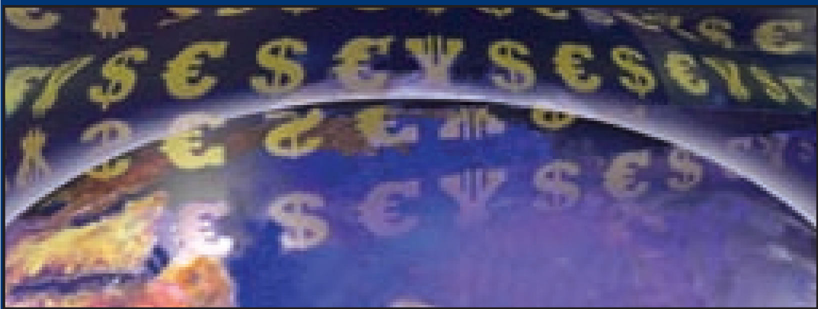
BANK OF MAURITIUS



# Financial Stability Report

February 2010 | Issue No.4

BANK OF MAURITIUS

# FINANCIAL STABILITY REPORT

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This report refers to information as at 31 December 2009, unless otherwise stated.

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# FINANCIAL STABILITY REPORT

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## List of Acronyms

| | |
|---|---|
| ASP | Additional Stimulus Package |
| BCP | Business Continuity Plan |
| FDI | Foreign Direct Investment |
| FSC | Financial Services Commission |
| GBCs | Global Business Companies |
| GDP | Gross Domestic Product |
| GFSR | Global Financial Stability Report |
| IMF | International Monetary Fund |
| IRS | Integrated Resort Scheme |
| MACSS | Mauritius Automated Clearing and Settlement System |
| MCIB | Mauritius Credit Information Bureau |
| MERI | Mauritius Effective Exchange Rate |
| MSCI | Morgan Stanley Capital International |
| MTSP | Mechanism for Transitional Support for the Private Sector |
| NBDTIs | Non-Bank Deposit Taking Institutions |
| ROE | Return on Equity |
| RTGS | Real Time Gross Settlement |
| SDRs | Special Drawing Rights |
| SEM | Stock Exchange of Mauritius |
| SIPS | Systemically Important Payment Systems |
| WAI | Weighted Average Interbank |
| WEO | World Economic Outlook |

# Overview

The global economic outlook has turned around on the back of unprecedented policy actions but the pace of recovery is uneven across different regions of the world. In its World Economic Outlook Update of January 2010, the IMF revised upwards the forecast of world output growth for 2010 to 3.9 per cent, from the earlier forecast of 3.1 per cent. Emerging and developing economies, led by the strong performance of Asian economies, are generally ahead on the road to recovery. In the developed economies, the high unemployment levels, lack of pick-up in bank lending and the growing debt burden may however cloud the sustainability of growth momentum. Concerns remain over the recovery losing momentum once the extraordinary fiscal stimulus and monetary accommodation are withdrawn. Thus, the short term debate is centered on the timing of exit strategies.

According to the IMF's Global Financial Stability Report Market Update of January 2010, market and liquidity risks have fallen and risk of systemic collapse has abated. However, balance sheets of banks need to be cleansed of troubled assets. The risks to global financial stability have declined markedly, but have not, altogether, receded. Taking forward the agenda set by the G-20, the Basel Committee on Banking Supervision, at its December meeting, announced consultative proposals to promote a more resilient banking sector.

In Mauritius, the economy grew by 2.8 per cent in 2009 and is expected to grow by 4.3 per cent, or even higher in 2010, depending on the strength of consumer confidence and spending in our main export markets. The unemployment rate for 2009 is estimated at 7.7 per cent and is expected to stabilise or even improve in 2010. The current account deficit is estimated to have narrowed in the first three quarters of 2009 as a result of an improvement in the merchandise account deficit, largely due to a sharper decline in imports compared to exports.

The Bank maintained its accommodative monetary policy stance due to uncertainties surrounding the domestic economic recovery and the global economic outlook, amidst abating inflationary pressures. Reflecting comfortable foreign exchange liquidity conditions of banks in 2009, the Bank did not intervene in the domestic foreign exchange market. However, towards the end of December 2009, the Bank offered spot-to-three months forward swap transactions to address some excess volatility in the spot domestic foreign exchange market.

Though the absence of toxic assets and complex products shielded banks from the first round effects of the crisis, the repercussions of the global downturn were felt in banks' balance sheets through a slowdown in the activities of the real sector and global business financial flows. Depositors' confidence in the banking sector remained unscathed and banks did not face the challenge of regaining lost customers. The banking sector in Mauritius continued to be profitable in the calendar year 2009, with no bank reporting a loss. Banks have thus been resilient to the effects of the global downturn and continue to remain sound. In addition, foreign-owned banks including branches and subsidiaries remained solvent both with respect to their country operations and globally. The performance of the non-bank deposit-taking institutions was also satisfactory.

The payment systems infrastructure has the capacity to meet the level of activities in the financial system. All transactions were processed immediately and none was rejected on account of system or application related faults.

# 1. International Environment

## 1.1 Global Macroeconomic Developments

The outlook for the global economy turned positive midway through the second semester of 2009 with major industrial economies having pulled out of the recession while, led by the strong performance of Asian economies, emerging and developing economies are generally further ahead on the road to recovery. The IMF, in its January 2010 World Economic Outlook Update, projected the world output to rebound by 3.9 per cent in 2010 as against the 3.1 per cent in its forecast in October 2009. However uncertainties over the pace and shape of recovery continue, largely arising from concerns about the recovery losing momentum once the extraordinary fiscal stimulus and monetary accommodation are withdrawn. The higher unemployment levels, lack of pick-up in bank lending and very high levels of fiscal deficit in the advanced countries could also cloud the sustainability of the growth momentum. Table 1.1 shows the changes in GDP growth forecasts by the IMF.

Reflecting the generally optimistic outlook for the global economy and the consequent waning of threat to financial stability, Libor-OIS spreads returned to levels that are only marginally above their pre-crisis levels, credit risks fell from their historical highs and corporate bond spread has narrowed as liquidity premia declined.

