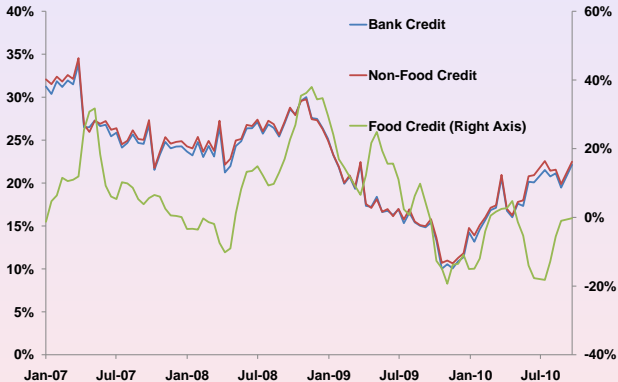
(a) Call Money



(b) CDS Spreads

[▶ Impact](#)

Domestic Credit Growth



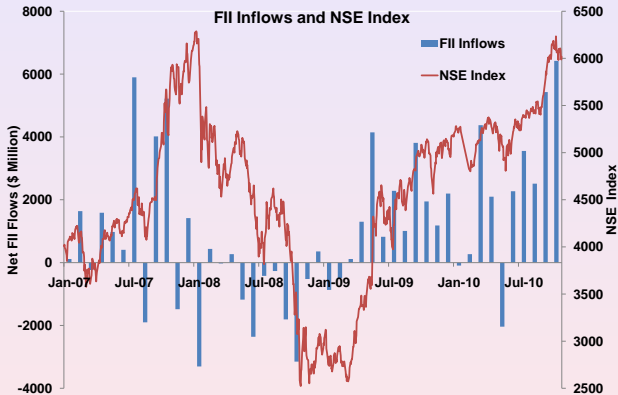
► Impact

Credit to Commercial Sector

	2007-08	2008-09	2009-10	Growth Rate	
				2008-09	2009-10
A. Adjusted Non-food Bank Credit (NFC)	4,44,807	4,21,091	4,80,258	-5.3%	14.1%
i) Non-food Credit	4,32,846	4,11,824	4,66,960	-4.9%	13.4%
ii) Non-SLR Investment by SCBs	11,961	9,267	13,298	-22.5%	43.5%
B. Flow from Non-banks (B1+B2)	5,64,558	4,39,926	5,80,821	-22.1%	32.0%
B1. Domestic Sources	2,55,230	2,58,132	3,64,989	1.1%	41.4%
1. Public issues by non-financial entities	51,478	14,205	31,956	-72.4%	125.0%
2. Gross private placements by non-financial entities	68,249	77,856	1,41,964	14.1%	82.3%
3. Net issuance of CPs subscribed to by non-banks	10,660	4,936	25,835	-53.7%	423.4%
4. Net credit by housing finance companies	41,841	25,876	28,485	-38.2%	10.1%
5. Gross accommodation by NABARD, SIDBI and EXIM Bank	22,267	31,408	33,871	41.1%	7.8%
6. Systemically important non-deposit taking NBFCs	36,460	42,277	60,663	16.0%	43.5%
7. LICs investment in corporate debt, infrastructure etc.	24,275	61,574	42,215	153.7%	-31.4%
B2. Foreign Sources	3,09,328	1,81,794	2,15,832	-41.2%	18.7%
1. ECBs/FCCBs	91,180	31,350	14,356	-65.6%	-54.2%
2. ADR/GDR issues	11,836	4,788	15,124	-59.5%	215.9%
3. Short-term credit from abroad	68,878	-12,972	35,170	-118.8%	
4. FDI to India	1,37,434	1,58,628	1,51,182	15.4%	-4.7%
C. Total Flow of Resources (A+B)	10,09,365	8,61,017	10,61,079	-14.7%	23.2%

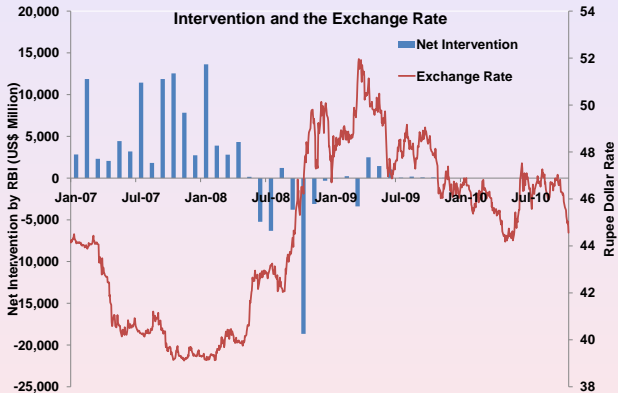
► Impact

FII Investment and Equity



► Impact

Intervention and Exchange Rate



► Stabilization

Release of Liquidity

Key Monetary Measures/Facilities	Amount (Rs. Billion)	Share in GDP (%)
Monetary Policy Operations	3266.2	6.1
1. Cash Reserve Ratio (CRR) Reduction	1600.0	3.0
2. Open Market Operations	688.4	1.3
3. MSS Unwinding/De-sequestering	977.8	1.8
Extension of Liquidity Facilities	1650.1	3.1
1. Term Repo Facility	600.0	1.1
2. Increase in Export Credit Refinance	255.1	0.5
3. Special Refinance Facility for SCBs (Non-RRB)	385.0	0.7
4. Refinance Facility for SIDBI/NHB/EXIM Bank	160.0	0.3
5. Liquidity Facility for NBFCs through SPV	250.0	0.5
Total	4916.3	9.2

