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Mid-Quarter Monetary Policy Review: December 2012

Monetary and Liquidity Measures

On the basis of the current macroeconomic assessment, it has been decided to:

- keep the cash reserve ratio (CRR) of scheduled banks unchanged at 4.25 per cent of their net demand and time liabilities; and
- keep the policy repo rate under the liquidity adjustment facility (LAF) unchanged at 8.0 per cent.

Consequently, the reverse repo rate under the LAF will remain unchanged at 7.0 per cent, and the marginal standing facility (MSF) and the Bank Rate at 9.0 per cent.

Introduction

2. Since the Second Quarter Review (SQR) of October 2012, the global economy has shown some signs of stabilisation although the situation remains fragile. While activity is picking up in the US and the UK, near-term prospects in the euro area are still weak. Moreover, there is no clarity as yet on how the US 'fiscal cliff' might be managed. While several emerging and developing economies (EDEs) are gradually returning to higher growth, weak external demand and contagion risks from advanced economies (AEs) render them vulnerable to further shocks.

3. On the domestic front, there are some incipient signs of pick-up though growth remains significantly below its recent trend. Also, though consumer price inflation remains stubborn, the pace of moderation in wholesale price inflation has been faster than anticipated. With food and manufacturing prices expected to edge down further, inflationary pressures may ease somewhat in the coming months.

Global Economy

4. Since the SQR, global activity has remained sluggish, but country growth trajectories appear to be de-coupling. In the US, the revised GDP estimates for Q3 of 2012 indicate that a pick-up in growth is underway, supported by rising non-farm payroll employment, home sales and house prices. In order to support a stronger recovery, the Fed continued its quantitative easing, and announced further expansion through purchase of longer-term treasury securities. In contrast, euro area growth contracted for a second successive quarter in Q3, and retail sales have been declining at a faster pace in Q4. In Japan, GDP growth contracted in Q3, triggering a fresh dose of fiscal stimulus. Overall, the global purchasing managers' index (PMI) for November points to acceleration, with the all-industry index recording an eight-month high. International energy and non-energy commodity prices softened in November for the second month in a row, suggesting lower inflationary pressures.

Domestic Economy

Growth

5. GDP growth in Q2 of 2012-13 at 5.3 per cent was marginally lower than 5.5 per cent in Q1. However, there are some indications of a modest firming up of activity in Q3. Industrial activity rose sharply in October but this is, in large part, due to a low base and festival-related demand which propelled the growth of both consumer durables and non-durables into double digits. Significantly, capital goods production recorded a growth of 7.5 per cent after 13 successive months of decline. The manufacturing PMI rose moderately in November as order book volumes expanded. While the services PMI declined from a month ago, expansion in new business and order book volumes suggests positive sentiment about increasing activity in the months ahead. In the farm sector, *rabi* sowing coverage is expanding steadily, improving the prospects of agricultural growth.

Inflation

6. Headline WPI inflation edged down to 7.2 per cent in November, mainly owing to softening of prices of vegetables, minerals and fuel. On the other hand, prices of cereals and protein-based items such as eggs, fish and meat firmed up further. Significantly, core (non-food manufactured products) inflation eased, aided by decline in prices of metals, cement and chemicals. The seasonally adjusted three-month

moving average annualised momentum indicator also points to ebbing of inflationary pressures. However, in striking contrast to wholesale inflation developments, retail inflation remained elevated. The new combined (rural and urban) CPI (Base:2010=100) inflation increased in November, reflecting sustained food inflation pressures, particularly in respect of vegetables, cereals, pulses, oils and fats. The non-food component of the index also suggested persistent inflationary pressures.

Monetary and Liquidity Conditions

7. While money supply (M_3) growth remained below its indicative trajectory because of lower deposit growth, non-food credit growth rose above the indicative trajectory of 16 per cent suggesting some pick-up in economic activity. Liquidity conditions have remained tight in Q3 due to large government balances with the Reserve Bank and the widening wedge between deposit and credit growth. With a view to containing the liquidity deficit at reasonable levels, the Reserve Bank conducted open market operations (OMOs) on December 4 and 11, injecting primary liquidity of ₹232 billion. Accordingly, money market rates remained close to the repo rate.

External Sector

8. With the step-up in oil imports persisting despite the moderation in crude prices, the cumulative trade deficit for April-November widened from its level a year ago indicating significant risks to the balance of payments from the adverse external environment. Even as capital inflows improved compared to Q2, there were downward pressures on the rupee reflecting the large trade and current account deficits.

Outlook

9. Lead indicators point to a modest firming up in the momentum of global growth over the rest of 2012 and in 2013 if there is firm policy action in the euro area and the US. The biggest risk to the outlook stems from political economy considerations that could impede, delay or erode resolute policy action. The consequences could be deepened financial stress and heightened risk aversion. For EDEs, the threat of spillovers remains significant in view of the depressed outlook for global trade and volatile capital flows. Although inflation pressures appear to be moderating, elevated food and commodity prices remain contingent risks, especially for EDEs facing domestic supply constraints.

10. On the domestic front, GDP growth is evolving along the baseline projection of 5.8 per cent for 2012-13 set out in the SQR. The recent policy initiatives by the Government and further reforms should help to boost business sentiment and improve the investment climate. As regards inflation, excess capacity in some sectors is working towards moderating core inflation. Furthermore, the easing of international commodity prices, particularly of crude, is expected to impart some softening bias to the evolving inflation conditions if it is not offset by the impact of rupee depreciation. The Reserve Bank is closely monitoring the evolving growth-inflation dynamic and will update the formal numerical assessment of its growth and inflation projections for 2012-13 as part of the third quarter review in January 2013.

Guidance

11. Headline inflation has been below the Reserve Bank's projected levels over the past two months. The decline in core inflation has also been comforting. These emerging patterns reinforce the likelihood of steady moderation in inflation going into 2013-14, though inflation may edge higher over the next two months. In view of inflation pressures ebbing, monetary policy has to increasingly shift focus and respond to the threats to growth from this point onwards. Liquidity conditions will be managed with a view to supporting growth as stated in the SQR, thereby preparing the ground for further shifting the policy stance to support growth. Overall, recent inflation patterns and projections provide a basis for reinforcing our October guidance about policy easing in the fourth quarter. However, risks to inflation remain and accordingly, even as the policy emphasis shifts towards growth, the policy stance will remain sensitive to these risks.

December 18, 2012

SPEECHES

*Transit Path for Indian Economy: Six Steps for Transforming The Elephant into A Tiger**

K. C. Chakrabarty

Shri Prabhat Jain and other members of the Delhi Chapter of the Young Presidents Organisation! It is my pleasure to be here amidst some of the young captains of the Indian industry, who, I believe, would continue to guide their respective enterprises for a foreseeable future and make immense contributions in shaping the Indian Economy going forward. I have been asked to speak to you today on 'transforming the elephant into a tiger' and in this regard, I would suggest six steps that I think are essential for such a transformation. However, at the outset, I thank the Delhi Chapter of the Young Presidents Organisation (YPO) for inviting me to share my thoughts on this important topic. YPO has really established itself as an extra-ordinary network of young global business leaders and a think tank on issues that are critical to economy, businesses and society. I am told the network has hosted some illustrious speakers in the past and therefore, I have to live up to high expectations. I believe the decades of my experience in commercial banks and in the Central Bank have provided me with insights into enterprise, governance, growth and society and their impact on nation-building, which, I would share with you today and hope you find them interesting and worth emulating.

Let us now focus on the topic for the evening. Transforming the elephant into a tiger can mean different things to different people. In reality, the state of the art in genetic engineering still cannot contemplate such a modification. An Ang Lee or a Steven Spielberg can, of course, use computer generated special effects to bring about such a transformation. But it is time to get real – given that the metaphor of elephant is used to denote the Indian economy and deals with our lives and the future of our children.

In 2007, Dr. Shashi Tharoor wrote an enchanting book, 'The Elephant, The Tiger and The Cellphone: Reflections on India: – The Emerging 21st Century Power'. The book, ingrained in history, culture and socio-economic change, criss-crosses the Indian life from Ajanta-Ellora and cricket to cellphones and call centres and makes a simple point of Indian growth effecting change in daily lives and imparting confidence to the Indian people. In December 2008, the Economist of London published a special report that India was elephant, not a tiger. It noted that for all its chaos, bureaucracy and occasional violence, India has had a remarkably successful past few years. But, it wondered how it will cope with an economic downturn and the general elections that were about to follow. It added that the democracy tax was rising and storm-clouds were gathering. The prognosis, however, were proven to be off beam by the events that followed. The elections removed uncertainty and the Indian economy staged a V-shaped recovery clocking 8.4 per cent growth during 2009-10 and 2010-11. Yet, we lost steam and the chinks in the tiger skin that we tried wearing, got exposed.

In July 2011, Shri Swaminathan Anklesaria Aiyar, my journalist friend and a profound observer on the political economy of India, wrote a paper for the Cato Institute, 'The Elephant that Became a Tiger'. In this paper he persuasively argued that 20 years of economic reforms in India had transformed the Indian economy into a tiger. Later the same year, the Reserve Bank Governor Dr. Subbarao, while delivering the Haksar Memorial Lecture, argued that India may be an elephant, but even elephant can dance. The elephant dance was disrupted by the zoo party in the form of global financial crisis. He then suggested ten steps to get back on course by re-jigging the elephant dance.

* Address delivered by Dr. K. C. Chakrabarty, Deputy Governor, Reserve Bank of India at the interaction with members of Delhi Chapter of the Young Presidents Organisation at New Delhi on December 7, 2012. Assistance provided by Dr. Mridul Saggar in preparation of this address is gratefully acknowledged.

Growth in India has clearly slowed down since then to 6.5 per cent in 2011-12 and a likely 5.8 per cent in 2012-13, with significant downside risks. The twin deficits – fiscal and balance of payments – have compounded our problems. This may set us thinking on whether we are an elephant or a tiger or a goat, about to be devoured by global forces and our domestic inaction? So should we at all pursue the tiger dream? If yes, what do we need to do to earn the tiger tag?

The elephant and the tiger: Which one should we prefer?

Before I touch upon what we need to do, the first step is to understand what these metaphors mean. So let me upfront visit the key attributes of elephants & tigers. There are four key attributes of an elephant – the size, the herbivores nature, its perceived moderate pace and its anatomy that includes large ears, the trunk and the tusks. Tiger, on the other hand, is not as large as the elephant, but is largest of the cat species. It is carnivore, and is known for its speed and agility. Its anatomy includes the stripes, the powerful jaws and razor sharp teeth, sharp claws and a flexible backbone. But, what conclusively differentiates the two is the tiger's killer instinct.

I think, in terms of size, the Indian economy is, of course, an elephant. It is also herbivores by habit given its democratic structure, unlike the carnivore habits of tigers and dragons. In terms of speed, many people have a misconception that elephants can't run or walk fast. The fact is that elephants can walk as fast as 25 miles per hour (mph), while tigers can run only a shade faster. Bengal tigers can run at 35 mph, but for short spurts and they can't keep this pace for long.

So, in my view, it is not axiomatic that one should try transforming the elephant into a tiger. Yes, we could do with an added bit of speed but what we should really aim at is developing a tiger's killer instinct. These, together with a better use of our anatomy or resources, both human and capital, would help us achieve what the dragons and the tigers have achieved, perhaps, with a smaller downside. For this to happen, in my view, we need to take the following six steps:

1. Preserve Demographic Dividends by investing in human capital

India's demographic dividend presents the country with a great opportunity to enhance its growth and seek convergence of per capita incomes with that in the developed world. India's birth rate has fallen from 45.6 per 1000 in 1951 to an estimated 21 currently, but still remains highly driven by a slowly falling infant mortality rate that remains high at about 46 per 1000. The death rate has fallen dramatically from 37.2 per 1000 birth in 1951 to an estimated 7 currently, but has still not caused population ageing. Median age for India's population is about 27 years compared with over 40 for most OECD economies. It will add significantly to its labour pool and, even as the median age bucket rises, it will still be at a relatively young 30-34 age bracket by 2026. India's age-dependency ratio (ratio of dependents-people younger than 15 or older than 64-to the working-age population) is currently about 54. This is already lower than Japan and France.

Most developed countries would see a rapid ageing of their population over the next 2-3 decades putting severe pressure on their social security systems with the rise in dependency ratio. The overall median age of these countries rose from 29.0 in 1950 to 37.3 in 2000, and is forecast to rise to 45.5 by 2050.

Many developing countries like China, Brazil and Thailand too face issues of ageing population having passed through the demographic transition. Over the last 60 years, China has experienced demographic change at a historic pace that had a profound impact on its population structure. Baby boom began in the mid-1960s after the period of 'Great Leap Forward' saw famines and a sharp rise in death rate and a fall in birth rate. China is now a 'post-transitional' society, where life expectancy has reached new heights, fertility has declined to below-replacement level, and rapid population ageing is expected over the next few decades. China's population will start to shrink after reaching a peak of about 1.4 billion by 2025 A.D. The median age of its population could touch 50 years by then. India's population would overtake that of China at that point. Its population is expected to peak only at 1.7 billion by 2060 A.D.

Clearly, India has a potential advantage of demographic dividend over its emerging market peers. But, this demographic dividend could be a boon or a curse depending upon how we exploit it, for, the time to reap these gains is finite. By the turn of this century, India would be facing a demographic discount rather than dividend because India's population would have aged and the developed countries' population would be much younger. So what do we need to do to reap the demographic dividend while they exist?

The very first thing is to invest in the resources that are expected to give us advantage. India invests much less than it should in its human capital. The combined spend of central and state governments in education, is just about 3.3 per cent of GDP, while that on health is another 1.3 per cent of GDP. In contrast, the European Union (EU) countries spend from their general government account, 5.5 per cent of their GDP on education and 7.5 per cent of their GDP on health – *i.e.,* nearly three times more of their GDP. Canada's public spending on health alone is over 11 per cent of their GDP and that on education is nearly 5 per cent. India needs to step up its public spending on education and health considerably over the next five years. However, spending alone does not guarantee high quality human capital. We also need to focus on the quality of this spending and think whether we can achieve better outcomes with less spending.

The second step we need to take is for right skilling of our work force. There is shortage of trained manpower for the industry, both at the bottom of the pyramid and higher up the ladder. India is often considered to be a source for skilled labour supply to the rest of the world, given its sheer size of manpower. It is often not recognised that over four-fifths of our rural population and over half of our urban population remains unskilled. Women participation rate in the labour market remains poor. The biggest problem is the lack of focus on technical education that could absorb a large chunk of unskilled labour, if backed by greater push to primary education. Less than 11 per cent of the job-seeking population in the age group of 15-29 receives any form of vocational training in India and only one of every three who do get vocational training receive it from specialised training institutes. Furthermore, even in the value added segment, where we have the largest pool of skilled manpower, *i.e.,* in the area of information technology, real wages are rising at a pace that may impact our competitiveness.

The biggest challenge is to ensure jobs for additional supply of labour that comes in to join the workforce. On a rough basis, about 10 million people would need a job every year for the next 15 years. Though disguised unemployment in agriculture sector has reduced over the years, it may not be possible for the sector to provide additional jobs given the rising rural wages and the need to shift to a corporate, more mechanised and capital intensive model of farming. While the services sector has led India's growth and employment story for some time now, India's growth pace may not be sustained unless the manufacturing sector also becomes more competitive and creates lot more jobs. This poses a significant challenge in employment generation and skilling our work force.

2. Improve productivity and efficiency

Productivity is an important driver of growth. Productivity depends on the efficiency with which scarce resources are allocated – be it your time, work effort, natural resources, capital or any other inputs. A great deal of the growth for most countries can be explained by productivity growth, especially total factor productivity growth (TFPG). Factor accumulation (such as increase in labour or capital) explains a smaller part of the growth. Given this experience, if

India were to become a tiger, it would need to focus on technological developments to improve its rate of TFPG. Capital deepening may also help, but the key lies in overall productivity enhancements.

In India, output per worker has increased at an impressive rate in the services sector after the reforms initiated in early 90s. In this period, TFPG growth has also been impressive for this sector, though I will eschew quoting precise numbers as the growth accounting research generally gives varied quantitative estimates. TFPG growth has also improved for the manufacturing sector since the 1980s. So, progress is being made. However, the rate of this technical change, still, has been lower than that for the East Asian economies during the period in which they earned the tag of being East Asian tigers.

I would rather focus on the issue of larger policy initiative that would be necessary in the quest to transform India into a tiger. In this context, I would make four suggestions. First, improving agriculture productivity is necessary as, clearly, increase in area under cultivation is just not practical and, therefore, increasing demand for cereals, pulses, fruits and vegetables would need to be met by improving yields. Substantial productivity enhancements are possible on the farm through adoption of precision farming techniques, better cultivars and optimal water management. Better adoption of modern technologies in the area of biotechnology, genomic tools, cost-effective and eco-friendly integrated pest management technologies, seed-supply chains and systems, regionally adapted varieties and hybrids, would help.

Second, we need to focus on issues confronting our Small and Medium Enterprise (SME). SME sector accounts for over a third of our industrial output and contributes an equal share of our total merchandise exports. In the current downturn, SMEs are facing adverse business climate with rising receivables, inadequate credit and high cost of credit. SME sector does not enjoy the economies of scale and scope that a large corporation enjoys. It also cannot fully reap the benefit of information technology as it has high sunk cost and a high rate of obsolescence. Though having strong links with large firms, institutional mechanisms for transfer of technology to SMEs are lacking. If SMEs are to effectively integrate with supply chains, we need to ensure that links of finance and technology with large firms work at all times.

Third, as I mentioned a little earlier, India's next growth push has to come from manufacturing sector. We had a missed century of opportunities. India cannot boast of one big 'home grown' global brand while much smaller nations like South Korea, Taiwan, *etc.* have plenty of them. Our abundant human capital has not been effectively channelised for supporting the manufacturing growth. But what I would really blame for this is a lack of 'R & D' culture that we suffer from. Globally, India figures at near the bottom in terms of R&D intensity. It spends less than one percentage of its GDP on R&D expenditure, Countries like Israel, Finland, Sweden, Korea, Japan, US and Germany have R&D intensities that are higher by three times or more.

Fourth, a key issue related to productivity is our attitude to work. It is strange that India, that epitomised the dignity of labour in the Early Vedic period, has imbibed a culture that does not respect workers. We have forgotten Swami Vivekananda's contribution in equating work to worship. No form of work, whether manual or intellectual is less inferior to the other. As a nation, we have been steadily neglecting our respect for dignity of labour. Since the manual labour does not receive the same respect as an intellectual work in India, work efforts are lost. This results in lower GDP and lower Welfare. Individuals idle away than take up a manual job. What else would explain the fact that labourers from poor states like Bihar, Orissa, UP, *etc.* migrate and work hard in the agricultural farms in Punjab and Haryana, while refusing to do the same in their own locality where the land is more fertile and same amount of labour would be much more productive. We must emulate the western society in this regard where no form of labour is discriminated against. If President Cleveland could accept dignity of labour in 1894, more than a century down the line it is time that we give respect to casual labour that operates around us – be it our maids, our drivers or the workmen in our factories – a due recognition and respect. If we do so, more women and men would join the workforce. Unemployment would be reduced and Indian industry would become more competitive globally.

3. Revive infrastructure investments and harness natural resources better

Much has been said about India's infrastructure deficit and rightly so. India does not have sufficient roads, nor sufficient power. When I was growing up, I was taught that India is a land of poor, but is rich in resources. Today we have made a giant leap in lowering poverty and still remain abundant in natural resources. Yet, we have not learnt to optimally utilise them. Take for example coal, which accounts for India's 55 per cent of energy needs. We have hard coal reserves of around 246 billion tonnes, of which 92 billion tonnes are proven. Yet, we are able to produce only 530 million tonnes of coal, leaving supply shortages of over 150 million tonnes. Coal shortages are constraining our power generation and though about 55 GW of new capacity was created during the 11th Five Year Plan (FYP), a large part of it remains unutilised due to coal shortages. Private sector has failed to develop most of the new coal blocks that were allotted to them. We ended up with inadequate planning and poor execution in this area. We are now planning to create even more thermal power capacity during the 12th FYP, but remain unsure of coal supplies. At the same time, banks have heavily extended themselves into lending to power sector both on generation and distribution side. On the distribution side, the State distribution companies (discoms) are sitting on huge losses and bank debt that is threatening to go bad. The end result is a loss of business confidence that has brought the investment boom to a premature halt.

What is most important in this context is to revive the confidence for investing and lending to the infrastructure sector. The government, in recent period, has taken several steps to facilitate this. The broad contours of the New Fuel Supply Agreements (FSAs) have been worked out, though some thorny issues such as price pooling of imported and domestic coal are still to be resolved. These pending issues must be solved quickly. Similarly, a debt restructuring package for the discoms has been worked out. The private sector must seize the initiative and rekindle the Schumpeterian spirit at this juncture. Banks also need to perform their core banking business while balancing risk assessment with the functional need to support growth.

We also need to harness our natural resources much better. Take the simple example of water. We are a country blessed with water resources with a network of perennial rivers and abundant rainfall. The rainfall provides four times the water that we use annually. Yet, water is a scarce resource in India. We haven't harnessed our resources enough and haven't planned the storage and distribution of water efficiently. India's per capita storage capacity is significantly lower than that of other countries. For example, the quantum of water that can be stored as a proportion of average river runoff for India is just 50 days of average runoff with wide variations—from 220 days in the Krishna to just two days in the Brahmaputra/Barak Basin. The comparable figures for the Colorado River Basin and Australia's Murray-Darling Basin are 900 days while for South Africa's Orange River Basin it is 350 days. Better water management could radically alter the agriculture situation in India.

India also needs to utilise its mining, spectrum and air resources better. The importance of clean air is often not recognised. We need to strike a right balance between our development needs and environmental commitments to ensure long-run growth sustainability. We are not among the world's top polluters. It needs to be recognised that average per square kilometre carbon dioxide (CO_2) pollution in Japan is 7.5 times more than in India. Similarly, per capita CO_2 emission by India is amongst the least globally. Nevertheless, we also need to note that air pollution has serious health costs and India ranks fourth in the list of the largest CO_2 pollutants after China, US and Russia. As such, if we want to ensure not just fast growth but also good quality growth sustainable for a fairly long period of time, we must continue to make efforts to exploit natural resources in an environmentally friendly way.

4. Improve governance at every level

The World Bank's worldwide governance indicators 2006-11 place India below average on key parameters of governance. It scores about 15 per cent on political stability and absence of violence, 40 per cent on control on corruption as well as regulatory quality, 55 per cent on rule of law as well as government effectiveness, while 60 per cent on vice and accountability. Clearly, there is lot of scope for improvement on these parameters. Both, our overall governance and corporate governance needs improvement. In fact, we need better governance at every level – from hospital and schools to polity, firms, non-profit institutions, sports, banking and finance, regulation, land records and even in our daily lives.

Our governance deficit, in some form, is reflected in our ranking on ease of doing business. According to the IFC-World Bank Report 2013 released this year, India ranks 132nd on the index measuring 'ease of doing business' amongst 185 economies. Singapore and Hong Kong got the top and second spots overall. In its sub-components, India stands at an impressive 23rd on the criteria of ease of getting credit and 49th in terms of protecting investors. However, it figures at 173rd in terms of starting a business, 182nd in terms of dealing with construction permits and 184th in contract enforcement.

According to the same report, on an average, in India it requires 173 days to start a business, 196 days for obtaining a construction permit and 67 days to get electricity. In Singapore one needs just 3 days to start a business, 26 days for construction permit and 36 days for getting electricity. All other East Asian tigers also have a far superior record than India on these parameters.

If we aspire to become a tiger we must become more business friendly, both for domestic and foreign firms, traders and tourists. We, of course, have an enviable record of a democratic system, a responsive government, an active media and an independent judiciary. However, the risk of dealing with India must come down further. We have to reach where the East Asian tigers reached. It is for this reason that we advocated the adoption of Singapore model in the last RBI Annual Report. In a limited way, this is being attempted in the form of National Investment Board (NIB). A well-functioning NIB can go a long way in cutting project delays. However, in our federal structure, NIB would still have some limitations. It will not have jurisdiction over project clearances that are required at sub-national levels. The Singapore model is a step further. It requires all concerned agencies to sit together in a time bound manner to clear or reject projects, failing which the clearance is deemed to be automatic. We must make doing business easy, to unleash entrepreneurship and venture capitalism in India.

We also need to improve our record of corporate governance in both financial and non-financial firms. Barriers to entry must collapse and a more competitive environment needs to be generated. However, we must develop a framework and inculcate practices of arms length relationships that do not permit connected lending and business relationships that may promote 'looting' behaviour as described by Akerlof (awarded the Nobel Prize in 2001) and Romer. They argued that an economic underground can come to life if firms have an incentive to go broke for profit at society's expense (to loot) instead of to go for broke (to gamble on success). Bankruptcy for profit will occur if poor accounting, lax regulation, or low penalties for abuse give owners an incentive to pay themselves more than their firms are worth and then default on their debt obligations. There is still a large gap arising from our nominal compliance of good corporate governance in accordance with regulatory provisions and real compliance of practicing it in law and spirit. We need to bridge this gap.

5. Enforce Accountability in all walks of life

All the other five steps that I talk of in this address, including real compliance of good governance cannot be achieved unless we enforce accountability. Just as we need better governance at every level, we also need to enforce accountability in all walks of life. Our accountability structures, especially in public sector, are weak. In administration, the civil servants are insufficiently incentivised for the risks they take, are seldom rewarded for successful completion of their goals and are, at best, merely transferred for poor implementation. Mangers in public sector enterprises face similar problems in addition to bureaucratic interventions that delay decisions or require them to move away from policies which may be in the best interests of a public sector unit. It is difficult to enforce accountability in this climate.

On corporate accountability, the principal-agent relationship between the management or those who wrest ownership and control and the shareholders as actual owners is rather weak. We have seen asset stripping and bankruptcies in this weak environment. This has been especially true where a complex web of companies within business groups prevail. There is a strong case for simplifying these structures that are often developed to evade taxes, indulge in regulatory arbitrage and to strip assets of the firm for personal use. In recent period, we have come across instances where corporate debt restructuring is sought but ownership commitment of those who have control is rather left weak. We must enforce accountability in such cases by forcing such business entities to bring in more of their capital. There are, sometimes, grave cases of businessmen launching new firms, renaming firms or indulging in M&As to garner fresh public money after they misused funds in the first instance. The concept of the modern firm based on limited liability principle requires care to prevent such practices.

Our political process ensures a fair deal of accountability through our democratic institutions. Yet, there is debate on whether a right to recall should exist. A more fragmented polity and existence of coalitions and minority governments, sometimes, make matters worse. Accountability at the municipal levels is also lacking. This, in turn, impacts the upkeep of our infrastructure that gets built. Roads seldom last more than a year. Drainage systems choke.

What is, therefore, necessary in this climate is to do four things. First, stakeholder engagement must be intensified in all institutions – public or private. Furthermore, there should be a principle of inclusivity in stakeholder engagement so that any sort of regulatory capture by interest groups is avoided. Second, individuals, rather than committees or groups, should be made accountable even where a collegiate approach is adopted. Such accountability should not be time barred by transfers of jobs or retirements. Third, financial accountability must be enforced for all. For enhancing fiscal transparency, the budgetary processes should be made tighter so that slippages are eliminated. Similarly, financial accountability needs to be promoted for firms and non-profit institutions. Fourth, accountability should be codified to the degree it can be done and a periodic evaluation must be done to assess achievement, failures and correctives.

6. Make finance more responsive to real sector and promote inclusive growth

Let me, at last, cover the role of finance in India's transformation from elephant to tiger. I have kept this for the end because this is where finance should belong to. In recent period, finance has become big and rather than responding to the real sector needs, it is leading the real sector. Too-big – to fail syndrome, firms depending on other incomes to shore up their accounts, market herd behaviour driven by noise rather than fundamentals, are all examples of finance sector becoming too big for its boots. Yet, the finance to support real activity is still inadequate. Firms and businesses still get crowded out by information asymmetry. Financial frictions and financial constraints come in the way of investment and growth in the economy. For want of collaterals, the poor cannot access even elementary banking services, resulting not only in some potential saving getting lost but leaving the society more unequal and polarised with insufficient support for Pareto superior outcomes just because gainers can't compensate the losers.

Finance must be regulated more tightly. This does not require more regulations but perhaps less and newer regulations with greater effectiveness. At the same time, those who engage in finance must have an obligation towards promoting financial inclusion, without which inclusive growth cannot be achieved. Banking should have a human face for it is the households who provide the base for all banking activities. They are the only ones with financial surpluses which can be intermediated to corporate and public sectors that run financial deficits. It has been my endeavour to push policies on bank lending with a view to encourage credit flows to the vulnerable section of the population that would otherwise get financially excluded.

Over the years, this has been the ethos of the Reserve Bank. The branch licensing policy and the directed lending route have been the two pillars on which the efforts for financial inclusion have rested for a long time. The bank licensing policy, mandating a certain ratio of rural bank branches for each license for urban branch, has often been criticised by banks as coming in the way of their business interests. However, there is strong research evidence to suggest that this social banking experiment in India has been successful in improving the credit flows to the rural population and even in lowering poverty as a result. The priority sector lending (PSL) stipulation has also improved the flow of credit to certain productive sectors of the economy that would otherwise have been crowded out of the bank credit market due to information asymmetries. There are reasons to believe that with proper planning and use of technology-enabled efficient delivery channels, banks can pursue financial inclusion in a profitable way.

Our approach should not be seen as being interventionist. In practice, the Reserve Bank has deftly balanced objectives of equity and efficiency so that financial inclusion is furthered, but banks' financial health is not impaired. In more recent period with which I have been associated, we have redoubled our efforts at financial inclusion. For instance, the prescription for PSL in respect of foreign banks has been raised from 32 per cent to 40 per cent in case of those banks which have 20 or more branches. We have also imparted a more human touch to basic banking for those who did not have bank accounts.

Conclusion

Let me end by talking about something we need to learn from the East Asian tigers in our quest to become one. Growth acceleration in these tigers were supported by liberalisation, export-led growth, high investment in education, large share of educated workforce, high public and private savings rate and macroeconomic discipline and governance. We are pursuing some of these policies and can pursue some more of them. However, these tigers also failed to maintain their spurt because of some mistakes they committed. Some of them maintained high interest rate to attract foreign investments, others pegged currency arrangements and many of them developed a vulnerable financial system. An unanticipated shock from banking and currency side, therefore, resulted in growth collapse for them during the East Asian crisis. Corporate failures added to the financial sector woes in some countries (especially Chaebols in Korea). While transforming the Indian economy into a tiger, we need to calibrate policies taking into account the lessons learnt during the East Asian crisis.

Thank you for your patient hearing. Downturns come and go away as business cycles run their course. In our present predicaments with macro-economic stabilisation, we must not lose sight of our larger goals, whether we walk at an elephant's pace or run like a tiger. Let me assure you that as a society, if we can inculcate an aggressive and tenacious urge to attain a set goal – the killer instinct of the tiger – we would definitely earn our rightful place under the sun.

Bibliography

Aiyar, Swaminathan Anklesaria (2011), 'The Elephant That Became a Tiger: 20 Years of Economic Reform in India', Cato Institute, Development Policy Analysis, no. 13, July 20, 2011.

Akerlof, George A. and Paul M. Romer (1993), 'Looting: The Economic Underworld of Bankruptcy for Profit', Brookings Papers on Economic Activity, Vol. 1993, No. 2 (1993), pp. 1-73.

Bosworth, Barry and Susan M. Collins (2007), ''Accounting for Growth: Comparing China and India', NBER Working Paper No.12943, February.

Tharoor, Shashi (2007), The Elephant, The Tiger and the Cellphone: Reflections on India: – The Emerging 21st Century Power, New York: Arcade Publishers.

Subbarao, Duvvuri (2011), 'Rejigging the Elephant Dance', Haksar Memorial Lecture delivered by Dr. Duvvuri Subbarao, Governor, Reserve Bank of India at the Centre for Research in Rural & Industrial Development, Chandigarh on November 25, 2011, reprinted in RBI Bulletin, December 2011, p.2041-48.

World Bank and IFC (2012), Doing Business 2013: Smarter Regulations for Small and Medium Enterprises, Washington, The World Bank.

*Contemporary Issues in Banking: Reflections on Viewpoints of a Bank Economist**

K. C. Chakrabarty

Dr. M. Narendra, Chairman and Managing Director, Indian Overseas Bank (IOB); Shri A.K. Bansal and Shri A.D.M. Chavali, Executive Directors of IOB; Shri N. Viswanathan, Regional Director, RBI; Smt. Indira Padmini and other General Managers of IOB; Shri M. Ramaswamy, Retired Secretary of Auroville; Shri S. Muthiah, Historian; Shri M.Ct.P. Chidambaram, grandson of the founder of Indian Overseas Bank; Shri B.J. Krishnan, Environmentalist; Shri Bhakther Solomon, Chief Executive Officer of Development Promotion Group; Shri Dharmalingam Venugopal, who is the reason for our assembling here today; serving and retired members of the banking fraternity, other invited dignitaries whom I have not specifically named; ladies and gentlemen. It is a matter of great pleasure for me to be present here today on the occasion of release of Shri D. Venugopal's book 'Indian Banking Reforms and After: A Bank Economist's Take'. Based on my interaction with Shri Venugopal and reading of his articles, my assessment of him is of an individual with an incisive mind and an ability to dispassionately analyse diverse subjects of concern to the economy.

2. The book being released today is an anthology of articles written by him in various national and financial dailies over a period of time. It deals with an impressive array of subjects and provides a bank economist's perspective on various issues, which certainly makes an interesting reading. I congratulate Shri Venugopal for the book, of which I had the privilege of writing the foreword, and hope the book gets all the success and accolades that it, so richly, deserves.

3. The first thing that strikes about the collection of articles featured in the book is the wide time horizon over which the articles were penned. The book succeeds in providing a panoramic view of issues that have confronted the economy over the last two decades, a period that has been exciting for the Indian economy with the country moving from the throes of despair at the beginning of the decade of the 90s to a period of heady growth and further, to the present, when we are facing multiple challenges. The book deftly captures several major landmark events/developments in the banking sector with the perspective of the point of time when these articles were actually written. It is noteworthy that apart from India, Shri Venugopal has also extensively covered the economic developments in China in his articles. Shri Venugopal has made a strong pitch for economic cooperation between the two major Asian markets naming China as the market of the future and stating that India should seek to get its due share of this market. It is actually a tribute to the vision of the man, as he has intensively focussed on two economies that have, since, seen a lot of economic prosperity and have become the cynosure of all in the global market place. As the Indian economy battles challenges on multiple fronts, Shri Venugopal's articles could provide valuable insights into these challenges and provide guidance for overcoming them.

4. The Indian banking system has seen a complete transformation during the last two decades, in sync with the progress made by the real economy. Almost every aspect of banking operation has seen significant change during this period as banks sought to reinvent themselves in an attempt to retain their preeminent position in the financial system. The period saw banks moving beyond brick and mortar branches to adopt innovative delivery channels including internet banking, ATMs, call centres, kiosks, Business Correspondents (BCs), *etc.* New products such as retail

* Remarks by Dr. K. C. Chakrabarty, Deputy Governor, Reserve Bank of India at a book release function organised by Indian Overseas Bank at Chennai on December 30, 2012.

banking gained prominence. Banks have sought to grow, not just in terms of balance sheet size, but also in terms of greater penetration of banking services to the hitherto unbanked segments of the population. It is reasonable to say that banks have succeeded in rising up to the challenges posed by the unique needs of a transforming economy and have, in no small measure, contributed to the nation's economic progress during this period.

5. The growth of the banking system and its pivotal position in the country's financial architecture implies that the banks cater to a whole host of diverse stakeholders who have equally diverse expectations. The success of individual banks and of the banking system as a whole depends on how well these stakeholder expectations are met. Some of the problems currently facing the banking industry bear their genesis to banks' inability to align their business operations with stakeholder expectations. In view of the considerable debate (and sometimes noise) generated by the ills plaguing the banking sector, I thought it appropriate to briefly flag some random thoughts on steps the Indian banking industry needs to take, in order to effectively meet the diverse stakeholder expectations and overcome the present challenges. Some of these thoughts also find resonance in the articles presented in Shri Venugopal's book.

A) Productivity and Efficiency

6. Banks play the critical role of financial intermediation by performing the task of maturity and risk transformation, besides providing payment and settlement services. In order to effectively perform these functions, banks need to ensure that they maintain high levels of productivity and efficiency in their operations. Two kinds of efficiency are essential for banks:

- **Allocational Efficiency:** This requires banks to ensure that the precious societal resources are allotted to the most productive activities. Besides, while taking allocation decisions, the interests of the most vulnerable sections of the society should also be taken into account.
- **Operational Efficiency:** Operational Efficiency requires banks to perform the financial intermediation function in a safe, secure and speedy manner while ensuring that the cost of performing the intermediation function is minimised. While profit margins are important for sustaining banking operations, the cost of operational inefficiencies of banks should not be passed on to customers by way of higher service charges and fees.

7. Indian banks need to improve both, allocational and operational efficiency, so that the financial intermediation function is effectively performed. This would include reengineering of all critical products and processes by leveraging on innovative technology-based solutions, while retaining a strong customer-centric focus.

B) Financial Consumer Protection and its Linkage to Risk Management Function

8. Financial Consumer Protection has emerged as a key area of supervisory focus globally. The global financial crisis has highlighted the vulnerability of the consumer class, which has been worst hit in the crisis. The key feature of the exploitation has been the discriminatory, non- transparent and illogical pricing which has affected the poor and vulnerable consumers most emphatically. The product innovations have not focused on customer requirements and have, instead, aimed at serving the interests of the service provider. The basic fact, that the well being of the consumer is essential for the sustainability and growth of the service provider, has been lost sight of. As part of its regulatory reform agenda, G-20 Finance Ministers and Central Bank Governors have also endorsed a set of High-level Principles on Financial Consumer Protection, underlining its overall importance for financial stability. The principles enjoin upon the

supervisors and oversight bodies to ensure an equitable and fair treatment of consumers, disclosure and transparency in product and service offerings along with promotion of financial education and awareness amongst the consumers.

9. In this context, I would like to highlight some important aspects of consumer protection and risk management that banks need to imbibe in their business processes:

- Pricing of asset and liability products should be transparent and non-discriminatory. At a minimum, it must be ensured that poor do not subsidise the provision of banking services to the rich.
- The business operations of banks should be customer-centric in nature. This should be reflected in all aspects of banking operations including creation of customised products and services, pricing of services, delivery channels, *etc.* Banks should, inherently, be flexible in their operations so that they have the ability to meet the evolving stakeholder expectations.
- Banks should be able to appreciate the risk-return trade-off involved in various activities. The basic premise that greater return would invariably come from assumption of higher risk, needs to be appreciated and disseminated, both within the organisation and to banks' customers. Banks need to develop the ability to discern good risk from bad, so that they selectively take on only those risks that are in alignment with the bank's long-term strategic vision.
- The culture of efficient risk management needs to be imbibed in the organisation's ethos so that everyone from the top management to frontline managers in the field shares a common vision of risk management.

10. A key related issue is the integrity of MIS in banks. Each bank claims to be oriented towards its customers. But, I have a simple poser. Are the banks aware of the number of customers they have? I am not referring to the number of accounts but the actual number of customers that the bank serves across all business verticals by offering different products. Moreover, most of the banks do not have a system of working out activity wise costs and returns. Unless banks know the return on each and every product, they cannot arrive at a truly risk based pricing.

C) Impaired Assets

11. Another issue which is generating considerable concern and is likely to impact banks' ability to serve its stakeholders is the rising portfolio of non-performing assets (NPAs) and restructured loans. While the downturn in business environment globally and in India has contributed to this rise, we need to reflect on why our risk management practices during boom time were unable to anticipate future downturns and build up suitable safeguards while giving loans.