## 1.2 Global Inflation

The IMF expects global inflationary pressures to be rather subdued both because there is still high levels of slack in resource utilisation and inflation expectations are stable. Headline inflation in advanced economies is expected to rise from zero in 2009 to 1.3 per cent in 2010 largely due to higher energy prices. The emerging and developing economies are expected to experience higher inflation of 6.2 per cent in 2010, up from 5.2 per cent in 2009.

## 1.3 International Stock Markets

International stock markets continued their uptrend in the second half of 2009, to reach all year high in the last quarter of the year, after the turnaround earlier in March. Though the pace of recovery was characterised by some uncertainties,

Table 1.1: Changes in GDP Growth Forecasts

| | **GDP growth - 2009** | **GDP growth - 2010** | | **GDP growth - 2011** | |
|---|---|---|---|---|---|
| | | ***January 2010 Update Forecast*** | ***Difference from October 2009 WEO Forecast*** | ***January 2010 Update Forecast*** | ***Difference from October 2009 WEO Forecast*** |
| World output | -0.8 | 3.9 | 0.8 | 4.3 | 0.1 |
| USA | -2.5 | 2.7 | 1.2 | 2.4 | -0.4 |
| Euro Area | -3.9 | 1.0 | 0.7 | 1.6 | 0.3 |
| Japan | -5.3 | 1.7 | 0.0 | 2.2 | -0.2 |
| Advanced economies | -3.2 | 2.1 | 0.8 | 2.4 | -0.1 |
| Emerging and developing economies | 2.1 | 6.0 | 0.9 | 6.3 | 0.2 |
| Sub-Saharan Africa | 1.6 | 4.3 | 0.2 | 5.5 | 0.0 |

*Note: Growth in per cent, difference in percentage points*

*Source: IMF*

investors remained cautiously optimistic and were focused on better-than-expected earnings reports in successive quarters and the steady stream of positive macroeconomic news. Recovery of economic growth, exceptionally low interest rates and fiscal stimuli in major advanced economies were among the major drivers of the post-crisis rebound in global equity markets.

Chart 1.1: MSCI World and Emerging Markets

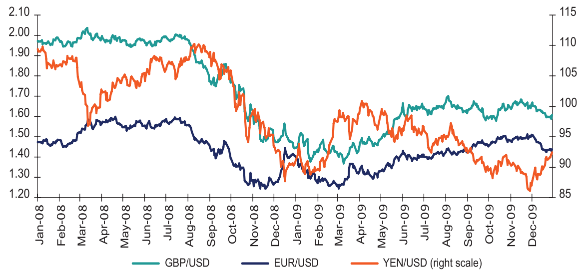

*Source: Reuters*

The MSCI Emerging Market index outperformed the MSCI World index by 38 percentage points in 2009 from their lows in March, (see Chart 1.1) on the back of resilient domestic demand, strong economic fundamentals and swift policy responses in emerging economies. However, there are concerns that the surge in stock markets has been ahead of fundamentals and this may have led to asset price bubbles in some instances. Some central banks, especially in emerging Asia, have already initiated policy responses to mitigate further increases in asset prices.

## 1.4 International Foreign Exchange Markets

In the global currency markets, the US dollar generally maintained a downward trend from July to the first week of December 2009 vis-à-vis the euro and the Japanese yen. The Federal Reserve's indications of maintaining the low interest rate environment encouraged carry trades funded in US dollars. The ballooning US budget deficit and concerns regarding its reserve currency status weighed on the US dollar. On 23 October 2009, the US dollar even breached the psychological level of USD 1.50 against the euro. In December 2009, the upbeat tone of the Fed on the US economy and increased risk aversion brought some support for the US dollar while the fiscal deficit woes of Greece impacted the euro. The Pound sterling was weighed by the dire fiscal situation and the continued weak outlook for the UK.

Chart 1.2: Evolution of Major Currencies




*Source: Reuters*

## 1.5 International Initiatives and Policy Challenges

At the Pittsburgh Summit in September 2009, the G-20 Leaders launched a Framework for Strong, Sustainable, and Balanced Growth. The Financial Stability Board has been requested by the G-20 Leaders to drive forward and co-ordinate implementation of the action plan to strengthen the financial system. New rules on compensation frameworks provide for a good part of compensation being variable and dependent on performance, but with payment deferred for at least three years, with a claw-back clause in the event of unsatisfactory performance by the bank or the executive.

Taking forward the agenda set by the G-20, the Basel Committee on Banking Supervision, at its December 2009 meeting, announced consultative proposals to promote a more resilient banking sector. The new rules will raise the quality, consistency and transparency of the capital base and introduce stricter limits on risk exposure from trading in derivatives and securities. Proposals include the introduction of a leverage ratio as a supplementary measure to the Basel II risk-based framework as well as measures to promote the build-up of capital buffers in good times that can be drawn upon in periods of stress. The introduction of a global minimum liquidity standard for internationally active banks that includes a 30-day liquidity coverage ratio requirement underpinned by a longer term structural liquidity ratio is also being considered. The Committee is also reviewing the need for additional capital, liquidity or other supervisory measures to reduce the externalities created by systemically important institutions. The proposals will be implemented by end-2012 after a thorough analysis of the impact assessment and comments on the consultative documents.

## 1.6 Risks to Global Financial Stability

The risks to global financial stability have declined markedly on the back of economic recovery, but have not altogether receded as economic conditions remained fragile. A key issue is whether economic recovery can be sustained once the effects of monetary and fiscal stimulus start to decline around the world. Further, according to the Global Financial Stability Report Market Update of January 2010 of the IMF, notwithstanding positive earnings, banks' capital levels would be weighed down by write-downs, which call for urgent actions to increase bank capital and cleanse troubled assets from banks balance sheets.