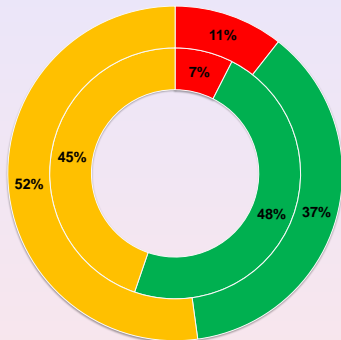
► Stabilization

Fiscal Measures

- Fortuitously a number of fiscal measures had been implemented prior to the crisis including debt waiver, increase in civil servants' salaries and extending NREGA.
- To ensure against transmission of the rise in international commodity prices in 2008 to domestic retail prices, large scale subsidies were introduced.
- Post crisis fiscal measures included a reduction in excise duties and service tax, approval for additional expenditure, allowing various state governments to borrow additional amount.
- Certain affected labour-intensive export industries such as handlooms, carpets and handicrafts, textiles, gems and jewellery, and SMEs were provided with an interest subvention of 2%.
- Rs 1.1 billion were allocated to ensure full refund of sales tax was set up, and various export incentive schemes of Rs 3.5 billion were also introduced.
- IIFCL was allowed to raise Rs 100 billion through the issuance of tax-free bonds to support its infrastructure schemes under a public private partnership mode.

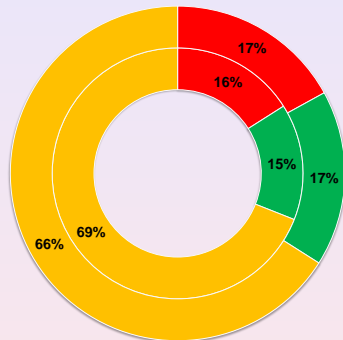
► Stabilization

OBS Exposure of Indian Banks



- Credit Contingent
- Forex Related Derivative Contracts
- Interest Rate Derivative Contracts

(c) Composition



- Public Sector Banks
- Private Banks
- Foreign Banks

(d) Concentration

▶ Stabilization

Indicators of the Banking Sector

	2005-06	2006-07	2007-08	2008-09	2009-10
Real Business per employee (in Rs. Millions)	40.22	47.04	55.2	59.85	66.98
Real Profit per employee (in Rs. Millions)	0.27	0.31	0.41	0.45	0.46
Net NPA ratio (per cent)	1.22	1.02	1	1.05	1.12
CRAR (per cent)	12.32	12.28	13.01	13.98	14.58
Return on Assets (per cent)	1.01	1.05	1.12	1.13	1.05

► Stabilization

Average Annual Growth Rates of Key Industries

	January 07 to September 08	October 08 to May 09	June 09 to October 10
Industrial Production	8.10%	0.90%	13.70%
Beverages and Tobacco	13.80%	7.40%	0.40%
Chemical	9.40%	1.80%	9.20%
Food	6.50%	-14.50%	6.80%
Leather	7.50%	-11.70%	8.90%
Non Metal and Minerals	5.00%	3.30%	15.20%
Paper	4.10%	-0.80%	6.30%
Rubber	6.20%	3.80%	15.00%
Wood	43.00%	-4.70%	0.20%
Textiles	4.80%	1.50%	7.10%
Metal and Machinery	9.80%	2.70%	25.60%

► MSME

Impact on Employment

	Apr-08 to Sep-08	Oct-08 to Dec-08	Jan-09 to Mar-09	Apr-09 to Jun-09	Jul-09 to Sep-09	Oct-09 to Dec-09	Jan-10 to Jun-10	Apr-10 to Sep-10	Jul-10 to Dec-10
Textile	0.206	-0.107	0.208	-0.154	0.318	0.016	-0.119	-0.063	0.245
Leather	0.008	0.006	-0.033	0.007	-0.008	0.009	0	0.021	0.004
Metals	-0.001	-0.1	-0.029	-0.001	0.065	0.023	0.004	0.045	0.027
Automobile	-0.008	-0.169	0.002	0.023	0.024	0.006	0.029	0.051	0.029
Gems & Jewellery	0.022	-0.159	0.033	-0.02	0.058	0.007	0.024	0.004	0.004
Transport	0.007	0.004	-0.004	-0.001	0	-0.002	-0.002	-0.021	0.013
IT-BPO	0.258	0.066	0.092	-0.034	0.026	0.57	0.129	0.129	0.108
Handloom-Power	-0.014	-0.016	0.007	0.049	0.015	0.009	-0.005	-0.003	0.006