12. I do believe that the rising impaired assets is a 'governance' issue as banks have forgotten the art of saying 'no', except, may be, to small borrowers. Banks need to significantly improve their risk assessment capability and their ability to price risks, so that they take on only those risks that they understand and can effectively manage. I believe that this need is all the more pronounced in the case of public sector banks, which, at times, end up with assets that have been exited by private sector/foreign banks on account of inherent weaknesses.

13. The ability to manage NPAs is important in order to preserve the strength of bank balance sheets and to retain the appetite to take on good risks. An attitude of complete risk aversion would not be appropriate as banks are in the business of taking risks, but with adequate safeguards. I note that NPAs are a recurrent theme in Shri Venugopal's articles and hope that they do provide insights into how banks can manage this

problem.

14. Another issue that I would like to bring up before you is the element of discrimination practiced by the banks in restructuring of loans. Analysis of available data indicates that the larger borrowers have invariably received the benefit of restructuring of loans, while the restructuring in case of SME/agriculture loans has remained abysmally low. I believe that with timely intervention and support from the banks, this sector would have definitely shown much lower levels of impaired assets than it presently does.

D) Financial Inclusion

15. Despite several steps having been taken by the Government and the Reserve Bank of India, the extent of exclusion in the Indian financial system continues to be unacceptably high. The unbanked masses constitute a unique but important stakeholder group for banks, even though they may not be bank customers. Meeting the expectations of this group through financial inclusion efforts presents a huge business opportunity for banks.

16. While there is no 'one-size-fits-all' approach to financial inclusion, it is important that banks recognise three important prerequisites for maximising the benefits of financial inclusion efforts. These are:

- Holistic approach to provision of financial services, not just credit or deposit alone
- Meeting the needs of small firms
- Focussing on segments of population excluded by gender or geographical remoteness

17. Banks need to focus on leveraging technology to create new business models and delivery channels that are customised to the needs of the targeted population. Technology has the potential to act as a force multiplier in our financial inclusion efforts, provided it is implemented in a planned manner. There is, however, an increasing realisation that mere reliance on technology-enabled non-face to face channels alone would not be sufficient to meet our goal of creating an inclusive financial system. There is a need for opening more brick and mortar outlets as delivery points, both as a control mechanism for BCs and to gain the trust and acceptability of the masses.

18. Our assessment of the progress in financial inclusion since the introduction of Board approved Financial Inclusion Plans is that while there has been considerable progress in the number of accounts opened, the actual number of transactions per account or per BC continues to be extremely low. This reduces the viability of the financial inclusion efforts and would, ultimately, results in concerned stakeholders losing interest in the exercise. The low transaction levels indicate inadequacies on both the demand and supply sides such as deficiencies in BC operations, non-distribution of smart cards, lack of awareness on the part of the account holders, *etc.* Banks need to identify the causes for the low transaction rates and urgently address them. In order to be successful, sustainable and scalable, financial inclusion should necessarily be commercially viable for everybody including the bank, the BC and the technology provider. However, the pricing should not result in exploitation of the customers.

19. It is, indeed, very gratifying to note that besides including financial inclusion prominently in his articles, Shri Venugopal, is also working for the financial inclusion of primitive tribes of the Nilgiri district. I am also very pleased to note that he is a great friend and protector of nature, especially the Nilgiris and has been staunchly espousing the cause of the environment throughout his career. We need more such dedicated persons with a genuine passion for inclusive and sustainable growth.

Conclusion

20. As with the economy, the Indian banking system is also at a crossroads with multiple opportunities and challenges before it. We need to make the right choices now in order to ensure the future of the banking system as the key pillar upon which the economic

prosperity of the country rests. Banks are the lifeline of any economy and it is the collective responsibility of all of us to ensure that we have a strong, resilient and inclusive banking system geared up to face all domestic and global challenges.

21. Opinions of thought leaders such as Shri Venugopal are important in deciding the right course of action for taking the banking system forward. The collection of articles in this book provides insights into how the economy has developed over the last two decades and provides clues to tackling the current challenges. The narratives are in a very simple language and the coverage of a diverse set of topics makes the book eminently readable and useful to most people. I hope the book is the first in a series of many more to follow. I once again congratulate Shri Venugopal for the book and wish it all success. I also thank Dr. Narendra and Indian Overseas Bank for this wonderful function.

Thank you.

*Unearned and Unshared Prosperity are Unsustainable**

V. K. Sharma

As is invariably the case with any major crisis, the ongoing global financial and economic crisis, including lately, of course, the eurozone crisis, have unleashed a passionate debate over the design of a new architecture of finance, capitalism and globalisation. However, the trouble has been not so much with the inter-temporally evolved architecture of finance, capitalism and globalisation as really with how it was actually worked in practice. The apocalyptic denouement, almost bordering on a veritable global financial and economic nuclear winter, happened not because the existing systems and best practices failed but because those responsible for implementing, and enforcing, them failed them! After all, of all risks to regulators and regulatees alike, human resources risk is by far the most serious as it is the source of all risks as confirmed by the ongoing financial and economic cataclysm. Effective and credible systems are not about right architecture but about right people for right people can make a wrong architecture work while wrong people can't make even a right architecture work ! This 'right people-wrong people' trade-off is substantively, and effectively, about 'ethics-expediency' trade-off, with the overwhelming anecdotal evidence of 'expediency' prevailing over 'ethics' ! The crux of the matter is what we need is not more, or less, regulation, but good regulation, and governance. This has been the undoing of regulators/ supervisors and financial firms/banks alike. But unfortunately broad-spectrum and generic failure of an inertial regulatory and supervisory system worldwide, especially in the West, precipitated the unprecedented global financial crisis and the resulting great recession. This regulatory and supervisory inertia and imperviousness to the early warning signals of unprecedented underpricing of risk, which were galore, and aplenty, pre-crisis, is graphically epitomised by the most no-holds-barred acknowledgement of this – though it came much later only recently – was when Donald Kohn, former Vice Chairman of the US Federal Reserve apologised by saying, 'The cops were not on the beat, resulting in the worst economic recession and loss of millions of jobs'! At the end of the day, the problem is not not knowing the problem, but knowing it and dithering, agonising over choices, temporising, procrastinating and doing nothing credible, timely, tangible and decisive about it. In other words, in my considered opinion, we don't really have to rethink capitalism and globalisation, for paraphrasing John Ruskin, what finally matters is not knowing what must be done but actually doing what must be done and doing it when it must be done !!

2. The cataclysmic financial crisis has thrown into sharp relief, as never before, the critical and important role of 'asset price' inflation/asset bubbles also, as opposed to that of shop floor/products/services inflation alone, as a key variable, in monetary policy response. For what happened was unprecedented in that with monetary policy focused only on traditional CPI, interest rates were kept low in spite of exploding prices of assets like real estate/property, credit assets, equity and commodities. And this was all made possible because of the huge pre-crisis current account surpluses in China and other Emerging Market Economies (EMEs), and huge private capital inflows into EMEs in excess of their current account deficits, getting recycled back as official capital flows into government bonds of reserve currency countries, especially the USA, resulting in compression of long-term yields which, in turn, translated into lower long-term interest rates even for the riskier asset classes

* Keynote Address delivered by Shri V. K. Sharma, Executive Director, Reserve Bank of India, on 30th November 2012, at International Leadership Symposium on 'Rethinking Capitalism and Globalisation' organised by World Forum for Ethics in Business in partnership with World Bank Institute at European Parliament, Brussels, Belgium. The views expressed are those of the author and not of the Reserve Bank of India.

mentioned above. This chasing of yield, due to global savings glut, in turn, led to a veritable credit bubble, characterised by unprecedented underpricing of risk as reflected in the all-time-low risk premia with junk bonds spreads becoming indistinguishable from investment grade debt! Such a low interest rate environment coupled with luxuriant supply of liquidity, created enabling environment for excessive leverage and risk taking. This financial syndrome was a classical case of ''too much' and 'too little' – too much liquidity, too much leverage, too much complex financial engineering, too little return for risk, too little understanding of risks'. This syndrome of too much of arcane rocket science and financial alchemy in the financial sector, almost entirely for its own sake to almost complete exclusion of the needs of the real sector, created a massive 'financial sector – real sector imbalance' which, being, intrinsically unsustainable, culminated eventually into the now-all-too-familiar apocalyptic denouement.

3. Significantly, the above pre-2007 story of massive and unprecedented current account imbalances was almost replicated in the current on-going eurozone crisis with large and persistent current account imbalances between the core, proxied by Germany, and the Netherlands, and the crisis-hit periphery, with the surpluses of the core being almost mirror image of the current account deficits of the periphery. Indeed, it is noteworthy that current account surpluses of the core increased dramatically after the launch of the single currency because of significant depreciation of the real exchange rate in the core and appreciation of the real exchange rate in the periphery. Such large, and persistent, current account imbalances between the core and the periphery would not have been possible but for the explicit moral hazard of fixed and stable exchange rates created by the single currency because the respective national currencies of the periphery would have depreciated in real terms resulting in timely automatic rebalancing of the current account imbalances! Incidentally, but significantly, these current account imbalances between the 'core' and the 'periphery' are, to an extent, the result of post-1999 fiscal convergence to fiscal divergence story in the eurozone for, unless, net private savings offset it, fiscal deficit typically tends to spill over into current account deficit and, therefore, post-euro launch, there ought to have been a credible, effective and functioning institutional enforcement mechanism to ensure ongoing compliance on Maastricht fiscal parameters. Of course, this post-1999 fiscal convergence to fiscal divergence story in the 'periphery' would not have mattered if, like in the case of Japan, net private savings more than offset the comparable net public dissaving (fiscal deficit) of -9.5 per cent ! So the way out of the current crisis is unwinding these imbalances through higher productivity and competitiveness in the periphery relative to the core. This is exactly what happened post-crisis in the case of unwinding of the imbalances between China, on the one hand, and the United States, on the other, with the United States current account deficit halving from almost 6 per cent in 2007 to 3 per cent currently and that of China's current account surplus shrinking steeply from 10 per cent in 2007 to 2.6 per cent currently ! Thus, in the framework of 'unearned – unshared prosperity', it was the case of 'unearned' prosperity for the 'deficit' periphery and 'unshared' prosperity for the 'surplus' core ! But as in the case of China and the United States, there is some good news that real wages in Germany have gone up by 3 per cent and those in Greece have gone down by 7 per cent. Going forward, this then holds the promise of unwinding such imbalances by export of goods and services from the 'periphery' and import of goods and services by the 'core'.

4. As I said, these large and persistent current account imbalances represented 'unearned' prosperity for deficit reserve currency countries and 'unshared' prosperity for surplus countries. Such a global economic order was inherently unsustainable, and unstable, from the word go. But the greatest good, and the highest virtue, as it were, of sustainable

globalisation is that, it does not permit, except in the very short-term, 'unearned' and 'unshared' prosperity but delivers 'sustainable prosperity' only if they are 'earned' and 'shared' prosperity! And mind you, 'unearned' and 'unshared' prosperity are no socialistic/ egalitarian platitudinal rhetoric but pretty compelling real-politik and geo-economic imperatives given the current irreversibly globalised and, increasingly integrated, and interdependent, world. Sustainable globalisation is about macroeconomic equilibrium, balance and harmony. In fact, the whole thing can be likened to cosmic balance/equilibrium/harmony where stars, suns, planets, all orbit within the inviolable discipline of their elliptical orbits which do not permit deviant behaviour beyond the shortest and the longest distance from suns and stars of orbiting planets ! Any deviant behaviour/conduct, inconsistent with the cosmic harmonious balance and equilibrium, will invite, and inflict, extremely retributive backlash; the more severe and prolonged the disequilibrium and imbalance, the more wrenching and excruciating will be the resulting pain as is currently being experienced, especially in the euro zone, where, it is no brainer to see that, in the event of the break-up of the euro, it is the surplus/creditor 'core' that has far more to lose than the deficit/debtor 'periphery'! For if the surplus/creditor 'core' exit the euro, value of what is left of the euro will be worth much less in terms of national currencies of the exiting surplus/creditor countries. On the other hand, if the deficit/debtor 'periphery' exit, they will simply default on their euro-denominated debt owed to the surplus/creditor 'core' because of the collapse of their national currencies against the euro! In other words, in sustainable globalisation, there can be both winners, and losers, only in the short-term, for such is the nature of sustainable globalisation that, in the long-term, there can only be all winners and no losers! To conclude, therefore, if we earn and share, we prosper together, and if we don't, we perish together!!

*Perspectives on India's Balance of Payments**

Deepak Mohanty

I thank Professor Sar for inviting me to address this young audience. In the recent years, India's integration with the global economy has increased significantly. This is reflected in our expanding volume of external trade and financial transactions. While this process has several benefits arising from wider access to consumption and investment, there is attendant cost of periodic instability. Over the last two years, the Reserve Bank has been drawing attention to the widening current account deficit (CAD) in our balance of payments (BoP). The risks to our BoP have increased both in the global and domestic context: first, following the global financial crisis trade volumes have slumped and capital flows have become volatile; second, slowing domestic growth coupled with a large fiscal deficit alongside a high CAD poses twin deficit risks. In this context, I propose to capture the evolution of India's BoP in the historical context and trace how did we respond to risks to external stability from time to time?

Let me start from the basics. What is BoP? It is our transaction account with the rest of the world. It can be better appreciated in terms of the national income accounting identity: GDP = C+G+I+X-M. In other words, domestic output (GDP) is equal to private consumption (C), plus government consumption (G), plus domestic investment (I), plus net exports (X-M). If net exports of goods and services (X-M) are negative, the domestic economy is absorbing more than it can produce. In other words, absorption (C+G+I) by the domestic economy is greater than domestic output (GDP). This is reflected in current account deficit (X-M) which needs to be financed by external borrowings and/or investments. In normal times external finance may not be a problem. However, it could be challenging if both the global and domestic economic outlook are not very favourable. Against this background, my scheme of presentation will be as follows: identify the key events those shaped India's BoP since independence; examine the changes in the composition of capital inflows; and in conclusion highlight a few risks and make some suggestions to reinforce India's BoP.

India's BoP evolved reflecting both the changes in our development paradigm and exogenous shocks from time to time. In the 60 year span, 1951-52 to 2011-12, six events had a lasting impact on our BoP: (i) the devaluation in 1966; (ii) first and second oil shocks of 1973 and 1980; (iii) external payments crisis of 1991; (iv) the East Asian crisis of 1997; (v) the Y2K event of 2000; and (vi) the global financial crisis of 2008. I will analyse the BoP trend in this sequence.

The first phase can be considered from the 1950s through mid-1960s. In the early 1950s, India was reasonably open. For example, in 1951-52, merchandise trade, exports plus imports, accounted for 16 per cent of GDP. Overall current receipts plus payments were nearly 19 per cent of GDP. Subsequently, the share of external sector in India's GDP gradually declined with the inward looking policy of import substitution. Moreover, Indian export basket comprised mainly traditional items like tea, cotton textile and jute manufactures. Not only the scope of world trade expansion in these commodities was less but additionally India had to face competition from new emerging suppliers, such as Pakistan in jute manufactures and Ceylon and East Africa in tea.

During this period, policy emphasis was on import saving rather than export promotion, and priority was given to basic goods and capital goods sector. It was argued that investment in heavy industries would bring in saving in foreign exchange, as output from such industries would replace their imports in the long-run. Import-substituting strategies

* Speech by Shri Deepak Mohanty, Executive Director, Reserve Bank of India at the School of Management, KIIT University, Bhubaneswar on 7th December 2012. The assistance provided by Shri Rajan Goyal and Dr. Rajeev Jain is acknowledged.

were expected to gradually increase export competitiveness through efficiency-gains achieved in the domestic economy. But this did not happen. Hence, exports remained modest. In fact our external sector contracted in relation to GDP from the level observed in the early 1950s. By 1965-66, merchandise trade was under 8 per cent of GDP and overall current receipts and payments were below 10 per cent of GDP (Table 1).

Notwithstanding the contracting size of the external sector, as imports growth outstripped exports growth, there was persistent CAD. Emphasis on heavy industrialisation in the second five year Plan led to a sharp increase in imports. On top of this, the strains of Indo-China conflict of 1962, Indo-Pakistan war of 1965 and severe drought of 1965-66 triggered a major BoP crisis. India's international economic relations with advanced countries came under stress during the Indo-Pak conflict. Withdrawal of foreign aid by countries like the US and conditional resumption of aid by the Aid India Consortium led to contraction in capital inflows. Given the low level of foreign exchange reserves and burgeoning trade deficit, India had no option other than to devalue. Rupee was devalued by 36.5 per cent in June 1966.[1]

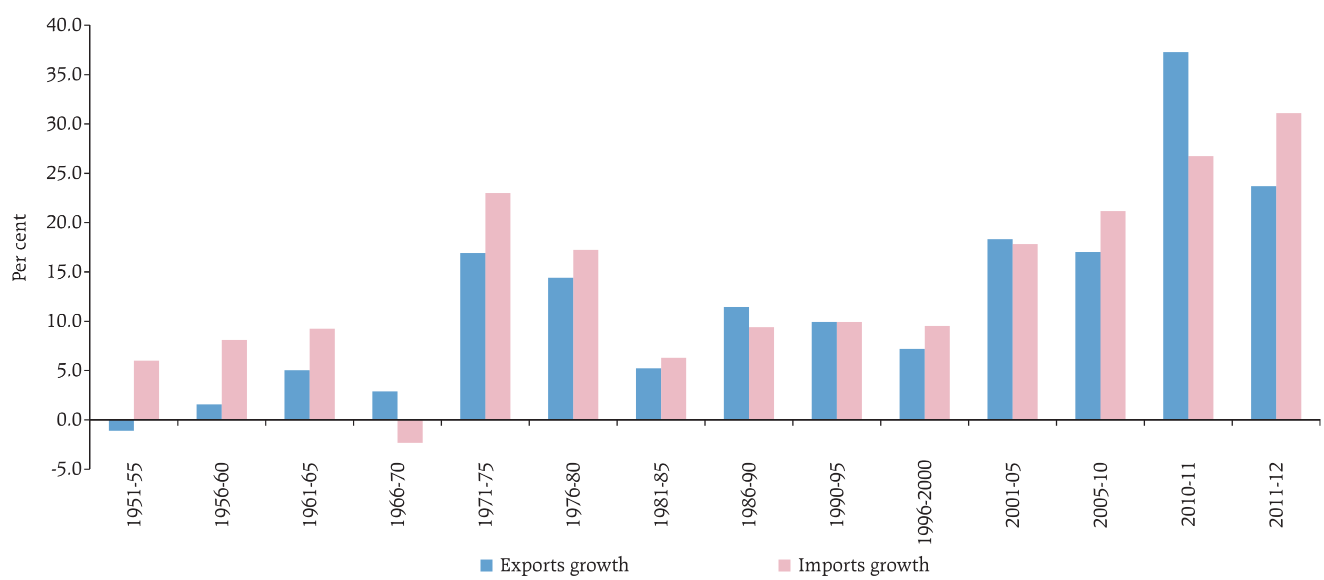
Table 1: Trend in External Openness

(Percent of GDP)

	Merchandise Exports plus Imports	Receipts plus Payments (Current Account)	Total Receipts plus Payments (Current and Capital)
1951-52	15.8	18.5	19.7
1965-66	7.7	9.9	14.1
1973-74	7.8	12.1	17.8
1990-91	14.6	19.4	31.5
1999-00	20.6	31.2	46.8
2008-09	40.6	60.6	111.6
2011-12	43.8	61.5	109.6

Though India's export basket was limited, the sharp devaluation clearly increased the competitiveness of India's exports. Concurrently, India had to undertake a number of trade liberalising measures. Even though the net impact of devaluation was a contentious issue among the leading economists,[2] data show that exports growth, though modest, outpaced imports growth (Chart 1).

Chart 1: In the second half of 1960s, growth in exports was higher than that in imports



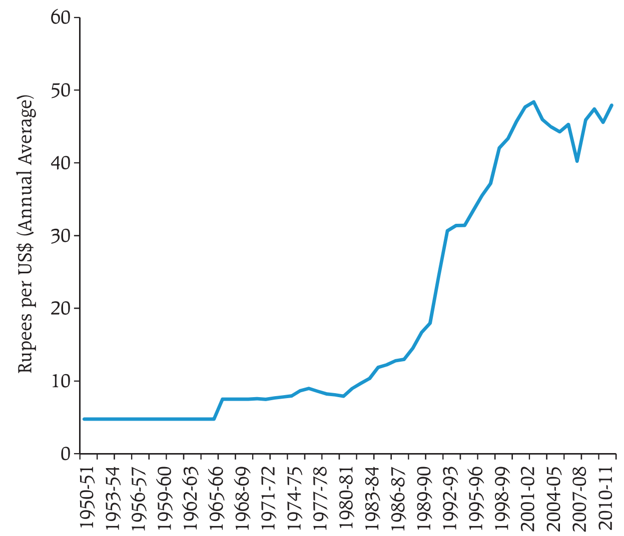
[1] Official rate increased from ₹4.76 per US dollar to ₹7.50 per US dollar.

[2] For example, Bhagwati and Srinivasan (1975) argued that the effective devaluation was more for imports than the exports. 'Foreign Trade Regimes and Economic Development: India', *National Bureau of Economic Research, New York.*

In fact, the current account turned into a surplus in 1973-74 as not only the exports growth was significant but invisible[3] receipts also showed a sharp turnaround from deficit to surplus mainly on account of official transfers which largely represented grants under the agreement of February 1974 with the US Government on the disposition of PL 480 and other rupee funds. Since surplus in current account balance (CAB) was used for repaying rupee loans under the same agreement with the US, accretion to reserves was only marginal.

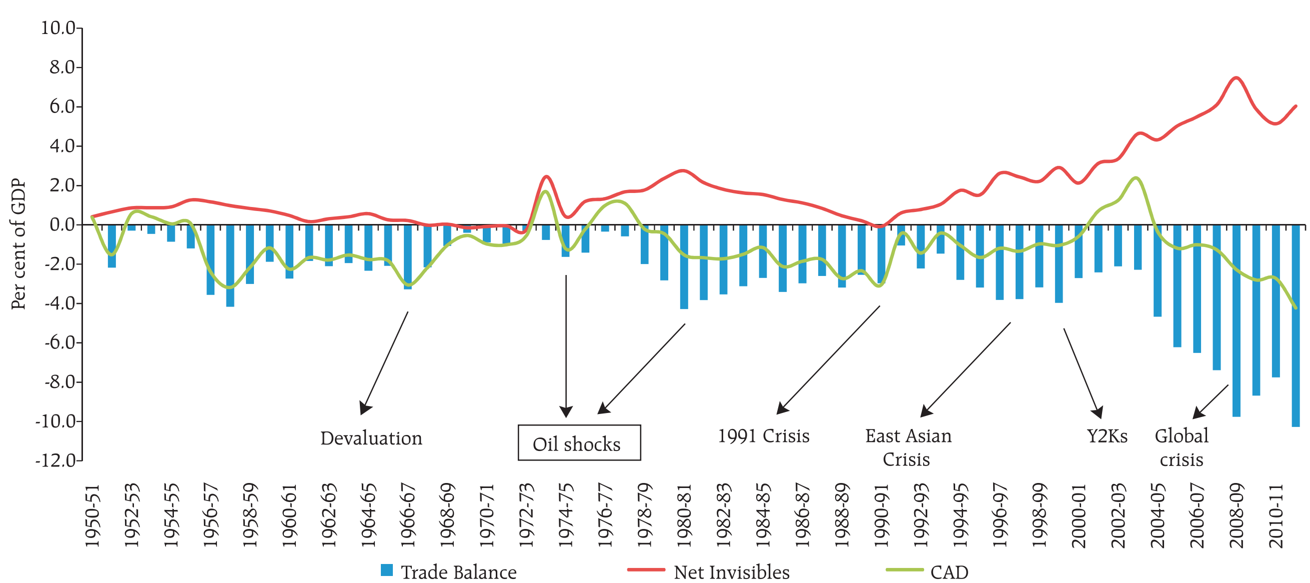
Surplus in India's CAB was, however, short-lived as the first oil shock occurred by October 1973. Sharp rise in international oil prices was evident in higher imports growth in 1973-74 and 1974-75. The share of crude oil in India's import bill rose from 11 per cent in 1972-73 to 26 per cent by 1974-75. As exports improved, particularly to oil producing Middle-East countries, BoP recovered quickly from the first oil shock. By this time, the Indian rupee, which was linked to a multi-currency basket with pound sterling as intervention currency, depreciated against the US dollar (Chart 2).

Chart 2: Exchange rate flexibility improved since the 1980s



Depreciating rupee along with other policy incentives to exporters acted as a supporting factor for India's exports. At the same time, invisible receipts grew sharply stemming from workers' remittances from the Middle-East. Consequently, the current account balance turned into surplus in 1976-77 and 1977-78 (Chart 3).

Chart 3: Key Events in India's BoP

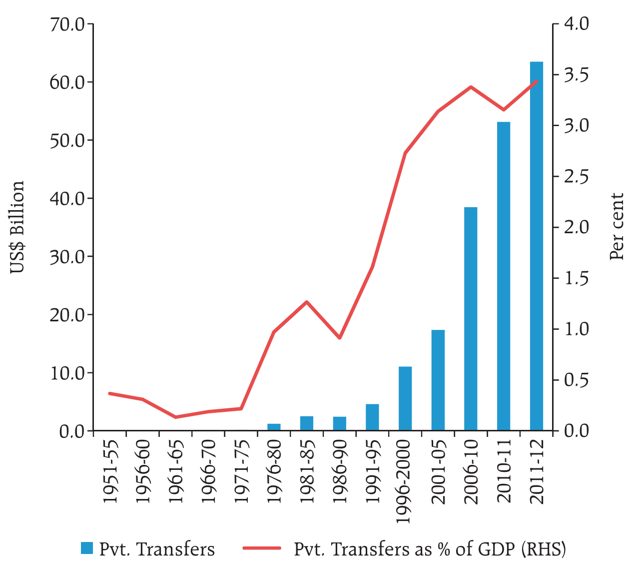


[3] Comprises services, transfers and income.

Thus, the private transfers added a new positive dimension to India's BoP after the first oil shock. Further, with the official exchange rate nearly converging to market exchange rate, there was not much incentive for routing remittances through unofficial exchange brokers. The rapid growth of private transfers reinforced the trade account adjustment to make the current account situation much more comfortable (Chart 4).

During the 1980s, BoP again came under stress. The second oil shock led to a rapid increase in imports in early 1980s. Oil imports increased to about two-fifths of India's imports during 1980-83. At the same time, India's external sector policy was changing towards greater openness. Various measures were undertaken to promote exports and liberalise imports for exporters during this period. However, several factors weighed against external stability. First, despite a number of export promotion measures, the subdued growth conditions in the world economy constrained exports growth. Second, the surplus on account of invisibles also deteriorated due to moderation in private transfers. Third, the debt servicing had increased with greater recourse to debt creating flows such as external commercial borrowings

Chart 4: Private Transfers emerged as a major source of receipts since the mid-1970s



(ECBs) and non-resident Indian (NRI) deposits. Fourth, deterioration is the fiscal position stemming from rising expenditures accentuated the twin deficit risks.

Given the already emerging vulnerabilities in India's BoP during the 1980s, the incipient signs of stress were discernible which culminated in the BoP crisis in 1991 when the Gulf War led to a sharp increase in the oil prices. On top of that, a slowdown in the world trade following the recessionary conditions in industrialised countries and the economic disruption in Eastern Europe including the erstwhile USSR had begun to affect India's exports. A large number of Indian workers employed in Kuwait had to be airlifted to India and their remittances stopped. Foreign exchange reserves had already dwindled due to significant drawdown for financing of CAD in earlier years. During 1990-91, at one point of time, the foreign currency assets had dipped below US$ 1.0 billion, covering barely two weeks of imports. With increasing recourse to the borrowings on commercial terms in the previous years, financing of CAD had also become more sensitive to creditors' confidence in the Indian economy.

Short-term credits began to dry up and the outflow of NRI deposits was also very substantial. Downgrading of India's credit rating below the investment grade also constrained India's access in the international markets for funds, especially ECBs and trade credit. Even though the stress in India's BoP was unprecedented, the Government decided to honour all debt obligations without seeking any rescheduling (Reddy, 2006)[4].

In response to the BoP crisis, a combination of standard and unorthodox policies for stabilisation and structural change was undertaken to ensure that the crisis did not translate into generalised financial instability. Such steps included pledging gold reserves,

[4] Reddy, Y.V. (2006), 'Dynamics of Balance of Payments in India', Speech at the first Diamond Jubilee lecture of the Department of Commerce, Osmania University on December 16.

discouraging of non-essential imports, accessing credit from the IMF and other multilateral and bilateral donors. While dealing with the crisis through an IMF programme, a comprehensive programme of structural reforms was undertaken simultaneously with special emphasis on the external sector.

The broad approach to reform in the external sector was laid out in the Report of the High Level Committee on Balance of Payments (Chairman: C. Rangarajan, 1993). Trade policies, exchange rate policies and industrial policies were recognised as part of an integrated policy framework so as to boost the overall productivity, competitiveness and efficiency of the economy. In addition, to contain the trade and current account deficits and enhance export competitiveness, the exchange rate of rupee was adjusted downwards in two stages on July 1 and July 3, 1991 by 9 per cent and 11 per cent, respectively. A dual exchange rate system was introduced in March 1992 which was unified in March 1993. Subsequently, India moved to current account convertibility in August 1994 by liberalising various transactions relating to merchandise trade and invisibles.

The impact of policy changes was reflected in lower CAD and its comfortable financing in subsequent years. India could manage the external shocks that emanated from the East Asian crisis in 1997 and subsequently, the rise in international oil prices and bursting of dotcom bubble in 1999-2000. Indeed, the Indian economy remained relatively insulated from the East Asian crisis owing to the reforms undertaken in previous years and proactive and timely policy measures initiated by the Reserve Bank to minimise the contagion effect. Monetary tightening coupled with flexible exchange rate and steps to bolster reserves through issuance of Resurgent India Bonds (RIBs) helped in stabilizing the BoP.

The BoP came under some stress again in the first half of 2000-01 due to a sharp rise in oil prices and increase in interest rates in advanced countries. At the same time, India's software exports got a boost following the demands to address the Y2K challenges. This also encouraged migration of Indian software engineers to the advanced countries. As a result, the surplus in the services exports and remittance account of the BoP increased sharply which more than offset the deficit in the trade account. Software exports rose from 0.9 per cent of GDP in 1999-2000 to a peak of 3.8 per cent of GDP by 2008-09. Private remittances also rose from 2.7 per cent of GDP to 3.8 per cent during this period. Thus, in the 2000s software exports and private remittances emerged as two main financing items for the current account mitigating to a large extent the merchandise trade deficit (Tables 2 & 3). Owing to a combination of factors, in fact, the current account recorded a surplus during 2001-04. Subsequently, as international oil prices started rising and domestic growth picked up, deficit in current account re-emerged during 2004-05 to 2007-08 *albeit* remained range bound.

After a period of stability, India's BoP came under stress in 2008-09 reflecting the impact of global financial crisis. As capital inflows plummeted, India

Table 2: Trend in Net Invisibles

(Per cent of GDP)

	1950-80	1980-90	1990-00	2000-09	2009-12
1. Services (Net)	0.3	0.4	0.3	2.1	3.0
2. Software (Net)	-	-	-	2.3	3.3
3. Other Services (Net)	0.3	0.4	0.3	-0.2	-0.3
4. Private Transfers (Net)	0.4	1.1	2.2	3.2	3.5
5. Total Invisibles (Net)	0.7	1.4	1.6	4.6	5.6

Table 3: Composition of Current Account Balance

(Percent of GDP)

Period	1970s	1980s	1990s	2000-09	2009-12
1. Oil TB	-1.2	-1.7	-2.0	-3.5	-4.5
2. Non-Oil TB	0.4	-0.9	0.6	-0.8	-3.9
3. Non-oil CAB	1.1	-0.1	0.8	3.3	1.3
4. CAB	-0.1	-1.8	-1.3	-0.3	-3.3

TB: Trade Balance, CAB: Current Account Balance, (-): Implies deficit had to draw down its foreign currency assets by US $ 20 billion during 2008-09. Stress since the collapse of Lehman Brothers largely emanated from decline in India's merchandise exports and deceleration in growth in services exports. Though there was some improvement during 2010-11 on the back of a strong pick-up in exports mainly led by diversification of trade in terms of composition as well as direction, it proved to be short-lived. BoP again came under stress during 2011-12 as slowdown in advanced economies spilled over to emerging and developing economies (EDEs), and there was sharp increase in oil and gold imports. Let me now turn to the financing aspects of the current account.

India's openness, both in terms of trade flows and capital flows which increased in the 1990s accelerated in the 2000s (Chart 5). This was made possible due to substantial liberalisation of the capital account and greater openness to private capital.

In the first three decades after the independence, CAD was mainly financed by external assistance and drawdown of forex reserves. Since much of India's planning strategy was conceived in terms of a closed economy theoretical framework, private investment inflows into the economy were not encouraged much. Therefore, foreign resources came primarily in the form of official transfers. The private investment came mainly through technology transfer, but played a minuscule role. During this period, the development efforts and stress on BoP from time to time led India to tap diverse aid sources for specific projects.

In the 1980s, as the traditional source of official concessional flows dried up, there was a need to access private capital. But, this came in the form of debt creating flows though costly ECBs and NRI deposits. The limitations of financing CAD through debt creating flows were exposed in the 1991 crisis. Subsequent reforms and opening up the capital account to non-debt creating flows of foreign direct investment (FDI) and portfolio equity flows not only completely transformed the sources of financing of the BoP but it also resulted in substantial addition to reserves in the 2000s (Table 4 & Chart 6).

Concluding Remarks

With the gradual external liberalisation of Indian economy, not only the size of BoP has increased manifold, but the pattern of current and capital account

Chart 5: External openness observed in the 1990s accelerated in the 2000s

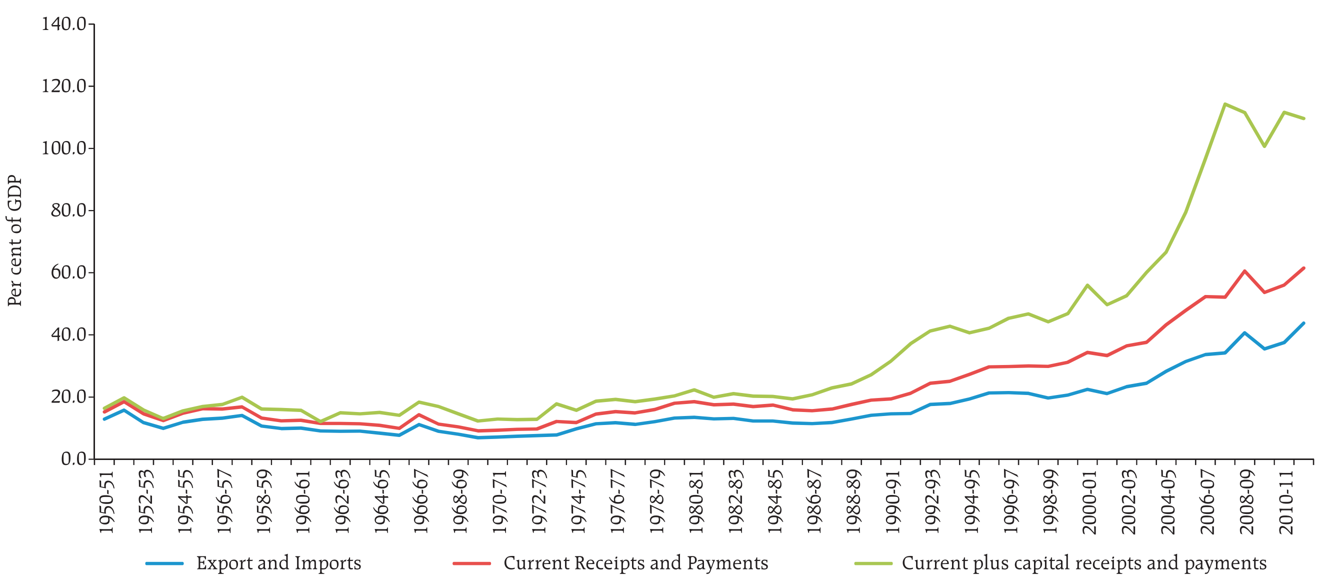


Table 4: Composition of Capital Flows

(Per cent of GDP)

Period	1951-80	1980s	1990s	2000-09	2009-12
1. NRI Deposits	0.1	0.4	0.4	0.4	0.4
2. Commercial Borrowings	0.1	0.4	0.5	0.6	0.5
3. External Assistance	0.9	0.6	0.5	0.0	0.2
4. Foreign Investment (FDI+FPI)	0.1	0.0	0.9	2.5	3.6
5. Others	-0.2	0.0	-0.1	-0.1	-1.1
6. Change in Foreign Exchange Reserves*	0.0	0.2	-1.0	-3.0	-0.4

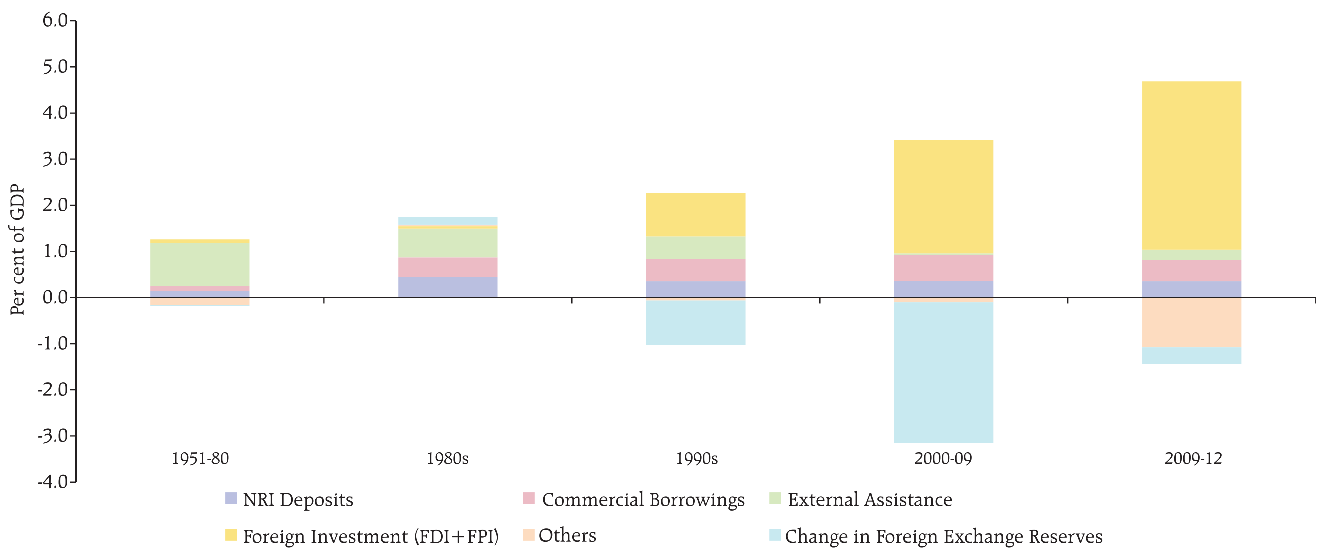
*: (-) implies increase and (+) implies decrease

has changed. Even though the reform process has strengthened resilience of India's external sector, at the same time vulnerabilities arise with greater exposure of the economy to the rest of world through liberalised trade and investment environment.

India's current account particularly remains vulnerable to developments in the trade account. It is evident from the size of trade deficit growing from 0.5 per cent of GDP during 1951-55 to 8.7 per cent during 2007-12. In 2011-12, the current account deficit has widened to a record 4.2 per cent of GDP (Chart 7). Over the years, current account derived some resilience from surplus generated by invisibles, particularly software exports and private transfers, but trade deficit continues to dictate the overall trend in the current account. Whenever trade account worsens reflecting downswings in the global business cycle or rise in international oil prices, the current account also comes under stress as is evident in the present context. Going forward, since India's linkage with the world economy, in terms of trade and finance, is likely to grow further, it is important that resilience in its trade account is built up mainly by promoting productivity based export competitiveness and improving domestic fundamentals that are supportive of least costly non-debt creating flows, particularly foreign direct investment (FDI). In this context, I make a few suggestions.