There are concerns that the recent rebound in financial markets has been driven more by sentiment and greater liquidity than economic fundamentals. Asset prices could be highly sensitive to the eventual reversal of the accommodative policies, potentially triggering another wave in the confidence crisis. The timing of exit strategy particularly in the advanced economies could therefore be critical to the sustainability of the global recovery. The IMF has also underscored the need to step up efforts directed at reforming the regulatory environment to significantly reduce the probability of a recurrence of a systemic crisis.

# 2. Domestic Environment

## 2.1 Macroeconomic Risks to Financial Stability

### 2.1.1 Growth Outlook and Risks

After reaching a trough of 1.6 per cent in the first quarter of 2009, growth picked up to 2.3 per cent and further to 3.8 per cent in the second and third quarters, respectively. The textile and tourism sectors, being dependent on external demand, were hardest hit, registering six and four consecutive quarters of negative growth, respectively. The 'construction' and the 'wholesale and retail trade' sectors contracted in two successive quarters but rebounded in the third quarter of 2009 with growth of 8.4 per cent and 2.1 per cent, respectively. The 'agriculture', 'real estate, renting and business activities', 'transport, storage and communications' and the 'financial intermediation' sectors maintained their resilience to the effects of the global economic crisis.

The fiscal stimulus and the easing of the monetary policy stance were seen to have supported consumer and business confidence. Growth is estimated to have accelerated significantly in the last quarter of 2009. Amid the gradually improving world economic outlook, growth is forecast to increase from 2.8 per cent in 2009 to 4.3 per cent, or even higher in 2010, depending on the strength of consumer confidence and spending in our main export markets.

The growth outlook of the Mauritian economy remains conditional to some extent on macroeconomic developments in our main export markets. Among the external risk factors, the still fragile economic conditions in the United Kingdom and the Euro Area are persistent. As for domestic factors, delays in implementation of public infrastructural projects could restrict growth below trend levels.

### 2.1.2 Inflation Risks and Monetary Policy

The Bank maintained its accommodative monetary policy stance due to uncertainties surrounding the domestic economic recovery and the global economic outlook, amidst abating inflationary pressures. Though the risks to inflation remain benign in the short-term, potential risks could arise from the future evolution of oil and food prices in international markets as the global recovery gathers momentum and from delayed implementation of exit strategies. Looking ahead, monetary policy is likely to remain focused on promoting sustainable growth and low inflation.

### 2.1.3 Risks from the Labour Market

The seasonally adjusted unemployment rate in the third quarter of 2009 stood at 7.7 per cent, slightly higher compared to 7.5 per cent in the corresponding quarter of the previous year. An analysis of net change in total employment by sectors shows that, between the third quarter of 2008 and third quarter of 2009, job losses were concentrated in the textile sector and to a much lesser extent in the hotels and restaurants sector, while the distributive trade and transport and communications sectors created additional employment. The Stimulus Package put in place by Government is perceived to have contributed to curbing job losses, which otherwise, would have been more widespread, given the impact of the crisis.

The unemployment rate for 2009 is estimated at 7.7 per cent, up from 7.2 per cent in 2008. Looking ahead, the labour market is expected to stabilise or even improve in 2010, in the wake of the projected pick-up in economic activity in key employment sectors. Recent developments in the labour market indicate that potential risks to financial stability are not a cause for concern.

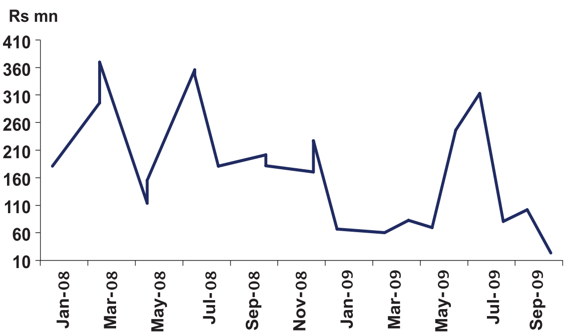
### 2.1.4 Risks from the External Sector

The current account deficit is estimated to have narrowed to 8.0 per cent of GDP in the first three quarters of 2009, compared to 10.9 per cent in the corresponding period of 2008. The decline in the current account deficit was driven by an improvement in the merchandise account deficit, largely due to a sharper decline in imports compared to exports.

The capital and financial account recorded net inflows of Rs 7,874 million in the first three quarters of 2009, significantly lower than the inflows of Rs 19,576 million in the corresponding period of 2008, mainly owing to a drop in the flows from other investment. Foreign direct investment net inflows, estimated at Rs 5,203 million, have shown some resilience to the economic downturn. However, foreign investment in Integrated Resort Scheme (IRS) projects has slowed down to Rs 1,044 million, compared to Rs 2,199 million in the first three quarters of 2008. Portfolio investment registered lower net outflows of Rs 2,243 million compared to net outflows of Rs 3,174 million during the first three quarters of 2008.

Chart 2.1 below shows the evolution of foreign direct investment in the IRS sector for the period January 2008 to September 2009.

Chart 2.1: Foreign Direct Investment in IRS



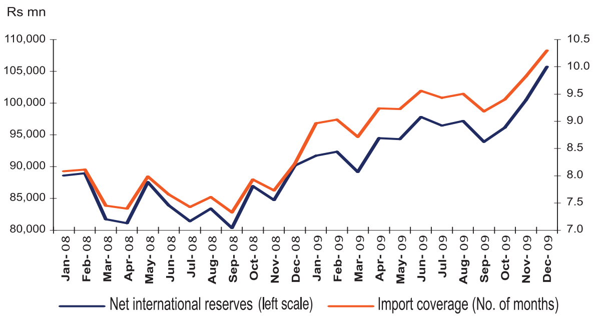

The overall balance of payments for the first three quarters of 2009, excluding valuation changes, recorded a higher surplus of Rs 7,974 million compared to Rs 7,063 million registered during the first three quarters of 2008. However, this higher surplus includes the SDR allocations to Mauritius in August 2009.

The merchandise trade deficit is forecast to worsen as the nominal imports growth is projected to outpace export growth. As for the current account deficit, it is estimated to deteriorate further in 2010.