▶ MSME

▶ MSME

Deductions from Capital

	Proposed Basel III Norm	Existing RBI Norms
Limit on deductions	Deductions to be made only if deductibles exceed 15% of core capital at an aggregate level, or 10% at the individual item level	All deductibles to be deducted
Deductions from Tier I or Tier II	All deductions from core capital.	50% of the deductions from Tier I capital and 50% from Tier II (except DTA and intangible assets wherein 100% deduction is done from Tier I capital)
Treatment of significant investments in common shares of unconsolidated financial institution	Any investment exceeding 10% of issued share capital to be counted as significant	For investments up to: (i) 30%: 125% risk weight or risk weight as warranted by external rating. (ii) 30-50%: 50% deduction from Tier I and 50% from Tier II

▶ Basel Norms

Capital Buffer

	Proposed Basel III Norm	Existing RBI Norms
Common equity (after deductions)	4.50%	3.6% (9.2%)
Conservation buffer	2.50%	Nil
Countercyclical buffer	0-2.5%	Nil
Common equity + Conservation buffer + Countercyclical buffer	7-9.5%	3.6% (9.2%)
Tier I (including the buffer)	8.5-11%	6% (10%)
Total capital (including the buffers)	10.5-13%	9% (14.5%)

► Basel Norms

Capital Adequacy

	Core Tier 1	Core Tier 1	Tier 1	Tier 2	CRAR	GOI Shareholding
	(net of deductions)					
	Rs. Billion					
Allahabad Bank	58.76	7.72%	8.12%	5.51%	13.62%	55.23%
Andhra Bank	42.21	7.81%	8.18%	5.75%	13.93%	51.55%
Bank of Baroda	131.57	8.43%	9.20%	5.16%	14.36%	53.81%
Bank of India (Consolidated)	122.30	7.51%	8.57%	4.43%	13.00%	64.47%
Bank of Maharashtra	20.69	5.61%	6.41%	6.37%	12.78%	76.77%
Canara Bank	120.30	7.99%	8.54%	4.89%	13.43%	73.17%
Central Bank of India	43.41	4.71%	6.83%	5.40%	12.23%	80.20%
Corporation Bank	57.24	8.19%	9.25%	6.12%	15.37%	57.17%
Dena Bank	22.02	7.33%	8.16%	4.61%	12.77%	51.19%
IDBI Bank	79.52	4.37%	6.35%	5.13%	11.48%	52.67%
Indian Bank	66.03	10.50%	11.13%	1.58%	12.71%	80.00%
Indian Overseas Bank	60.95	7.68%	8.67%	6.11%	14.78%	61.23%
Oriental Bank of Commerce	72.97	8.63%	9.26%	3.25%	12.54%	51.09%
Punjab National Bank	152.07	8.04%	9.11%	5.04%	14.16%	57.80%
Punjab & Sind Bank	21.27	7.14%	7.68%	5.41%	13.10%	100.00%
State Bank of India Group	752.95	8.60%	9.28%	4.21%	13.49%	59.41%
Syndicate Bank	52.06	7.17%	8.24%	4.46%	12.70%	66.47%
UCO Bank	34.82	4.90%	7.06%	6.16%	13.21%	63.59%
Union Bank	86.57	7.06%	7.91%	4.60%	12.51%	55.43%
United Bank	28.71	6.85%	8.16%	4.64%	12.80%	84.20%
Vijaya Bank	24.78	6.40%	7.69%	4.81%	12.50%	53.87%
Total - Public Sector Banks	2,051.19	7.66%	8.60%	4.75%	13.36%	
Axis Bank	153.69	10.89%	11.18%	4.62%	15.80%	
Federal Bank	46.80	16.92%	16.92%	1.44%	18.36%	
HDFC Bank	204.84	13.13%	13.26%	4.20%	17.44%	
ICICI	431.06	12.12%	12.92%	6.23%	19.15%	
Indusind	21.40	9.65%	9.65%	5.68%	15.33%	
ING Vysya Bank	19.72	9.62%	10.11%	4.79%	14.91%	
Jammu & Kashmir Bank	29.86	12.79%	12.79%	3.10%	15.89%	
Kotak Group	74.90	17.31%	17.31%	1.97%	19.28%	
South Indian Bank	14.12	12.42%	12.42%	2.97%	15.39%	
Yes Bank	30.20	11.84%	12.85%	7.76%	20.61%	
Total - Private Sector Banks	1,026.59	12.42%	12.88%	5.05%	17.93%	
Barclays Bank	46.65	16.62%	16.62%	0.46%	17.07%	
Citibank Group	156.07	17.29%	17.29%	0.57%	17.86%	
Deutsche Bank	41.71	16.50%	16.50%	0.71%	17.21%	
HSBC Bank	91.44	16.63%	16.63%	1.40%	18.03%	
RBS	17.22	6.72%	7.94%	4.56%	12.50%	
Standard Chartered Bank	80.37	8.94%	8.94%	3.47%	12.41%	
Total - Foreign Banks	433.46	13.80%	13.90%	1.87%	15.77%	
Commercial Banks	3,511.24	9.19%	9.97%	4.58%	14.55%	