First, the current level of CAD is far above the level sustainable for India. As per estimates, at a nominal growth rate of about 13 per cent, the sustainable current account to GDP ratio is 2.3 per cent (Rangarajan, 2012)[5]. Reserve Bank's own research

Chart 6: Composition of Capital Flows Changed predominantly for external assistance to equity creating flows since the 1990s



[5] Rangarajan, C. (2012), 'India's External Sector: Do We need to worry', ECGC Business Commencement Commemorative Lecture at Export Credit Guarantee Corporation of India Ltd., Mumbai on October 3.

shows that economy can sustain CAD of about 2.5 per cent of GDP under a scenario of slower growth (RBI, 2012)[6]. A slowing global economy and protracted high levels of unemployment in advanced economies make it difficult to boost services exports in the short run. If the slowdown continues, it could also have an adverse impact on inward remittances. Hence, there is a need to reduce imports and boost merchandise exports to bring the CAD to sustainable levels.

Second, structural policy measures are needed to reduce vulnerability emanating from high oil and gold imports. While oil has been a major component of India's imports, the sharp increase in demand for gold has put an additional pressure. During 2008-09 to 2011-12, on average, the net gold imports stood at about 2 per cent of GDP, almost double the level recorded during 2004-05 to 2007-08. Thus, during the same period, CAD-GDP ratio, excluding net gold imports, would seem less problematic at 1.1 per cent as compared to a surplus of 0.2 per cent. In addition to the traditional motive of gold demand for jewellery, gold seems to have become a safe investment asset and a hedge against inflation as is observed in other advanced economies. Its dematerialisation like any other financial product can reduce its physical imports (Gokarn, 2012)[7]. Furthermore, inflation indexed bonds could also be another option to offer investors the inflation linked returns and detract them from gold investments. In the case of oil, we need to become more energy efficient to reduce our dependence on oil imports. Stepping up of production of electricity could reduce oil demand from backup generation systems. Moreover, the domestic pricing of oil should be aligned further to the international prices to rationalise oil consumption.

Third, current policies towards further diversification of India's export basket, both destination and products, needs to be stepped up. Indian exporters need to accelerate efforts to move up in the value chain at the global level.

Fourth, given the global uncertainties and volatility in capital flows, the resilience of capital account needs to be further enhanced by encouraging FDI inflows.

To conclude, the Indian economy is much more open and globalised now than ever before. The periodic pressures on BoP have been addressed through policy changes. While the BoP has again come under stress since 2011-12 as emphasised by Governor Dr Subbarao, the situation is not as serious as it was in 1991[8]. This is because the structure of the economy has changed in a fundamental way with flexible exchange rate and greater depth in financial markets, besides much larger foreign exchange reserves than those in 1991. However, there is a need to bring the CAD to sustainable levels in the short run and over the medium-term to accelerate efforts towards structural reforms that help boosting our competitiveness, raise growth potential and bring in more stable flows into the economy.

[6] Reserve Bank of India (2012), Annual Report, 2011-12.

[7] Gokarn, Subir (2012), 'India's Gold Import Problem: Finding Solutions through Financial Products', speech at BANCON on 25th November 2012 at Pune.

[8] Subbarao, D., 'Macroeconomic Situation Assessment and Prospects', Speech delivered at Indian Merchants' Chamber, Mumbai on June 19, 2012

*Money Market and Monetary Operations in India**

Deepak Mohanty

I thank Mr. G. Mahalingam for the opportunity to share my thoughts in this distinguished panel on money market. This forum which brings together the Reserve Bank and practitioners in the financial market, is important not only from the perspective of market development but also for fostering a better understanding of monetary operations. Money market is at the heart of monetary operations. Over the last decade, there has been substantial development in the Indian money market in terms of depth, variety of instruments and efficiency. This has enabled the Reserve Bank to change its monetary operations from direct quantity based instruments to indirect interest rate based instruments to enhance the efficiency of monetary transmission consistent with international best practice. Against this background, I will briefly capture the developments in the money market and discuss the experience with the recently modified operating procedure of monetary policy before concluding with some thoughts on the way forward.

Role of money market

Money market can be defined as a market for short-term funds with maturities ranging from overnight to one year and includes financial instruments that are considered to be close substitutes of money. It provides an equilibrating mechanism for demand and supply of short-term funds and in the process provides an avenue for central bank intervention in influencing both the quantum and cost of liquidity in the financial system, consistent with the overall stance of monetary policy. In the process, money market plays a central role in the monetary policy transmission mechanism by providing a key link in the operations of monetary policy to financial markets and ultimately, to the real economy. In fact, money market is the first and the most important stage in the chain of monetary policy transmission.

Typically, the monetary policy instrument, effectively the price of central bank liquidity, is directly set by the central bank. In view of limited control over long-term interest rates, central banks adopt a strategy to exert direct influence on short-term interest rates. Changes in the short-term policy rate provide signals to financial markets, whereby different segments of the financial system respond by adjusting their rates of return on various instruments, depending on their sensitivity and the efficacy of the transmission mechanism. How quickly and effectively the monetary policy actions influence the spectrum of market interest rates depends upon the level of development of various segments of financial markets, particularly the money market. Cross-country studies suggest that as domestic financial markets grow, transmission of monetary policy through various channels becomes better.

As a crucial initial link in the chain through which monetary policy aims at achieving ultimate goals relating to inflation and growth, money market developments are closely monitored and influenced by central banks. Besides expecting money market rates to respond to policy rate changes in a well anchored manner, central banks aim at ensuring appropriate liquidity conditions through discretionary liquidity management operations so that money market functions normally. Money market is also an important funding market for banks and financial institutions, and at times, even for corporates. Stressed conditions in the money markets could increase moral hazard with banks expecting a central bank to function as the lender of first resort. Following the recent global financial crisis, money market funding for the financial system effectively got

* Speech by Shri Deepak Mohanty, Executive Director, Reserve Bank of India, at the Seminar on Issues in Financial Markets, Mumbai, 15th December 2012. The assistance provided by Shri Sitikantha Pattanaik, Shri Jeevan Khundrakpam, Shri Binod Bhoi and Dr. Rajeev Jain is acknowledged.

replaced with central bank funding in advanced countries. Money market rates (like LIBOR and EURIBOR) are standard benchmarks for pricing of bonds, loans and other financial products. Market manipulation of this key benchmark – as reportedly happened to LIBOR recently – though undermined the faith in money market. A sound money market would have to ensure conditions where banks can conduct business safely.

Money market transactions could be both secured and unsecured, *i.e.,* without collaterals. What does one expect from the secured and unsecured markets? The unsecured market should primarily promote market discipline. Loans being uncollateralised in this market, lenders are directly exposed to the risk of non-repayment. This works as an incentive for them to address information asymmetry by collecting information about borrowers. It is the constant peer monitoring that promotes market discipline. In the secured segment of the money market, the lender may address credit risk concerns by asking for sound collaterals and also applying some haircuts, but the peer monitoring could potentially then be less emphasised. Conditions of market stress can lead to collateral scarcity and falling value of collaterals could stifle even the secured money market. Illiquidity spiral from the financial markets, *i.e.,* when financial instruments held as assets turn illiquid, may lead to a situation where central banks would be required to dilute the collateral standards for liquidity injection, and even exchange good quality securities against securities facing illiquidity risks. This becomes necessary to unfreeze the markets in general. After the global crisis, asset quality, particularly liquidity, has received greater policy focus.

Money market rates also reflect market expectations of how the policy rate could evolve in the near term. As per standard expectations hypothesis, money market rates for different time duration should equal expected future short-term rates, plus term premium and risk premium. Bernanke (2004)[1] had examined how expectations of the likely future course of the federal funds rate respond to the Fed's policy actions and statements and noted that '… Our findings support the view that FOMC statements have proven a powerful tool for affecting market expectations about the future course of the federal funds rate'.

Empirical research suggests that if the shortest end of the money market, which is influenced the most by policy rate, is stable, or less volatile, then it may help in keeping term premium lower, compared to a period when volatile short rates get transmitted to the entire money market and simultaneously the term premium rises.

With the sophistication of financial markets rendering the money, output and price relationship unstable, by the early 1980s, major central banks began to emphasise on the price channel, *i.e.*, policy interest rate for monetary policy transmission. As a result, the role of money market became all the more important for signaling and transmission of monetary policy. Thus, the development of money markets across countries in terms of instruments and participants with varying risk profiles has necessitated changes in the operating procedures of monetary policy.

In the case of India, the ultimate goals of monetary policy, *i.e.,* price stability and growth, have remained unchanged over the years. In the recent years, financial stability has been considered as an additional objective of monetary policy. However, operational and intermediate objectives of monetary policy have undergone periodic changes in response to changes in the economic and financial environment. The development of the money market over the years and relative stability in the call money market enabled the Reserve Bank to move away from quantity-based instruments to price-based instruments under its

1 Bernanke, Ben S. (2004), 'Central Bank Talk and Monetary Policy', At the Japan Society Corporate Luncheon, New York, October 7.

multiple indicators approach adopted since 1998. Accordingly, the overnight call rate, which was used implicitly as operating target since the institution of liquidity adjustment facility (LAF) in 2000, became explicit after the adoption of a new operating procedure in May 2011.

Money market in India

Financial reforms in India began in the early 1990s. However, various segments of domestic financial markets, *viz.*, money market, debt market and forex market underwent significant shifts mainly from the 1990s. Earlier, the Indian money market was characterised by paucity of instruments, lack of depth and distortions in the market micro-structure. It mainly consisted of uncollateralised call market, treasury bills, commercial bills and participation certificates.

Following the recommendations of the Chakravarty Committee (1985), the Reserve Bank adopted a monetary targeting framework. At the same time, efforts were made to develop the money market following the recommendations of Vaghul Committee (1987). In this regard, important developments were: (i) setting up of the Discount and Finance House of India (DFHI) in 1988 to impart liquidity to money market instruments and help the development of secondary markets in such instruments; (ii) introduction of instruments such as certificate of deposits (CDs) in 1989 and commercial papers (CPs) in 1990 and inter-bank participation certificates with and without risk in 1988 to increase the range of instruments; and (iii) freeing of call money rates by May 1989 to enable price discovery. However, the functioning of the market continued to be hindered by a number of structural rigidities such as skewed distribution of liquidity and the prevalence of administered deposit and lending rates of banks.

Recognising these rigidities, the pace of reforms in money market was accelerated. Following the recommendations of an Internal Working Group (1997) and the Narasimham Committee (1998), a comprehensive set of measures was undertaken by the Reserve Bank to develop the money market. These included: (i) withdrawal of interest rate ceilings in the money market; (ii) introduction of auctions in treasury bills; (iii) gradual move away from the cash credit system to a loan-based system. Maturities of other existing instruments such as CPs and CDs were also gradually shortened to encourage wider participation. Most importantly, the *ad hoc* treasury bills were abolished in 1997 thereby putting a stop to automatic monetisation of fiscal deficit. This enhanced the instrument independence of the Reserve Bank (Table 1).

More importantly, efforts were made to transform the call money market into primarily an inter-bank market, while encouraging other market participants to migrate towards collateralised segments of the market, thereby increasing overall market stability and diversification. In order to facilitate the phasing out of corporate and the non-

Table 1 : Major Developments in Money Market since the 1990s

1. Abolition of *ad hoc* treasury bills in April 1997.
2. Full fledged LAF in June 2000.
3. CBLO for corporate and non-bank participants introduced in 2003.
4. Minimum maturity of CPs shortened by October 2004.
5. Prudential limits on exposure of banks and PDs to call/notice market in April 2005.
6. Maturity of CDs gradually shortened by April 2005.
7. Transformation of call money market into a pure inter-bank market by August 2005.
8. Widening of collateral base by making state government securities (SDLs) eligible for LAF operations since April 2007.
9. Operationalisation of a screen-based negotiated system (NDS-CALL) for all dealings in the call/notice and the term money markets in September 2006. The reporting of all such transactions made compulsory through NDS-CALL in November 2012.
10. Repo in corporate bonds allowed in March 2010.
11. Operationalisation of a reporting platform for secondary market transactions in CPs and CDs in July 2010.

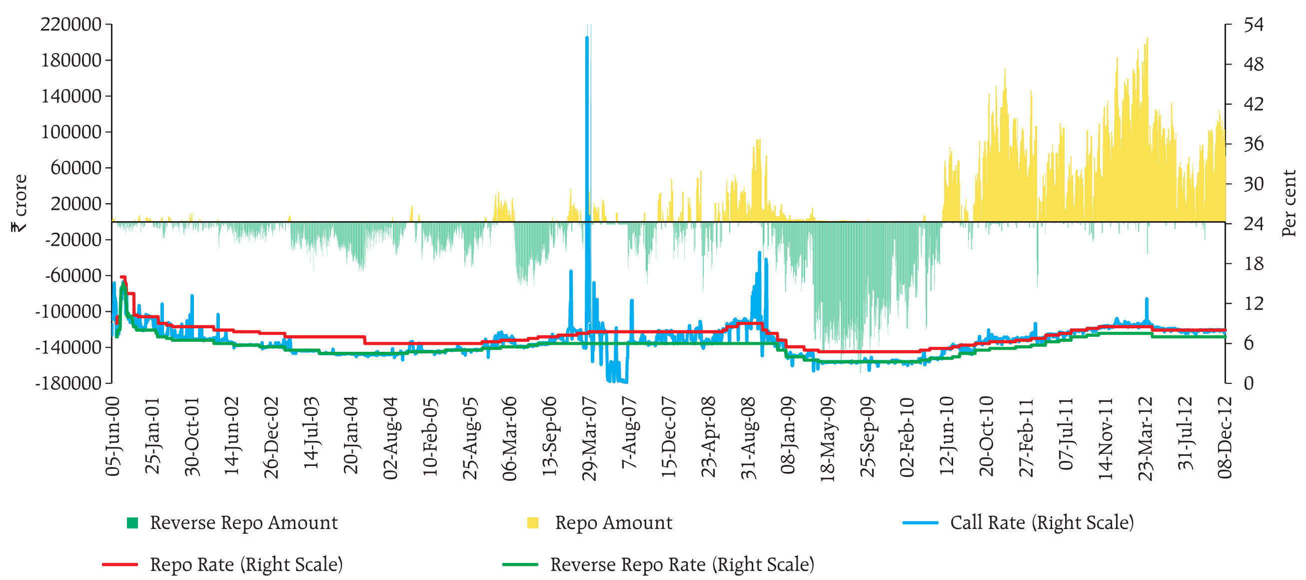
banks from the call money market, new instruments such as market repos and collateralised borrowing and lending obligations (CBLO) were introduced to provide them avenues for managing their short-term liquidity. Non-bank entities completely exited the call money market by August 2005. In order to minimise the default risk and ensure balanced development of various market segments, the Reserve Bank instituted prudential limits on exposure of banks and primary dealers (PDs) to the call/notice money market. In April 2005, these limits were linked to capital funds (sum of Tier I and Tier II capital) for scheduled commercial banks.

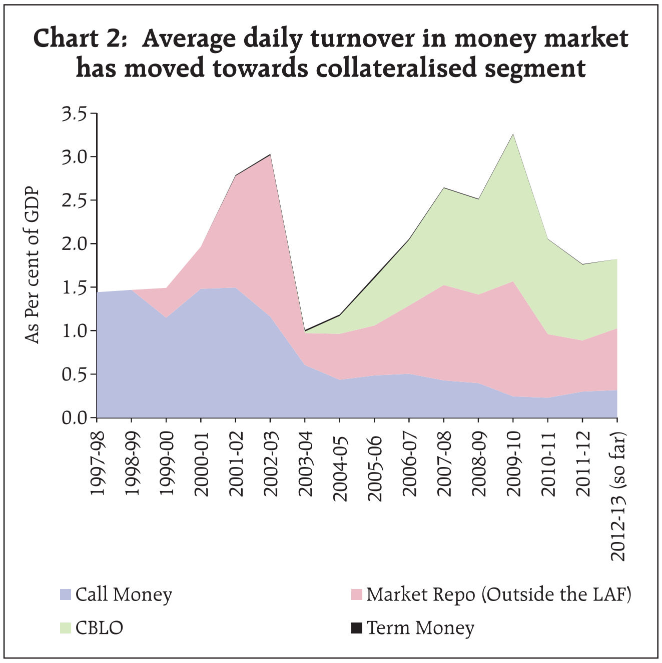
In order to improve transparency and efficiency in the money market, reporting of all call/notice money market transactions through negotiated dealing system (NDS) within 15 minutes of conclusion of the transaction was made mandatory. Furthermore, a screen-based negotiated quote-driven system for all dealings in the call/notice and the term money markets (NDS-CALL), developed by the Clearing Corporation of India Limited (CCIL), was operationalised in September 2006 to ensure better price discovery.

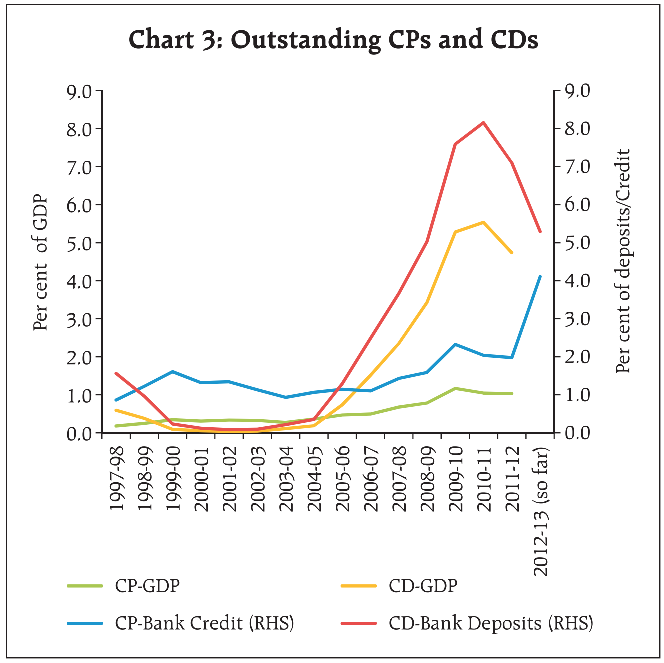
Beginning in June 2000, the Reserve Bank introduced a full-fledged LAF and it was operated through overnight fixed rate repo and reverse repo from November 2004. This helped to develop interest rate as an important instrument of monetary transmission. It also provided greater flexibility to the Reserve Bank in determining both the quantum of liquidity as well as the rates by responding to the needs of the system on a daily basis (Chart 1).

In the development of various constituents of the money market, the most significant aspect was the growth of the collateralised market *vis-à-vis* the uncollateralised market. Over the last decade, while the daily turnover in the call money market either stagnated or declined, that of the collateralised segment, market repo plus CBLO, increased manifold (Chart 2). Since 2007-08, both the CP and CD volumes have also increased very significantly (Chart 3). Furthermore, issuance of 91-treasury bills has also increased sharply (Chart 4). The overall money market now is much larger relative to GDP than a decade ago.

Chart 1: Liquidity Adjustment Facility and Call Rate







Alongside, the rates of return on various instruments in the money market have shown greater co-movement, especially since the introduction of LAF (Table 2 & Chart 5).

Monetary operating procedure

The development of money market as well as its growing inter-linkages with other segments of financial markets enabled the Reserve Bank to alter the operating procedures of monetary policy consistent with the objectives of the monetary policy. Based on the recommendations of Chakravarty Committee (1985), a monetary targeting framework with feedback was introduced during the mid-1980s, under which reserve money was used as operating target and broad money (M_3) as an intermediate target.

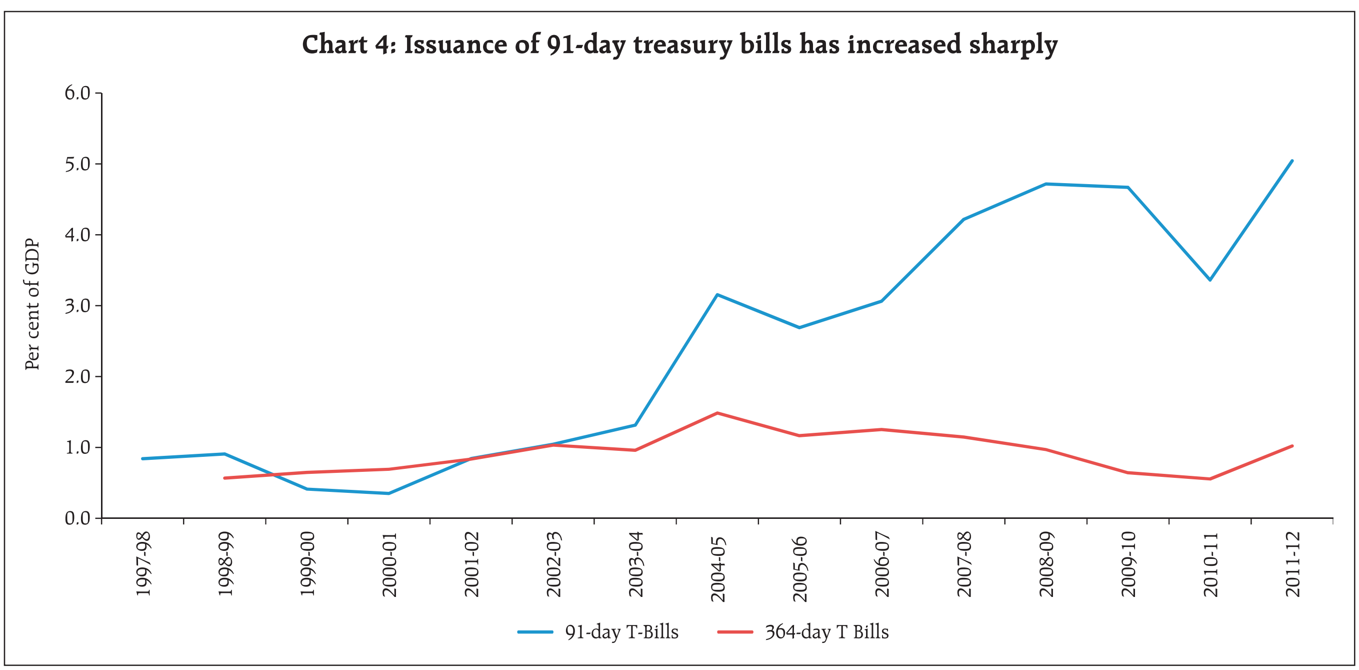


Table 2: Interest Rates in the Money Market

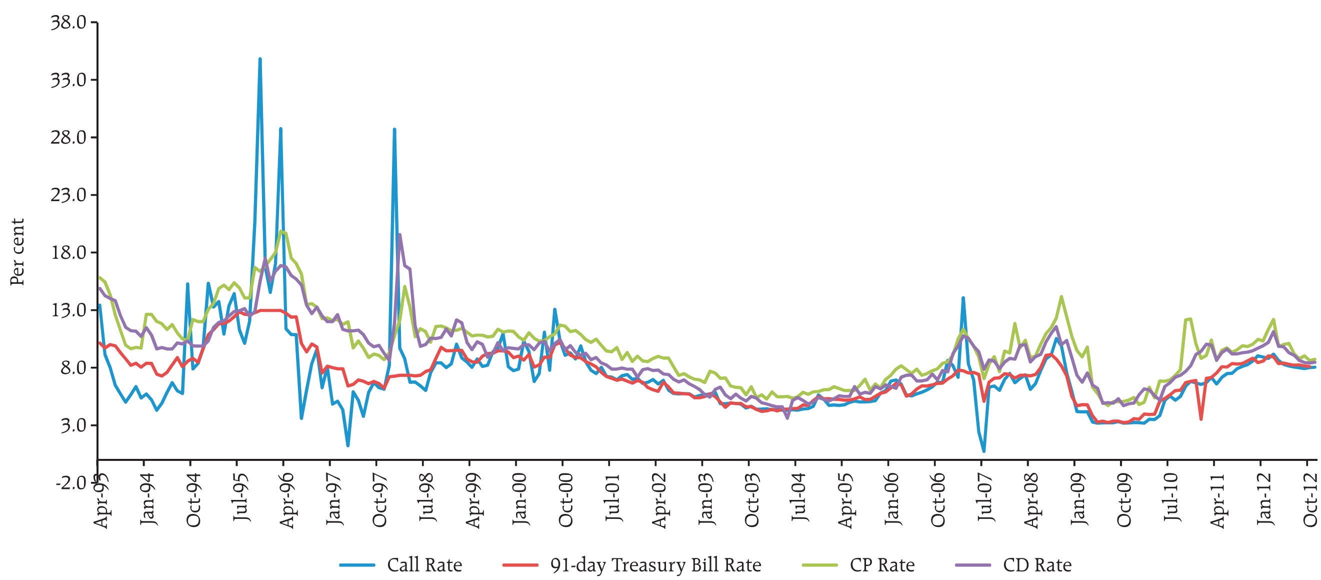
(Per cent per annum: Annual Averages)

	Repo Rate	Call Rate	CBLO Rate	Market Repo Rate	91 day T-Bills	364-day T-Bills	CP Rate	CD Rate
1	2	3	4	5	8	9	6	7
2000-01	11.2	9.1	-	-	9.0	9.8	10.8	9.6
2001-02	8.5	7.2	-	-	7.0	7.3	9.2	8.0
2002-03	7.7	5.9	-	-	5.8	5.9	7.7	6.6
2003-04	7.0	4.6	-	-	4.6	4.7	6.1	5.3
2004-05	6.0	4.7	-	-	4.9	5.2	5.8	5.0
2005-06	6.2	5.6	5.3	5.4	5.7	6.0	6.7	6.1
2006-07	7.0	7.2	6.2	6.3	6.6	7.0	8.5	7.9
2007-08	7.8	6.1	5.2	5.5	7.1	7.5	9.3	9.1
2008-09	7.4	7.1	6.1	6.5	7.1	7.2	10.7	9.2
2009-10	4.8	3.2	2.7	2.8	3.6	4.4	5.3	5.4
2010-11	5.9	5.7	5.4	5.5	6.2	6.6	8.7	7.7
2011-12	8.0	8.1	7.8	7.9	8.4	8.4	10.1	9.6
2013-14 (so far)	8.0	8.1	7.9	8.0	8.2	8.1	9.3	9.0

By the mid-1990s, this framework was rendered increasingly inadequate due to several developments. Structural reforms and financial liberalisation led to a paradigm shift in the financing of government and commercial sectors with increasingly market-determined interest rates and exchange rate. Development in the various segments of the financial market led to deepening of the financial sector. This provided the Reserve Bank to effectively transmit policy signals through indirect instruments such as interest rates. On the other hand, increase in liquidity emanating from capital inflows raised the ratio of net foreign assets to reserve money and rendered the control of monetary aggregates more difficult. With financial innovations, the stability in the demand function for money also came under question.

Recognising these challenges and the growing complexities of monetary management, the Reserve Bank switched to a multiple indicators approach in 1998-99. Under this approach, a host of macroeconomic indicators including interest rates in different segments of financial markets, along with other indicators on currency, lending by banks and financial institutions, fiscal position, trade, capital flows, inflation rate, exchange rate, refinancing and transactions in foreign exchange available on high frequency basis are juxtaposed with output data for drawing implications for monetary policy formulation. However, the approach itself continued to evolve and was further augmented by forward-looking indicators drawn from Reserve Bank's various surveys and a

Chart 5: Money market rates show greater co-movement



panel of parsimonious time series models (Mohanty, 2010).[2]

Along with the multiple indicators approach, operating procedure also underwent a change following the recommendation of Narasimham Committee II (1998). The Reserve Bank introduced the Interim Liquidity Adjustment Facility (ILAF) in April 1999, under which liquidity injection was done at the Bank Rate and liquidity absorption was through fixed reverse repo rate. The ILAF gradually transited into a full-fledged liquidity adjustment facility (LAF) with periodic modifications based on experience and development of financial markets and the payment system. The LAF was operated through overnight fixed rate repo and reverse repo from November 2004, which provided an informal corridor for the call money rate.

Though the LAF helped to develop interest rate as an instrument of monetary transmission, two major weaknesses came to the fore. First was the lack of a single policy rate, as the operating policy rate alternated between repo during deficit liquidity situation and reverse repo rate during surplus liquidity condition. Second was the lack of a firm corridor, as the effective overnight interest rates dipped (rose) below (above) the reverse repo (repo) rate in extreme surplus (deficit) conditions. Recognising these shortcomings, a new operating procedure was put in place in May 2011.

Let me elaborate on the key features of the new operating procedure. First, the weighted average overnight call money rate was explicitly recognised as the operating target of monetary policy.[3] Second, the repo rate was made the only one independently varying policy rate. Third, a new Marginal Standing Facility (MSF) was instituted under which scheduled commercial banks (SCBs) could borrow overnight at 100 basis points above the repo rate up to one per cent of their respective net demand and time liabilities (NDTL). This limit was subsequently raised to two per cent of NDTL and in addition, SCBs were allowed to borrow funds under MSF on overnight basis against their excess SLR holdings as well. Moreover, the Bank Rate being the discount rate was aligned to the MSF rate. Fourth, the revised corridor was defined with a fixed width of 200 basis points. The repo rate was placed in the middle of the corridor, with the reverse repo rate at 100 basis points below it and the MSF rate as well as the Bank Rate at 100 basis points above it (Chart 6). Thus, under the new operating procedure, all the three other rates announced by the Reserve Bank, *i.e.*, reverse repo rate, MSF rate and the Bank Rate, are linked to the single policy repo rate.

The new operating procedure was expected to improve the implementation and transmission of monetary policy for the following reasons. First, explicit announcement of an operating target makes market participants clear about the desired policy impact. Second, a single policy rate removes the confusion arising out of policy rate alternating between the repo and the reverse repo rates, and makes signalling of monetary policy stance more accurate. Third, MSF provides a safety valve against unanticipated liquidity shocks. Fourth, a fixed interest rate corridor set by MSF rate and reverse repo rate, reduces uncertainty and communication difficulties and helps keep the overnight average call money rate close to the repo rate.

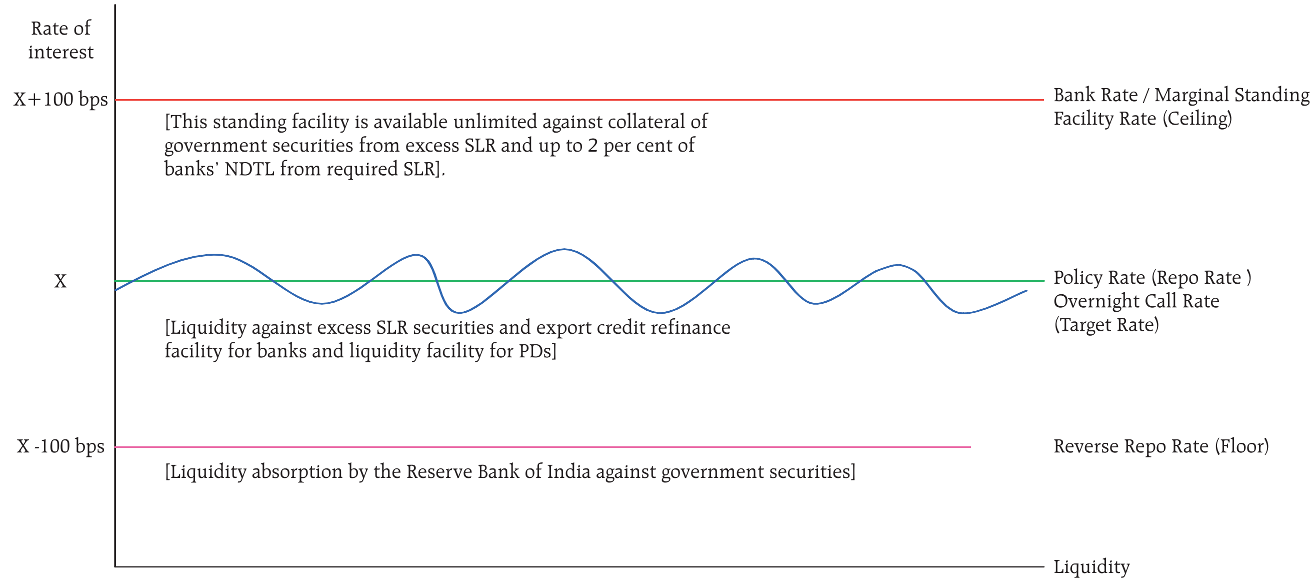
Let me now turn to a brief evaluation of the experience with the new operating procedure. In the implementation of the new procedure, the Reserve Bank prefers to keep the systemic liquidity in deficit mode as monetary transmission is found to be more effective in this situation (RBI, 2011).[4] The Reserve

[2] Mohanty, Deepak (2010), 'Monetary Policy Framework in India: Experience with Multiple-Indicators Approach', *RBI Bulletin*, March 2010.

[3] Even though the share of call money market in the overnight money market is lower than that of collateralised segment, the weighted overnight call rate is used as operating target. This is partly on account of high correlation between the overnight call money rate and the collateralised money market rate at 0.9. The issue was examined in detail by the Working Group on Operating Procedure of Monetary Policy which observed that the transmission of policy rate to the overnight call money rate is stronger than the overnight money market rate. In addition, the call money market is a pure inter-bank market and, hence, better reflects the net liquidity situation.

[4] Reserve Bank of India (2011), Report of the Working Group on Operating Procedure of Monetary Policy (Chairman: Deepak Mohanty), March.

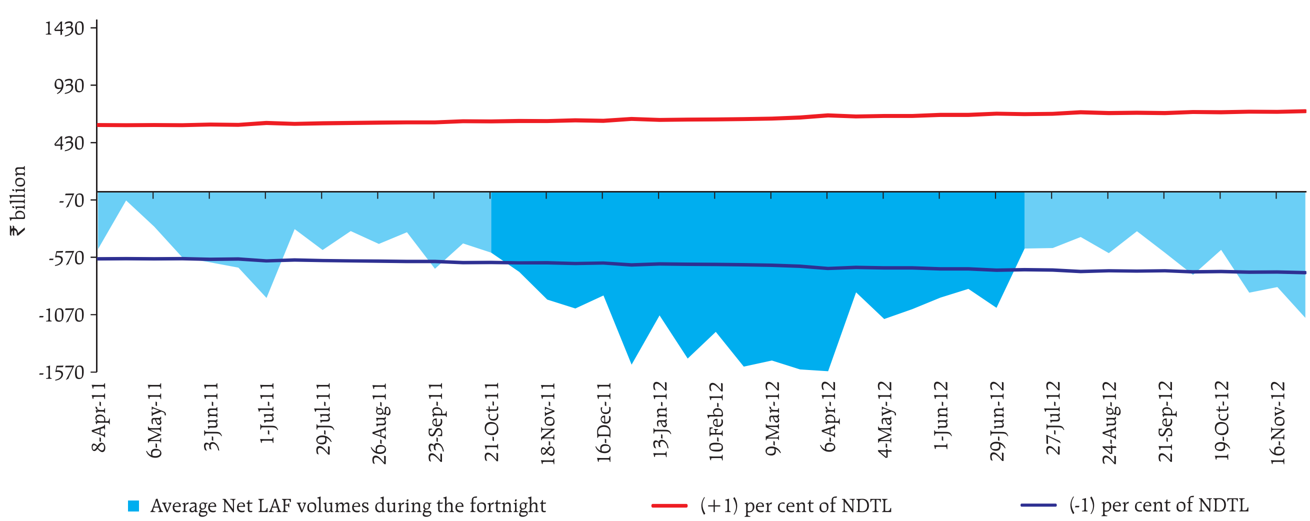
Chart 6: Revised LAF Framework



Bank also announced an indicative liquidity comfort zone of (+)/(-) 1.0 per cent of net demand and time liabilities (NDTL) of banks.

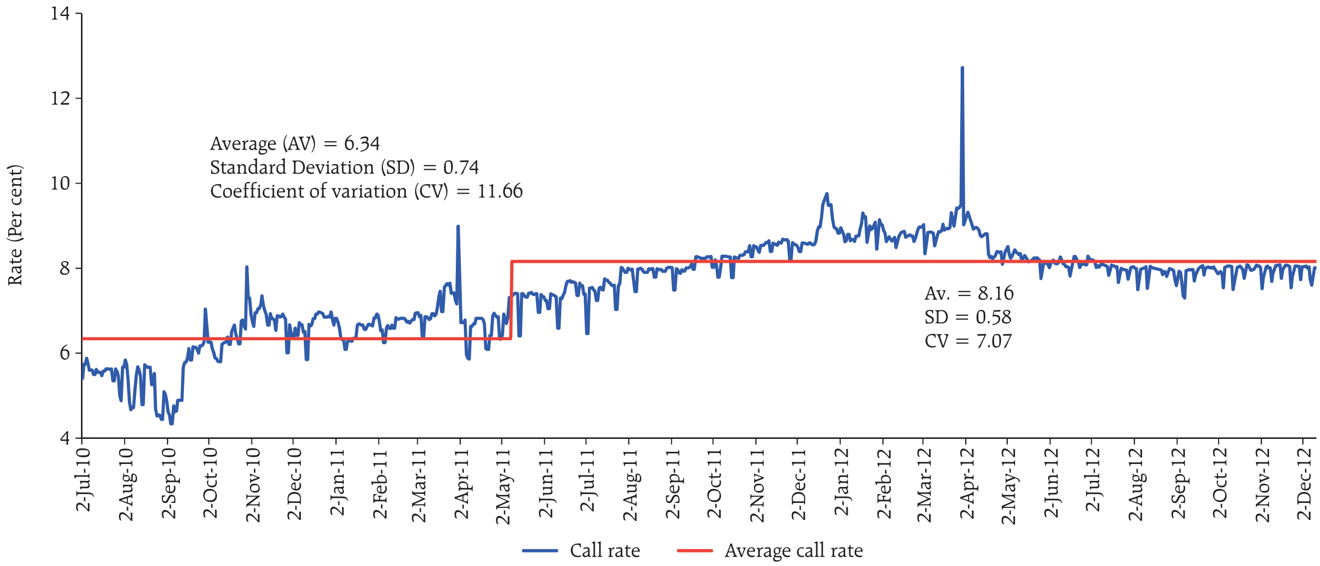
Since May 2011, the liquidity conditions can be broadly divided into three distinct phases. After generally remaining within the Reserve Bank's comfort zone during the first phase during May-October 2011, the liquidity deficit crossed the one per cent of NDTL level during November 2011 to June 2012. This large liquidity deficit was mainly caused by forex intervention and increased divergence between credit and deposit growth. The deficit conditions were further aggravated by frictional factors like the build-up of government cash balances with the Reserve Bank that persisted longer than anticipated and the increase in currency in circulation. Accordingly, the Reserve Bank had to actively manage liquidity through

Chart 7: Liquidity conditions ease following a period of tightness



Note: Negative LAF volumes indicate injection of liquidity.

Chart 8: Stability of call rate improves under new procedure



injection of liquidity by way of open market operations (OMOs) and cut in cash reserve ratio (CRR) of banks. This was supported by decline in currency in circulation and a reduction in government cash balances with the Reserve Bank. As a result, there was a significant easing of liquidity conditions since July 2012 with the extent of the deficit broadly returning to the Reserve Bank's comfort level of one per cent of NDTL (Chart 7).

Since its implementation, the systemic liquidity has been in deficit mode, which has helped in better transmission of policy rate to various segments of money markets. First, the overnight interest rate has been more stable since its implementation (Chart 8).