Looking forward, the implications of the larger current account deficit on foreign exchange liquidity and exchange rate would be mitigated by FDI and other capital inflows. Though the external debt to GDP ratio has increased lately, it is still at levels considered relatively low and is not a cause for concern at present. Net investment by foreign investors on the domestic stock market was negative for the year 2009 amounting to Rs 1,087 million. Given the share of foreign investors in the stock market activity being relatively high, their behaviour has some potential impact on exchange rate movements.

The level of net international reserves of the country, which represented more than 10 months of imports at the end of December 2009, is strong enough to allow the country to resist external shocks. From a medium-term perspective, however, the structural current account deficit, mirroring the low saving rate, implies dependence on foreign capital flows and vulnerability to foreign investors' market sentiment. Chart 2.2 shows the evolution of the monthly level of net international reserves for the period January 2008 through December 2009.

Chart 2.2: Monthly Level of Net International Reserves




### 2.1.5 Risks from the Fiscal Sector

The overall budget deficit is estimated at 3.4 per cent of GDP for the six months ended December 2009, as against the initial estimate of 4.8 per cent. This better-than-expected performance was mainly attributed to relatively buoyant revenue despite slower domestic economic activity. According to the Programme-Based Budget Estimates 2010, the budget deficit to GDP ratio is forecast at 4.5 per cent in 2010, with the Additional Stimulus Package lasting until December 2010, but is projected to decline to 3.9 per cent and 3.0 per cent in 2011 and 2012, respectively, reflecting increased efforts towards fiscal consolidation.

Public sector debt, which consists of general government debt and debt of public enterprises, is estimated at 60.0 per cent of GDP as at end-December 2009, up from 58.7 per cent as at end-June 2009 but is projected to come down to 58.7 per cent at the end of December 2010. Total external debt as a percentage of GDP went up from 9.9 per cent as at end-June 2009 to 12.3 per cent as at end-December 2009 and is estimated to reach 13.2 per cent as at end-December 2010, reflecting increased recourse by Government to foreign borrowing to finance its budget deficit. The share of fixed, floating and interest-free debts stood at 50.1 per cent, 44.8 per cent and 5.1 per cent of external debt, respectively, as at end-December 2009.

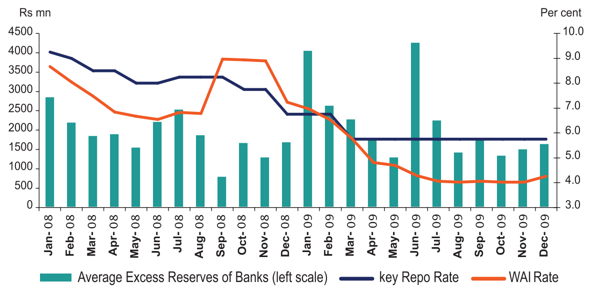
Thus, sustainability of public debt has not been jeopardised in the face of the economic downturn. Lately, the maturity profile of domestic public debt has lengthened somewhat, with the share of short-term obligations in total government domestic debt declining from 33.3 per cent as at end-June 2008 to 31.3 per cent as at end-December 2009, thus mitigating interest rate and roll-over risks. In sum, government finances do not seem to pose risks to financial stability in the short to medium term.

## 2.2 Developments in the Domestic Financial Markets

### 2.2.1 Domestic Money Market

While liquidity in international markets showed some signs of improvement in 2009, excess liquidity conditions prevailed in the domestic banking system throughout 2009. Banks' average excess reserves stood at Rs 1,653 million in the second semester of 2009 as compared to Rs 2,703 million in the first six months of 2009, partly due to the net issue of government securities. The interbank money market continued to function normally with interbank transactions totalling Rs 95,114 million from July to December 2009, up from Rs 74,515 million in the first semester of 2009 (Chart 2.3).

Chart 2.3: Banks' Excess Reserves, key Repo Rate and Weighted Average Interbank Rates




To minimise risks of disruption that the level of excess liquidity may have on money market rates, the Bank accepted Special Deposits in September and December 2009 to absorb Rs 2,485 million from the system.

### 2.2.2 Domestic Foreign Exchange Market

Reflecting comfortable foreign exchange liquidity conditions of banks in 2009, the Bank did not intervene in the domestic foreign exchange market. As such, our exchange rate arrangement was upgraded by the IMF from a managed-float regime with no pre-determined exchange rate path to a free-float effective February 2009, applicable in retrospect. As at end-December 2009, only an amount of USD 8.0 million of the Special Foreign Currency Line of Credit was outstanding against the aggregate limit of USD 125 million.

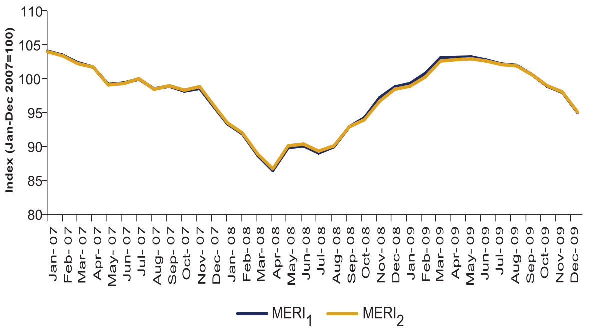
Banks' foreign exchange position averaged USD 69.0 million in the second semester of 2009 compared to an average of USD 77.9 million in the first semester. Activity in the interbank foreign exchange market was buoyant, with transactions totalling USD 189.6 million in the second semester of 2009 compared to USD 68.4 million in the first semester.

However, towards end-2009, some excess volatility emerged in the spot domestic foreign exchange market as a result of reduced supply due to exporters holding to their export proceeds. The Bank felt it necessary to create conditions for the orderly functioning of the market and offered spot-to-three months forward swap transactions in US dollars, euro and Pound sterling for a minimum deal size of USD 1.0 million or equivalent for a targeted amount of USD 100.0

million. In February 2010, the Bank offered to cover for shorter maturity swaps as this will deepen the domestic foreign exchange market and provide liquidity.

The evolution of the rupee in the domestic foreign exchange market was driven by the interplay of local and international factors. During the period July to December 2009, the weighted average dealt selling rates of the rupee against Pound sterling, US dollar and the euro appreciated by 10.30, 5.69 and 3.23 per cent, respectively.