Second, the repo rate and weighted call rate are far more closely aligned under the new operating procedure than earlier; implying improved

Chart 9: Monetary transmission improves under liquidity deficit

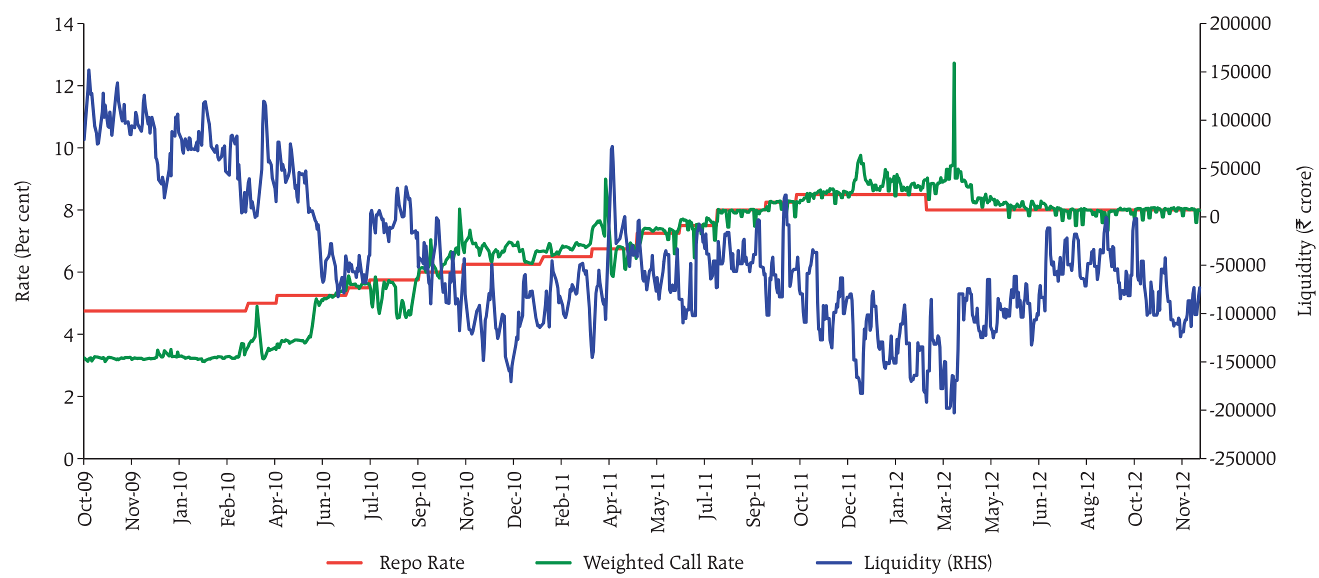
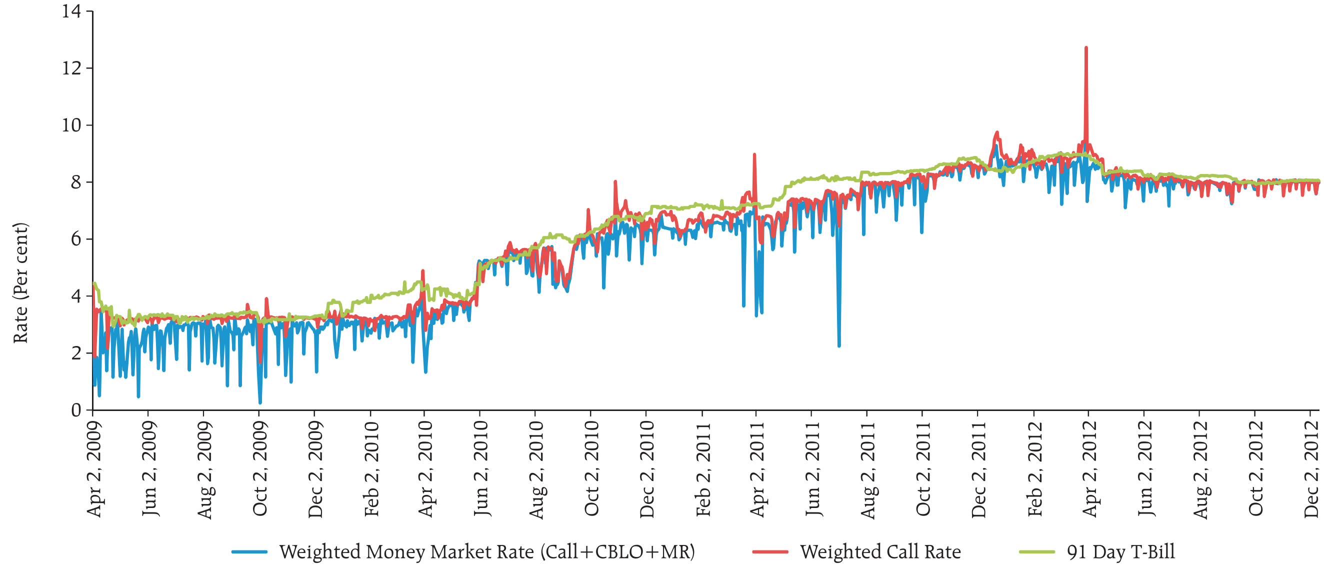


Chart 10: Call rates move in tandem with other money market rates



transmission of monetary policy in terms of movement in call money market interest rate (Chart 9).

Third, the call money rate in turn is observed to be better aligned with other money market interest rates after the implementation of new operating procedure than before (Chart 10).

Conclusion

Let me conclude. Our experience shows that the development of money market and refinements in operating procedures of monetary policy have moved in tandem. Financial sector reforms along with Reserve Bank's emphasis on development of various segments of financial market enabled shifts in operating procedures based on direct quantity-based instruments to indirect interest rate-based instruments. The Reserve Bank has been able to better transmit monetary policy signals in the money market through a single policy repo rate. Evidence so far suggests a significant improvement in monetary policy transmission under the new operating framework. In order to reinforce this process, I make three suggestions.

First, there has been a swift transmission of policy rate at the short-end of money market, partly due to the prevalence of market liquidity in deficit mode. However, ensuring market liquidity in a deficit mode of desired level on a sustained basis is contingent on Reserve Bank's ability to effectively conduct OMOs and the market appetite for such operations. Hence, there is a need to develop the market micro-structure and further enhance secondary market transactions in government securities to facilitate smooth conduct of OMOs.

Second, the LAF is not the appropriate instrument for managing the liquidity of more enduring nature. As the system is expected to be in deficit, there is a need to develop term repo to minimise daily requirement of liquidity.

Third, notwithstanding significant advances in developing the market, the term structure in the money market is incomplete. It is, therefore, desirable to extend the yield curve beyond the overnight rate by developing a term money market.

Thank you.

*Technology enabled Transformation in the Financial Sector**

G Padmanabhan

Mr Sambamurthy, Members of Faculty, CIOs and GMs of banks, ladies and gentlemen. I thank the IDRBT for inviting me to address this erudite audience. The issues that I have chosen to flag; I hope, would generate adequate interest and be the basis for further deliberations leading to some concrete suggestions. We, in the Reserve Bank would eagerly look forward to such outcomes, as these can be useful to set the road map for technology adoption in the Indian financial sector in the years to come.

Introductory thoughts

2. Information and communication technology is playing a vital role across many industries and sectors, resulting in a positive impact on economic development cutting across the geographical barriers. It is important to note that the financial sector and more particularly banking industry was one of the very first to utilise information technology way back in the 1960s, and has thus the record of influencing the development process through the technology. The banking sector is an example in which information technology infrastructures have had implications on the economic development of many nations across jurisdictions. Studies show that information technology coupled with knowledge management hold much potential for propelling the development process (Okpaku, 2003).

3. Since the 1990s, the banking sector in India has seen greater emphasis being placed on technology and innovation. Banks began to use technology initially with a view to take care of their internal requirements pertaining to book keeping, balancing and for transactions processing; the all-pervasive face of information technology soon enabled banks to provide better quality of services at greater speed. Internet banking and mobile banking have made it possible for customers to access banking services literally and virtually from anywhere and anytime. The biggest barriers, time and distance, to access banking services were crossed by leveraging technology. The sector has also moved rapidly towards universal banking and electronic transactions, which changed the way banking is done, during the last decade or so.

4. Take the case of payment systems, an area which I am familiar with and where technology has brought in a sea-change. Till 1990s, one could make payments in this country through two predominant means – cash and cheque. Today, a tech-savvy customer is empowered to choose a desired service from a slew of products – card payments, NEFT transfer, RTGS transfer, ECS/NECS payments, mobile payments *etc.* Further, after using any of these payment methods, the first instrument he turns to is his mobile phone for confirmatory messages, a feature unique to India. What would you imagine as the future scenario? Consider this: "the future of payments is the elimination of POS terminals and checkout lines that require an associate in a store to scan and bag purchases item by item. The most frictionless solution is not a smart phone but a collection of sensor networks that automatically identify the buyer, scan the items to be purchased, and process payments without human intervention. No lines, no taps, no swipes, no associates, no cash registers. Just wireless sensors and networks that automatically process transactions, manage inventory, *etc.* Our grand kids won't be carrying a wallet even if it's digital. Biometric factoring is not that far away. You've heard of fingerprinting and retina scans. The distance between pupils is unique even between twins. You'll be able to walk into a store that knows how much you have

* Keynote address delivered by Shri G. Padmanabhan, Executive Director, Reserve Bank of India, at IDRBT on December 17, 2012 at the GM/CIOs Conference. Assistance provided by Smt. K. Nikhila in the preparation of this speech and comments on the draft from S/Shri S Ganeshkumar and A Madhavan gratefully acknowledged.

available [if you've made that information available], what you usually spend based on which a personalised deal is offered. Your pre-set rules and the store's pre-set rules will negotiate, and the store will offer you a set of options. The impact of social commerce is also evident, so much so that one could expect to get discounts and other rewards based on your influence on friends' purchases"[1].

5. To restate the future scenario more directly, in the next few years, there will be substantial challenges for the banking industry. Customers will become increasingly individualistic and, at the same time, more discerning in their relationships with banks. Ubiquitous information and the power of social media inputs will result in customers comparing offerings across the market; evaluating the service levels of different banks and also demanding transactions increasingly on their own terms – a mimic of the corporate sector. This may well signal the sunset phase of the hitherto traditional segmentation approaches and 'go-to market' techniques. There would be dramatic changes in the levels of competition in the retail banking space with the predicted entry of non banks. Banks, may have to look at opportunities particularly with respect to harnessing product, service and process innovation to serve customers better, and to create a niche in an increasingly crowded market place.

6. Two main trends that may stand out here, as the most significant forces that will drive industry change are increasing customer centric products and intensifying competition. Further, the other trends that may change the way we do banking in the future would be – managing human capital, regulations and technologies – and these may strongly contribute to and reinforce the effects of intensifying competition and customer empowerment on banks' strategic choices[2]. Are we ready? And could these be the niche areas of focussed research for the IDRBT?

[1] Lisa Morgan- 'Making Change: The Future of Payments is ease of use'

[2] The paradox of Banking 2015 – IBM paper

7. Before moving on to the next set of issues, let me set out a few more questions. If IT is to rule our lives, how do we measure whether IT has delivered? IT has certainly enabled banks to increase its business multiple times with less of man power. But is this sufficient? What has been the customer experience? Do banks study the customer satisfaction levels after a new product is offered? Are there tools or techniques available to measure the impact of IT? Can IDRBT and the experts here suggest tangible methods of measuring the success or failure of IT deployment?

Mind the gap – Issues in IT delivery in the banking sector

8. Though IT is increasingly becoming an invaluable and powerful tool in driving development, supporting growth, promoting innovation, and enhancing competitiveness in the banking context in India, there are several potential areas where technology can deliver better.

Financial inclusion

9. Technology plays a major role in financial inclusion, a sustainable banking theme very relevant to a country like India that has a large unbanked population. For example, handheld devices, used by bank agents to draw people living in remote areas into the banking fold, run on technology. Internet and mobile technologies are trying to reach out to the populace starved of banking services as well. Financial institutions are also joining forces with network operators in providing access to mobile based payment services even to those who do not have bank accounts. These product and channel innovations require robust and scalable ICT platforms.

10. If we want to move the mobile financial services sector beyond payments space and create products that reach every level of society, we have to be creative. The industry requires product innovation that focuses on customer desires, usage patterns, and needs, and then translate these findings into viable products. For example, in Uganda, Grameen Foundation's AppLab is

partnering with MTN and CGAP to do this by launching a product incubator: AppLab Money. This product AppLab Money reportedly uses several complementary research methods to understand the financial lives of the poor.

In this context, are our efforts good enough? Where can we do more? Isn't it time for introspection?

Innovation

11. Today, banking is becoming increasingly complex and banks which fail to use technology to take their services to the common man and tap the potential of the rural sector will stand to lose. Ultimately, technology would be the key enabler and differentiator in accomplishing this objective. When we look at technology, the scope for innovation is immense – in the field of financial inclusion itself, right from biometric based systems to mobile based to simple interactive voice response based applications. But it cannot be a one-size-fits-all approach. This however, does not reduce the importance of standardisation and interoperability which would result in higher efficiency and more choices. Further, many initiatives using technology would be impossible to pursue without the active participation and support of several stakeholders. Thus the need of the hour is collaborative innovation.

Do banks recognise the power of innovation to create higher customer satisfaction, loyalty and bank productivity through their products/processes/ channels?

Data integrity

12. The policy and decision-making processes are becoming more information intensive, therefore, it is imperative to ensure quality of data and its timely submission by banks not only to the regulator but to the banks' managements as well. This area requires more attention, given that data quality may have an impact on the reputation of banks besides posing other risks. You would appreciate that accurate data is a *sine-qua non* for improving the quality of MIS and an effective Decision Support System (DSS). By adopting an automated process for submission of returns, the banks would be able to submit accurate and timely data without any manual intervention to the regulator. *Inter alia*, this process would also assist the banks in terms of improved timelines, enhanced data quality, improved efficiency of processes. Towards this, the Reserve Bank has initiated the Automated Data Flow Project. The deadline for banks to automate all their returns is March 2013.

Are the banks braced up to meet the deadline?

Cost of transactions

13. Technology has been helping in delivering affordable financial services with greater efficiency without compromising on levels of safety, security and reliability. Perhaps the most significant contribution of technology has been in attempting to bring down the cost of financial services by using economies of scale. Technology has also been used in removing geographical barriers and reaching out to the unbanked – the poor are unreached but not unreachable. The use of electronic payment modes to disburse the governments social benefit transfers illustrates this point. Technology should be used in such a manner that you have a diversified product range to bridge the supply gap at the same time keeping in view the customers convenience in mind.

Has IT delivered in India in terms of reducing the costs? If not why? Is the Government/Regulatory intervention the best way forward? What are the advantages or dangers to such an approach?

Channel security

14. To compete successfully in today's tough market place, financial institutions need to retain the trust of their customers – a trust which relies not only on their capacity to deliver good value services, but also on their ability to protect people, assets, premises and the highly sensitive data they hold. There is always an element of hidden fear as far as IT based operations

are concerned, the fear of the unknown. Banks need to ensure that the best of controls and security measures are in place. Customer education is the key to customer trust.

Are there steps taken towards customer education as far as IT based service delivery channels are concerned? Are these adequate?

How to bridge the Gap?

15. Having identified some of the gaps, let me now try and offer suggestions to bridge these gaps.

IT and Business alignment

16. Alignment can be described as the timely and appropriate application of IT in harmony with business objectives, strategies and requirements. Alignment occurs when the respective strategies are interwoven in such a way that the right things are done to deliver greater value to the organisation. After all, a successful alignment is a two way relationship, a give and take between IT and business. Though IT has the capability to reduce costs, standardise processes, the benefits of successful IT-business alignment are beyond these *i.e.,* increased efficiency of implementation & integration, reduced cycle time, increased enterprise agility and the ultimate benefit of improving the bottom line. Until recently IT played a docile role in business planning. It is now time for banks to move over from being merely an implementation tool to shaping business strategy. The principal difficulty is that there are few instances of business oriented IT strategies as most are focussed on technology products of one shape or another. This makes it all the more challenging to align the IT and business strategies.

Managing Outsourcing

17. IT outsourcing is a growing phenomenon in developing economies. The challenges of outsourcing range from selection of ideal outsourcing partner to dynamic issues of knowledge transfer, security risks, legal concerns, vendor dependency, *etc.* This concern has heightened in recent years and these issues may be dealt with in synchronisation with general governance principles. As we look to external IT service providers for assisting us to innovate and optimise, we must assess how mature our outsourcing capability is to utilise the right engagement models and align ourselves with the appropriate providers.

18. Before initiating the process of outsourcing any service/application, it is necessary to examine whether the outsourced function meets the business needs and strategic objectives. Identification of the nature of the activities undertaken by the vendor and the inherent risks of the activity are also important. It is recommended that due diligence in selecting, contracting, supervising and monitoring of the vendor is adopted. Diligence in vendor selection also requires a reasonable inquiry into the ability and suitability of the vendor to meet the requirements for the proposed service. Well defined and enforceable Service Level Agreements (SLAs) with the vendor will establish the performance standard and service quality expected under the agreement. As part of meeting principles of governance, it may be ensured that there is a documented, accepted procedure which governs service expectations and obligations including change management.

Combating Cyber Crime

19. In a networked world, there are no real safe harbours – like a ship which can be attacked by pirates anywhere, a service delivery offering on the network is generally available to everyone else on the network; in some cases this may well be the gateway for entry to the bank's main systems as well. Cyber security is a collective concern that is comprehensive in scope – the Internet has no national boundaries. Whereas security is typically regulated at the government level, cyber security is national, international, public and private in character all in the same context. Today, there are Government initiatives aimed at enhancing cyber security which is complemented by cyber risk management and security provided by private entities

that manage and operate most ICT infrastructure. Such security cannot be adequately assured by market forces or regulation; rather, it requires a novel mix of solutions involving a range of stakeholders working both in their own domains and in concert. No single strategy, set of governance arrangements, or operational practices will be right for every country. Cyber security issues now top the list of risks to watch. While such importance is ascribed for cyber security in general, banks, as prime targets of financial fraud and crime, need to be extra vigilant as far as cyber security is concerned and this needs to be ingrained in each and every offering made available using IT. The role of organisations such as IDRBT assume significance in this regard.

20. To share some important findings:

- India is seeing an increase in the number of cyber attacks, from 2,565 in 2008 to 8,266 in 2009 and 10,315 in 2010 (*source: CERT-In*). India is one of the top three countries in the world in terms of malicious activities[3]. India has been responsible for sending out 16 per cent of all spam according to the results of IBM's 'X-Force 2012 Mid-Year Trend and Risk Report', ahead of the 15 per cent level of the USA. Some of the cyber security threats (malware and virus) reported by *CERT-In* are DNS Changer malware, Zeus BOT, stuxnet and spyeye.
- According to a report by Japanese security company Trend Micro, hackers are now increasingly targeting Indian financial institutions with the latest variants of malware like SpyEye and Zeus to siphon larger amounts of money from bank accounts. It has reported a whopping 187 per cent rise in phishing attacks being reported on various Indian brands in May this year over the previous month and points out that significantly, all phishing are targeted on the banking sector[4].

21. In this context, the questions that arise are:

- *How secure are we?*
- *How literate and aware are our employees about the IT governance and cyber security?*
- *Is there an organisation culture for detecting and reporting of violations?*
- *Is there a zero tolerance policy about breeches of policies?*
- *Do business partners share and observe your governance and security policy?*

All these assume significance in view of the fact that the internal threats from employees and third party service providers are as critical as external threats.

Governance in IT

22. Is IT governance all about IT? A consistent IT Governance policy provides institutions with tools which ensure that IT investment drives business to meet its goals. IT Governance depends strongly on corporate governance and the overall corporate strategy, which means that IT strategy and IT processes should be in consonance with business goals. In other words, it means that IT Governance provides tools to manage IT structures and processes in order to appropriately support business strategy.

23. Implementing IT Governance in banks can be very challenging. For addressing the structural inadequacies in the areas of IT governance -information, data, information security- there is an imperative need to have synergy among these areas. Adoption of a structured IT Governance framework would enable banks to manage their businesses in a manner that would bring about benefits to their

[3] source: Symantec Intelligence Quarterly: July – September, 2011

[4] http://newindianexpress.com/business/article551583.ece

customers as also facilitate the growth of banks in this fiercely competitive world. Banks' investments in IT are most fruitful when they match technology strategy with business strategy, implement systems in a disciplined way, and balance value creation with increased IT capabilities.

Human capital – development of knowledge and talent marketplace

24. Though the face of banking industry has undergone a sea change in the years that have gone by, you would agree with one characteristic of the industry that has remained unchanged is people. The banks succeed or fail depending on the quality of their workforce talent at every level – the front lines, middle management and executive leadership. Banks should look at workforce talent as the primary engine for sustained, competitive advantage and for creating a workforce in which people at every level are capable of contributing with high levels of performance leveraging on technology. It's about creating a IT culture of excellence. It is the HR teams that will give banks the competitive advantage in the years to come.

Analytics – to drive up customer confidence

25. The power of predictive analytics is undisputable. It has made deep inroads into several industries and is now doing the same in banking. So, what's new? Haven't banks – the producers and consumers of more data than most other industries, been mining it since ages? Yes, but data mining and analytics aren't the same thing. To cut a long story short, the latest analytics solutions have the ability to process petabytes of data into predictive insights, in near real time. This means that in theory, banks can derive key insights into the outcome of an action, even as they execute it. In practical terms, this could mean the difference between stopping fraud in mid-transaction or raising the alarm after the deed is done. Now banks should be looking at leveraging predictive analytics to acquire and retain customers, manage campaigns and improve cross sales. They also have the opportunity to refine customer understanding to a different level, with the help of analytics, which would improve customer centricity.

Concluding thoughts

26. At this stage, I would like to acknowledge the contributions made by you all. As CIOs and IT managers, you have all excelled in bringing about the much needed change in the banking sector. A decade back we could see on the sign boards 'fully computerised branch' which now could perhaps be changed to 'fully automated transaction processing branch'. We cannot, however, rest with this. We need to strive towards higher levels, each one of you becoming a super CIO[5] – A CIO who can function as that lever and who can make a difference to the bank's productivity. Since I am addressing a group of CIOs, I would like to leave you with some thoughts as to how you can transform into super CIOs by using technology differently:

Use Big data

27. Banks would need to think about Big data. Collecting and analysing transactional data will give banks more insight into their customer's preferences. It can be used to create new products and services and allow banks to remedy emerging problems in an efficient manner. However there is one word of caution, you may need skilled personnel to work on the tools to analyse the data.

Lead

28. What CIOs need is independent thought, open-mindedness, flexibility and the ability to learn continuously. Technology expects you to be a student for all your life. You also need to have that 'fire in your belly' to lead a team. Leadership is an art. Master IT. This may also mean that you may have to press pause button while engaging the top management once in a while for effectively bridging gaps between the IT and business teams.

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[5] CIO Anniversary Issue - November 2012

Collaborate

29. To increase efficiency and ensure regulatory compliance, banks need better methods of gathering and reporting data from all their verticals. Most banks struggle with multiple back-office systems and silo based information. To address these issues in earnest, there will be a need for new and improved business process management tools in the times ahead and hence a great deal of collaboration among all.

Stay secure

30. New technologies being adopted everyday are opening doors for new threats. To combat these, we need new weapons. In the first place we need to identify information that needs to be secure and protected at all times. Further we need to put in effective security for accessing, sharing and controlling important documents across the extended and mobile enterprise on any device. You would appreciate that controlling sensitive or confidential documents is more difficult than controlling records in databases. Most organisations including banks focus the majority of their security resources on the network rather than their applications. Banks would need to prioritise their application security to avoid being 'sitting ducks' for impending attacks. There's a silver lining here. According to a report[6], security in the banking vertical worldwide has shown its dedication to security. During 2011-12, banking websites have had the highest remediation rate at 74 per cent.

Go Cloud but with caution

31. The rapid emergence of cloud computing is transforming the way financial institutions think about how they consume their IT resources. The Cloud is here to stay. We all know it but are worried whether or not to acknowledge it. This is because we are worried about the security and data integrity in the Cloud. Cloud computing, which in the most basic of terms, offers unlimited computing resource as a service on a pay-per-use basis, is proven to directly translate to less upfront capital expense and reduced IT overheads, offering a cost-effective, simple alternative to accessing enterprise-level IT without the associated costs. But world over, financial sector is treading with caution in adopting this technology. Indian financial sector needs to be conscious of this reality, at least until such time, the industry evolves Indian standards for cloud computing.

Source

32. Outsourcing is still in. It may have taken on new names like the cloud but traditional outsourcing is not really extinct. CIOs need to work towards improving their relationship with their vendor so that banks may finally look, in the long run, towards increasing their productivity. In order to cut outsourcing costs, banks may look towards setting clear expectations from the vendor, take control of the project, and choose the vendor wisely. At times, banks may look towards being reasonable in their negotiations, at times 'put the contract away', partner with them to bring about change and be nice; of course not at the cost of expecting sub-optimal performance!!

Manage Mobile

33. The mobile revolution has created a sort of new world order. It has the potential to change the way banks do business. It is up to the banks to take cue. While banks are embracing the mobile channel - and continuing to support the old standby of online banking - they are not integrating the technologies used to build e-banking solutions. Also as more people conduct their banking on mobile devices, these devices also will become the growing focus of hackers and fraudsters, who are always on the hunt for ripe targets. Banks can work on two areas within the mobile channel[7]: fraud prevention and marketing to customers. In fact, world over mobile banking already is playing a role in reducing fraud in a variety of ways

[6] Whitehat Security Website Statistics report 2011

[7] Forrester Report commissioned by ClairMail

– ranging from simple transaction and security alerts to mobile authentication for bank transfers.

34. As I conclude, let me flag final set of broad issues:

- Can CIOs of banks come together and identify three major challenges which require immediate remediation? IDRBT could take these forward as their core activity.
- A major aspect to be taken care of in IT implementation pertains to technological obsolescence. CIOs need to be ready with alternatives before this sets in as far as their systems are concerned. Could we see CIOs collaborating so that you drive the change rather than getting driven?
- All of you are fully aware of the KYC requirements. Can we look at technology based KYC which is easy to implement yet ensures secure and sure information which cannot be repudiated?
- Has time come for CIOs to worry about over dependence on some IT systems (Oracle for database, Windows for Operating system and so on)?
- Finally what would be the best fit options for inter-operability across IT systems and more importantly inter-operability across banks?

35. Whether it's helping to better understand customer profitability, deliver products in innovative ways or manage the spiralling data requirements as a result of new regulation, technology is emerging as both a key enabler and differentiator. As the role of technology evolves more into mainstream banking, banks will need to think about technology expenditure in a different way. Instead of being a cost to manage down, it should be seen more as an investment to support growth and new business development, only to stay ahead of the curve in the competitive world. Ultimately, the proof of technology adoption is in the improvement of services to customers – across all economic, social and geographical sectors. And the CIO's have a large role to play in fulfilling this objective.

36. I would like to conclude with the observation of Gurucharan Das who said 'What leadership needs more than thought is action and what's more important than intelligence is will power'. CIOs, who are leaders in their own right, should work towards translating their thoughts into action with the will power to make IT happen.

37. I wish you all successful deliberations in this Conference. Since the New Year is less than a fortnight away, I would also like to wish you all a happy and prosperous New Year.

ARTICLES

Performance of Private Corporate Business Sector during First Half of 2012-13

*Performance of Private Corporate Business Sector during First Half of 2012-13**

Sales growth of the private (non-financial) corporate business sector decelerated further in the first half (H1) of 2012-13. While there was a modest growth in operating profits, more significantly net profits went up partly contributed by 'other income', reversing the declining trend observed in the previous two half years. Deceleration in sales growth was broad-based across manufacturing, IT and non-IT services sectors. While the net profit margin of the IT sector could be maintained, the non-IT services registered a fall in margin. Performance of smaller companies was relatively weak as compared with larger companies.

This article analyses the performance of the private corporate business sector during the first half (H1) of 2012-13 based on quarterly financial results of 2,832 listed non-government non-financial (NGNF) companies. Besides analysing the aggregate performance, it provides a brief analysis by size and major industry groups. It also captures the evolving trend in sales, expenditure and profit margins of the corporate sector over a longer horizon. The detailed data have been made available in the website of the Reserve Bank. For comparison, similar data for previous half-years have been used.

1. Moderation in Sales Growth but improvement in Net Profit Growth at the aggregate level

1.1 Sales growth (Y-o-Y) of the corporate sector decelerated further to 12.3 per cent during H1:2012-13 from 17.2 per cent in H2:2011-12. In line with the sales, the expenditure on major heads such as consumption of raw materials (CRM) also grew at lower rates resulting in a modest growth in operating profits as measured by 'earnings before interest, tax, depreciation and amortisation' (EBITDA) during H1:2012-13 (Table 1). Further, with moderation in the growth of interest expenses and continued support from 'non-core' other income, net profits also went up, reversing the declining trend observed in the previous two half years.

1.2 Profitability in terms of EBITDA margin and net profit margin (as percentage of sales) were also higher than those recorded in H2:2011-12. Although expenditure growth outpaced sales growth from H1:2010-11 onwards, the reduced gap between the sales and expenditure growth led to a slightly improved profit margin in H1:2012-13, which had

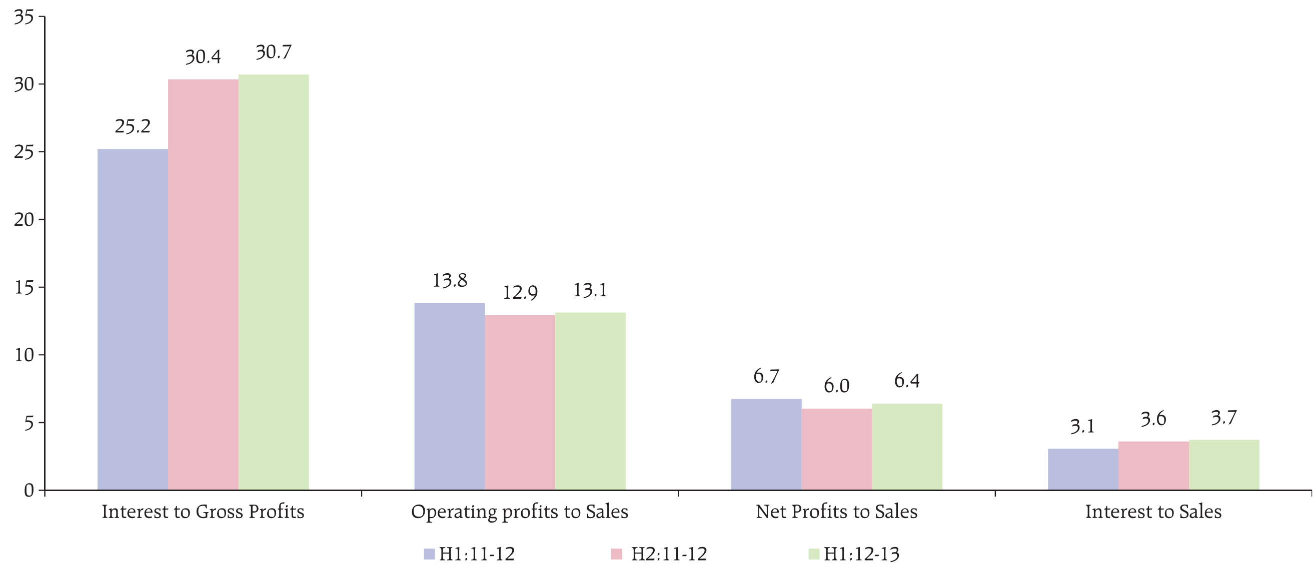
Table 1: Performance of the Listed Non-Government Non-Financial Companies

Items	H1:2012-13	H2:2011-12	H1:2011-12*
No. of companies	2832	3063	2643
	Y-o-Y Growth@ in Per cent	Y-o-Y Growth@ in Per cent	Y-o-Y Growth@ in Per cent
1	2	3	4
Sales	12.3	17.2	20.8
Value of Production	12.4	16.7	20.1
Expenditure	13.6	20.0	22.8
CRM**	13.8	21.1	25.4
Staff Cost	16.1	15.6	18.7
Power & fuel	18.8	29.6	26.4
Operating Profits (EBITDA)	4.9	-1.6	5.7
Other Income@@	31.1	33.3	31.0
Depreciation	10.7	11.4	9.7
Gross Profits (EBIT)	7.7	0.2	7.6
Interest	24.4	37.4	34.5
Earnings before tax (EBT)	1.7	-10.4	0.8
Tax provision	3.0	-1.8	11.9
Net Profits ^	4.3	-15.0	-4.9
Paid-up capital	4.7	4.7	6.9

* : Published in the January 2012 issue of RBI Bulletin.
^ : Adjusted for non-operating surplus/deficit.
** : CRM: Consumption of Raw Materials.
@ : Growth rates calculated on the basis of common set of companies during any period
@@ : Includes forex gain while forex losses are included in Expenditure

* Prepared in the Corporate Studies Division of the Department of Statistics and Information Management. The previous study 'Performance of Private Corporate Business Sector, during the First Half of 2011-12' was published in the January 2012 issue of the RBI Bulletin.

Chart 1: Profit allocation, Profitability and Interest linked ratios



been contracting continuously since H2:2010-11 (Table 2, Chart 1).

1.3 However, the marginal improvement in profit margins in H1:2012-13 was partly contributed by higher 'other income' to sales ratio. Decline in the share of raw material expenses in total sales was offset by the increase in share of staff expenses and EBT (excluding other income) continued to decline (Chart 2).

Table 2: Important Performance Parameters

Period	Sales Growth (Y-O-Y)	Expend-iture Growth (Y-O-Y)	EBITDA Growth (Y-O-Y)	Net Profit Growth (Y-O-Y)	EBITDA Margin (per cent)	Net Profit Margin (per cent)
1	2	3	4	5	6	7
H1:2008-09	32.1	37.3	14.9	3.6	15.2	9.2
H2:2008-09	4.7	5.7	-18.6	-41.4	13.7	5.9
H1:2009-10	-0.6	-3.4	8.8	8.4	17.4	9.8
H2:2009-10	25.3	25.0	47.1	53.0	16.1	8.8
H1:2010-11	21.5	24.2	11.7	6.8	16.1	8.6
H2:2010-11	18.9	21.5	12.4	9.1	15.4	8.2
H1:2011-12	20.8	22.8	5.7	-4.9	13.8	6.7
H2:2011-12	17.2	20.0	-1.6	-15.0	12.9	6.0
H1:2012-13	12.3	13.6	4.9	4.3	13.1	6.4

1.4 Over a longer horizon, sales and expenditure growth continued the slide and fell below the long term average in the last two half years. While the corporate sales and expenditure growth trends since 2000-01 showed considerable fluctuations, the operating profit margin moved within a narrower band. (Chart 3).

Chart 2: Components of Expenditures, Interest and EBT as % of sales for NGNF Companies

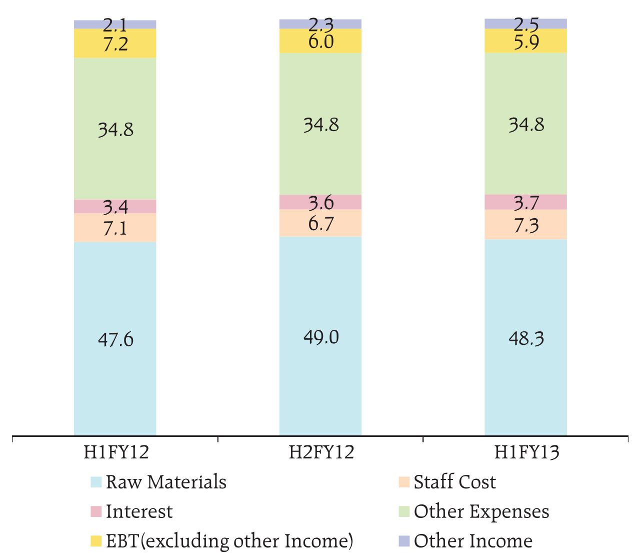
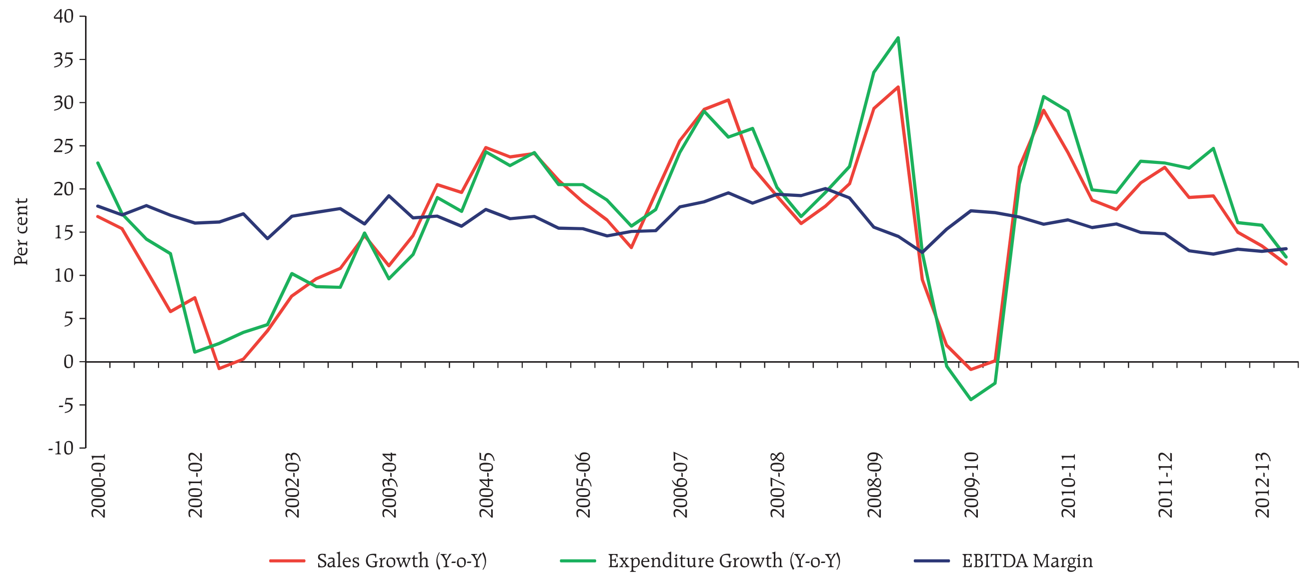


Chart 3: Trends in Select Corporate Performance Parameters



2. Performance of large companies was distinctly better

2.1 An analysis of the companies classified according to size classes based on sales indicates that large companies (annualised sales > ₹10 billion) recorded relatively higher growth in sales and EBITDA as well as higher profit margins than their smaller counterparts. However, sales of large companies also moderated over time and recorded the lowest growth in post-crisis period during H1:2012-13. EBITDA margin declined steadily from 18.2 per cent in H1:2009-10 to 13.4 per cent in H1:2012-13. Net profit margin of large companies, however, improved marginally after declining consistently since H2:2009-10. While sales growth of the medium sized companies (annualised sales ₹1 billion - ₹10 billion) dropped sharply in the last two half-years, their profit margin improved in the latest period. Performance of

Table 3: Size class wise important performance parameters

Size Classes	Large (Annualised sales more than ₹10 billion)					Medium (Annualised sales between ₹1 billion and 10 billion)					Small (Annualised sales less than ₹1 billion)				
Period	Sales Growth	EBITDA Growth	Net Profit Growth	EBITDA Margin	Net Margin	Sales Growth	EBITDA Growth	Net Profit Growth	EBITDA Margin	Net Margin	Sales Growth	EBITDA Growth	Net Profit Growth	EBITDA Margin	Net Margin
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
H1:2008-09	37.2	15.8	5.3	16.0	10.1	17.8	14.0	-1.8	12.6	6.3	6.9	-14.2	-38.3	9.4	3.2
H2:2008-09	8.4	-11.3	-30.3	15.2	7.3	-3.3	-39.6	-76.2	10.0	2.1	-17.9	-78.9	$	2.5	-2.4
H1:2009-10	0.5	11.8	13.8	18.2	10.8	-2.0	1.9	-7.5	15.4	7.0	-20.4	-35.0	-74.5	9.8	1.9
H2:2009-10	27.0	44.1	40.7	17.0	9.6	21.6	60.5	202.7	13.3	5.6	2.6	218.4	$	6.7	3.9
H1:2010-11	22.6	12.2	5.0	16.7	9.2	20.2	11.8	30.8	13.9	6.6	-4.9	-16.7	-92.3	9.5	0.4
H2:2010-11	19.8	14.0	14.3	16.2	9.2	18.9	6.8	-12.0	12.4	4.8	-11.7	-46.3	$	4.1	-4.9
H1:2011-12	22.9	8.2	-0.3	14.4	7.4	12.8	-6.6	-32.7	11.1	3.7	-7.0	-41.7	$	6.1	-0.8
H2:2011-12	20.8	0.5	-12.7	13.5	6.7	3.6	-13.8	-38.0	10.9	3.2	-18.9	-41.9	$	2.6	-3.4
H1:2012-13	14.6	5.9	7.8	13.4	7.0	3.8	0.6	-27.1	11.9	3.5	-21.5	-19.1	$	6.9	-4.0

$: Denominator negative or negligible.

Table 4: Sector wise important performance parameters

Sector	Manufacturing					Service(Other than IT)					IT				
Period	Sales Growth	EBITDA Growth	Net Profit Growth	EBITDA Margin	Net Margin	Sales Growth	EBITDA Growth	Net Profit Growth	EBITDA Margin	Net Margin	Sales Growth	EBITDA Growth	Net Profit Growth	EBITDA Margin	Net Margin
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
H1:2008-09	32.8	14.0	2.2	14.0	8.0	30.6	12.4	2.7	17.2	10.5	28.9	26.1	11.9	23.6	19.1
H2:2008-09	2.4	-22.9	-42.2	12.1	5.2	10.6	-13.9	-12.6	17.0	10.4	10.9	-0.7	-93.8	18.8	1.0
H1:2009-10	-1.9	10.6	9.5	16.9	9.1	2.5	-2.4	-2.3	17.1	8.9	3.7	22.0	19.6	23.6	18.1
H2:2009-10	30.3	61.5	92.8	15.1	7.9	16.0	26.1	4.9	17.5	9.2	6.9	18.0	18.6	23.5	17.2
H1:2010-11	24.8	11.7	9.9	15.1	8.0	11.1	13.4	-4.0	17.3	7.6	15.7	8.6	5.3	24.1	18.1
H2:2010-11	21.2	14.2	13.4	14.3	7.5	11.4	7.4	-7.5	17.2	8.1	17.8	11.4	16.2	22.2	17.1
H1:2011-12	22.5	4.7	-4.9	12.6	6.1	15.0	4.9	-26.8	15.9	5.1	18.1	13.4	21.8	21.1	17.1
H2:2011-12	17.5	-4.5	-20.6	11.6	5.1	15.8	0.2	-24.1	15.0	5.3	17.8	13.8	23.9	21.6	17.7
H1:2012-13	12.2	2.5	2.4	11.6	5.7	11.2	2.3	-3.9	15.7	4.9	16.9	25.6	18.6	22.7	17.1

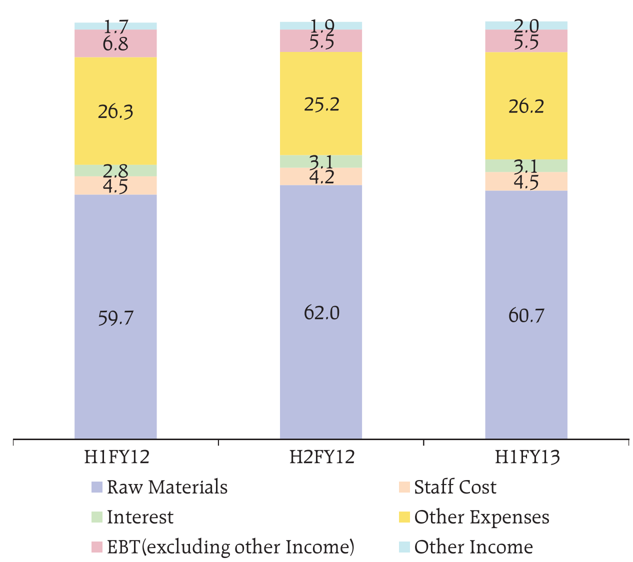
companies in the smallest size class (annualized sales upto ₹1 billion) suffered the most in the recent periods. Their sales have been declining for five consecutive half years and they incurred net losses continuously since H2:2010-11.

3. Sales growth moderated across sectors with profit margin improving in the manufacturing sector

3.1 Moderation in the sales growth in H1:2012-13 was seen across all the three broad sectors. Manufacturing sector recorded decelerating sales growth for two consecutive half years (Table 4). Sales growth of the services sector (both IT and others) also tapered down in H1:2012-13. Profit margins of manufacturing and service companies, however, behaved somewhat differently. While EBITDA margin of manufacturing companies declined continuously from 16.9 per cent in H1:2009-10 to 11.6 per cent in H2:2011-12, their net profit margin showed some improvement in the current period. In the case of services (other than IT) sector, EBITDA margin recovered slightly in H1:2012-13 after declining in 2011-12, whereas their net profit margin moderated in H1:2012-13. IT sector continued to outperform the other sectors with sales growth outpacing growth in expenditure in H1:2012-13. The IT sector maintained its net profit margin at above 17 per cent for the last three and half years in a row.

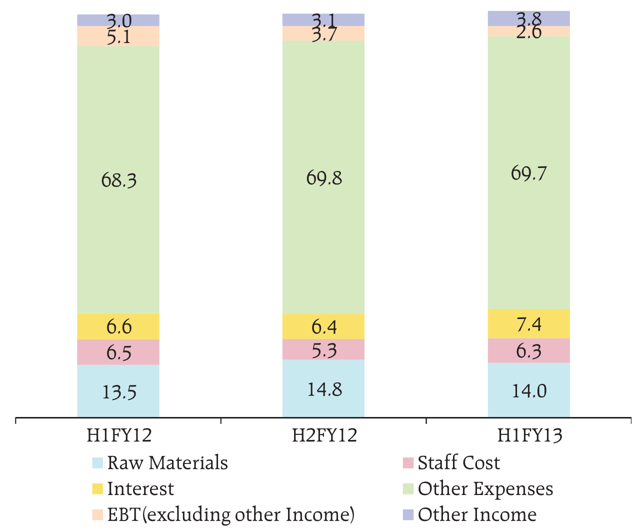
3.2 A closer look at the components of expenditure viz., CRM, staff cost, interest expenditure and other expenses[1] as percentage of sales revealed that they moved in a manner so as to leave the gross profit margin (EBT) almost intact between H2:2011-12 and

Chart 4: Components of Expenditures, Interest and EBT as % of sales for Manufacturing Companies



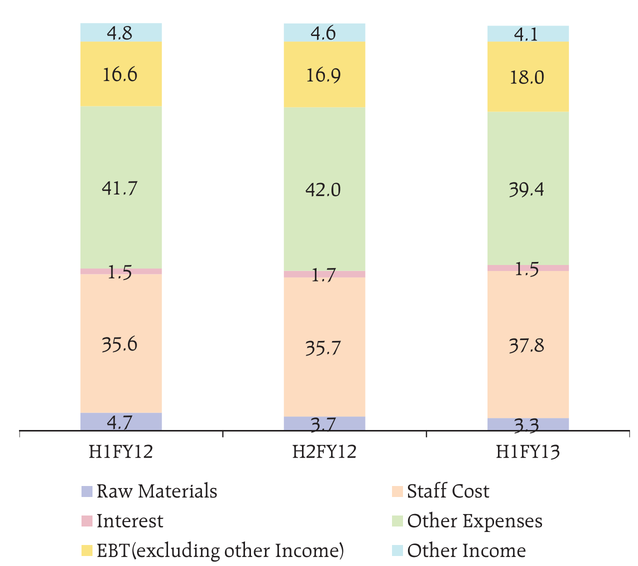
1 Includes power& fuel cost, administrative costs, change in stock and depreciation

Chart 5: Components of Expenditures, Interest and EBT as % of sales for Services (Excluding IT) Companies



H1:2012-13 for the manufacturing sector. Reduction in CRM has been nullified by an increase in other expenses leaving EBT margin almost unchanged compared to H2:2011-12 (Chart 4). For services (other than IT) companies, increased staff cost and interest cost have forced the EBT margin (excluding other income) down (Chart 5). On the other hand, for IT sector, the increase in the staff cost was offset by the reduction in other expenses resulting in minor improvement in EBT margin (Chart 6).

Chart 6: Components of Expenditures, Interest and EBT as % of sales for IT Companies



3.3 The longer term trend from the beginning of the last decade reveals that CRM to sales ratio has remained fairly stable, except for the dip during the 2008-09 crisis period (Table 5, Chart 7) and the staff cost also remained stable. Interest expenses, which is a small component of the total expenditure, as percentage of sales has increased across all sectors and all size classes in different sectors in the recent periods. However, it remains lower than the levels observed in 2001-02.

4. Profit margin improved in major industries but smaller companies suffered more even in comparatively better performing industries

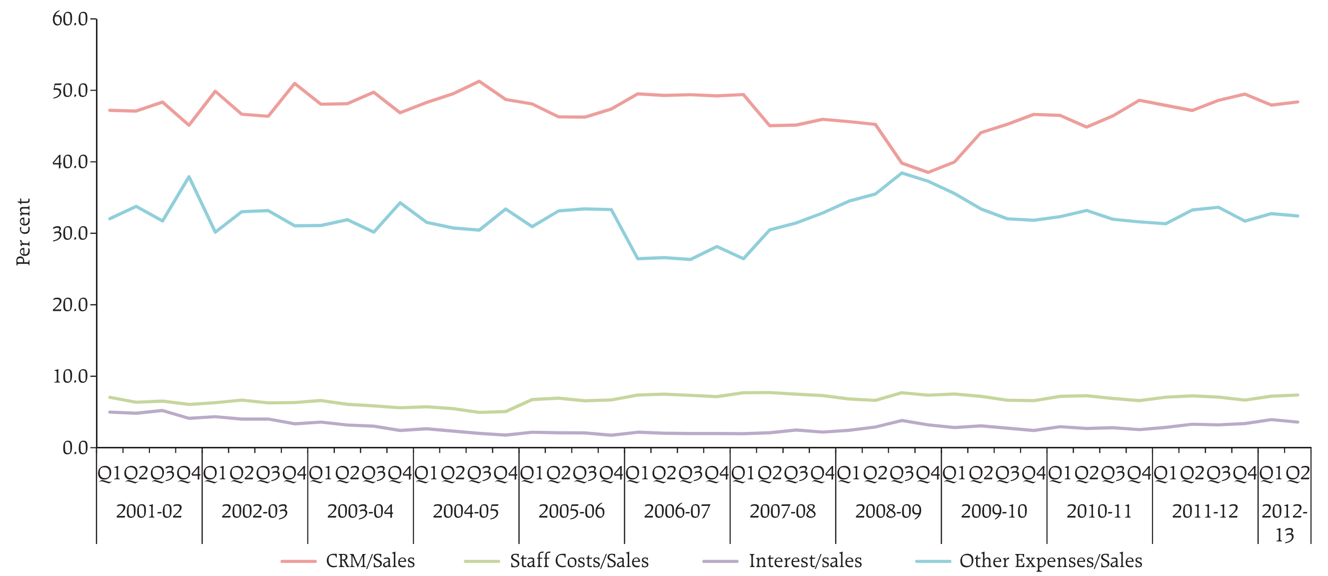
4.1 An analysis at major industry group level indicates that most of the industries in the manufacturing sector followed the general trend of lower sales growth and by and large maintained or slightly improved the profit margin in H1:2012-13. In the basic goods sector, sales growth of the cement industry moderated in H1: 2012-13 after steadily reaching the recent peak in H2:2011-12, but still remained above the growth rate of last four years (Chart 8). More importantly, its profit margin improved continuously since H1:2010-11. However, sales growth of another basic goods industry viz., iron & steel suffered in the last two half-years and its profit (EBITDA) margin also contracted during this period before showing some improvement in H1:2012-13 (Chart 9).

4.2 In the consumer goods sector, sales growth of motor vehicles and textiles industries suffered huge and steady decline in the recent period, although sales of textiles group improved marginally in H1:2012-13. EBITDA margin of motor vehicles industry declined steadily since H1:2010-11 while that of the textiles industry recovered in the last two half-years (Charts 10 and 11). On the other hand, pharmaceuticals industry succeeded in maintaining a steady rise in

Table 5: CRM, Staff Cost and Interests Expenditure as percentage to Sales

	CRM	Staff Cost	Interest Exp.	CRM	Staff Cost	Interest Exp.	CRM	Staff Cost	Interest Exp.	CRM	Staff Cost	Interest Exp.
	Large			Medium			Small			All size		
	Manufacturing											
H1:2008-09	61.6	3.6	1.2	56.4	6.0	2.7	52.2	7.9	4.5	60.3	4.2	1.6
H2:2008-09	54.2	4.3	1.8	56.0	6.5	3.2	51.3	8.8	5.3	54.5	5.0	2.3
H1:2009-10	55.4	4.3	2.3	52.2	6.5	3.5	49.5	8.9	5.8	54.5	4.9	2.7
H2:2009-10	59.7	3.7	2.3	56.5	6.5	3.4	51.6	8.3	5.0	58.9	4.4	2.6
H1:2010-11	57.6	4.1	2.1	53.2	7.0	3.4	47.4	8.6	6.0	56.6	4.7	2.4
H2:2010-11	60.4	3.8	2.4	57.2	6.4	3.7	51.8	7.4	5.2	59.7	4.3	2.7
H1:2011-12	59.6	3.9	2.2	54.3	6.8	4.1	50.0	10.2	5.1	58.7	4.5	2.6
H2:2011-12	63.1	3.7	2.7	57.1	6.6	4.5	51.5	10.0	7.4	62.0	4.2	3.1
H1:2012-13	62.0	4.0	2.8	53.7	6.9	4.6	51.8	9.7	8.5	60.7	4.5	3.1
	Services Other than IT											
H1:2008-09	22.6	6.1	1.7	21.3	8.5	3.5	18.6	9.4	4.9	22.3	6.5	2.0
H2:2008-09	18.3	5.8	2.8	15.6	7.8	6.2	19.3	8.5	5.3	17.9	6.2	3.4
H1:2009-10	15.3	6.2	4.2	19.0	10.5	5.4	19.2	11.4	7.1	15.9	6.9	4.4
H2:2009-10	11.8	5.8	3.1	8.2	5.6	4.3	18.9	9.6	6.1	11.5	5.9	3.3
H1:2010-11	14.2	6.7	4.7	15.4	8.9	7.3	19.8	12.0	8.5	14.4	7.1	5.1
H2:2010-11	13.5	5.0	4.7	15.2	8.2	7.9	19.1	10.7	8.4	13.8	5.6	5.2
H1:2011-12	17.9	6.3	5.5	14.5	10.3	8.5	21.6	11.5	10.4	17.5	6.9	5.9
H2:2011-12	14.9	4.8	5.7	13.4	8.8	10.4	18.1	11.2	9.1	14.8	5.3	6.4
H1:2012-13	13.8	5.7	6.8	14.5	9.6	11.3	18.2	12.4	10.8	14.0	6.3	7.4
	IT											
H1:2008-09	4.8	32.1	0.3	4.9	24.2	1.5	13.6	28.1	1.9	5.1	30.9	0.5
H2:2008-09	2.4	35.8	0.5	6.7	28.9	1.6	11.2	30.7	3.0	3.3	34.6	0.8
H1:2009-10	4.4	32.5	0.7	4.2	30.0	2.7	14.6	23.3	3.6	4.6	31.9	1.1
H2:2009-10	6.0	31.2	0.5	4.3	31.7	3.4	12.4	23.3	4.4	5.9	31.0	1.0
H1:2010-11	2.7	35.9	0.7	4.3	33.1	2.6	12.5	25.4	6.1	3.2	35.3	1.1
H2:2010-11	5.3	33.5	0.8	7.3	32.8	3.1	8.7	26.4	6.2	5.6	33.3	1.2
H1:2011-12	3.4	35.7	1.1	3.8	40.4	3.0	15.0	31.6	8.0	3.6	36.1	1.4
H2:2011-12	3.4	36.3	1.2	4.6	31.4	4.3	10.7	33.0	10.6	3.7	35.7	1.7
H1:2012-13	2.6	38.1	0.9	8.3	34.8	5.8	11.3	35.5	10.9	3.3	37.8	1.5
	All Sectors											
H1:2008-09	50.5	6.2	1.2	49.8	7.2	2.8	44.1	9.8	4.3	50.2	6.5	1.6
H2:2008-09	41.2	7.5	1.9	47.0	8.1	3.6	42.5	10.2	5.2	42.4	7.7	2.4
H1:2009-10	42.5	7.1	2.6	44.7	8.4	3.8	42.2	10.3	5.9	42.9	7.4	2.9
H2:2009-10	45.7	6.1	2.3	46.3	7.6	3.5	42.7	9.7	5.1	45.8	6.5	2.6
H1:2010-11	45.8	6.7	2.5	45.2	8.6	3.9	40.4	10.4	6.4	45.6	7.1	2.8
H2:2010-11	47.3	6.1	2.8	47.7	8.1	4.3	42.4	9.5	5.9	47.3	6.5	3.1
H1:2011-12	47.9	6.8	2.7	45.8	9.0	4.7	42.7	11.9	6.2	47.5	7.2	3.1
H2:2011-12	49.4	6.3	3.2	47.2	8.3	5.5	41.4	12.2	8.0	49.0	6.7	3.6
H1:2012-13	49.0	7.0	3.3	44.5	8.9	5.8	41.5	12.4	9.2	48.3	7.3	3.7

Chart 7: Trends in Components of Expenditure



sales during the last two years but its EBITDA margin declined (Chart 12).

4.3 Sales growth of machinery and machine goods industry remained low since H1: 2011-12 and its EBITDA margin also declined gradually. Another important industry viz., the construction industry recorded lower sales growth in the latest half year but its profit margin remained intact (Chart 13).

4.4 A further disaggregated analysis of the performance of these industries in terms of sizes

Chart 8: Cement & Cement Products

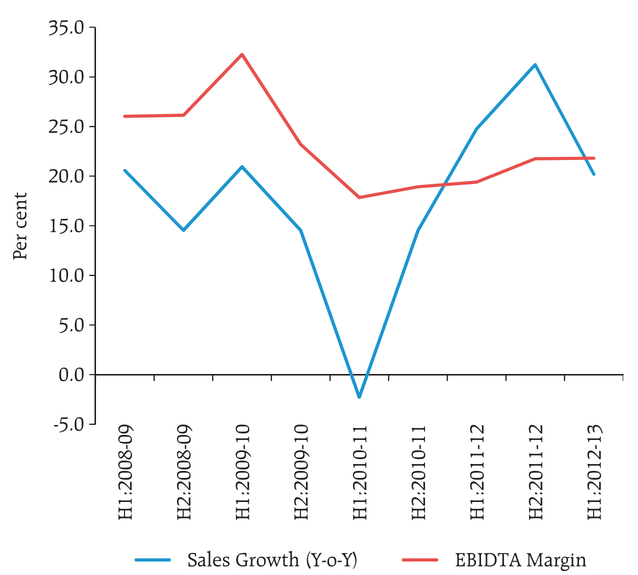


Chart 9: Iron & Steel

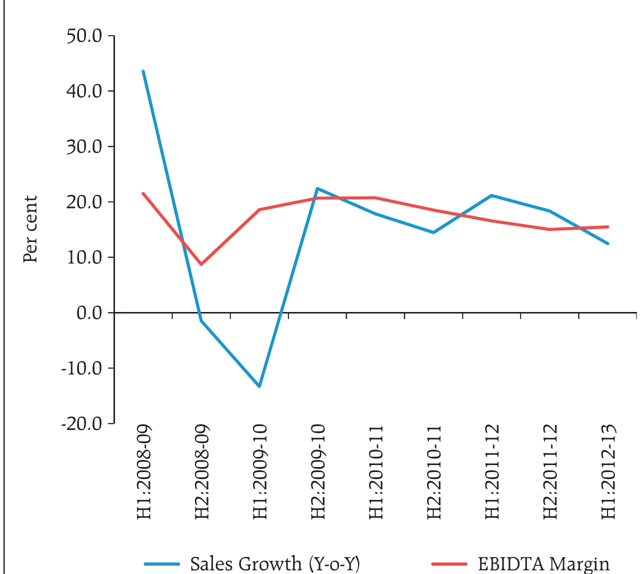


Chart 10: Textiles Industry

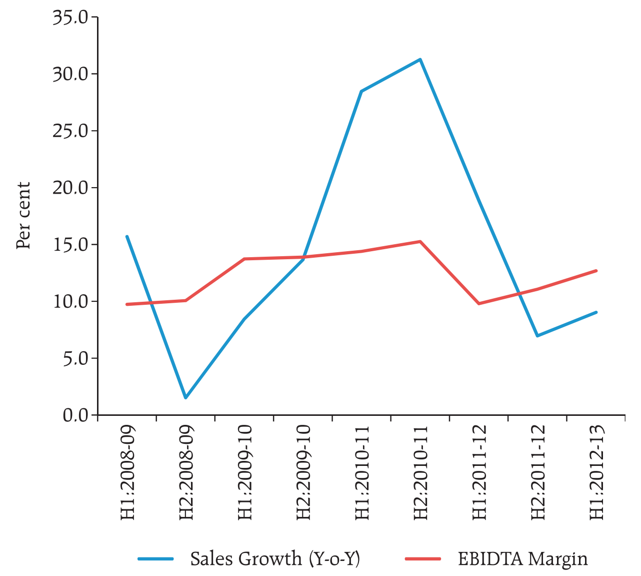
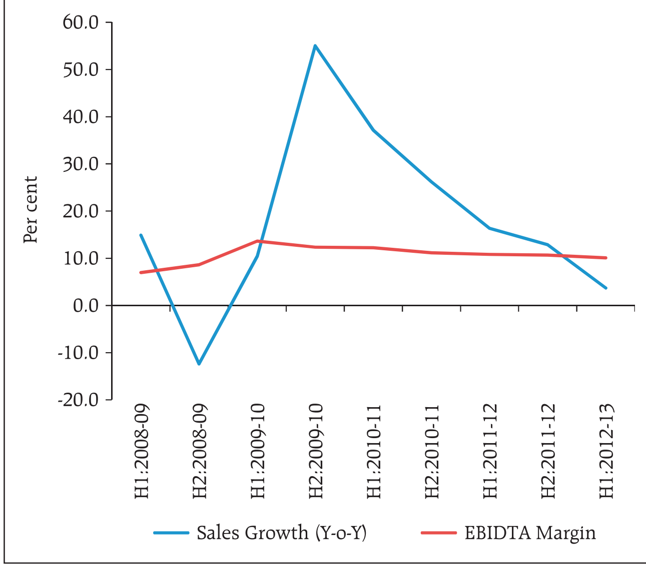


Chart 11: Motor Vehicles & Other Transport Equipments



corroborated the earlier observation that sales growth of large companies was relatively higher than that of their smaller counterparts in H1:2012-13. However, the disparity is much sharper for construction and iron & steel sector where the sales as well as EBITDA of the smaller companies, as a group, severely contracted. It is notable that in H1:2012-13, the smaller companies were in deeper trouble, even in the industries which at the aggregate level performed relatively well (Annex 1).

5. Quarterly view - Sales growth reached a low in Q2:2012-13 while net profit margin improved

5.1 An analysis of performance of (NGNF) listed companies over the quarters reveals that sales growth moderated over the first two quarters of 2012-13 and

Chart 12: Pharmaceuticles & Medicines

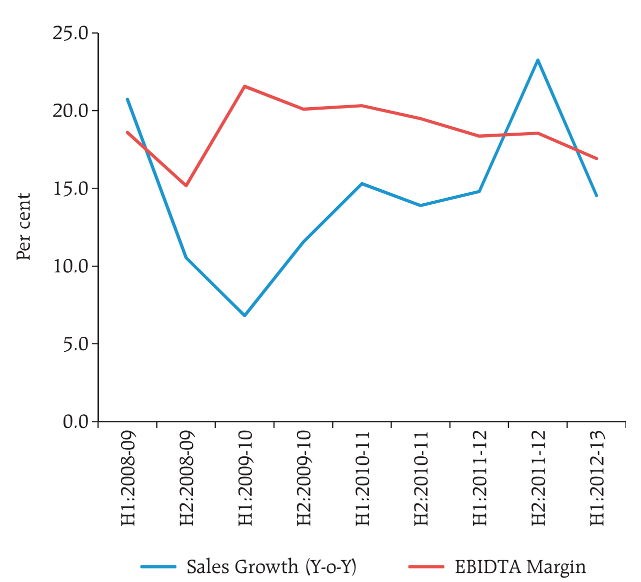


Chart 13: Construction

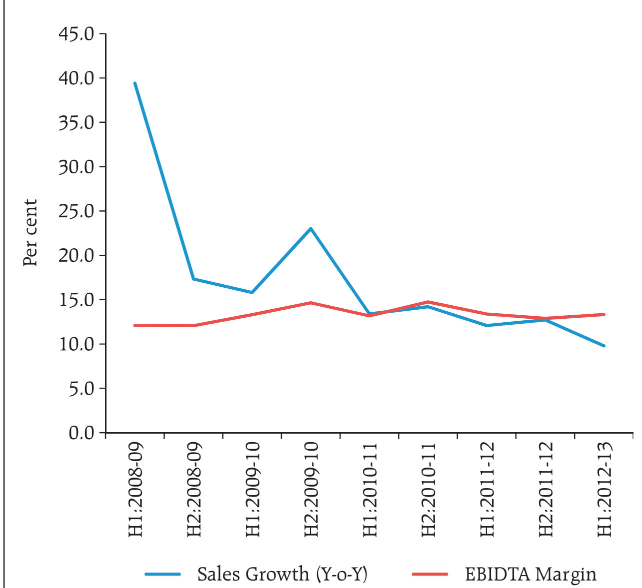


Table 6: Performance of the Select Companies over the Quarters of 2012-13

	2011-12		2012-13	
	Q1	Q2	Q1	Q2
1	2	3	4	5
No. of companies	2,307			
Year-on-year Growth rate in per cent				
Sales	22.6	19.4	13.1	11.0
Expenditure	23.1	22.7	15.4	11.8
Operating Profits (EBITDA)	12.3	-0.3	-4.2	11.1
Other Income	40.0	24.8	28.2	51.1
Depreciation	9.5	10.4	9.8	9.3
Gross Profits (EBIT)	15.9	0.2	-3.3	19.2
Interest	21.5	48.2	36.7	11.3
Net Profits	6.0	-14.7	-9.8	25.3
Ratios in Per cent				
Operating profits to Sales	14.9	13.0	12.7	13.1
Gross profits to Sales	13.1	11.5	11.5	12.7
Profit after tax to Sales	7.5	6.2	6.1	7.1
Interest to Sales	2.8	3.2	3.7	3.5
Interest to Gross profits	21.4	28.2	32.7	27.5
Interest Coverage (Times)	4.7	3.5	3.1	3.6

reached its lowest level in Q2: 2012-13 in previous 12 quarters. The slide in sales growth (Y-o-Y) in Q2:2012-13 was spread across all the three sectors (manufacturing, IT and services other than IT) and all sales size groups. Companies in aggregate, however, could manage higher profit margins in Q2:2012-13 as compared with Q1:2012-13 which were driven primarily by lower interest outgo and higher support from other income. More specifically, the growth in interest expenses, which was persistently high during previous four quarters, moderated to less than 12 per cent in Q2:2012-13 which, in turn, contributed positively to profitability. Net profits for each of the three broad sectors (manufacturing, IT and services other than IT) grew in Q2:2012-13 with a noticeable improvement in manufacturing sector.

Annex 1: Important Performance Parameters for select Industries								
Industry	**Period**	**All sizes**			**Large**			
		Sales Growth	**OP Margin**	**Net Margin**	**Sales Growth**	**OP Margin**	**Net Margin**
Textiles	H1:2011-12	18.9	9.8	0.1	24.0	12.6	2.1
	H2:2011-12	7.0	11.1	2.2	16.6	14.1	4.4
	H1:2012-13	9.0	12.7	2.8	12.9	14.4	3.8
Pharmaceuticals and medicines	H1:2011-12	14.8	18.4	12.6	18.3	20.7	13.5
	H2:2011-12	23.2	18.5	4.8	28.6	18.9	5.4
	H1:2012-13	14.5	16.9	11.0	19.3	18.1	13.4
Cement and cement products	H1:2011-12	24.8	19.4	8.1	28.9	20.8	9.1
	H2:2011-12	31.2	21.7	9.5	33.3	23.0	10.1
	H1:2012-13	20.2	21.8	11.7	20.4	22.7	11.9
Iron and steel	H1:2011-12	21.2	16.6	4.9	22.5	18.1	5.5
	H2:2011-12	18.4	15.0	5.0	22.2	16.7	6.2
	H1:2012-13	12.5	15.5	4.8	16.6	16.8	5.8
Motor vehicles and other transport equ	H1:2011-12	16.4	10.8	6.4	16.1	10.9	6.6
	H2:2011-12	12.9	10.7	6.5	12.9	10.8	6.6
	H1:2012-13	3.7	10.1	5.8	4.1	10.3	6.2
Construction	H1:2011-12	12.1	13.4	5.1	13.3	13.3	5.1
	H2:2011-12	12.7	12.9	5.9	15.4	13.1	6.1
	H1:2012-13	9.8	13.3	4.6	12.7	13.3	4.7
Machinery ^	H1:2011-12	12.4	10.2	4.5	13.1	10.7	4.8
	H2:2011-12	15.6	9.6	4.4	17.1	9.8	4.9
	H1:2012-13	10.2	8.6	4.0	13.1	8.4	3.6
Industry	**Period**	**Medium**			**Small**		
		Sales Growth	**OP Margin**	**Net Margin**	**Sales Growth**	**OP Margin**	**Net Margin**
Textiles	H1:2011-12	15.4	6.1	-2.4	-14.7	1.8	-8.5
	H2:2011-12	-2.8	6.4	-0.5	-27.8	4.0	-10.7
	H1:2012-13	3.4	9.7	1.2	-7.7	5.5	-4.4
Pharmaceuticals and medicines	H1:2011-12	7.3	14.1	12.9	1.4	-5.6	-18.5
	H2:2011-12	9.2	18.5	2.0	-3.1	4.7	9.0
	H1:2012-13	11.0	13.9	5.2	-46.4	4.3	-15.7
Cement and cement products	H1:2011-12	6.2	12.2	2.9	9.4	7.3	-1.8
	H2:2011-12	17.8	13.0	5.3	35.3	15.4	3.4
	H1:2012-13	20.0	14.2	9.9	-1.5	16.5	1.3
Iron and steel	H1:2011-12	13.6	6.5	1.0	-3.7	1.2	-1.8
	H2:2011-12	-0.5	4.8	-2.5	-1.0	1.9	1.9
	H1:2012-13	-8.0	6.6	0.7	-31.4	-3.8	-46.1
Motor vehicles and other transport equ	H1:2011-12	19.2	10.4	4.6	10.2	7.4	7.0
	H2:2011-12	13.7	9.8	5.4	-11.5	1.8	-0.3
	H1:2012-13	0.1	8.5	2.1	-0.9	6.6	8.0
Construction	H1:2011-12	3.4	14.4	5.2	-8.4	15.0	8.0
	H2:2011-12	-8.3	10.5	4.2	-40.7	9.7	-2.3
	H1:2012-13	-8.8	14.3	4.4	-24.2	7.9	-2.3
Machinery ^	H1:2011-12	11.8	9.0	3.5	0.3	10.2	5.7
	H2:2011-12	12.9	9.3	3.3	-10.5	7.5	-1.3
	H1:2012-13	-1.0	9.2	6.2	2.1	10.1	0.0

^ : includes Machinery & Machine Tools and Electrical Machinery & Apparatus
Small: Annualised salesless than ₹1billion; Medium: between ₹1 billion to ₹10 billion; Large: more than ₹10 billion.

CURRENT STATISTICS

Select Economic Indicators

Reserve Bank of India

Money and Banking

Prices and Production

Government Accounts and Treasury Bills

Financial Markets

External Sector

Payment and Settlement Systems

Occasional Series

Contents

Notes: .. = Not available.
– = Nil/Negligible.
P = Preliminary/Provisional. PR = Partially Revised.

No. 1: Select Economic Indicators

Item	2011-12	2011-12		2012-13	
		Q1	Q2	Q1	Q2
	1	2	3	4	5
1 Real Sector (% Change)					
1.1 GDP	6.5	8.0	6.7	5.5	5.3
1.1.1 Agriculture	2.8	3.7	3.1	2.9	1.2
1.1.2 Industry	2.6	6.5	2.7	0.8	1.2
1.1.3 Services	8.5	9.3	8.5	7.4	7.1
1.1a Final Consumption Expenditure	5.5	4.9	4.9	4.7	4.4
1.1b Gross Fixed Capital Formation	5.5	14.7	5.0	0.7	4.1
	2011-12	2011		2012	
		Oct	Nov	Oct	Nov
	1	2	3	4	5
1.2 Index of Industrial Production	2.9	-5.0	6.0	8.2	..
2 Money and Banking (% Change)					
2.1 Scheduled Commercial Banks					
2.1.1 Deposits	13.5	15.3	16.5	13.6	14.0
2.1.2 Credit	17.0	19.3	17.7	16.0	18.4
2.1.2.1 Non-food Credit	16.8	19.0	17.4	15.6	18.0
2.1.3 Investment in Govt. Securities	15.9	13.6	16.1	14.8	15.0
2.2 Money Stock Measures					
2.2.1 Reserve Money (M0)	3.7	18.4	13.8	5.2	2.9
2.2.2 Broad Money (M3)	13.2	14.9	15.5	13.1	13.4
3 Ratios (%)					
3.1 Cash Reserve Ratio	4.75	6.00	6.00	4.50	4.25
3.2 Statutory Liquidity Ratio	24.0	24.0	24.0	23.0	23.0
3.3 Cash-Deposit Ratio	6.1	7.3	7.0	5.8	5.1
3.4 Credit-Deposit Ratio	76.5	73.8	74.1	75.4	77.0
3.5 Incremental Credit-Deposit Ratio	78.1	50.5	55.6	42.6	65.1
3.6 Investment-Deposit Ratio	29.4	30.4	30.3	30.7	30.6
3.7 Incremental Investment-Deposit Ratio	29.4	49.3	47.5	45.9	43.2
4 Interest Rates (%)					
4.1 Policy Repo Rate	8.5	8.5	8.5	8.0	8.0
4.2 Reverse Repo Rate	7.5	7.5	7.5	7.0	7.0
4.3 Marginal Standing Facility (MSF) Rate	9.5	9.5	9.5	9.0	9.0
4.4 Bank Rate	9.5	6.0	6.0	9.0	9.0
4.5 Base Rate	10.00/10.75	10.00/10.75	10.00/10.75	9.75/10.50	9.75/10.50
4.6 Term Deposit Rate >1 Year	8.50/9.25	8.25/9.25	8.25/9.25	8.50/9.00	8.50/9.00
4.7 Savings Deposit Rate	4.00	4.00	4.00	4.00	4.00
4.8 Call Money Rate (Weighted Average)	8.22	8.26	8.58	8.00	8.04
4.9 91-Day Treasury Bill (Primary) Yield	9.02	8.65	8.81	8.14	8.19
4.10 182-Day Treasury Bill (Primary) Yield	8.66	8.71	8.84	8.07	8.16
4.11 364-Day Treasury Bill (Primary) Yield	8.40	8.68	8.45	8.11	8.11
4.12 10-Year Government Securities Yield	8.6	8.88	8.21	8.21	8.18
5 RBI Reference Rate and Forward Premia					
5.1 INR-US$ Spot Rate (₹ Per Foreign Currency)	51.16	48.87	52.17	54.12	54.53
5.2 INR-Euro Spot Rate (₹ Per Foreign Currency)	68.34	68.36	69.47	70.15	70.89
5.3 Forward Premia of US$ 1-month (%)	8.68	6.63	6.90	7.43	7.26
3-month (%)	7.66	5.73	4.98	6.84	6.42
6-month (%)	6.80	4.75	4.14	6.21	6.24
6 Inflation (%)					
6.1 Wholesale Price Index	9.0	9.9	9.5	7.5	7.2
6.1.1 Primary Articles	9.8	11.0	8.9	8.2	9.4
6.1.2 Fuel and Power	14.0	14.8	15.5	11.7	10.0
6.1.3 Manufactured Products	7.2	8.0	8.2	5.9	5.4
6.2 Consumer Price Index - General Index	..	..	..	9.8	9.9
6.3 Consumer Price Index for Industrial Workers	8.3	9.4	9.3	9.6	9.6
7 Foreign Trade (% Change)					
7.1 Imports	32.4	26.8	35.6	7.4	..
7.2 Exports	21.3	23.9	2.8	-1.6	..