Chart 2.4: Movements of $MERI_1$ and $MERI_2$

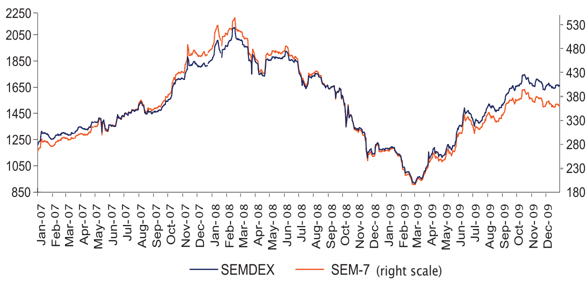



The general tendency of the exchange rate of the rupee vis-à-vis major trading currencies is captured by $MERI_1$ and $MERI_2$. Both $MERI_1$ and $MERI_2$ have been on an appreciating trend in the second half of 2009. $MERI_1$, which has currency distribution of trade as weights, appreciated by 7.52 per cent while $MERI_2$ which has currency distribution of tourism receipts and trade combined as weights, appreciated by 7.38 per cent over the same period (Chart 2.4).

### 2.2.3 Domestic Stock Market

Both SEMDEX and SEM-7 trended upwards in 2009 since the turnaround observed in March and their movements were highly correlated with those in global equity markets. Improved investor risk appetite was mirrored in the movement of the local stock market (Chart 2.5). Though earnings reports by local firms were quite mixed in 2009, the SEMDEX remained on the upbeat with some volatility, especially towards the end of the year. Between 03 March 2009, when it reached its lowest level and end-December 2009, the SEMDEX increased by 80.6 per cent while the SEM-7 went up by 83.8 per cent compared to a rise of 107.8 per cent in the MSCI Emerging Market index. Over the same period, the share prices of banks, on average increased by 81.8 per cent while those of hotels gained 117.1 per cent. However, there may be concerns that share prices may have risen too fast for the tourism sector given that low visibility prevailed until recently.

Chart 2.5: Evolution of SEMDEX and SEM-7




Looking ahead, the local stock market would continue to be influenced by movements in global equity markets and overall economic activity in the domestic economy.

# 3. Financial Sector

## 3.1 Banking Sector

The banking sector is the most important component of the financial sector in Mauritius and at end-December 2009, it comprised 18 banks engaged largely in conventional commercial banking activities. A full fledged Islamic bank has been licensed but is yet to commence operations. Banks remain the main source of funds for real sector operators and the economy at large. The linkages which exist between the real sector and banks are bi-directional and have key implications for financial system stability.

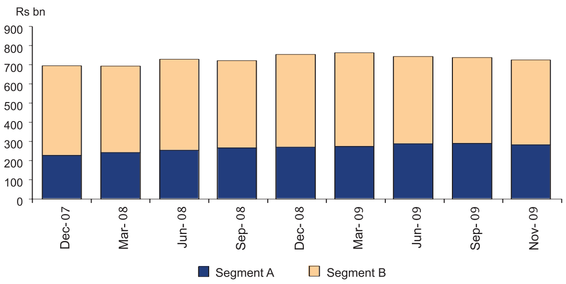
Although the unified licensing system is in place, the general pattern observed is that domestic banks have a larger proportion of their assets in Segment A while foreign-owned banks have a larger proportion of Segment B[1] assets. The sources of vulnerabilities for the domestic and international financial services of banks are different as the extent of influence of local and external economic conditions vary on these two lines of business. With Segment A and Segment B assets representing 39 per cent and 61 per cent, respectively, in total banking sector's assets as at end-November 2009, a segmental analysis of the various facets of the banking sector's functions is important from a financial stability point of view.

The absence of toxic assets and complex products insulated banks from the first round effects of the crisis. However, the repercussions of the global downturn were felt in banks' balance sheets through a slowdown of the real sector and global business financial flows. It is noteworthy that banks in Mauritius have been resilient to the effects of the global downturn and continue to remain profitable besides being well capitalised. In addition, foreign-owned banks including branches and subsidiaries remained solvent both with respect to their country operations and globally.

### 3.1.1 Total Assets and Deposits

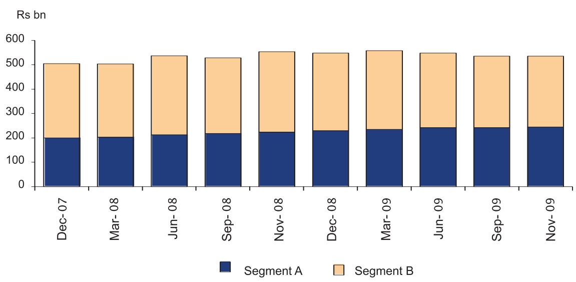
After several years of sustained expansion, banking activities contracted in 2009 mainly as a result of a decline in Segment B activities in the wake of adverse global conditions. Over the 11 months to November 2009, Segment B assets declined by 8.5 per cent compared to an expansion of 5.6 per cent in the corresponding period of 2008 while Segment A assets grew at a slower rate of 4.4 per cent compared to 16.2 per cent in the first 11 months of 2008.

Chart 3.1: Total Assets in the Banking Sector




Depositors' confidence in the banking sector remained unscathed. Consequently, banks in Mauritius did not face the challenge of regaining lost customers. However, deposits grew at a slower pace in the first 11 months of 2009 compared to 2008. It is important to note that Segment A deposits recorded positive albeit lower growth rate than in 2008 while Segment B deposits declined by 8.8 per cent against a positive growth of around the same rate a year earlier.

Chart 3.2: Total Deposits in the Banking Sector




***Domestically-owned/Foreign-owned Banks***

Segment A and Segment B assets represented 77 per cent and 23 per cent, respectively, in total assets of domestically-owned banks at end-November 2009.