No. 2: RBI - Liabilities and Assets

(₹ Billion)

Item	As on the Last Friday/ Friday						
	2011-12	2011	2012				
		Dec.	Nov.	Dec. 7	Dec. 14	Dec. 21	Dec. 28
	1	2	3	4	5	6	7
1 Issue Department							
1.1 Liabilities							
1.1.1 Notes in Circulation	10,558.28	10,067.58	11,258.41	11,344.26	11,370.70	11,338.24	11,272.62
1.1.2 Notes held in Banking Department	0.12	0.09	0.17	0.13	0.13	0.11	0.08
1.1/1.2 Total Liabilities (Total Notes Issued) or Assets	**10,558.40**	**10,067.67**	**11,258.58**	**11,344.38**	**11,370.83**	**11,338.35**	**11,272.70**
1.2 Assets							
1.2.1 Gold Coin and Bullion	724.43	743.07	794.39	794.39	794.39	794.39	794.39
1.2.2 Foreign Securities	9,822.63	9,311.27	10,451.63	10,537.75	10,564.52	10,532.46	10,466.97
1.2.3 Rupee Coin	0.88	2.87	2.10	1.78	1.45	1.04	0.87
1.2.4 Government of India Rupee Securities	10.46	10.46	10.46	10.46	10.46	10.46	10.46
2 Banking Department							
2.1 Liabilities							
2.1.1 Deposits	4,255.36	3,832.40	3,220.26	3,444.59	3,740.65	4,223.03	4,089.55
2.1.1.1 Central Government	489.51	1.00	106.84	90.14	183.54	900.45	825.60
2.1.1.2 Market Stabilisation Scheme	–	–	–	–	–	–	–
2.1.1.3 State Governments	0.42	0.42	0.42	0.42	0.42	0.42	0.42
2.1.1.4 Scheduled Commercial Banks	3,465.45	3,506.10	2,812.78	3,045.25	3,255.90	3,026.74	2,972.61
2.1.1.5 Scheduled State Co-operative Banks	34.46	39.81	31.80	30.90	31.64	29.72	30.88
2.1.1.6 Non-Scheduled State Co-operative Banks	0.87	0.62	1.57	1.50	1.95	1.82	1.65
2.1.1.7 Other Banks	147.56	167.51	139.03	144.31	138.25	143.54	138.82
2.1.1.8 Others	117.08	116.94	127.82	132.07	128.95	120.34	119.56
2.1.2 Other Liabilities	5,990.18	6,193.90	7,049.32	6,976.89	7,119.04	7,303.59	7,230.79
2.1/2.2 Total Liabilities or Assets	**10,245.54**	**10,026.30**	**10,269.58**	**10,421.48**	**10,859.69**	**11,526.62**	**11,320.35**
2.2 Assets							
2.2.1 Notes and Coins	0.12	0.09	0.17	0.13	0.13	0.11	0.08
2.2.2 Balances held Abroad	3,514.56	4,713.00	3,766.53	3,622.45	3,732.13	3,938.30	3,944.59
2.2.3 Loans and Advances							
2.2.3.1 Central Government	–	109.86	–	–	–	–	–
2.2.3.2 State Governments	2.28	0.42	1.95	11.88	13.09	7.41	7.10
2.2.3.3 Scheduled Commercial Banks	63.25	58.79	228.53	250.37	169.92	286.84	244.25
2.2.3.4 Scheduled State Co-op.Banks	–	–	–	–	–	–	–
2.2.3.5 Industrial Dev. Bank of India	–	–	–	–	–	–	–
2.2.3.6 NABARD	–	–	–	–	–	–	–
2.2.3.7 EXIM Bank	–	–	–	–	–	–	–
2.2.3.8 Others	26.93	19.97	42.74	37.27	31.67	25.18	25.42
2.2.4 Bills Purchased and Discounted							
2.2.4.1 Internal	–	–	–	–	–	–	–
2.2.4.2 Government Treasury Bills	–	–	–	–	–	–	–
2.2.5 Investments	5,904.72	4,394.05	5,466.84	5,733.57	6,147.07	6,502.10	6,327.96
2.2.6 Other Assets	733.68	730.14	762.82	765.81	765.67	766.69	770.94
2.2.6.1 Gold	658.07	674.99	721.61	721.61	721.61	721.61	721.61

No. 3: Liquidity Operations by RBI

(₹ Billion)

Date	Liquidity Adjustment Facility		MSF	Standing Liquidity Facilities	OMO (Outright)		Net Injection (+)/ Absorption (-) (1+3+4+6-2-5)
	Repo	Reverse Repo			Sale	Purchase	
	1	2	3	4	5	6	7
Nov. 1, 2012	741.25	–	–	5.16	–	–	746.41
Nov. 2, 2012	541.00	0.45	–	-11.20	–	–	529.35
Nov. 5, 2012	582.05	–	–	-4.20	–	–	577.85
Nov. 6, 2012	423.15	–	–	-4.50	–	–	418.65
Nov. 7, 2012	665.20	2.00	–	0.70	–	–	663.90
Nov. 8, 2012	796.20	–	–	7.70	–	–	803.90
Nov. 9, 2012	874.60	–	–	2.23	–	–	876.83
Nov. 12, 2012	1064.85	0.15	–	-30.70	–	–	1034.00
Nov. 15, 2012	1128.50	–	–	27.30	–	–	1155.80
Nov. 16, 2012	1103.20	1.40	–	9.00	–	–	1110.80
Nov. 19, 2012	1110.90	0.15	–	7.30	–	–	1118.05
Nov. 20, 2012	1047.10	0.30	–	46.30	–	–	1093.10
Nov. 21, 2012	1069.70	0.05	–	3.90	–	–	1073.55
Nov. 22, 2012	1240.40	0.05	–	10.40	–	–	1250.75
Nov. 23, 2012	1188.90	0.05	–	6.37	–	–	1195.22
Nov. 26, 2012	1107.10	0.05	–	-10.00	–	–	1097.05
Nov. 27, 2012	1064.55	–	–	3.90	–	–	1068.45
Nov. 29, 2012	1018.80	7.05	–	0.00	–	–	1011.75
Nov. 30, 2012	869.25	2.50	–	-4.10	–	–	862.65

No. 4: Sale/ Purchase of U.S. Dollar by the RBI

Item	2011-12	2011	2012	
		Nov.	Oct.	Nov.
	1	2	3	4
1 Net Purchase/ Sale of Foreign Currency (US$ Million) (1.1–1.2)	–20138.00	–2918.00	–95.00	–921.00
1.1 Purchase (+)	1665.00	–	1055.00	855.00
1.2 Sale (–)	21803.00	2918.00	1150.00	1776.00
2 ₹ equivalent at contract rate (₹ Billion)	–1044.98	–148.35	–5.95	–50.52
3 Cumulative (over end-March 2012) (US $ Million)	–20138.00	–4706.00	–2152.00	–3073.00
(₹ Billion)	–1044.98	–236.89	–115.36	–165.88
4 Outstanding Net Forward Sales (–)/ Purchase (+) at the end of month (US$ Million)	–3233.00	–1620.00	–14082.00	–13537.00

No. 5: RBI's Standing Facilities

(₹ Billion)

Item	As on the Last Reporting Friday							
	2011-12	2011	2012					
		Nov. 18	Jun. 29	Jul. 27	Aug. 24	Sep. 21	Oct. 19	Nov. 30
	1	2	3	4	5	6	7	8
1 MSF	–	–	6.0	–	–	–	–	–
2 Export Credit Refinance for Scheduled Banks								
2.1 Limit	131.5	116.7	126.1	424.6	391.8	381.1	376.9	377.3
2.2 Outstanding	87.9	32.6	71.1	110.5	69.1	166.0	166.1	229.7
3 Liquidity Facility for PDs								
3.1 Limit	26.7	26.7	28.0	28.0	28.0	28.0	28.0	28.0
3.2 Outstanding	13.1	5.9	5.9	3.4	5.9	3.2	3.2	8.7
4 Others								
4.1 Limit	50.0	–	50.0	50.0	50.0	50.0	50.0	50.0
4.2 Outstanding	13.3	–	22.8	31.1	25.4	19.7	5.3	32.7
5 Total Outstanding (1+2.2+3.2+4.2)	**114.3**	**38.4**	**105.8**	**145.0**	**100.4**	**188.9**	**174.6**	**271.1**

No. 6: Money Stock Measures

(₹ Billion)

Item	Outstanding as on March 31/last reporting Fridays of the month/reporting Fridays				
	2011-12	2011	2012		
		Nov. 18	Oct. 19	Nov. 16	Nov. 30
	1	2	3	4	5
1 Currency with the Public (1.1 + 1.2 + 1.3 – 1.4)	10,265.0	9,778.8	10,654.9	11,081.2	10,878.5
1.1 Notes in Circulation	10,537.9	10,081.3	10,952.9	11,455.0	11,258.4
1.2 Circulation of Rupee Coin	127.1	121.5	134.8	134.8	134.8
1.3 Circulation of Small Coins	15.7	15.7	15.7	15.7	15.7
1.4 Cash on Hand with Banks	415.6	439.7	448.5	524.3	530.3
2 Deposit Money of the Public	7,077.3	6,381.9	6,697.9	6,808.9	7,101.6
2.1 Demand Deposits with Banks	7,049.1	6,370.3	6,681.5	6,795.1	7,078.2
2.2 'Other' Deposits with Reserve Bank	28.2	11.6	16.4	13.8	23.4
3 M_1 (1 + 2)	17,342.3	16,160.7	17,352.8	17,890.1	17,980.1
4 Post Office Saving Bank Deposits	50.4	50.4	50.4	50.4	50.4
5 M_2 (3 + 4)	17,392.7	16,211.1	17,403.2	17,940.5	18,030.5
6 Time Deposits with Banks	56,249.7	54,182.9	61,650.4	61,760.6	61,811.4
7 M_3 (3 + 6)	73,592.0	70,343.6	79,003.1	79,650.6	79,791.6
8 Total Post Office Deposits	259.7	259.7	259.7	259.7	259.7
9 M_4 (7 + 8)	73,851.7	70,603.3	79,262.8	79,910.3	80,051.2

No. 7: Sources of Money Stock (M_3)

(₹ Billion)

Sources	Outstanding as on March 31/last reporting Fridays of the month/reporting Fridays				
	2011-12	2011	2012		
		Nov. 18	Oct. 19	Nov. 16	Nov. 30
	1	2	3	4	5
1 Net Bank Credit to Government	**23,695.5**	**22,235.5**	**26,137.4**	**26,529.7**	**26,061.8**
1.1 RBI's net credit to Government (1.1.1–1.1.2)	5,357.4	4,169.0	5,551.9	5,778.0	5,358.4
1.1.1 Claims on Government	5,542.0	4,170.5	5,605.2	5,779.4	5,465.7
1.1.1.1 Central Government	5,528.3	4,157.2	5,597.3	5,755.5	5,463.7
1.1.1.2 State Governments	13.7	13.2	7.9	23.9	2.0
1.1.2 Government deposits with RBI	184.6	1.4	53.3	1.4	107.3
1.1.2.1 Central Government	184.2	1.0	52.8	1.0	106.8
1.1.2.2 State Governments	0.4	0.4	0.4	0.4	0.4
1.2 Other Banks' Credit to Government	18,338.1	18,066.5	20,585.5	20,751.8	20,703.5
2 Bank Credit to Commercial Sector	**49,594.3**	**45,149.8**	**51,762.8**	**52,581.2**	**53,236.8**
2.1 RBI's credit to commercial sector	39.6	19.1	21.7	41.8	54.5
2.2 Other banks' credit to commercial sector	49,554.7	45,130.7	51,741.1	52,539.4	53,182.2
2.2.1 Bank credit by commercial banks	46,118.5	41,886.7	48,159.3	48,945.3	49,590.7
2.2.2 Bank credit by co-operative banks	3,389.4	3,171.0	3,535.1	3,546.7	3,544.8
2.2.3 Investments by commercial and co-operative banks in other securities	46.7	73.0	46.8	47.4	46.8
3 Net Foreign Exchange Assets of Banking Sector (3.1 + 3.2)	**15,437.8**	**15,894.4**	**16,020.8**	**16,303.8**	**16,245.6**
3.1 RBI's net foreign exchange assets (3.1.1–3.1.2)	14,722.0	15,433.3	15,511.5	15,794.5	15,736.4
3.1.1 Gross foreign assets	14,722.0	15,433.4	15,511.8	15,794.8	15,736.7
3.1.2 Foreign liabilities	0.1	0.0	0.3	0.2	0.2
3.2 Other banks' net foreign exchange assets	715.8	461.0	509.2	509.2	509.2
4 Government's Currency Liabilities to the Public	**142.7**	**137.2**	**150.5**	**150.5**	**150.5**
5 Banking Sector's Net Non-monetary Liabilities	**15,278.3**	**13,073.3**	**15,068.3**	**15,914.5**	**15,903.2**
5.1 Net non-monetary liabilities of RBI	6,038.4	5,774.5	6,774.3	7,153.2	7,112.1
5.2 Net non-monetary liabilities of other banks (residual)	9,239.9	7,298.7	8,294.1	8,761.3	8,791.0
M_3 (1+2+3+4–5)	**73,592.0**	**70,343.6**	**79,003.1**	**79,650.6**	**79,791.6**

No. 8: Monetary Survey

(₹ Billion)

Item	Outstanding as on March 31/last reporting Fridays of the month/reporting Fridays				
	2011-12	2011	2012		
		Nov. 18	Oct. 19	Nov. 16	Nov. 30
	1	2	3	4	5
Monetary Aggregates					
M_1 (1.1 + 1.2.1+1.3)	17,246.3	16,076.3	17,261.8	17,798.6	17,885.6
NM_2 (M_1 + 1.2.2.1)	41,699.5	39,620.6	44,064.1	44,640.4	44,749.2
NM_3 (NM_2 + 1.2.2.2 + 1.4 = 2.1 + 2.2 + 2.3 – 2.4 – 2.5)	73,651.2	70,073.4	78,740.0	79,491.1	79,606.1
1 Components					
1.1 Currency with the Public	10,274.4	9,789.3	10,665.0	11,095.1	10,890.4
1.2 Aggregate Deposits of Residents	61,284.1	58,596.0	66,141.1	66,338.0	66,668.7
1.2.1 Demand Deposits	6,943.7	6,275.4	6,580.4	6,689.7	6,971.7
1.2.2 Time Deposits of Residents	54,340.4	52,320.6	59,560.7	59,648.4	59,696.9
1.2.2.1 Short-term Time Deposits	24,453.2	23,544.3	26,802.3	26,841.8	26,863.6
1.2.2.1.1 Certificates of Deposit (CDs)	4,539.0	3,853.8	3,539.2	3,422.6	3,097.4
1.2.2.2 Long-term Time Deposits	29,887.2	28,776.3	32,758.4	32,806.6	32,833.3
1.3 ‘Other’ Deposits with RBI	28.2	11.6	16.4	13.8	23.4
1.4 Call/Term Funding from Financial Institutions	2,064.5	1,676.4	1,917.6	2,044.2	2,023.6
2 Sources					
2.1 Domestic Credit	72,952.5	67,045.3	77,012.2	77,419.7	76,952.4
2.1.1 Net Bank Credit to the Government	23,318.6	21,876.4	25,719.2	26,106.6	25,626.6
2.1.1.1 Net RBI credit to the Government	5,357.4	4,169.0	5,551.9	5,778.0	5,358.4
2.1.1.2 Credit to the Government by the Banking System	17,961.3	17,707.4	20,167.2	20,328.6	20,268.2
2.1.2 Bank Credit to the Commercial Sector	49,633.9	45,168.9	51,293.0	51,313.1	51,325.9
2.1.2.1 RBI Credit to the Commercial Sector	39.6	19.1	21.7	41.8	54.5
2.1.2.2 Credit to the Commercial Sector by the Banking System	49,594.3	45,149.8	51,271.3	51,271.3	51,271.3
2.1.2.2.1 Other Investments (Non-SLR Securities)	2,719.7	3,178.9	3,391.7	3,376.9	3,288.2
2.2 Government’s Currency Liabilities to the Public	142.7	137.2	150.5	150.5	150.5
2.3 Net Foreign Exchange Assets of the Banking Sector	13,950.1	14,227.3	14,262.1	14,522.0	14,489.9
2.3.1 Net Foreign Exchange Assets of the RBI	14,722.0	15,433.3	15,511.5	15,794.5	15,736.4
2.3.2 Net Foreign Currency Assets of the Banking System	–771.8	–1,206.0	–1,249.5	–1,272.6	–1,246.6
2.4 Capital Account	11,094.1	10,940.2	12,780.0	13,077.8	13,021.1
2.5 Other items (net)	2,300.1	396.2	–95.3	–476.8	–1,034.4

No. 9: Liquidity Aggregates

(₹ Billion)

Aggregates	2011-12	2011	2012		
		Nov.	Sep.	Oct.	Nov.
	1	2	3	4	5
1 NM_3	73,651.2	70,073.4	77,843.8	78,740.0	79,606.1
2 Postal Deposits	1,241.5	1,203.6	1,323.9	1,323.9	1,323.9
3 L_1 (1 + 2)	74,892.7	71,277.0	79,167.8	80,064.0	80,930.0
4 Liabilities of Financial Institutions	29.3	29.3	29.3	29.3	29.3
4.1 Term Money Borrowings	26.6	26.6	26.6	26.6	26.6
4.2 Certificates of Deposit	0.3	0.3	0.3	0.3	0.3
4.3 Term Deposits	2.5	2.5	2.5	2.5	2.5
5 L_2 (3 + 4)	74,922.0	71,306.3	79,197.1	80,093.3	80,959.3
6 Public Deposits with Non-Banking Financial Companies	101.1	–	99.4	–	–
7 L_3 (5 + 6)	75,023.1	–	79,296.5	–	–

No. 10: Reserve Bank of India Survey

(₹ Billion)

Item	Outstanding as on March 31/last reporting Fridays of the month/reporting Fridays				
	2011-12	2011	2012		
		Nov. 18	Oct. 19	Nov. 16	Nov. 30
	1	2	3	4	5
1 Components					
1.1 Currency in Circulation	10,680.6	10,218.5	11,103.4	11,605.5	11,408.9
1.2 Bankers' Deposits with the RBI	3,562.9	3,786.6	3,507.7	3,170.7	2,985.2
1.2.1 Scheduled Commercial Banks	3,373.6	3,583.9	3,328.6	3,004.5	2,812.8
1.3 'Other' Deposits with the RBI	28.2	11.6	16.4	13.8	23.4
Reserve Money (1.1 + 1.2 + 1.3 = 2.1 + 2.2 + 2.3 – 2.4 – 2.5)	14,271.7	14,016.7	14,627.4	14,790.0	14,417.4
2 Sources					
2.1 RBI's Domestic Credit	5,445.5	4,220.7	5,739.7	5,998.1	5,642.7
2.1.1 Net RBI credit to the Government	5,357.4	4,169.0	5,551.9	5,778.0	5,358.4
2.1.1.1 Net RBI credit to the Central Government (2.1.1.1.1 + 2.1.1.1.2 + 2.1.1.1.3 + 2.1.1.1.4 – 2.1.1.1.5)	5,344.1	4,156.2	5,544.5	5,754.5	5,356.9
2.1.1.1.1 Loans and Advances to the Central Government	–	158.5	–	–	–
2.1.1.1.2 Investments in Treasury Bills	–	–	–	–	–
2.1.1.1.3 Investments in dated Government Securities	5,527.5	3,998.0	5,594.9	5,752.9	5,461.6
2.1.1.1.3.1 Central Government Securities	5,517.0	3,987.5	5,584.4	5,742.4	5,451.2
2.1.1.1.4 Rupee Coins	0.8	0.7	2.4	2.7	2.1
2.1.1.1.5 Deposits of the Central Government	184.2	1.0	52.8	1.0	106.8
2.1.1.2 Net RBI credit to State Governments	13.2	12.8	7.5	23.5	1.5
2.1.2 RBI's Claims on Banks	48.5	32.6	166.1	178.4	229.7
2.1.2.1 Loans and Advances to Scheduled Commercial Banks	48.5	32.2	164.8	177.1	228.5
2.1.3 RBI's Credit to Commercial Sector	39.6	19.1	21.7	41.8	54.5
2.1.3.1 Loans and Advances to Primary Dealers	13.6	5.9	169.3	7.0	8.7
2.1.3.2 Loans and Advances to NABARD	–	–	–	–	–
2.2 Government's Currency Liabilities to the Public	142.7	137.2	150.5	150.5	150.5
2.3 Net Foreign Exchange Assets of the RBI	14,722.0	15,433.3	15,511.5	15,794.5	15,736.4
2.3.1 Gold	1,376.6	1,314.4	1,482.5	1,525.5	1,516.0
2.3.2 Foreign Currency Assets	13,345.6	14,119.1	14,029.2	14,269.2	14,220.6
2.4 Capital Account	5,490.0	5,433.9	6,429.2	6,730.3	6,686.7
2.5 Other Items (net)	548.4	340.6	345.0	422.8	425.4

No. 11: Reserve Money - Its Components and Sources

(₹ Billion)

Item	Outstanding as on March 31/ last Fridays of the month/ Fridays						
	2011-12	2011	2012				
		Nov. 25	Oct. 26	Nov. 9	Nov. 16	Nov. 23	Nov. 30
	1	2	3	4	5	6	7
Reserve Money (1.1 + 1.2 + 1.3 = 2.1 + 2.2 + 2.3 + 2.4 + 2.5 – 2.6)	14,271.7	14,095.8	14,501.0	14,466.5	14,790.0	14,738.7	14,417.4
1 Components							
1.1 Currency in Circulation	10,680.6	10,159.8	11,176.6	11,362.5	11,605.5	11,466.1	11,408.9
1.2 ‘Other’ Deposits with RBI	28.2	13.5	15.5	15.3	13.8	41.5	23.4
1.3 Bankers' Deposits with RBI	3,562.9	3,922.4	3,308.9	3,088.6	3,170.7	3,231.1	2,985.2
2 Sources							
2.1 Net Reserve Bank Credit to Government	5,357.4	4,231.8	5,423.4	5,418.6	5,778.0	5,666.3	5,358.4
2.2 Reserve Bank Credit to Banks	48.5	58.7	188.3	179.2	178.4	239.9	229.7
2.3 Reserve Bank Credit to Commercial Sector	39.6	20.0	21.7	35.4	41.8	54.6	54.5
2.4 Net Foreign Exchange Assets of RBI	14,722.0	15,439.8	15,493.4	15,626.4	15,794.5	15,966.2	15,736.4
2.5 Government's Currency Liabilities to the Public	142.7	137.2	150.5	150.5	150.5	150.5	150.5
2.6 Net Non- Monetary Liabilities of RBI	6,038.4	5,791.6	6,776.3	6,943.6	7,153.2	7,338.7	7,112.1

No. 12: Commercial Bank Survey

(₹ Billion)

Item	Outstanding as on last reporting Fridays of the month/ reporting Fridays of the month				
	2011-12	2011	2012		
		Nov. 18	Oct. 19	Nov. 16	Nov. 30
	1	2	3	4	5
1 Components					
1.1 Aggregate Deposits of Residents	58,309.6	55,699.7	63,090.7	63,286.2	63,614.3
1.1.1 Demand Deposits	6,253.3	5,599.8	5,856.6	5,968.4	6,249.1
1.1.2 Time Deposits of Residents	52,056.3	50,099.9	57,234.0	57,317.8	57,365.2
1.1.2.1 Short-term Time Deposits	23,425.3	22,544.9	25,755.3	25,793.0	25,814.3
1.1.2.1.1 Certificates of Deposits (CDs)	4,247.0	3,853.8	3,539.2	3,422.6	3,097.4
1.1.2.2 Long-term Time Deposit	28,631.0	27,554.9	31,478.7	31,524.8	31,550.8
1.2 Call/Term Funding from Financial Institutions	2,064.5	1,676.4	1,917.6	2,044.2	2,023.6
2 Sources					
2.1 Domestic Credit	66,236.7	62,120.0	71,074.5	72,019.1	72,510.8
2.1.1 Credit to the Government	17,350.2	17,082.3	19,550.7	19,711.9	19,652.0
2.1.2 Credit to the Commercial Sector	48,886.5	45,037.7	51,523.8	52,307.3	52,858.7
2.1.2.1 Bank Credit	46,118.5	41,886.7	48,159.3	48,945.3	49,590.7
2.1.2.1.1 Non-food Credit	45,305.5	41,099.6	47,207.2	47,863.3	48,512.7
2.1.2.2 Net Credit to Primary Dealers	30.0	22.7	32.4	44.0	39.3
2.1.2.3 Investments in Other Approved Securities	27.7	39.0	30.1	30.8	30.1
2.1.2.4 Other Investments (in non-SLR Securities)	2,710.2	3,089.2	3,302.1	3,287.3	3,198.6
2.2 Net Foreign Currency Assets of Commercial Banks (2.2.1–2.2.2–2.2.3)	–801.9	–1,206.0	–1,249.5	–1,272.6	–1,246.6
2.2.1 Foreign Currency Assets	732.7	435.2	377.6	391.0	382.5
2.2.2 Non-resident Foreign Currency Repatriable Fixed Deposits	781.2	812.3	795.3	814.1	814.1
2.2.3 Overseas Foreign Currency Borrowings	753.4	829.0	831.8	849.5	814.9
2.3 Net Bank Reserves (2.3.1+2.3.2–2.3.3)	3,506.5	3,936.1	3,553.6	3,289.4	3,054.2
2.3.1 Balances with the RBI	3,232.7	3,583.9	3,328.6	3,004.5	2,812.8
2.3.2 Cash in Hand	361.3	384.3	389.8	462.0	470.0
2.3.3 Loans and Advances from the RBI	87.5	32.2	164.8	177.1	228.5
2.4 Capital Account	5,291.5	5,264.6	6,109.0	6,105.7	6,092.7
2.5 Other items (net) (2.I+2.2+2.3–2.4–1.1–1.2)	3,275.5	2,209.3	2,261.4	2,599.8	2,587.9
2.5.1 Other Demand and Time Liabilities (net of 2.2.3)	2,980.5	2,660.8	2,709.0	2,819.9	3,052.9
2.5.2 Net Inter-Bank Liabilities (other than to PDs)	–525.9	–426.7	–673.4	–735.2	–516.7

No. 13: Scheduled Commercial Banks' Investments

(₹ Billion)

Item	As on March 23, 2012	2011	2012		
		Dec. 02	Oct. 19	Nov. 16	Nov. 30
	1	2	3	4	5
1 SLR Securities	17,377.9	17,449.1	19,713.1	19,742.6	19,682.1
2 Commercial Paper	196.0	250.0	371.5	367.6	318.6
3 Shares issued by					
3.1 PSUs	72.0	77.7	75.0	75.9	78.2
3.2 Private Corporate Sector	301.1	299.8	319.6	316.4	318.7
3.3 Others	5.2	5.1	5.8	5.8	5.9
4 Bonds/Debentures issued by					
4.1 PSUs	412.1	353.0	432.3	322.1	315.8
4.2 Private Corporate Sector	740.5	753.8	956.7	933.9	941.7
4.3 Others	349.3	425.0	447.3	435.3	412.8
5 Instruments issued by					
5.1 Mutual funds	251.4	554.9	502.9	478.3	448.8
5.2 Financial institutions	382.5	342.8	383.2	352.0	358.1

No. 14: Business in India - All Scheduled Banks and All Scheduled Commercial Banks

(₹ Billion)

Item	As on the Last Reporting Friday (in case of March)/ Last Friday							
	All Scheduled Banks				All Scheduled Commercial Banks			
	2011-12	2011	2012	2012	2011-12	2011	2012	2012
		Nov.	Oct.	Nov.		Nov.	Oct.	Nov.
	1	2	3	4	5	6	7	8
Number of Reporting Banks	237	235	232	236	169	166	165	169
1 Liabilities to the Banking System	1,256.1	1,040.9	1,188.0	1,217.7	1,223.2	1,008.6	1,153.9	1,184.9
1.1 Demand and Time Deposits from Banks	874.5	716.1	796.2	817.0	842.5	687.3	765.1	787.1
1.2 Borrowings from Banks	320.1	224.5	324.8	316.6	319.2	221.1	321.7	313.8
1.3 Other Demand and Time Liabilities	61.5	100.2	67.1	84.1	61.4	100.2	67.0	84.0
2 Liabilities to Others	66,655.8	63,607.6	71,686.3	72,227.4	64,889.2	61,943.8	69,786.6	70,319.8
2.1 Aggregate Deposits	60,777.9	58,212.4	65,796.5	66,270.0	59,090.8	56,622.3	63,965.6	64,428.4
2.1.1 Demand	6,401.7	5,872.3	6,203.5	6,410.2	6,253.3	5,730.1	6,046.5	6,249.1
2.1.2 Time	54,376.3	52,340.1	59,593.0	59,859.8	52,837.5	50,892.2	57,919.1	58,179.3
2.2 Borrowings	2,083.3	1,805.4	2,202.2	2,036.9	2,064.5	1,789.1	2,184.2	2,023.6
2.3 Other Demand and Time Liabilities	3,794.6	3,589.9	3,687.6	3,920.6	3,733.9	3,532.3	3,636.8	3,867.9
3 Borrowings from Reserve Bank	87.9	58.7	188.3	229.7	87.5	58.3	187.1	228.5
3.1 Against Usance Bills /Promissory Notes	–	–	–	–	–	–	–	–
3.2 Others	87.9	58.7	188.3	229.7	87.5	58.3	187.1	228.5
4 Cash in Hand and Balances with Reserve Bank	3,687.0	4,205.4	3,673.1	3,376.0	3,594.0	4,095.0	3,573.3	3,282.7
4.1 Cash in Hand	369.7	390.8	458.9	481.4	361.3	381.2	447.7	470.0
4.2 Balances with Reserve Bank	3,317.3	3,814.6	3,214.1	2,894.6	3,232.7	3,713.8	3,125.6	2,812.8
5 Assets with the Banking System	2,040.1	1,685.3	2,087.6	1,996.7	1,779.1	1,453.5	1,837.0	1,740.9
5.1 Balances with Other Banks	792.1	624.5	904.0	857.3	706.5	546.4	805.3	758.0
5.1.1 In Current Account	117.8	97.9	111.1	117.2	103.2	82.3	97.1	100.9
5.1.2 In Other Accounts	674.3	526.6	792.9	740.1	603.3	464.1	708.2	657.1
5.2 Money at Call and Short Notice	356.9	244.1	332.1	333.5	232.8	137.3	244.1	232.6
5.3 Advances to Banks	139.6	72.6	90.6	80.6	135.8	68.8	76.6	74.0
5.4 Other Assets	751.6	744.1	760.9	725.3	703.9	701.1	711.0	676.4
6 Investment	17,912.9	17,623.8	20,263.5	20,269.9	17,377.9	17,106.5	19,681.5	19,682.1
6.1 Government Securities	17,882.7	17,581.3	20,233.8	20,237.6	17,350.2	17,067.4	19,654.0	19,652.0
6.2 Other Approved Securities	30.2	42.5	29.7	32.3	27.7	39.1	27.6	30.1
7 Bank Credit	47,537.8	43,377.6	49,740.0	51,162.1	46,118.5	42,060.8	48,184.3	49,590.7
7a Food Credit	876.3	–	–	1,159.2	813.0	–	–	1,077.9
7.1 Loans, Cash-credits and Overdrafts	45,760.4	41,832.1	47,999.0	49,386.0	44,359.8	40,534.7	46,463.0	47,833.9
7.2 Inland Bills-Purchased	168.3	143.8	216.2	232.1	163.4	139.5	210.9	226.6
7.3 Inland Bills-Discounted	989.6	826.3	936.4	953.7	979.8	814.3	925.3	943.2
7.4 Foreign Bills-Purchased	212.7	188.7	193.7	175.8	211.7	188.3	193.5	175.4
7.5 Foreign Bills-Discounted	406.7	386.7	394.6	414.5	403.8	384.0	391.6	411.7

No. 15: Deployment of Gross Bank Credit by Major Sectors

(₹ Billion)

Item	Outstanding as on				Growth (%)	
	Mar. 23, 2012	2011	2012		Financial year so far	Y-o-Y
		Nov. 18	Oct. 19	Nov. 30	2012-13	2012
	1	2	3	4	5	6
1 Gross Bank Credit	**43714**	**39503**	**45261**	**46610**	**6.6**	**18.0**
1.1 Food Credit	**816**	**779**	**941**	**1058**	**29.6**	**35.8**
1.2 Non-food Credit	**42897**	**38724**	**44320**	**45552**	**6.2**	**17.6**
1.2.1 Agriculture & Allied Activities	**5225**	**4418**	**5351**	**5495**	**5.2**	**24.4**
1.2.2 Industry	**19675**	**17712**	**20264**	**20853**	**6.0**	**17.7**
1.2.2.1 Micro & Small	2592	2448	2595	2685	3.6	9.7
1.2.2.2 Medium	2056	1972	1984	2031	–1.2	3.0
1.2.2.3 Large	15026	13292	15685	16137	7.4	21.4
1.2.3 Services	**10168**	**9215**	**10368**	**10625**	**4.5**	**15.3**
1.2.3.1 Transport Operators	713	650	791	790	10.8	21.5
1.2.3.2 Computer Software	154	146	151	164	6.5	12.3
1.2.3.3 Tourism, Hotels & Restaurants	313	303	341	342	9.2	13.0
1.2.3.4 Shipping	89	97	81	81	–8.4	–16.1
1.2.3.5 Professional Services	639	537	503	511	–20.0	–4.8
1.2.3.6 Trade	2209	2058	2441	2538	14.9	23.3
1.2.3.6.1 Wholesale Trade	1280	1147	1326	1389	8.6	21.1
1.2.3.6.2 Retail Trade	929	911	1115	1148	23.6	26.1
1.2.3.7 Commercial Real Estate	1205	1141	1188	1201	–0.3	5.3
1.2.3.8 Non-Banking Financial Companies (NBFCs)	2218	1872	2371	2439	10.0	30.3
1.2.3.9 Other Services	2628	2411	2505	2558	–2.6	6.1
1.2.4 Personal Loans	**7830**	**7378**	**8337**	**8580**	**9.6**	**16.3**
1.2.4.1 Consumer Durables	88	82	72	75	–14.4	–7.8
1.2.4.2 Housing	4027	3861	4285	4372	8.6	13.2
1.2.4.3 Advances against Fixed Deposits	685	540	586	615	–10.2	13.9
1.2.4.4 Advances to Individuals against share & bonds	38	36	30	31	–20.4	–15.5
1.2.4.5 Credit Card Outstanding	204	196	227	247	20.6	25.7
1.2.4.6 Education	502	491	537	543	8.2	10.6
1.2.4.7 Vehicle Loans	949	869	1040	1093	15.2	25.8
1.2.4.8 Other Personal Loans	1336	1304	1561	1604	20.0	23.0
1.2A Priority Sector	**14122**	**12682**	**13979**	**14617**	**3.5**	**15.3**
1.2A.1 Agriculture & Allied Activities	5225	4418	5351	5495	5.2	24.4
1.2A.2 Micro & Small Enterprises	5191	4736	5137	5262	1.4	11.1
1.2A.2.1 Manufacturing	2592	2448	2595	2685	3.6	9.7
1.2A.2.2 Services	2599	2287	2541	2576	–0.9	12.6
1.2A.3 Housing	2654	2480	2619	2667	0.5	7.5
1.2A.4 Micro-Credit	231	253	218	219	–5.3	–13.6
1.2A.5 Education Loans	483	480	517	523	8.3	8.9
1.2A.6 State-Sponsored Orgs. for SC/ST	18	17	20	20	12.9	18.5
1.2A.7 Weaker Sections	2563	2113	2696	2725	6.3	29.0
1.2A.8 Export Credit	377	409	388	401	6.5	–1.8

No. 16: Industry-wise Deployment of Gross Bank Credit

(₹ Billion)

Industry	Outstanding as on				Growth (%)	
	Mar. 23, 2012	2011	2012		Financial year so far	Y-o-Y
		Nov. 18	Oct. 19	Nov. 30	2012-13	2012
	1	2	3	4	5	6
1 Industry	**19675**	**17712**	**20264**	**20853**	**6.0**	**17.7**
1.1 Mining & Quarrying (incl. Coal)	**325**	**279**	**378**	**396**	**21.8**	**41.8**
1.2 Food Processing	**1024**	**857**	**1021**	**1071**	**4.6**	**25.0**
1.2.1 Sugar	312	236	274	266	–14.6	12.8
1.2.2 Edible Oils & Vanaspati	144	126	99	154	7.6	22.8
1.2.3 Tea	23	23	29	30	28.9	28.3
1.2.4 Others	546	472	619	621	13.7	31.4
1.3 Beverage & Tobacco	**135**	**137**	**158**	**163**	**20.7**	**19.1**
1.4 Textiles	**1599**	**1481**	**1592**	**1622**	**1.5**	**9.5**
1.4.1 Cotton Textiles	810	748	808	818	0.9	9.3
1.4.2 Jute Textiles	14	14	17	18	28.4	29.5
1.4.3 Man-Made Textiles	114	104	111	114	0.2	9.7
1.4.4 Other Textiles	661	615	656	673	1.8	9.3
1.5 Leather & Leather Products	**74**	**76**	**81**	**83**	**11.8**	**9.7**
1.6 Wood & Wood Products	**63**	**61**	**72**	**75**	**17.8**	**22.1**
1.7 Paper & Paper Products	**251**	**239**	**282**	**288**	**14.7**	**20.7**
1.8 Petroleum, Coal Products & Nuclear Fuels	**701**	**591**	**592**	**673**	**–3.9**	**13.9**
1.9 Chemicals & Chemical Products	**1125**	**995**	**1179**	**1214**	**7.9**	**22.0**
1.9.1 Fertiliser	152	97	173	179	17.9	85.5
1.9.2 Drugs & Pharmaceuticals	472	446	470	484	2.4	8.4
1.9.3 Petro Chemicals	184	139	148	151	–18.0	8.8
1.9.4 Others	317	313	388	400	26.3	27.6
1.10 Rubber, Plastic & their Products	**258**	**247**	**301**	**302**	**17.5**	**22.5**
1.11 Glass & Glassware	**60**	**56**	**65**	**65**	**8.6**	**15.3**
1.12 Cement & Cement Products	**372**	**340**	**405**	**425**	**14.2**	**25.0**
1.13 Basic Metal & Metal Product	**2556**	**2371**	**2853**	**2971**	**16.2**	**25.3**
1.13.1 Iron & Steel	1927	1802	2115	2221	15.2	23.2
1.13.2 Other Metal & Metal Product	629	568	738	749	19.2	31.8
1.14 All Engineering	**1136**	**1030**	**1226**	**1241**	**9.2**	**20.5**
1.14.1 Electronics	320	286	328	326	2.0	13.9
1.14.2 Others	816	744	899	914	12.1	23.0
1.15 Vehicles, Vehicle Parts & Transport Equipment	**516**	**508**	**597**	**586**	**13.6**	**15.4**
1.16 Gems & Jewellery	**504**	**459**	**542**	**551**	**9.3**	**20.0**
1.17 Construction	**567**	**524**	**566**	**561**	**–1.0**	**7.0**
1.18 Infrastructure	**6191**	**5800**	**6586**	**6887**	**11.2**	**18.7**
1.18.1 Power	3289	3065	3576	3786	15.1	23.5
1.18.2 Telecommunications	936	920	894	929	–0.7	0.9
1.18.3 Roads	1144	1063	1252	1270	11.0	19.5
1.18.4 Other Infrastructure	822	751	864	903	9.8	20.1
1.19 Other Industries	**2219**	**1661**	**1768**	**1679**	**–24.3**	**1.1**

No. 17: State Co-operative Banks Maintaining Accounts with the Reserve Bank of India

(₹ Billion)

Item	Last Reporting Friday (in case of March)/Last Friday/ Reporting Friday					
	2011-12	2011	2012			
		Aug. 26	Jul. 27	Aug. 10	Aug. 24	Aug. 31
	1	2	3	4	5	6
Number of Reporting Banks	31	31	31	31	31	31
1 Aggregate Deposits (2.1.1.2+2.2.1.2)	315.3	287.4	335.0	336.0	338.3	339.6
2 Demand and Time Liabilities						
2.1 Demand Liabilities	126.1	109.8	118.9	119.7	118.9	118.6
2.1.1 Deposits						
2.1.1.1 Inter-Bank	19.6	14.7	16.8	16.8	18.4	17.1
2.1.1.2 Others	66.4	60.9	70.1	69.9	70.5	71.3
2.1.2 Borrowings from Banks	12.3	10.6	10.6	10.6	9.3	8.9
2.1.3 Other Demand Liabilities	27.8	23.6	21.4	22.4	20.6	21.3
2.2 Time Liabilities	715.1	655.3	745.7	747.6	747.2	748.1
2.2.1 Deposits						
2.2.1.1 Inter-Bank	455.4	421.7	471.0	471.9	469.9	469.7
2.2.1.2 Others	248.9	226.5	264.9	266.1	267.8	268.3
2.2.2 Borrowings from Banks	3.6	2.0	3.1	3.0	3.0	3.0
2.2.3 Other Time Liabilities	7.2	5.1	6.7	6.6	6.5	7.1
3 Borrowing from Reserve Bank	–	–	–	–	–	–
4 Borrowings from a notified bank / State Government	275.9	163.7	286.7	285.8	290.9	296.9
4.1 Demand	106.9	73.1	119.5	121.2	125.7	128.0
4.2 Time	169.0	90.6	167.2	164.6	165.2	169.0
5 Cash in Hand and Balances with Reserve Bank	37.1	38.6	36.1	37.1	37.8	41.5
5.1 Cash in Hand	1.9	1.8	2.0	2.0	2.1	2.2
5.2 Balance with Reserve Bank	35.2	36.7	34.1	35.1	35.7	39.3
6 Balances with Other Banks in Current Account	6.5	4.9	5.9	5.7	5.7	5.2
7 Investments in Government Securities	251.8	247.8	257.0	258.0	255.9	257.0
8 Money at Call and Short Notice	159.1	151.3	137.0	140.4	133.3	137.0
9 Bank Credit (10.1+11)	310.3	245.0	332.7	332.0	334.2	335.0
10 Advances						
10.1 Loans, Cash-Credits and Overdrafts	310.1	244.9	332.6	331.9	334.1	334.8
10.2 Due from Banks	461.6	438.7	488.3	500.2	509.2	518.1
11 Bills Purchased and Discounted	0.1	0.2	0.1	0.1	0.1	0.1

No. 18: Consumer Price Index (Base: 2010=100)

Group/Sub group	2011-12			Rural			Urban			Combined		
	Rural	Urban	Combined	Nov. 11	Oct. 12	Nov. 12	Nov. 11	Oct. 12	Nov. 12	Nov. 11	Oct. 12	Nov. 12
	1	2	3	4	5	6	7	8	9	10	11	12
1 Food, beverages and tobacco	**114.7**	**114.9**	**114.8**	**114.2**	**127.7**	**127.8**	**113.2**	**125.5**	**126.2**	**113.9**	**127.0**	**127.3**
1.1 Cereals and products	108.5	103.2	107.1	108.4	119.9	120.7	102.5	117.0	118.3	106.9	119.1	120.1
1.2 Pulses and products	103.5	101.3	102.8	102.4	115.1	115.4	101.7	119.6	119.5	102.2	116.5	116.7
1.3 Oils and fats	125.8	135.2	128.8	119.7	141.0	141.6	125.9	146.5	146.6	121.7	142.8	143.2
1.4 Egg, fish and meat	119.0	119.2	119.1	117.2	130.3	130.3	115.1	129.0	128.4	116.5	129.9	129.7
1.5 Milk and products	125.5	123.3	124.7	122.3	134.4	134.3	120.5	128.9	129.5	121.6	132.4	132.5
1.6 Condiments and spices	121.5	120.6	121.2	123.0	128.1	128.3	125.4	122.4	123.0	123.7	126.4	126.7
1.7 Vegetables	107.8	107.6	107.7	115.4	137.6	135.2	111.0	122.8	121.4	114.0	132.9	130.8
1.8 Fruits	127.6	125.6	126.7	127.3	136.9	137.6	124.0	130.1	133.0	125.9	134.0	135.6
1.9 Sugar etc	99.0	98.0	98.7	98.3	114.5	114.6	98.5	117.2	116.4	98.4	115.3	115.1
1.10 Non-alcoholic beverages	118.0	117.2	117.7	115.1	126.2	126.7	114.0	124.6	126.2	114.6	125.5	126.5
1.11 Prepared meals etc	117.7	117.8	117.7	117.1	125.3	126.1	114.8	125.8	127.4	116.0	125.5	126.7
1.12 Pan, tobacco and intoxicants	123.5	123.7	123.6	120.8	133.6	134.2	120.8	134.2	135.1	120.8	133.8	134.4
2 Fuel and light	**121.5**	**118.3**	**120.3**	**121.4**	**129.1**	**129.3**	**116.7**	**125.3**	**127.0**	**119.6**	**127.7**	**128.4**
3 Housing	**--**	**114.4**	**114.4**	**--**	**--**	**--**	**110.9**	**121.6**	**122.4**	**110.9**	**121.6**	**122.4**
4 Clothing, bedding and footwear	**123.3**	**125.4**	**124.1**	**120.4**	**132.8**	**134.1**	**121.7**	**133.2**	**134.7**	**120.9**	**132.9**	**134.3**
4.1 Clothing and bedding	123.7	126.5	124.7	120.8	133.4	134.7	122.6	134.5	136.0	121.4	133.8	135.2
4.2 Footwear	121.2	119.1	120.4	118.4	129.5	130.6	116.0	125.7	126.8	117.5	128.1	129.2
5 Miscellaneous	**115.9**	**111.8**	**114.0**	**114.7**	**121.8**	**122.3**	**110.3**	**117.2**	**118.0**	**112.7**	**119.7**	**120.3**
5.1 Medical care	112.8	110.9	112.2	111.8	117.7	118.0	108.5	115.6	116.4	110.7	117.0	117.5
5.2 Education, stationery etc	112.8	110.1	111.3	112.0	118.2	118.5	108.9	117.4	117.9	110.3	117.8	118.2
5.3 Recreation and amusement	110.8	103.9	106.6	109.2	115.1	115.5	103.6	106.3	107.8	105.8	109.8	110.9
5.4 Transport and communication	117.1	112.9	114.7	116.2	122.8	123.5	112.3	117.5	118.2	114.0	119.8	120.5
5.5 Personal care and effects	113.2	110.3	112.0	110.9	118.9	119.5	107.6	115.5	116.1	109.6	117.5	118.1
5.6 Household requisites	121.8	114.0	118.7	120.8	129.5	130.3	111.9	120.8	121.8	117.2	126.0	126.9
5.7 Others	123.8	124.2	124.0	121.0	132.5	133.3	119.4	132.9	134.6	120.4	132.7	133.8
General Index (All Groups)	**116.2**	**114.6**	**115.5**	**115.4**	**126.6**	**126.9**	**112.5**	**122.6**	**123.4**	**114.1**	**124.9**	**125.4**

Source: Central Statistics Office, Ministry of Statistics and Programme Implementation, Government of India.

No. 19: Other Consumer Price Indices

Item	Base Year	Linking Factor	2011-12	Nov. 11	Oct. 12	Nov. 12
	1	2	3	4	5	6
1 Consumer Price Index for Industrial Workers	2001	4.63	195	199	217	218
2 Consumer Price Index for Agricultural Labourers	1986-87	5.89	611	621	680	685
3 Consumer Price Index for Rural Labourers	1986-87	5.89	611	621	681	686

Source: Labour Bureau, Ministry of Labour and Employment, Government of India.

No. 20: Monthly Average Price of Gold and Silver in Mumbai

Item	2011-12	2011	2012	
		Nov.	Oct.	Nov.
	1	2	3	4
1 Standard Gold (₹ per 10 grams)	25,722	28,563	31,056	31,548
2 Silver (₹ per kilogram)	57,311	56,514	61,072	61,848

Source: Bombay Bullion Association Ltd.

No. 21: Index Numbers of Wholesale Prices in India (Contd.)

(Base: 2004-05 = 100)

Commodities	Weight	2011-12	2011	2012		
			Nov.	Sep.	Oct.	Nov.
	1	2	3	4	5	6
1 ALL COMMODITIES	**100.000**	**156.1**	**157.4**	**168.8**	**168.7**	**168.8**
1.1 PRIMARY ARTICLES	**20.118**	**200.3**	**201.8**	**221.6**	**220.2**	**220.8**
1.1.1 Food articles	**14.337**	**192.7**	**196.5**	**213.1**	**212.5**	**213.2**
1.1.1.1 Food Grains	4.090	180.7	182.4	212.0	211.2	212.5
1.1.1.1.1 Cereals	3.373	176.2	175.4	201.6	201.6	203.2
1.1.1.1.2 Pulses	0.717	201.8	215.2	260.8	256.8	256.3
1.1.1.2 Fruits & Vegetables	3.843	183.2	189.8	194.9	194.4	195.7
1.1.1.2.1 Vegetables	1.736	179.3	209.4	202.2	207.6	206.9
1.1.1.2.2 Fruits	2.107	186.4	173.6	189.0	183.5	186.3
1.1.1.3 Milk	3.238	194.0	197.3	207.9	209.4	209.5
1.1.1.4 Eggs, Meat & Fish	2.414	214.3	214.9	248.4	244.8	245.4
1.1.1.5 Condiments & Spices	0.569	237.5	252.2	210.2	209.0	208.1
1.1.1.6 Other Food Articles	0.183	216.5	220.2	258.3	259.5	251.8
1.1.2 Non-Food Articles	**4.258**	**182.7**	**176.6**	**203.2**	**197.7**	**201.3**
1.1.2.1 Fibres	0.877	218.4	208.6	214.7	205.0	205.8
1.1.2.2 Oil Seeds	1.781	158.8	154.6	207.0	196.4	203.1
1.1.2.3 Other Non-Food Articles	1.386	195.3	190.4	201.8	203.5	201.7
1.1.2.4 Flowers	0.213	153.9	139.5	133.4	141.5	164.6
1.1.3 Minerals	**1.524**	**320.7**	**322.5**	**352.2**	**355.8**	**347.1**
1.1.3.1 Metallic Minerals	0.489	411.5	403.2	438.9	447.9	436.6
1.1.3.2 Other Minerals	0.135	165.9	166.9	208.6	204.8	209.6
1.1.3.3 Crude Petroleum	0.900	294.5	302.0	326.7	328.4	319.3
1.2 FUEL & POWER	**14.910**	**169.0**	**171.6**	**188.5**	**189.9**	**188.8**
1.2.1 Coal	2.094	191.0	184.6	210.3	210.3	210.3
1.2.2 Mineral Oils	9.364	184.0	188.9	204.4	206.6	204.9
1.2.3 Electricity	3.452	115.0	117.0	132.4	132.4	132.4
1.3 MANUFACTURED PRODUCTS	**64.972**	**139.5**	**140.4**	**148.0**	**147.9**	**148.0**
1.3.1 Food Products	**9.974**	**151.2**	**152.5**	**167.3**	**166.7**	**167.7**
1.3.1.1 Dairy Products	0.568	171.6	178.0	176.2	175.8	175.7
1.3.1.2 Canning, Preserving & Processing of Food	0.358	139.6	142.0	142.0	143.0	143.7
1.3.1.3 Grain Mill Products	1.340	146.2	145.9	156.4	157.0	161.1
1.3.1.4 Bakery Products	0.444	127.2	127.9	130.0	129.7	132.3
1.3.1.5 Sugar, Khandsari & Gur	2.089	167.7	170.8	197.6	197.2	194.7
1.3.1.6 Edible Oils	3.043	135.7	135.3	150.9	148.2	148.7
1.3.1.7 Oil Cakes	0.494	175.3	182.3	228.0	220.9	229.7
1.3.1.8 Tea & Coffee Proccessing	0.711	156.6	153.5	160.4	167.2	168.3
1.3.1.9 Manufacture of Salt	0.048	176.2	179.1	181.8	181.8	181.8
1.3.1.10 Other Food Products	0.879	157.4	159.4	162.8	164.5	165.3
1.3.2 Beverages, Tobacco & Tobacco Products	**1.762**	**163.3**	**163.6**	**176.0**	**175.6**	**176.7**
1.3.2.1 Wine Industries	0.385	122.6	123.6	124.9	124.9	125.4
1.3.2.2 Malt Liquor	0.153	170.0	170.0	173.6	173.6	173.6
1.3.2.3 Soft Drinks & Carbonated Water	0.241	148.5	147.8	151.3	151.4	151.2
1.3.2.4 Manufacture of Bidi, Cigarettes, Tobacco & Zarda	0.983	181.8	182.3	202.4	201.7	203.6
1.3.3 Textiles	**7.326**	**128.5**	**126.4**	**131.8**	**131.6**	**131.8**
1.3.3.1 Cotton Textiles	2.605	143.8	139.3	147.7	147.1	147.1
1.3.3.1.1 Cotton Yarn	1.377	154.7	146.9	159.4	158.4	158.2
1.3.3.1.2 Cotton Fabric	1.228	131.6	130.7	134.5	134.5	134.6
1.3.3.2 Man-Made Textiles	2.206	120.0	119.3	124.3	124.0	124.0
1.3.3.2.1 Man-Made Fibre	1.672	120.1	119.0	124.3	123.9	123.6
1.3.3.2.2 Man-Made Fabric	0.533	119.7	120.2	124.3	124.5	125.3
1.3.3.3 Woollen Textiles	0.294	132.6	134.6	141.3	142.8	146.3
1.3.3.4 Jute, Hemp & Mesta Textiles	0.261	176.3	172.0	178.3	177.4	179.4
1.3.3.5 Other Misc. Textiles	1.960	110.9	109.8	111.4	111.7	111.6
1.3.4 Wood & Wood Products	**0.587**	**161.0**	**162.2**	**171.0**	**171.7**	**172.1**
1.3.4.1 Timber/Wooden Planks	0.181	136.0	136.4	140.4	140.6	140.9
1.3.4.2 Processed Wood	0.128	170.8	171.1	179.2	180.3	180.7
1.3.4.3 Plywood & Fibre Board	0.241	179.3	182.1	193.5	194.4	194.7
1.3.4.4 Others	0.038	131.5	128.8	146.5	146.5	148.5

No. 21: Index Numbers of Wholesale Prices in India (Concld.)

(Base: 2004-05 = 100)

Commodities	Weight	2011-12	2011	2012		
			Nov.	Sep.	Oct.	Nov.
	1	2	3	4	5	6
1.3.5 Paper & Paper Products	**2.034**	**131.9**	**132.4**	**136.3**	**136.5**	**136.7**
1.3.5.1 Paper & Pulp	1.019	133.0	133.4	135.5	135.5	135.6
1.3.5.2 Manufacture of boards	0.550	124.9	123.8	128.1	128.5	128.0
1.3.5.3 Printing & Publishing	0.465	137.9	140.5	147.7	148.1	149.6
1.3.6 Leather & Leather Products	**0.835**	**130.0**	**131.8**	**134.5**	**134.1**	**133.5**
1.3.6.1 Leathers	0.223	110.9	111.4	112.5	112.5	111.9
1.3.6.2 Leather Footwear	0.409	143.8	145.9	150.4	149.4	148.6
1.3.6.3 Other Leather Products	0.203	123.2	125.8	126.7	127.1	126.7
1.3.7 Rubber & Plastic Products	**2.987**	**133.6**	**133.4**	**137.7**	**137.9**	**138.0**
1.3.7.1 Tyres & Tubes	0.541	161.2	161.6	163.1	163.1	163.5
1.3.7.1.1 Tyres	0.488	160.9	161.4	162.9	162.9	163.3
1.3.7.1.2 Tubes	0.053	163.0	163.9	165.2	165.2	165.2
1.3.7.2 Plastic Products	1.861	122.5	121.5	127.3	127.4	127.6
1.3.7.3 Rubber Products	0.584	143.6	144.8	147.0	148.0	147.7
1.3.8 Chemicals & Chemical Products	**12.018**	**134.7**	**135.6**	**144.0**	**144.1**	**143.9**
1.3.8.1 Basic Inorganic Chemicals	1.187	138.2	139.2	149.0	149.2	149.3
1.3.8.2 Basic Organic Chemicals	1.952	135.0	132.0	139.9	140.0	139.3
1.3.8.3 Fertilisers & Pesticides	3.145	129.8	134.0	146.1	146.2	146.5
1.3.8.3.1 Fertilisers	2.661	132.6	137.6	150.5	150.5	151.1
1.3.8.3.2 Pesticides	0.483	114.9	114.6	122.1	122.4	121.5
1.3.8.4 Paints, Varnishes & Lacquers	0.529	128.5	130.9	144.2	144.6	144.2
1.3.8.5 Dyestuffs & Indigo	0.563	122.5	123.8	127.0	127.2	127.1
1.3.8.6 Drugs & Medicines	0.456	119.6	120.8	124.2	124.5	124.4
1.3.8.7 Perfumes, Cosmetics, Toiletries etc.	1.130	145.3	145.5	152.1	152.3	152.3
1.3.8.8 Turpentine, Plastic Chemicals	0.586	136.1	138.1	138.6	139.6	139.5
1.3.8.9 Polymers including Synthetic Rubber	0.970	130.4	129.3	134.2	134.0	133.7
1.3.8.10 Petrochemical Intermediates	0.869	156.2	154.4	164.3	163.9	163.6
1.3.8.11 Matches, Explosives & other Chemicals	0.629	135.5	136.4	142.6	142.4	141.8
1.3.9 Non-Metallic Mineral Products	**2.556**	**152.9**	**155.7**	**164.5**	**164.8**	**163.5**
1.3.9.1 Structural Clay Products	0.658	155.3	158.2	164.8	165.2	164.2
1.3.9.2 Glass, Earthenware, Chinaware & their Products	0.256	127.0	127.5	131.3	131.1	131.7
1.3.9.3 Cement & Lime	1.386	157.0	160.6	171.1	171.3	169.3
1.3.9.4 Cement, Slate & Graphite Products	0.256	150.8	150.8	161.3	161.6	161.7
1.3.10 Basic Metals, Alloys & Metal Products	**10.748**	**156.3**	**159.4**	**167.1**	**166.8**	**166.4**
1.3.10.1 Ferrous Metals	8.064	147.7	149.8	156.7	156.5	156.1
1.3.10.1.1 Iron & Semis	1.563	152.7	155.0	163.6	162.6	162.0
1.3.10.1.2 Steel: Long	1.630	158.5	159.8	170.3	169.8	168.9
1.3.10.1.3 Steel: Flat	2.611	146.0	149.6	154.4	154.6	154.2
1.3.10.1.4 Steel: Pipes & Tubes	0.314	125.2	125.4	128.0	127.9	126.9
1.3.10.1.5 Stainless Steel & alloys	0.938	145.9	145.9	156.0	156.5	156.4
1.3.10.1.6 Castings & Forgings	0.871	133.5	135.8	137.9	137.9	137.9
1.3.10.1.7 Ferro alloys	0.137	146.8	145.7	152.0	150.7	151.2
1.3.10.2 Non-Ferrous Metals	1.004	157.1	156.7	161.4	160.9	160.8
1.3.10.2.1 Aluminium	0.489	128.1	127.3	134.7	134.1	134.2
1.3.10.2.2 Other Non-Ferrous Metals	0.515	184.7	184.6	186.8	186.4	186.1
1.3.10.3 Metal Products	1.680	197.2	207.4	220.5	219.2	219.3
1.3.11 Machinery & Machine Tools	**8.931**	**125.1**	**125.5**	**128.4**	**128.5**	**128.5**
1.3.11.1 Agricultural Machinery & Implements	0.139	133.9	134.1	137.4	137.4	137.2
1.3.11.2 Industrial Machinery	1.838	142.3	142.3	145.9	145.8	145.9
1.3.11.3 Construction Machinery	0.045	131.7	131.8	136.0	136.3	136.3
1.3.11.4 Machine Tools	0.367	145.0	145.4	155.0	156.3	156.4
1.3.11.5 Air Conditioner & Refrigerators	0.429	109.8	109.4	113.3	113.5	113.0
1.3.11.6 Non-Electrical Machinery	1.026	121.6	122.0	122.9	122.9	123.0
1.3.11.7 Electrical Machinery, Equipment & Batteries	2.343	129.7	130.8	133.1	133.1	133.0
1.3.11.8 Electrical Accessories, Wires, Cables etc.	1.063	138.0	138.5	143.7	143.8	143.8
1.3.11.9 Electrical Apparatus & Appliances	0.337	116.3	116.5	117.1	117.2	117.2
1.3.11.10 Electronics Items	0.961	84.8	85.3	86.5	86.8	87.1
1.3.11.11 IT Hardware	0.267	88.5	89.1	89.2	89.2	89.2
1.3.11.12 Communication Equipments	0.118	94.2	94.2	93.7	93.7	93.7
1.3.12 Transport, Equipment & Parts	**5.213**	**124.6**	**125.3**	**129.9**	**130.1**	**130.5**
1.3.12.1 Automotives	4.231	123.8	124.5	129.0	129.3	129.8
1.3.12.2 Auto Parts	0.804	125.3	125.9	130.6	130.6	130.8
1.3.12.3 Other Transport Equipments	0.178	140.3	140.9	146.5	147.2	146.6

Source: Office of the Economic Adviser, Ministry of Commerce and Industry, Government of India.

No. 22: Index Number of Industrial Production (Base:2004-05=100)

Industry	Weight	2010-11	2011-12	April-October		October	
				2011-12	2012-13	2011	2012
	1	2	3	4	5	6	7
General Index	**100.00**	**165.5**	**170.3**	**165.0**	**167.0**	**158.3**	**171.3**
1 Sectoral Classification							
1.1 Mining and Quarrying	14.16	131.0	128.5	121.9	121.1	122.6	122.5
1.2 Manufacturing	75.53	175.7	181.0	175.3	177.1	165.9	181.9
1.3 Electricity	10.32	138.0	149.3	148.8	155.8	152.1	160.5
2 Use-Based Classification							
2.1 Basic Goods	45.68	142.2	150.0	146.0	150.4	147.3	153.4
2.2 Capital Goods	8.83	278.9	267.8	265.8	235.6	225.4	242.4
2.3 Intermediate Goods	15.69	145.3	144.4	142.1	145.3	133.8	146.4
2.4 Consumer Goods	29.81	178.3	186.1	176.4	183.5	168.4	190.6
2.4.1 Consumer Durables	8.46	287.7	295.1	290.6	307.0	288.1	335.5
2.4.2 Consumer Non-Durables	21.35	135.0	142.9	131.1	134.6	121.0	133.2

Source : Central Statistics Office, Ministry of Statistics and Programme Implementation, Government of India.

No. 23: Union Government Accounts at a Glance

(Amount in ₹ Billion)

Item	Financial Year	April–November			
	2012-13 (Budget Estimates)	2011-12 (Actuals)	2012-13 (Actuals)	Percentage to Budget Estimates	
				2011-12	2012-13
	1	2	3	4	5
1 Revenue Receipts	9,356.9	3,928.1	4,458.2	49.7	47.6
1.1 Tax Revenue (Net)	7,710.7	3,204.7	3,696.0	48.2	47.9
1.2 Non-Tax Revenue	1,646.1	723.4	762.2	57.7	46.3
2 Capital Receipts	5,552.4	3,678.8	4,218.3	78.6	76.0
2.1 Recovery of Loans	116.5	117.8	67.1	78.5	57.6
2.2 Other Receipts	300.0	27.3	21.9	6.8	7.3
2.3 Borrowings and Other Liabilities	5,135.9	3,533.7	4,129.3	85.6	80.4
3 Total Receipts (1+2)	14,909.3	7,606.9	8,676.5	60.5	58.2
4 Non-Plan Expenditure	9,699.0	5,394.2	6,242.6	66.1	64.4
4.1 On Revenue Account	8,656.0	4,854.5	5,662.9	66.2	65.4
4.1.1 Interest Payments	3,197.6	1,659.1	1,828.6	61.9	57.2
4.2 On Capital Account	1,043.0	539.7	579.8	65.3	55.6
5 Plan Expenditure	5,210.3	2,212.8	2,433.9	50.1	46.7
5.1 On Revenue Account	4,205.1	1,878.2	1,990.3	51.7	47.3
5.2 On Capital Account	1,005.1	334.5	443.5	42.9	44.1
6 Total Expenditure (4+5)	14,909.3	7,606.9	8,676.5	60.5	58.2
7 Revenue Expenditure (4.1+5.1)	12,861.1	6,732.7	7,653.2	61.4	59.5
8 Capital Expenditure (4.2+5.2)	2,048.2	874.2	1,023.3	54.4	50.0
9 Revenue Deficit (7-1)	3,504.2	2,804.6	3,195.0	91.3	91.2
10 Fiscal Deficit {6-(1+2.1+2.2)}	5,135.9	3,533.7	4,129.3	85.6	80.4
11 Gross Primary Deficit [10-4.1.1]	1,938.3	1,874.6	2,300.7	129.5	118.7

Source: Controller General of Accounts, Ministry of Finance, Government of India.

No. 24: Treasury Bills – Ownership Pattern									
									(₹ Billion)
Item		2011-12	2011	2012					
			Nov. 25	Oct. 26	Nov. 2	Nov. 9	Nov. 16	Nov. 23	Nov. 30
		1	2	3	4	5	6	7	8
1	14-day								
	1.1 Banks	–	–	–	–	–	–	–	–
	1.2 Primary Dealers	–	–	–	–	–	–	–	–
	1.3 State Governments	1183.7	753.0	850.2	891.7	827.6	773.7	920.7	860.3
	1.4 Others	12.8	22.9	10.1	8.6	5.7	7.6	6.6	5.3
2	91-day								
	2.1 Banks	488.2	292.1	480.0	466.2	504.3	483.9	480.8	440.6
	2.2 Primary Dealers	354.6	297.5	275.4	259.7	229.2	219.0	213.2	204.2
	2.3 State Governments	215.9	251.2	473.6	538.6	458.6	470.8	490.8	490.8
	2.4 Others	187.4	105.5	123.2	132.7	105.2	115.6	78.4	135.4
3	182-day								
	3.1 Banks	137.5	165.3	251.9	232.4	270.5	260.2	290.4	262.3
	3.2 Primary Dealers	213.8	174.4	240.8	258.7	254.6	251.9	221.6	220.2
	3.3 State Governments	–	4.0	2.4	2.4	2.4	2.4	2.4	2.4
	3.4 Others	168.7	89.8	157.4	158.8	124.8	137.8	138.1	167.6
4	364-day								
	4.1 Banks	210.7	204.0	202.9	225.3	233.2	212.3	215.0	208.9
	4.2 Primary Dealers	443.2	359.3	598.0	663.6	611.1	660.2	637.0	630.0
	4.3 State Governments	4.2	4.2	3.8	3.8	3.8	3.8	3.8	3.8
	4.4 Others	245.7	146.2	391.4	309.3	358.1	337.8	358.3	382.0
5	Total	3866.4	2869.2	4061.1	4151.8	3989.1	3937.0	4057.0	4013.6

No. 25: Auctions of Treasury Bills

(Amount in ₹ Billion)

Date of Auction	Notified Amount	Bids Received			Bids Accepted			Total Issue (6+7)	Cut-off Price	Implicit Yield at Cut-off Price (per cent)
		Number	Total Face Value		Number	Total Face Value				
			Competitive	Non-Competitive		Competitive	Non-Competitive			
	1	2	3	4	5	6	7	8	9	10
91-day Treasury Bills										
2012-13										
Oct. 31	50	69	224.94	80.00	29	50.00	80.00	130.00	98.01	8.1439
Nov. 7	50	55	232.78	50.00	28	50.00	50.00	100.00	98.01	8.1439
Nov. 12	50	54	225.52	62.23	40	50.00	62.23	112.23	98.00	8.1857
Nov. 21	50	55	219.31	35.00	40	50.00	35.00	85.00	98.00	8.1857
Nov. 27	50	53	241.00	51.65	35	50.00	51.65	101.65	98.00	8.1857
182-day Treasury Bills										
2012-13										
Oct. 23	50	54	207.10	–	22	50.00	–	50.00	96.13	8.0737
Nov. 7	50	59	174.55	–	16	50.00	–	50.00	96.09	8.1606
Nov. 21	50	52	210.78	–	12	50.00	–	50.00	96.09	8.1606
364-day Treasury Bills										
2012-13										
Oct. 17	50	74	205.15	–	10	50.00	–	50.00	92.64	7.9666
Oct. 31	50	72	133.55	–	49	50.00	–	50.00	92.52	8.1069
Nov. 12	50	81	158.33	–	23	50.00	–	50.00	92.52	8.1069
Nov. 27	50	64	152.00	0.53	24	50.00	0.53	50.53	92.52	8.1069

No. 26: Daily Call Money Rates

(In Per cent per annum)

As on	Range of Rates	Weighted Average Rates
	Borrowings/ Lendings	Borrowings/ Lendings
	1	2
November 1, 2012	6.90-8.10	8.01
November 2, 2012	6.75-8.10	7.97
November 3, 2012	7.00-8.00	7.78
November 5, 2012	6.90-8.10	8.03
November 6, 2012	7.00-8.15	8.05
November 7, 2012	7.00-8.15	8.02
November 8, 2012	7.00-8.10	8.01
November 9, 2012	7.00-8.20	8.03
November 10, 2012	7.05-8.10	7.88
November 12, 2012	7.00-8.14	8.05
November 15, 2012	7.00-8.15	8.07
November 16, 2012	7.00-8.10	8.03
November 17, 2012	7.00-8.10	7.97
November 19, 2012	6.90-8.15	8.07
November 20, 2012	7.00-8.15	8.07
November 21, 2012	6.90-8.15	8.06
November 22, 2012	7.00-8.15	8.04
November 23, 2012	6.90-8.10	8.04
November 24, 2012	7.00-8.00	7.81
November 26, 2012	7.00-8.15	8.05
November 27, 2012	7.00-8.15	8.05
November 29, 2012	7.00-8.15	8.04
November 30, 2012	7.00-8.15	8.02
December 1, 2012	7.00-8.13	8.01
December 3, 2012	7.00-8.15	8.04
December 4, 2012	7.00-8.15	8.05
December 5, 2012	7.00-8.10	8.01
December 6, 2012	7.00-8.30	8.04
December 7, 2012	7.00-8.10	8.01
December 8, 2012	6.50-7.90	7.60
December 10, 2012	7.00-8.10	8.01
December 11, 2012	6.90-8.10	8.01
December 12, 2012	7.00-8.10	7.99
December 13, 2012	7.00-8.10	7.99
December 14, 2012	6.50-8.10	7.96
December 15, 2012	7.00-8.15	7.57

No. 27: Certificates of Deposit Issued by Scheduled Commercial Banks

Item	2011	2012			
	Nov. 18	Oct. 19	Nov. 2	Nov. 16	Nov. 30
	1	2	3	4	5
1 Amount Outstanding (₹ Billion)	3,784.3	3,531.2	3,504.4	3,408.5	3,066.1
1.1 Issued during the fortnight (₹ Billion)	13.1	95.9	82.6	101.8	429.6
2 Rate of Interest (per cent)	9.30-9.81	8.10-9.35	8.25-8.68	8.30-8.70	8.29-8.90

No. 28: Commercial Paper Issued by Companies

Item	2011	2012			
	Nov. 30	Oct. 15	Oct. 31	Nov. 15	Nov. 30
	1	2	3	4	5
1 Amount Outstanding (₹ Billion)	1,734.8	1,961.3	1,941.1	2,040.1	1,994.3
1.1 Reported during the fortnight (₹ Billion)	188.1	339.9	244.2	268.5	423.6
2 Rate of Interest (per cent)	8.00-14.50	7.99-14.47	8.05-12.59	7.64-12.67	7.92-14.00

No. 29: Average Daily Turnover in Select Financial Markets

(₹ Billion)

Item	2011-12	2011	2012					
		Nov. 25	Oct. 26	Nov. 2	Nov. 9	Nov. 16	Nov. 23	Nov. 30
	1	2	3	4	5	6	7	8
1 Call Money	217.0	199.6	192.9	213.6	182.9	197.2	234.7	207.1
2 Notice Money	59.8	41.5	112.6	69.6	56.3	76.0	51.5	94.4
3 Term Money	4.9	4.6	20.3	16.7	20.1	9.0	7.1	8.8
4 CBLO	769.3	574.4	719.7	776.3	820.6	578.1	769.7	709.6
5 Market Repo	519.2	527.2	761.9	850.1	717.2	821.4	665.8	910.1
6 Repo in Corporate Bond	0.1	0.2	0.0	0.0	0.0	0.0	0.0	0.0
7 Forex (US $ million)	57,103	51,331	51,831	54,599	45,771	40,020	41,682	62,393
8 Govt. of India Dated Securities	264.4	171.1	498.8	401.4	353.8	280.6	261.4	325.0
9 State Govt. Securities	4.4	4.3	15.3	7.1	5.6	2.2	16.1	5.7
10 Treasury Bills								
10.1 91-Day	15.9	5.6	17.4	15.3	11.6	8.2	12.3	11.2
10.2 182-Day	4.5	5.3	11.8	6.7	12.2	1.8	11.8	19.2
10.3 364-Day	7.8	1.8	8.6	13.0	15.3	14.3	13.2	22.4
10.4 Cash Management Bills	3.5	2.8	–	–	–	–	–	–
11 Total Govt. Securities (8+9+10)	300.6	191.0	551.9	443.5	398.6	307.1	314.8	383.5
11.1 RBI	6.3	22.1	3.7	0.1	0.3	0.7	0.0	0.3

No. 30: New Capital Issues By Non-Government Public Limited Companies

(Amount in ₹ Billion)

Security & Type of Issue	2011-12		2011-12 (Apr.-Oct.)		2012-13 (Apr.-Oct.)		Oct. 2011		Oct. 2012	
	No. of Issues	Amount	No. of Issues	Amount	No. of Issues	Amount	No. of Issues	Amount	No. of Issues	Amount
	1	2	3	4	5	6	7	8	9	10
1 Equity Shares	49	81.5	39	70.7	24	72.7	0	0.0	1	0.1
1A Premium	47	65.6	38	55.6	21	64.0	0	0.0	1	0.0
1.1 Prospectus	33	57.8	29	49.8	14	5.2	0	0.0	1	0.1
1.1.1 Premium	33	44.3	29	36.6	12	4.4	0	0.0	1	0.0
1.2 Rights	16	23.8	10	20.9	10	67.5	0	0.0	0	0.0
1.2.1 Premium	14	21.3	9	19.0	9	59.6	0	0.0	0	0.0
2 Preference Shares	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
2.1 Prospectus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
2.2 Rights	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
3 Debentures	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
3.1 Prospectus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
3.2 Rights	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
3.2.1 Convertible	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
3.2.1.1 Prospectus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
3.2.1.2 Rights	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
3.2.2 Non-Convertible	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
3.2.2.1 Prospectus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
3.2.2.2 Rights	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
4 Bonds	–	0.0	0	0.0	0	0.0	0	0.0	0	0.0
4.1 Prospectus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
4.2 Rights	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
5 Total (1+2+3+4)	49	81.5	39	70.7	24	72.7	0	0.0	1	0.1
5.1 Prospectus	33	57.8	29	49.8	14	5.2	0	0.0	1	0.1
5.2 Rights	16	23.8	10	20.9	10	67.5	0	0.0	0	0.0

Source: Based on prospectus/advertisements issued by companies, replies to Reserve Bank's questionnaire and information received from SEBI, stock exchanges, press reports, etc.

No. 31: Foreign Trade

Item	Unit	2011-12	2011	2012				
			Nov.	Jul.	Aug.	Sep.	Oct.	Nov.
		1	2	3	4	5	6	7
1 Exports	₹ Billion	14,592.8	1,183.4	1,263.8	1,223.4	1,316.5	1,215.6	1,221.5
	US $ Million	304,623.5	23,269.7	22,772.6	22,020.3	24,109.2	22,926.1	22,299.6
1.1 Oil	₹ Billion	2,658.2	215.9	217.4	225.0	256.3	..	..
	US $ Million	55,603.5	4,245.3	3,918.1	4,048.9	4,694.3	..	..
1.2 Non-oil	₹ Billion	11,934.6	967.5	1,046.3	998.5	1,060.2	..	..
	US $ Million	249,020.0	19,024.4	18,854.4	17,971.4	19,414.9	..	..
2 Imports	₹ Billion	23,459.7	1,988.6	2,251.4	2,075.5	2,277.4	2,377.6	2,278.0
	US $ Million	489,417.4	39,102.5	40,569.0	37,356.0	41,706.4	44,840.0	41,586.9
2.1 Oil	₹ Billion	7,427.6	632.5	766.4	716.0	774.8	854.2	..
	US $ Million	154,905.9	12,436.6	13,811.0	12,886.9	14,189.8	16,109.7	14,522.1
2.2 Non-oil	₹ Billion	16,032.1	1,356.1	1,484.9	1,359.5	1,502.6	1,523.4	2,278.0
	US $ Million	334,511.5	26,665.9	26,758.0	24,469.0	27,516.6	28,730.3	27,064.8
3 Trade Balance	₹ Billion	–8,866.9	–805.2	–987.6	–852.0	–960.9	–1,162.0	–1,056.5
	US $ Million	–184,793.9	–15,832.8	–17,796.4	–15,335.7	–17,597.2	–21,913.9	–19,287.3
3.1 Oil	₹ Billion	–4,769.5	–416.6	–549.0	–491.0	–518.5	..	..
	US $ Million	–99,302.4	–8,191.3	–9,892.9	–8,838.0	–9,495.5	..	..
3.2 Non-oil	₹ Billion	–4,097.5	–388.6	–438.6	–361.0	–442.4	..	..
	US $ Million	–85,491.4	–7,641.5	–7,903.6	–6,497.7	–8,101.7	..	..

Source: DGCI & S and Ministry of Commerce & Industry.