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[1] *Segment B activity relates to provision of international financial services that give rise to foreign source income. Segment A activity refers to all banking activities other than Segment B activities.*

Growth in the assets of domestically-owned banks slowed to 8.9 per cent for the period January to November 2009 compared to a growth of 15.9 per cent in the corresponding period of 2008. Growth rate of deposits decelerated from 21.1 per cent to 10.1 per cent over these two periods.

Foreign-owned banks' Segment B assets represented 80 per cent of their total assets as at end-November 2009. Total assets rose by 6.5 per cent for the period January to November 2008 but a contraction of 9.1 per cent was observed over the first 11 months of 2009 due to higher exposure to countries affected by the global crisis.

Deposits held by foreign-owned banks declined by 7.9 per cent in the first 11 months of 2009 against an increase of 4.7 per cent over the corresponding period of last year.

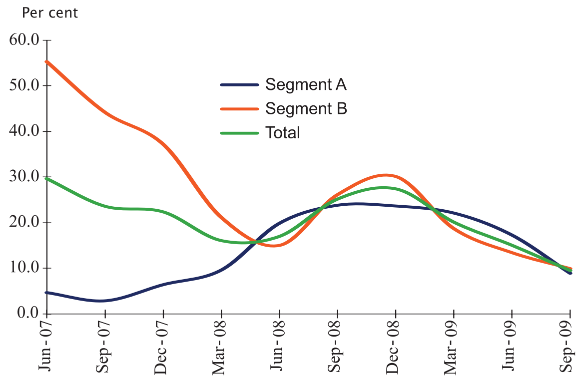
The reduced growth rate or contraction of the key components of banks' balance sheets impacted on profits in 2009. However, despite a moderate deterioration in their performance, no bank has posted loss in 2009.

### 3.1.2 Credit Risk

Lending activities of banks warrant close supervisory attention as poor credit quality may have adverse consequences on the soundness and stability of the banking sector. Credit risks are the most prominent risks faced by the banking system and assume even greater importance in periods of global financial instability. With banks holding the major share in the financial sector's assets in Mauritius and acting as the main providers of market funding, their exposure to credit risk is particularly significant.

The economic downturn has affected the growth of banks' loan portfolio as banking sector credit declined by 2.9 per cent over the period November 2008 to November 2009 against a growth of 26.2 per cent in the corresponding period a year earlier. The marked decline was driven by a 7.8 per cent fall in advances granted to customers operating under Segment B, who are more exposed to global economic conditions. On the other hand, credit under Segment A grew by 4.4 per cent from November 2008 to November 2009 against a 25.4 per cent growth a year earlier. As at end-November 2009, credit under Segment A and Segment B constituted 42.9 and 57.1 per cent, respectively, of total banking sector credit. The year-on-year growth of advances under both segments A and B is depicted in Chart 3.3 below.

Chart 3.3: Year-on-Year Growth of Advances




Total credit to the private sector grew by 4.3 per cent from November 2008 to November 2009 compared to a growth of 24.3 per cent in the corresponding period a year ago. Although the system was relatively liquid throughout 2009, credit growth to private sector decelerated, mainly due to pessimism in certain key sectors which led to lower demand for credit. On a positive note, the successive cuts in the key Repo Rate did not result in a surge in credit uptake, warding off risks of potential delinquencies in the event of a rise in cost of funds, in future.

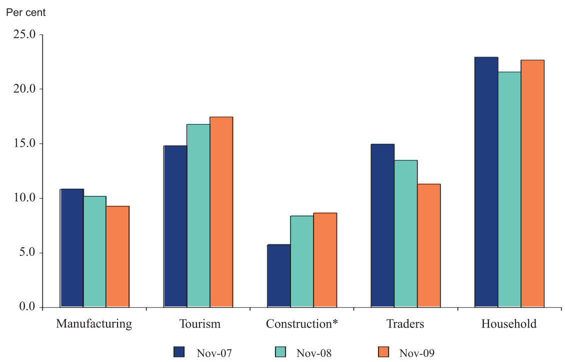
***Sectorwise Distribution of Credit***

Sectoral concentration of credit exposes banks to higher credit risk. The credit portfolio of banks in Mauritius is fairly well diversified across different sectors. However, four sectors, namely households, tourism, traders and manufacturing, in aggregate accounted more than 50 per cent of total private sector credit as at November 2009.

Over the past quarters, sectoral distribution of credit has witnessed some changes to reflect the slowdown in the economic activity in the country. For instance, the share of credit extended to the manufacturing sector and traders in total private sector credit in Mauritius was lower at end-November 2009 than it was at end-November 2008. The share of credit to the construction sector (excluding housing loans) in total private sector credit at end-November 2009 remained more or less at the level of end-November 2008 as the surge in real estate activities witnessed previously receded due to the somewhat subdued sentiment arising from the uncertain economic environment.

However, the share of credit to operators in the tourism sector in total private sector credit increased during the above period despite the lower activities in that sector after the outbreak of the crisis and poor visibility that prevailed until recently. Chart 3.4 depicts the sectoral distribution of credit over the past three years.

Chart 3.4: Sectorwise Distribution of Credit




* *excluding housing loans which are included in household sector*

*Note: Percentage of total credit to the private sector in Mauritius*

### *Household Indebtedness*

Household indebtedness is generally a cause for concern for financial stability as declining economic growth rates often weaken the debt-servicing ability of households and contribute to increased credit risks and have adverse repercussions on banks' loan portfolios and asset quality.

At the end of November 2009, advances to households in Mauritius, proxied by credit to the housing and personal sectors, represented the highest share in total credit to the private sector and stood at almost 22 per cent. As the global crisis unfolded, household demand for credit moderated due to heightened uncertainties despite low interest rates. Credit to the sector grew by 9.7 per cent during the year ended November 2009, down from 16.9 per cent of the previous period. Risks contained in housing loans are significantly mitigated as such loans are fully secured by mortgage. On the other hand, personal loans are usually granted for consumption purposes and carry higher risks as they are generally unsecured in nature. The share of housing loans in total household debts from banks has increased from 54.3 per cent in November 2008 to 56.1 per cent in November 2009 indicating that, on an incremental basis, exposure of banks to risks associated with credit to households has declined.

### *Non-Performing Loans*

The size of non-performing loans (NPLs) is important as it reflects the quality of credit portfolio of banks and consequently impact on their cash flows, net income and solvency. The consolidated banking sector NPL ratio edged up from 2.1 per cent at end-December 2008 to 2.5 per cent at end-September 2009, pointing to global crisis induced delinquencies. These levels are, *per se*, not alarming. The slight increase in the consolidated NPL ratio has been driven by relatively higher NPLs in credit extended in Mauritius. Table 3.1 depicts the NPL levels over the past few years.

Table 3.1: Non-Performing Loans

| | Non-performing loans as a percentage to credit extended in Mauritius | Non-performing loans as a percentage to credit extended outside Mauritius | Total non-performing loans as a percentage to total loans by the banking sector |
|---|---|---|---|
| Dec-07 | 4.4 | 0.2 | 2.2 |
| Mar-08 | 4.7 | 0.1 | 2.2 |
| Jun-08 | 4.4 | 0.6 | 2.4 |
| Sep-08 | 4.0 | 0.5 | 2.1 |
| Dec-08 | 3.8 | 0.6 | 2.1 |
| Mar-09 | 4.0 | 0.9 | 2.4 |
| Jun-09 | 4.0 | 0.9 | 2.4 |
| Sep-09 | 4.5 | 0.7 | 2.5 |

### *Non-Performing Loans by sectors*

Defaults in some sectoral exposures have grown since the last issue of the Financial Stability Report, reflecting the relative higher susceptibility of some sectors like the manufacturing and construction sectors, to the global economic environment.

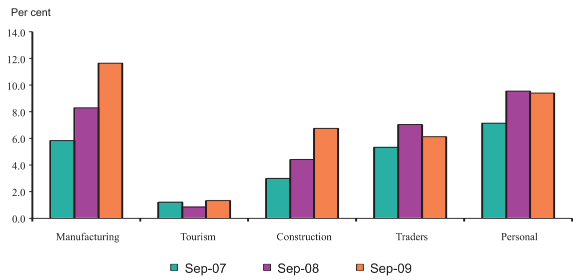
Despite the contraction of activities in the tourism sector over the past four quarters, the debt servicing capacity of operators in that sector was not significantly affected indicating higher resilience. As a result, NPL ratio in the tourism sector was relatively low compared to other sectors and stood at 1.3 per cent at end-September 2009.

Charts 3.5 and 3.6 illustrate the share of sectoral NPLs in the banking sector's NPLs and in credit to the respective sectors, at end-September 2007, 2008 and 2009.

The more optimistic outlook for the global and domestic economy should stave off further rise in NPLs.

Chart 3.5: Sectoral NPL as a Ratio to Total NPL

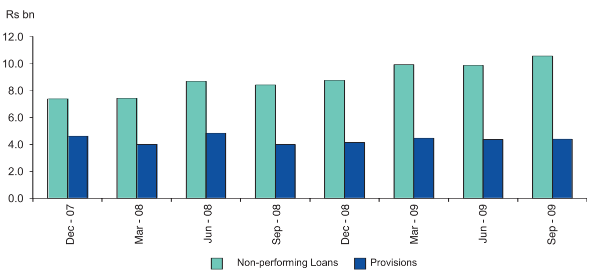

Chart 3.6: Sectoral NPL as a Ratio to Loans to the Respective Sectors




### *Non-Performing Loans and Provisions*

Although the level of the NPLs was on a rising trend as from December 2008, specific provisions did not increase in the same proportion, lowering the provisioning coverage from 47.6 per cent to 41.5 per cent from end-September 2008 to end-September 2009. The trend of banking sector non-performing loans and specific provisions, for the period December 2007 to September 2009, is provided in Chart 3.7 below.

Chart 3.7: Non-Performing Loans and Provisions




### *Concentration of Credit*

Credit concentration risk arises when large exposures are high. To deter banks from taking excessive credit concentration risks, the Bank has tightened its approach to regulation in that area while, at the same time closely monitoring such exposures. The revised Guideline on Credit Concentration Risk proscribes banks from taking additional exposures which may cause them to exceed the regulatory credit concentration limits. Furthermore, in case of breach of limits, the concerned banks may even be required to keep additional capital, as may be determined by the Bank.

The aggregate large exposures of the banking sector in 2009, as a percentage to the capital base and total credit facilities, are given in Table 3.2

Table 3.2: Large Exposures as a Percentage of Capital Base and Total Credit Facilities

| | Percentage of aggregate large exposures to capital base | Percentage of aggregate large exposures to total credit facilities |
|---|---|---|
| | *(per cent)* | *(per cent)* |
| Mar-09 | 211 | 26 |
| Jun-09 | 209 | 31 |
| Sep-09 | 212 | 28 |

Although the ratio of large exposures to capital base is low on a macro level compared to the threshold of 800 per cent, credit concentration risk can be a cause of concern given the small number of large conglomerates in Mauritius which avail of credit facilities across the banking sector. This warrants a more macroprudential approach to supervision to better capture the vulnerability of the banking system as a result of such exposures.

### *Cross-Border Exposures*

The downturn in several economies, as a result of the global turbulence, has highlighted the importance of country risks, which are amplified in times of economic crisis. Banks in Mauritius grant a significant portion of loans to borrowers outside Mauritius and, credit risk inherent in those exposures are accentuated by country risk.

Although the exposure of banks to the hard-hit areas is insignificant, the Bank sensing the need for a structured framework to measure, manage and mitigate this risk, has issued a draft Guideline on Country Risk Management for consultation.

The cross border exposures of banks show a bias towards Asian and Middle East economies which accounted for 70.7 per cent of total cross border loans at end-September 2009 compared to 71.5 per cent at end-December 2008. The geographical distribution of these loans is given in the Table 3.3 below.