No. 32: Foreign Exchange Reserves

Item	Unit	2011	2012					
		Dec. 16	Nov. 9	Nov. 16	Nov. 23	Nov. 30	Dec. 7	Dec. 14
		1	2	3	4	5	6	7
1 Total Reseves	**₹ Billion**	**15,936**	**15,947**	**16,118**	**16,292**	**16,060**	**15,999**	**16,137**
	US $ Million	**302,100**	**293,559**	**293,526**	**294,981**	**294,510**	**294,994**	**296,632**
1.1 Foreign Currency Assets	₹ Billion	14,099	14,058	14,226	14,397	14,178	14,120	14,256
	US $ Million	266,968	258,707	258,691	260,138	260,013	260,505	262,120
1.2 Gold	₹ Billion	1,463	1,526	1,526	1,526	1,516	1,516	1,516
	US $ Million	28,041	28,189	28,189	28,189	27,803	27,803	27,803
1.3 SDRs	SDRs Million	2,885	2,886	2,886	2,886	2,886	2,886	2,886
	₹ Billion	234	240	242	244	242	240	241
	US $ Million	4,439	4,409	4,398	4,403	4,430	4,421	4,436
1.4 Reserve Tranche Position in IMF	₹ Billion	140	123	124	125	124	123	124
	US $ Million	2,652	2,254	2,248	2,251	2,264	2,265	2,273

No. 33: NRI Deposits

(US$ Million)

Scheme	Outstanding				Flows	
	2011-12	2011	2012		2011-12	2012-13
		Nov.	Oct.	Nov.	Apr.-Nov.	Apr.-Nov.
	1	2	3	4	5	6
1 NRI Deposits	**58,608**	**52,954**	**66,592**	**67,099**	**6,394**	**11,240**
1.1 FCNR(B)	14,968	15,574	14,739	14,855	–23	–113
1.2 NR(E)RA	31,408	25,621	41,530	42,226	2,817	12,795
1.3 NRO	12,232	11,759	10,324	10,017	3,600	–1,442

No. 34: Foreign Investment Inflows

(US$ Million)

Item	2011-12	2011-12	2012-13	2011	2012	
		Apr.-Nov.	Apr.-Nov.	Nov.	Oct.	Nov.
	1	2	3	4	5	6
1 Foreign Investment Inflows	**39,177**	**20,588**	**25,501**	**1,707**	**3,640**	**3,255**
1.1 Net Foreign Direct Investment (1.1.1–1.1.2)	**22,006**	**19,629**	**14,712**	**1,647**	**685**	**1,219**
1.1.1 Direct Investment to India (1.1.1.1–1. 1.1.2)	**32,955**	**27,092**	**20,001**	**2,570**	**1,813**	**1,945**
1.1.1.1 Gross Inflows/Gross Investments	**46,553**	**35,495**	**24,650**	**3,423**	**3,279**	**2,395**
1.1.1.1.1 Equity	35,854	28,284	15,942	2,628	2,033	1,149
1.1.1.1.1.1 Government (SIA/FIPB)	3,046	2,589	1,781	282	418	39
1.1.1.1.1.2 RBI	20,427	15,350	11,200	1,028	1,195	892
1.1.1.1.1.3 Acquisition of shares	11,360	9,698	2,266	1,228	328	128
1.1.1.1.1.4 Equity capital of unincorporated bodies	1,021	647	695	90	91	91
1.1.1.1.2 Reinvested earnings	8,205	5,201	7,169	718	880	880
1.1.1.1.3 Other capital	2,494	2,010	1,539	77	366	366
1.1.1.2 Repatriation/Disinvestment	**13,598**	**8,403**	**4,649**	**853**	**1,466**	**450**
1.1.1.2.1 Equity	13,018	7,919	4,283	838	1,463	447
1.1.1.2.2 Other capital	580	484	366	15	3	3
1.1.2 Foreign Direct Investment by India (1.1.2.1+1.1.2.2+1.1.2.3–1.1.2.4)	**10,950**	**7,464**	**5,290**	**923**	**1,128**	**727**
1.1.2.1 Equity capital	6,387	4,125	4,379	494	816	623
1.1.2.2 Reinvested Earnings	1,208	806	792	101	99	99
1.1.2.3 Other Capital	5,810	3,970	2,843	662	425	218
1.1.2.4 Repatriation/Disinvestment	2,455	1,438	2,724	334	213	213
1.2 Net Portfolio Investment (1.2.1+1.2.2+1.2.3–1.2.4)	**17,171**	**960**	**10,789**	**60**	**2,955**	**2,036**
1.2.1 GDRs/ADRs	597	567	187	0	8	0
1.2.2 FIIs	16,813	443	11,161	76	2,937	2,026
1.2.3 Offshore funds and others	–	0	0	0	0	0
1.2.4 Portfolio investment by India	239	50	559	16	–10	–10

No. 35: Outward Remittances under the Liberalised Remittance Scheme (LRS) for Resident Individuals

(US$ Million)

Item	2011-12	2011	2012		
		Oct.	Aug.	Sep.	Oct.
	1	2	3	4	5
1 Outward Remittances under the LRS	**1,001.6**	**64.9**	**82.1**	**108.8**	**87.7**
1.1 Deposit	26.6	0.6	1.4	0.5	0.5
1.2 Purchase of immovable property	62.2	4.2	4.8	6.8	5.0
1.3 Investment in equity/debt	239.5	13.8	20.3	20.1	17.8
1.4 Gift	244.6	13.2	17.7	19.4	20.1
1.5 Donations	3.4	0.4	0.5	0.6	0.5
1.6 Travel	34.9	3.4	4.1	4.4	4.0
1.7 Maintenance of close relatives	165.2	12.3	12.4	20.8	15.6
1.8 Medical Treatment	3.6	0.3	0.3	0.4	0.6
1.9 Studies Abroad	114.3	7.5	14.1	15.4	8.5
1.10 Others	107.2	9.4	6.4	20.3	15.2

No. 36: Indices of Real Effective Exchange Rate (REER) and Nominal Effective Exchange Rate (NEER) of the Indian Rupee

Item	2010-11	2011-12	2011	2012	
			December	November	December
	1	2	3	4	5
36-Currency Export and Trade Based Weights (Base: 2004-05=100)					
1 Trade-Based Weights					
1.1 NEER	93.66	87.61	80.83	78.42	78.01
1.2 REER	102.34	99.15	91.58	91.22	90.74
2 Export-Based Weights					
2.1 NEER	94.74	89.06	82.22	79.88	79.47
2.2 REER	103.52	100.68	93.04	92.86	92.38
6-Currency Trade Based Weights					
1 Base: 2004-05 (April-March) =100					
1.1 NEER	91.83	84.86	78.06	75.33	75.05
1.2 REER	114.91	111.86	103.75	105.11	104.71
2 Base: 2010-11 (April-March) =100					
2.1 NEER	100.00	92.41	85.01	82.03	81.72
2.2 REER	100.00	97.34	90.29	91.47	91.12

No. 37: External Commercial Borrowings (ECBs)

(Amount in US$ Million)

Item	2011-12	2011	2012	
		Nov.	Oct.	Nov.
	1	2	3	4
1 Automatic Route				
1.1 Number	999	78	93	57
1.2 Amount	27,849	1,343	2,409	1,106
2 Approval Route				
2.1 Number	68	2	4	8
2.2 Amount	7,861	255	1,890	241
3 Total (1+2)				
3.1 Number	1,067	80	97	65
3.2 Amount	35,710	1,598	4,299	1,347
4 Weighted Average Maturity (in years)	5.78	5.09	6.25	4.98
5 Interest Rate (per cent)				
5.1 Weighted Average Margin over 6-month LIBOR or reference rate for Floating Rate Loans	2.89	2.93	2.72	3.68
5.2 Interest rate range for Fixed Rate Loans	0.00-8.00	0.00-5.50	0.00-12.44	0.00-4.15

No. 38: India's Overall Balance of Payments

(US $ Million)

	Jul-Sep 2011			Jul-Sep 2012		
	Credit	Debit	Net	Credit	Debit	Net
	1	2	3	4	5	6
Overall Balance of Payments(1+2+3)	**249,370**	**249,094**	**276**	**234,304**	**234,462**	**–158**
1 CURRENT ACCOUNT	**131,667**	**150,558**	**–18,892**	**124,467**	**146,866**	**–22,398**
1.1 MERCHANDISE	**79,560**	**124,088**	**–44,528**	**69,841**	**118,181**	**–48,339**
1.2 INVISIBLES	**52,107**	**26,471**	**25,636**	**54,626**	**28,685**	**25,941**
1.2.1 Services	32,643	18,651	13,992	34,795	19,234	15,562
1.2.1.1 Travel	4,235	3,534	701	3,954	2,993	961
1.2.1.2 Transportation	4,499	3,624	875	4,176	3,892	284
1.2.1.3 Insurance	629	423	206	555	304	251
1.2.1.4 G.n.i.e.	147	179	–32	149	174	–25
1.2.1.5 Miscellaneous	23,134	10,891	12,242	25,962	11,871	14,090
1.2.1.5.1 Software Services	13,940	307	13,633	16,078	523	15,556
1.2.1.5.2 Business Services	6,120	6,352	–232	7,132	6,755	377
1.2.1.5.3 Financial Services	1,577	2,130	–553	1,355	1,107	248
1.2.1.5.4 Communication Services	390	309	80	455	141	314
1.2.2 Transfers	16,376	775	15,601	16,994	1,011	15,983
1.2.2.1 Official	136	152	–16	110	203	–93
1.2.2.2 Private	16,240	622	15,618	16,883	808	16,076
1.2.3 Income	3,088	7,045	–3,958	2,837	8,441	–5,604
1.2.3.1 Investment Income	2,377	6,578	–4,201	2,028	7,907	–5,879
1.2.3.2 Compensation of Employees	711	467	244	809	534	276
2 CAPITAL ACCOUNT	**117,704**	**98,137**	**19,567**	**109,837**	**85,972**	**23,864**
2.1 Foreign Investment	**55,208**	**49,918**	**5,289**	**52,661**	**36,059**	**16,602**
2.1.1 Foreign Direct Investment	11,981	5,496	6,485	13,093	4,208	8,885
2.1.1.1 In India	11,615	2,137	9,478	11,657	1,342	10,315
2.1.1.1.1 Equity	9,161	2,015	7,145	8,078	1,340	6,739
2.1.1.1.2 Reinvested Earnings	2,051	–	2,051	3,125	–	3,125
2.1.1.1.3 Other Capital	403	122	282	454	2	452
2.1.1.2 Abroad	366	3,359	–2,993	1,436	2,866	–1,431
2.1.1.2.1 Equity	366	1,631	–1,265	1,436	1,606	–170
2.1.1.2.2 Reinvested Earnings	–	302	–302	–	297	–297
2.1.1.2.3 Other Capital	–	1,426	–1,426	–	963	–963
2.1.2 Portfolio Investment	43,227	44,422	–1,196	39,569	31,851	7,718
2.1.2.1 In India	42,769	44,152	–1,384	38,946	30,957	7,988
2.1.2.1.1 FIIs	42,564	44,152	–1,589	38,861	30,957	7,904
2.1.2.1.2 ADR/GDRs	205	–	205	85	–	85
2.1.2.2 Abroad	458	270	188	623	894	–271
2.2 Loans	**37,270**	**28,772**	**8,498**	**34,035**	**28,648**	**5,387**
2.2.1 External Assistance	1,081	790	291	1,028	972	57
2.2.1.1 By India	17	57	–39	14	78	–64
2.2.1.2 To India	1,063	734	330	1,014	894	120
2.2.2 Commercial Borrowings	9,785	4,449	5,336	5,616	4,418	1,198
2.2.2.1 By India	1,118	469	649	379	629	–250
2.2.2.2 To India	8,667	3,980	4,687	5,237	3,790	1,447
2.2.3 Short Term to India	26,405	23,534	2,871	27,390	23,258	4,133
2.2.3.1 Suppliers' Credit > 180 days & Buyers' Credit	25,130	23,534	1,596	27,390	22,238	5,153
2.2.3.2 Suppliers' Credit up to 180 days	1,275	–	1,275	–	1,020	–1,020
2.3 Banking Capital	**20,488**	**13,439**	**7,049**	**19,770**	**14,279**	**5,491**
2.3.1 Commercial Banks	20,144	13,439	6,705	19,128	14,279	4,849
2.3.1.1 Assets	2,223	1,006	1,217	2,705	1,214	1,491
2.3.1.2 Liabilities	17,921	12,433	5,488	16,423	13,065	3,358
2.3.1.2.1 Non-Resident Deposits	15,088	12,302	2,786	15,043	12,197	2,846
2.3.2 Others	344	–	344	641	–	641
2.4 Rupee Debt Service	–	**1**	**–1**	–	**1**	**–1**
2.5 Other Capital	**4,737**	**6,006**	**–1,269**	**3,371**	**6,986**	**–3,615**
3 Errors & Omissions	–	**399**	**–399**	–	**1,624**	**–1,624**
4 Monetary Movements	–	**276**	**–276**	**158**	–	**158**
4.1 I.M.F.	–	–	–	–	–	–
4.2 Foreign Exchange Reserves (Increase - / Decrease +)	–	276	–276	158	–	158

No. 39: India's Overall Balance of Payments

(₹ Billion)

	Jul-Sep 2011			Jul-Sep 2012		
	Credit	Debit	Net	Credit	Debit	Net
	1	2	3	4	5	6
Overall Balance of Payments(1+2+3)	**11,415**	**11,403**	**13**	**12,938**	**12,947**	**–9**
1 CURRENT ACCOUNT	**6,027**	**6,892**	**–865**	**6,873**	**8,110**	**–1,237**
1.1 MERCHANDISE	**3,642**	**5,680**	**–2,038**	**3,857**	**6,526**	**–2,669**
1.2 INVISIBLES	**2,385**	**1,212**	**1,174**	**3,016**	**1,584**	**1,432**
1.2.1 Services	1,494	854	641	1,921	1,062	859
1.2.1.1 Travel	194	162	32	218	165	53
1.2.1.2 Transportation	206	166	40	231	215	16
1.2.1.3 Insurance	29	19	9	31	17	14
1.2.1.4 G.n.i.e.	7	8	–1	8	10	–2
1.2.1.5 Miscellaneous	1,059	499	560	1,434	656	778
1.2.1.5.1 Software Services	638	14	624	888	29	859
1.2.1.5.2 Business Services	280	291	–11	394	373	21
1.2.1.5.3 Financial Services	72	97	–25	75	61	14
1.2.1.5.4 Communication Services	18	14	4	25	8	17
1.2.2 Transfers	750	35	714	938	56	883
1.2.2.1 Official	6	7	–1	6	11	–5
1.2.2.2 Private	743	28	715	932	45	888
1.2.3 Income	141	323	–181	157	466	–309
1.2.3.1 Investment Income	109	301	–192	112	437	–325
1.2.3.2 Compensation of Employees	33	21	11	45	29	15
2 CAPITAL ACCOUNT	**5,388**	**4,492**	**896**	**6,065**	**4,747**	**1,318**
2.1 Foreign Investment	**2,527**	**2,285**	**242**	**2,908**	**1,991**	**917**
2.1.1 Foreign Direct Investment	548	252	297	723	232	491
2.1.1.1 In India	532	98	434	644	74	570
2.1.1.1.1 Equity	419	92	327	446	74	372
2.1.1.1.2 Reinvested Earnings	94	–	94	173	–	173
2.1.1.1.3 Other Capital	18	6	12	25	–	25
2.1.1.2 Abroad	17	154	–137	79	158	–79
2.1.1.2.1 Equity	17	75	–58	79	89	–9
2.1.1.2.2 Reinvested Earnings	–	14	–14	–	16	–16
2.1.1.2.3 Other Capital	–	65	–65	–	53	–53
2.1.2 Portfolio Investment	1,979	2,034	–55	2,185	1,759	426
2.1.2.1 In India	1,958	2,021	–63	2,151	1,709	441
2.1.2.1.1 FIIs	1,948	2,021	–73	2,146	1,709	436
2.1.2.1.2 ADR/GDRs	9	–	9	5	–	5
2.1.2.2 Abroad	21	12	9	34	49	–15
2.2 Loans	**1,706**	**1,317**	**389**	**1,879**	**1,582**	**297**
2.2.1 External Assistance	49	36	13	57	54	3
2.2.1.1 By India	1	3	–2	–	4	–4
2.2.1.2 To India	49	34	15	56	49	7
2.2.2 Commercial Borrowings	448	204	244	310	244	66
2.2.2.1 By India	51	21	30	21	35	–14
2.2.2.2 To India	397	182	215	289	209	80
2.2.3 Short Term to India	1,209	1,077	131	1,513	1,284	228
2.2.3.1 Suppliers' Credit > 180 days & Buyers' Credit	1,150	1,077	73	1,513	1,228	285
2.2.3.2 Suppliers' Credit up to 180 days	58	–	58	–	56	–56
2.3 Banking Capital	**938**	**615**	**323**	**1,092**	**788**	**303**
2.3.1 Commercial Banks	922	615	307	1,056	788	268
2.3.1.1 Assets	102	46	56	149	67	82
2.3.1.2 Liabilities	820	569	251	907	721	185
2.3.1.2.1 Non-Resident Deposits	691	563	128	831	674	157
2.3.2 Others	16	–	16	35	–	35
2.4 Rupee Debt Service	–	–	–	–	–	–
2.5 Other Capital	**217**	**275**	**–58**	**186**	**386**	**–200**
3 Errors & Omissions	–	**18**	**–18**	–	**90**	**–90**
4 Monetary Movements	–	**13**	**–13**	**9**	–	**9**
4.1 I.M.F.	–	–	–	–	–	–
4.2 Foreign Exchange Reserves (Increase - / Decrease +)	–	13	–13	9	–	9

No. 40: Standard Presentation of BoP in India as per BPM6

(US $ Million)

Item	Jul-Sep 2011			Jul-Sep 2012		
	Credit	Debit	Net	Credit	Debit	Net
	1	2	3	4	5	6
1 Current Account	**131,199**	**150,075**	**–18,876**	**124,368**	**146,680**	**–22,311**
1.A Goods and Services	**111,871**	**142,407**	**–30,536**	**104,636**	**137,414**	**–32,778**
1.A.a Goods	**79,577**	**124,088**	**–44,511**	**69,841**	**118,181**	**–48,339**
1.A.a.1 General merchandise on a BOP basis	79,560	111,206	–31,646	67,991	106,545	–38,553
1.A.a.2 Net exports of goods under merchanting	17	–	17	1,850	1,172	678
1.A.a.3 Non-monetary gold	–	12,882	–12,882	–	10,464	–10,464
1.A.b Services	**32,295**	**18,320**	**13,975**	**34,795**	**19,234**	**15,562**
1.A.b.1 Manufacturing services on physical inputs owned by others	–	–	–	20	14	6
1.A.b.2 Maintenance and repair services n.i.e.	–	–	–	21	121	–100
1.A.b.3 Transport	4,503	3,651	852	4,176	3,892	284
1.A.b.4 Travel	4,235	3,534	701	3,954	2,993	961
1.A.b.5 Construction	128	315	–187	240	250	–10
1.A.b.6 Insurance and pension services	629	423	206	555	304	251
1.A.b.7 Financial services	1,577	2,130	–553	1,355	1,107	248
1.A.b.8 Charges for the use of intellectual property n.i.e.	78	693	–615	67	1,116	–1,050
1.A.b.9 Telecommunications, computer, and information services	14,417	676	13,741	16,557	746	15,811
1.A.b.10 Other business services	5,772	6,020	–248	7,132	6,755	377
1.A.b.11 Personal, cultural, and recreational services	121	79	42	222	160	63
1.A.b.12 Government goods and services n.i.e.	147	179	–32	149	174	–25
1.A.b.13 Others n.i.e.	689	619	70	348	1,602	–1,254
1.B Primary Income	**3,088**	**7,045**	**–3,958**	**2,837**	**8,441**	**–5,604**
1.B.1 Compensation of employees	711	467	244	809	534	276
1.B.2 Investment income	2,084	6,497	–4,414	1,806	7,822	–6,016
1.B.2.1 Direct investment	769	6,440	–5,671	604	3,826	–3,222
1.B.2.2 Portfolio investment	–	–	–	17	1,391	–1,373
1.B.2.3 Other investment	–	54	–54	79	2,604	–2,525
1.B.2.4 Reserve assets	1,315	4	1,311	1,107	2	1,105
1.B.3 Other primary income	293	81	212	222	85	136
1.C Secondary Income	**16,240**	**622**	**15,618**	**16,895**	**825**	**16,070**
1.C.1 Financial corporations, nonfinancial corporations, households, and NPISHs	16,240	622	15,618	16,883	808	16,076
1.C.1.1 Personal transfers (Current transfers between resident and/ non-resident households)	15,648	530	15,119	16,288	743	15,545
1.C.1.2 Other current transfers	592	93	499	595	65	530
1.C.2 General Government	–	–	–	11	17	–6
2 Capital Account	**407**	**163**	**244**	**163**	**470**	**–307**
2.1 Gross acquisitions (DR.)/disposals (CR.) of non-produced nonfinancial assets	271	11	260	51	27	24
2.2 Capital transfers	136	152	–16	112	442	–331
3 Financial Account	**117,432**	**98,402**	**19,030**	**109,952**	**85,709**	**24,243**
3.1 Direct Investment	**11,981**	**5,496**	**6,485**	**13,093**	**4,208**	**8,885**
3.1.A Direct Investment in India	11,615	2,137	9,478	11,657	1,342	10,315
3.1.A.1 Equity and investment fund shares	11,212	2,015	9,197	11,203	1,340	9,864
3.1.A.1.1 Equity other than reinvestment of earnings	9,161	2,015	7,145	8,078	1,340	6,739
3.1.A.1.2 Reinvestment of earnings	2,051	–	2,051	3,125	–	3,125
3.1.A.2 Debt instruments	403	122	282	454	2	452
3.1.A.2.1 Direct investor in direct investment enterprises	403	122	282	454	2	452
3.1.B Direct Investment by India	366	3,359	–2,993	1,436	2,866	–1,431
3.1.B.1 Equity and investment fund shares	366	1,933	–1,567	1,436	1,903	–467
3.1.B.1.1 Equity other than reinvestment of earnings	366	1,631	–1,265	1,436	1,606	–170
3.1.B.1.2 Reinvestment of earnings	–	302	–302	–	297	–297
3.1.B.2 Debt instruments	–	1,426	–1,426	–	963	–963
3.1.B.2.1 Direct investor in direct investment enterprises	–	1,426	–1,426	–	963	–963
3.2 Portfolio Investment	**43,022**	**44,422**	**–1,401**	**39,484**	**31,851**	**7,633**
3.2A Portfolio Investment in India	42,564	44,152	–1,589	38,861	30,957	7,904
3.2A.1 Equity and investment fund shares	30,233	32,345	–2,112	30,426	23,264	7,162
3.2A.2 Debt securities	12,331	11,807	524	8,435	7,693	741
3.2.B Portfolio Investment by India	458	270	188	623	894	–271
3.3 Financial derivatives (other than reserves) and employee stock options	**–**	**–**	**–**	**804**	**1,093**	**–289**
3.4 Other investment	**62,429**	**48,207**	**14,222**	**56,405**	**48,466**	**7,939**
3.4.1 Other equity (ADRs/GDRs)	205	–	205	85	–	85
3.4.2 Currency and deposits	15,433	12,302	3,130	15,685	12,197	3,488
3.4.2.1 Central bank (Rupee Debt Movements; NRG)	344	–	344	641	–	641
3.4.2.2 Deposit-taking corporations, except the central bank (NRI Deposits)	15,088	12,302	2,786	15,043	12,197	2,846
3.4.2.3 General government	–	–	–	–	–	–
3.4.2.4 Other sectors	–	–	–	–	–	–
3.4.3 Loans (External Assistance, ECBs and Banking Capital)	15,922	6,376	9,546	10,730	7,472	3,257
3.4.3A Loans to India	14,786	5,850	8,936	10,336	6,765	3,571
3.4.3B Loans by India	1,136	526	610	393	707	–313
3.4.4 Insurance, pension, and standardized guarantee schemes	–	–	–	8	91	–82
3.4.5 Trade credit and advances	26,405	23,534	2,871	27,390	23,258	4,133
3.4.6 Other accounts receivable/payable - other	4,466	5,996	–1,530	2,515	5,539	–3,024
3.4.7 Special drawing rights	–	–	–	–	–	–
3.5 Reserve assets	**–**	**276**	**–276**	**158**	**–**	**158**
3.5.1 Monetary gold	–	–	–	–	–	–
3.5.2 Special drawing rights n.a.	–	–	–	–	–	–
3.5.3 Reserve position in the IMF n.a.	–	–	–	–	–	–
3.5.4 Other reserve assets (Foreign Currency Assets)	–	276	–276	158	–	158
3 Total assets/liabilities (Instrument wise)	**117,432**	**98,402**	**19,030**	**109,952**	**85,709**	**24,243**
3.0.1 Equity and investment fund shares	42,269	36,564	5,705	44,500	28,584	15,916
3.0.2 Debt instruments	70,492	55,566	14,926	62,693	51,586	11,107
3.0.3 Other financial assets and liabilities	4,671	6,272	–1,601	2,758	5,539	–2,781
4 Net errors and omissions	**–**	**399**	**–399**	**–**	**1,624**	**–1,624**

No. 41: Standard Presentation of BoP in India as per BPM6

(₹ Billion)

Item	Jul-Sep 2011			Jul-Sep 2012		
	Credit	Debit	Net	Credit	Debit	Net
	1	2	3	4	5	6
1 Current Account	**6,006**	**6,870**	**–864**	**6,868**	**8,100**	**–1,232**
1.A Goods and Services	**5,121**	**6,519**	**–1,398**	**5,778**	**7,588**	**–1,810**
1.A.a Goods	**3,643**	**5,680**	**–2,038**	**3,857**	**6,526**	**–2,669**
1.A.a.1 General merchandise on a BOP basis	3,642	5,091	–1,449	3,754	5,883	–2,129
1.A.a.2 Net exports of goods under merchanting	1	–	1	102	65	37
1.A.a.3 Non-monetary gold	–	590	–590	–	578	–578
1.A.b Services	**1,478**	**839**	**640**	**1,921**	**1,062**	**859**
1.A.b.1 Manufacturing services on physical inputs owned by others	–	–	–	1	1	–
1.A.b.2 Maintenance and repair services n.i.e.	–	–	–	1	7	–6
1.A.b.3 Transport	206	167	39	231	215	16
1.A.b.4 Travel	194	162	32	218	165	53
1.A.b.5 Construction	6	14	–9	13	14	–1
1.A.b.6 Insurance and pension services	29	19	9	31	17	14
1.A.b.7 Financial services	72	97	–25	75	61	14
1.A.b.8 Charges for the use of intellectual property n.i.e.	4	32	–28	4	62	–58
1.A.b.9 Telecommunications, computer, and information services	660	31	629	914	41	873
1.A.b.10 Other business services	264	276	–11	394	373	21
1.A.b.11 Personal, cultural, and recreational services	6	4	2	12	9	3
1.A.b.12 Government goods and services n.i.e.	7	8	–1	8	10	–1
1.A.b.13 Others n.i.e.	32	28	3	19	88	–69
1.B Primary Income	**141**	**323**	**–181**	**157**	**466**	**–309**
1.B.1 Compensation of employees	33	21	11	45	29	15
1.B.2 Investment income	95	297	–202	100	432	–332
1.B.2.1 Direct investment	35	295	–260	33	211	–178
1.B.2.2 Portfolio investment	–	–	–	1	77	–76
1.B.2.3 Other investment	–	2	–2	4	144	–139
1.B.2.4 Reserve assets	60	–	60	61	–	61
1.B.3 Other primary income	13	4	10	12	5	8
1.C Secondary Income	**743**	**28**	**715**	**933**	**46**	**887**
1.C.1 Financial corporations, nonfinancial corporations, households, and NPISHs	743	28	715	932	45	888
1.C.1.1 Personal transfers (Current transfers between resident and/ non-resident households)	716	24	692	899	41	858
1.C.1.2 Other current transfers	27	4	23	33	4	29
1.C.2 General Government	–	–	–	1	1	–
2 Capital Account	**19**	**7**	**11**	**9**	**26**	**–17**
2.1 Gross acquisitions (DR.)/disposals (CR.) of non-produced nonfinancial assets	12	0	12	3	2	1
2.2 Capital transfers	6	7	–1	6	24	–18
3 Financial Account	**5,376**	**4,505**	**871**	**6,072**	**4,733**	**1,339**
3.1 Direct Investment	**548**	**252**	**297**	**723**	**232**	**491**
3.1.A Direct Investment in India	532	98	434	644	74	570
3.1.A.1 Equity and investment fund shares	513	92	421	619	74	545
3.1.A.1.1 Equity other than reinvestment of earnings	419	92	327	446	74	372
3.1.A.1.2 Reinvestment of earnings	94	–	94	173	–	173
3.1.A.2 Debt instruments	18	6	12	25	–	25
3.1.A.2.1 Direct investor in direct investment enterprises	18	6	12	25	–	25
3.1.B Direct Investment by India	17	154	–137	79	158	–79
3.1.B.1 Equity and investment fund shares	17	88	–72	79	105	–26
3.1.B.1.1 Equity other than reinvestment of earnings	17	75	–58	79	89	–9
3.1.B.1.2 Reinvestment of earnings	–	14	–14	–	16	–16
3.1.B.2 Debt instruments	–	65	–65	–	53	–53
3.1.B.2.1 Direct investor in direct investment enterprises	–	65	–65	–	53	–53
3.2 Portfolio Investment	**1,969**	**2,034**	**–64**	**2,180**	**1,759**	**421**
3.2A Portfolio Investment in India	1,948	2,021	–73	2,146	1,709	436
3.2A.1 Equity and investment fund shares	1,384	1,481	–97	1,680	1,285	396
3.2A.2 Debt securities	564	540	24	466	425	41
3.2.B Portfolio Investment by India	21	12	9	34	49	–15
3.3 Financial derivatives (other than reserves) and employee stock options	**–**	**–**	**–**	**44**	**60**	**–16**
3.4 Other investment	**2,858**	**2,207**	**651**	**3,115**	**2,676**	**438**
3.4.1 Other equity (ADRs/GDRs)	9	–	9	5	–	5
3.4.2 Currency and deposits	706	563	143	866	674	193
3.4.2.1 Central bank (Rupee Debt Movements; NRG)	16	–	16	35	–	35
3.4.2.2 Deposit-taking corporations, except the central bank (NRI Deposits)	691	563	128	831	674	157
3.4.2.3 General government	–	–	–	–	–	–
3.4.2.4 Other sectors	–	–	–	–	–	–
3.4.3 Loans (External Assistance, ECBs and Banking Capital)	729	292	437	592	413	180
3.4.3A Loans to India	677	268	409	571	374	197
3.4.3B Loans by India	52	24	28	22	39	–17
3.4.4 Insurance, pension, and standardized guarantee schemes	–	–	–	–	5	–5
3.4.5 Trade credit and advances	1,209	1,077	131	1,513	1,284	228
3.4.6 Other accounts receivable/payable - other	204	274	–70	139	306	–167
3.4.7 Special drawing rights	–	–	–	–	–	–
3.5 Reserve assets	**–**	**13**	**–13**	**9**	**–**	**9**
3.5.1 Monetary gold	–	–	–	–	–	–
3.5.2 Special drawing rights n.a.	–	–	–	–	–	–
3.5.3 Reserve position in the IMF n.a.	–	–	–	–	–	–
3.5.4 Other reserve assets (Foreign Currency Assets)	–	13	–13	9	–	9
3 Total assets/liabilities (Instrument wise)	**5,376**	**4,505**	**871**	**6,072**	**4,733**	**1,339**
3.0.1 Equity and investment fund shares	1,935	1,674	261	2,457	1,578	879
3.0.2 Debt instruments	3,227	2,544	683	3,462	2,849	613
3.0.3 Other financial assets and liabilities	214	287	–73	152	306	–154
4 Net errors and omissions	**–**	**18**	**–18**	**–**	**–**	**–**

No. 42: International Investment Position

(US$ Million)

Item	As on Financial Year /Quarter End							
	2011-12		2011		2012			
			Sep.		Jun.		Sep.	
	Assets	Liabilities	Assets	Liabilities	Assets	Liabilities	Assets	Liabilities
	1	2	3	4	5	6	7	8
1 Direct Investment Abroad/in India	112,376	222,330	107,610	216,918	114,379	205,643	115,810	229,970
1.1 Equity Capital and Reinvested Earnings	82,048	213,119	79,979	208,290	82,816	196,158	83,283	219,939
1.2 Other Capital	30,329	9,211	27,631	8,628	31,564	9,485	32,527	10,031
2 Portfolio Investment	1,472	165,797	1,488	155,756	1,447	148,211	1,447	165,325
2.1 Equity	1,455	125,330	1,463	121,180	1,430	110,506	1,430	125,674
2.2 Debt	17	40,468	25	34,576	17	37,706	17	39,651
3 Other Investment	29,524	298,061	32,116	282,398	28,156	303,701	29,662	317,908
3.1 Trade Credit	–39	67,325	10,421	66,691	4,915	72,729	5,606	76,775
3.2 Loan	6,067	159,993	4,367	153,995	3,782	160,313	3,761	163,965
3.3 Currency and Deposits	11,764	58,778	7,706	52,427	7,490	61,048	8,418	67,207
3.4 Other Assets/Liabilities	11,732	11,965	9,622	9,284	11,970	9,611	11,877	9,961
4 Reserves	294,397	–	311,482	–	289,737	–	294,812	–
5 Total Assets/ Liabilities	437,770	686,188	452,696	655,072	433,719	657,555	441,731	713,203
6 IIP (Assets - Liabilities)		–248,418		–202,376		–223,835		–271,472

No. 43: Payment System Indicators

System	Volume (Million)				Value (₹ Billion)			
	2011-12	2012			2011-12	2012		
		Sep.	Oct.	Nov.		Sep.	Oct.	Nov.
	1	2	3	4	5	6	7	8
1 RTGS	**55.04**	**5.10**	**5.83**	**5.55**	**1,079,790.59**	**90,900.45**	**92,276.40**	**56,115.59**
1.1 Customer Transactions	51.02	4.75	5.46	5.19	395,244.50	45,355.91	41,925.26	35,717.32
1.2 Interbank Transactions	4.01	0.35	0.38	0.36	144,062.97	12,641.10	12,533.53	11,057.25
1.3 Interbank Clearing	0.010	0.001	0.001	0.001	540,483.13	32,903.44	37,817.61	9,341.03
2 CCIL Operated Systems	**1.87**	**0.18**	**0.19**	**0.16**	**406,071.18**	**41,943.64**	**42,638.86**	**35,725.63**
2.1 CBLO	0.14	0.01	0.01	0.01	111,554.28	11,555.38	10,468.92	8,466.94
2.2 Govt. Securities Clearing	0.44	0.06	0.06	0.04	72,520.79	9,754.78	10,346.64	8,184.74
2.2.1 Outright	0.41	0.06	0.05	0.04	34,882.04	5,498.23	5,112.53	3,425.52
2.2.2 Repo	0.030	0.004	0.004	0.004	37,638.75	4,256.55	5,234.11	4,759.22
2.3 Forex Clearing	1.28	0.11	0.12	0.11	221,996.11	20,633.48	21,823.30	19,073.95
3 Paper Clearing	**1,341.87**	**100.79**	**118.76**	**100.31**	**99,012.14**	**7,400.99**	**8,860.42**	**7,597.50**
3.1 Cheque Truncation System (CTS)	180.03	21.14	24.55	22.34	15,103.74	1,655.09	1,863.26	1,722.05
3.2 MICR Clearing	934.88	62.96	75.93	60.99	65,093.25	4,454.67	4,976.43	4,311.65
3.2.1 RBI Centres	605.01	38.95	44.44	38.81	44,225.00	2,741.41	3,043.81	2,760.56
3.2.2 Other Centres	329.87	24.01	31.48	22.18	20,868.24	1,713.26	1,932.62	1,551.09
3.3 Non-MICR Clearing	226.95	16.69	18.29	16.98	18,815.15	1,291.23	2,020.73	1,563.80
4 Retail Electronic Clearing	**512.44**	**60.09**	**64.04**	**57.61**	**20,575.30**	**2,518.54**	**2,776.64**	**2,539.82**
4.1 ECS DR	164.74	15.74	15.02	14.98	833.55	85.61	78.64	91.39
4.2 ECS CR (includes NECS)	121.50	14.78	14.12	8.87	1,837.84	136.67	163.59	146.61
4.3 EFT/NEFT	226.11	29.50	34.84	33.71	17,903.50	2,296.08	2,534.20	2,301.55
4.4 Interbank Mobile Payment Service (IMPS)	0.10	0.06	0.05	0.05	0.42	0.18	0.21	0.26
5 Cards	**5,731.61**	**511.51**	**543.54**	**533.47**	**15,510.77**	**1,458.20**	**1,593.73**	**1,636.40**
5.1 Credit Cards	322.15	30.63	35.84	34.20	978.73	95.02	109.58	112.12
5.1.1 Usage at ATMs	2.19	0.20	0.26	0.21	12.60	1.35	1.28	1.21
5.1.2 Usage at POS	319.96	30.43	35.58	34.00	966.13	93.67	108.30	110.91
5.2 Debit Cards	5,409.46	480.88	507.70	499.27	14,532.05	1,363.18	1,484.15	1,524.28
5.2.1 Usage at ATMs	5,081.92	443.97	467.81	452.15	13,997.73	1,306.75	1,416.36	1,452.07
5.2.2 Usage at POS	327.54	36.92	39.89	47.12	534.32	56.44	67.79	72.20
6 Prepaid Payment Instruments (PPIs)	**30.60**	**5.12**	**5.70**	**6.18**	**62.01**	**7.28**	**7.22**	**8.23**
6.1 m-Wallet	–	2.23	2.68	3.13	–	0.49	0.65	0.96
6.2 PPI Cards	–	2.84	2.98	3.01	–	4.92	4.84	5.25
6.3 Paper Vouchers	–	0.04	0.04	0.04	–	1.87	1.73	2.02
7 Mobile Banking	**25.56**	**3.90**	**4.44**	**4.72**	**18.21**	**4.10**	**4.98**	**5.39**
8 Cards Outstanding	**295.94**	**320.86**	**325.37**	**328.15**	–	–	–	–
8.1 Credit Card	17.65	18.38	18.53	18.67	–	–	–	–
8.2 Debit Card	278.28	302.48	306.83	309.48	–	–	–	–
9 Number of ATMs (in actuals)	**95686**	**101646**	**102542**	**103968**	–	–	–	–
10 Number of POS (in actuals)	**660920**	**741859**	**764674**	**784642**	–	–	–	**0**
11 Grand Total (1.1+1.2+2+3+4+5+6)	**7,673.41**	**682.79**	**738.06**	**703.28**	**1,080,538.87**	**111,325.67**	**110,335.66**	**94,282.15**

Explanatory Notes to the Current Statistics

Table No. 1

1.2 & 6: Annual data are averages of months.

3.5 & 3.7: Relate to ratios of increments over financial year so far.

4.1 to 4.4, 4.8, 4.12 & 5: Relate to the last day of the month/financial year.

4.5, 4.6 & 4.7: Relate to five major banks on the last Friday of the month/financial year.

4.9 to 4.11: Relate to the last auction day of the month/financial year.

Table No. 2

2.1.2: Include paid-up capital, reserve fund and Long-Term Operations Funds.

2.2.2: Include cash, fixed deposits and short-term securities/bonds, e.g., issued by IIFC (UK).

Table No. 6

For scheduled banks, March-end data pertain to the last reporting Friday.

2.2: Exclude balances held in IMF Account No.1, RBI employees' provident fund, pension fund, gratuity and superannuation fund.

Table Nos. 7 & 11

3.1 in Table 7 and 2.4 in Table 11: Include foreign currency denominated bonds issued by IIFC (UK).

Table No. 8

NM_2 and NM_3 do not include FCNR (B) deposits.

2.4: Consist of paid-up capital and reserves.

2.5: includes other demand and time liabilities of the banking system.

Table No. 9

Financial institutions comprise EXIM Bank, SIDBI, NABARD and NHB.

L_1 and L_2 are compiled monthly and L_3 quarterly.

Wherever data are not available, the last available data have been repeated.

Table No. 17

2.1.1: Exclude reserve fund maintained by co-operative societies with State Co-operative Banks

2.1.2: Exclude borrowings from RBI, SBI, IDBI, NABARD, notified banks and State Governments.

4: Include borrowings from IDBI and NABARD.

Table No. 24

Primary Dealers (PDs) include banks undertaking PD business.

Table No. 30

Exclude private placement and offer for sale.

1: Exclude bonus shares.

2: Include cumulative convertible preference shares and equi-preference shares.

Table No. 32

Exclude investment in foreign currency denominated bonds issued by IIFC (UK). Foreign currency assets in US dollar take into account appreciation/depreciation of non-US currencies (such as Euro, Sterling and Yen) held in reserves. Foreign exchange holdings are converted into rupees at rupee-US dollar RBI holding rates.

Table No. 34

1.1.1.1.2 & 1.1.1.1.1.4: Estimates.

1.1.1.2: Estimates for latest months.

'Other capital' pertains to debt transactions between parent and subsidiaries/branches of FDI enterprises.

Data may not tally with the BoP data due to lag in reporting.

Table No. 35

1.10: Include items such as subscription to journals, maintenance of investment abroad, student loan repayments and credit card payments.

Table No. 36

Increase in indices indicates appreciation of rupee and vice versa. For 6-Currency index, base year 2010-11 is a moving one, which gets updated every year. Methodological details are available in December 2005 issue of the Bulletin.

Table No. 37

Based on applications for ECB/Foreign Currency Convertible Bonds (FCCBs) which have been allotted loan registration number during the period.

Table Nos. 38, 39, 40 & 41

Explanatory notes on these tables are available in December issue of RBI Bulletin, 2012.

Table No. 43

1.3: Pertain to multilateral net settlement batches.

3.1: Pertain to two centres - New Delhi and Chennai.

3.3: Pertain to clearing houses managed by 21 banks.

6: Available from December 2010.

7: Include IMPS transactions.

Detailed explanatory notes are available in the relevant press releases issued by RBI and other publications/releases of the Bank such as **Handbook of Statistics on the Indian Economy**.

Indicative Calendar for Bulletin Articles in 2013

No.	Articles	Release Month
1	Performance of Private Corporate Business Sector during First Half of 2012-13	**January**
2	Finances of Non-Government Non-Financial Large Public Limited Companies: 2011-12	**March**
3	Developments in India's Balance of Payments during Second Quarter (July –September) of 2012-13	
4	Order Books, Inventories and Capacity Utilisation Survey for the Quarters during October 2011 to September 2012	
5	India's Foreign Trade: April-December, 2012-13	**April**
6	Investment Portfolio of Scheduled Commercial Banks, March 2012	
7	North-East Monsoon 2012: A Review (October- December, 2012)	
8	Union Budget 2013-14: An Assessment	**June**
9	Composition and Ownership Pattern of Deposits with Scheduled Commercial Banks - March 2012	
10	Finances of Non-Government Non-Financial Public Limited Companies: 2011-12	
11	Developments in India's Balance of Payments during Third Quarter (October –December) of 2012-13	
12	Inflation Expectations Survey of Households: 2012-13	
13	International Banking Statistics for June, September and December 2012	**July**
14	International Trade in Banking Services: 2011-12	
15	India's Foreign Trade: 2012-13	
16	Industrial Outlook Survey for the Quarters during 2012-13	
17	Survey on Computer Software & Information Technology Services Exports: 2011-12	**August**
18	Corporate Investment: Growth in 2012-13 and Prospects for 2013-14	**September**
19	Developments in India's Balance of Payments during Fourth Quarter (January – March) of 2012-13	
20	India's External Debt as at the end of March 2013	
21	Consumer Confidence Survey: 2012-13	
22	Performance of Private Corporate Business Sector: 2012-13	**October**
23	Performance of Financial and Investment Companies: 2011-12	
24	Monthly Seasonal Factors of Select Economic Time Series: 2012-13	
25	India's Foreign Trade: April-June, 2013-14	
26	Housing Price Index: 2012-13	
27	Finances of Non-Government Non-Financial Private Limited Companies: 2011-12	**November**
28	Flow of Funds Accounts of the Indian Economy	**December**
29	Developments in India's Balance of Payments during First Quarter (April – June) of 2013-14	
30	India's External Debt: Trend, Policy Changes and Cross-Country Comparison	
31	Survey of Professional Forecasters: 2013-14	
32	South-West Monsoon: A Review (June- September , 2013)	

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Name of Publication	Price	
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Notes

1. Many of the above publications are available at the RBI website (www.rbi.org.in).
2. Time Series data are available at the Database on Indian Economy (http://dbie.rbi.org.in).
3. The Reserve Bank of India History 1935-1981 (3 Volumes), Challenges to Central Banking in the Context of Financial Crisis and the Regional Economy of India: Growth and Finance are available at leading book stores in India.

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