Table 3.3: Cross-Border Exposures

| Region | December 2008 | | September 2009 | |
|---|---|---|---|---|
| | Percentage of total cross border loans | Percentage of impaired loans* | Percentage of total cross border loans | Percentage of impaired loans* |
| Africa | 7.3 | 7.4 | 5.6 | 10.0 |
| Asia | 63.7 | 0.1 | 68.4 | 0.1 |
| Australia | 0.2 | 0.2 | 0.3 | 0.2 |
| Europe | 13.8 | 0.2 | 14.4 | 1.1 |
| Middle East | 7.8 | - | 2.3 | - |
| USA and Canada | 0.6 | | 0.6 | |
| Others | 6.6 | 0.0 | 8.5 | 0.1 |

**Ratio of impaired loans by region to total loans granted to borrowers in that region*

### 3.1.3 Liquidity Risk

The liquidity crunch in major markets contributed to amplify the global crisis and emphasised the important relationship between liquidity and financial stability. Liquidity is therefore vital for the proper functioning of financial markets and the banking sector. In Mauritius, a series of liquidity management principles is embedded in the Guideline on Liquidity Risk Management, which has recently been reviewed to include the recommendations made by the Basel Committee on Banking Supervision in its paper issued in April 2009.

Banks in Mauritius generally adopt a prudent approach to managing liquidity risk. Although there is no central bank prescribed liquidity ratio, on average, banks' credit-deposit ratio ranged between 73.0 and 79.9 per cent over the period January to November 2009. Moreover, the percentage of liquid assets in banks' total assets remained at comfortable levels and on average ranged from 36.1 to 40.8 per cent during this period while the ratio of liquid assets to total deposits ranged between 49.4 and 55.8 per cent. The trend in credit to deposit ratio and liquid assets ratios is depicted in Chart 3.8 and 3.9.

Chart 3.8: Credit to Deposit Ratio for the Year 2009

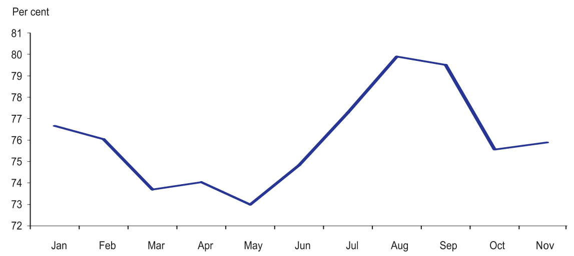
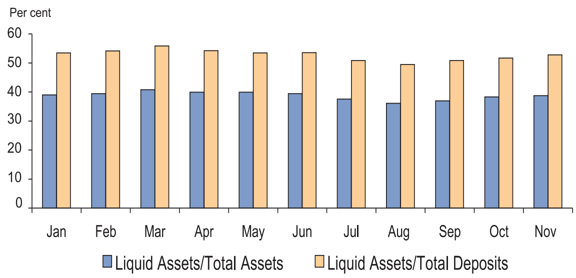


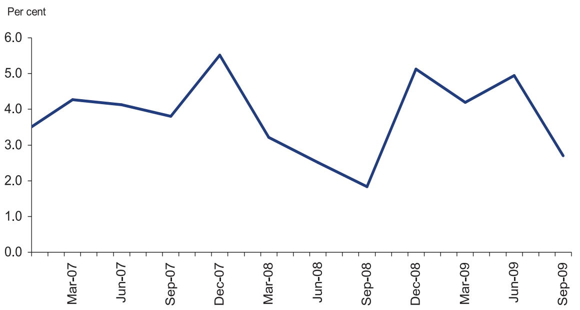

Chart 3.9: Liquid Assets Ratio for the Year 2009




### 3.1.4 Market Risk

Market risks, if not properly assessed and mitigated through adequate capital buffers, can threaten the soundness and stability of banks. Banks operating in Mauritius are faced with market risk arising from exchange rate and interest rate movements. The trading book of banks account for only two per cent of total assets and therefore market risk arising from this segment of activity is limited. Within those assets, 65 per cent bear foreign exchange risk while the remaining generates interest rate risk. Exposures to assets bearing commodity and equity risks are minimal. Because of these facts, the Bank has not prescribed additional regulatory capital for market risk while exchange rate risk is part of the risk-weighted assets. Banks' open foreign exchange positions as a ratio to Tier 1 capital was well below the prudential limit of 30 per cent throughout the last six months, indicating prudential management of their foreign exchange risk.

Chart 3.10: Ratio of Open Foreign Exchange Position to Tier 1 Capital




Interest rate risks in the banking book are also being captured in the form of impact of an interest rate shock of 200 basis points, spread over a time horizon of one year, as per the Basel Capital Accord. The repricing risk of banks was marginal. Overall, the banking sector is not largely exposed to vulnerabilities arising from market risks.

### 3.1.5 Financial Position of Banks

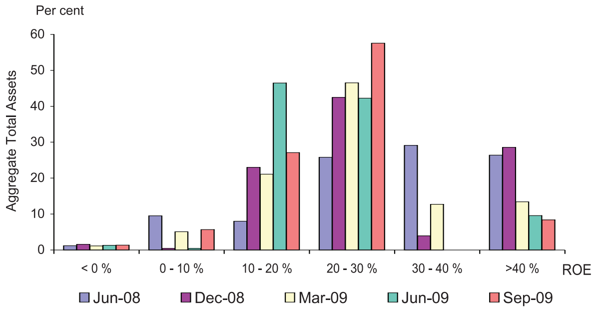
The banking sector in Mauritius continued to be profitable in the calendar year 2009 with no bank reporting a loss. However, the global and domestic economic factors had a bearing on the earnings of the banking sector.

The annualised pre-tax profit of banks fell by 5.9 per cent and 5.2 per cent in the first and second quarters of 2009, respectively, over the level achieved in the last quarter of 2008. This was mainly driven by a fall in pre-tax profit of the subsidiaries of foreign-owned banks caused by a contraction in their global business operations and the appreciation of the local currency vis-à-vis their reporting currencies. However, a slight pick up was noted in banks' profits in the third quarter of 2009 mainly as a result of an exceptional increase in the trading income of some foreign-owned banks. The continued profitable operations of banks despite the stress caused by the global economic crisis are a testimony to the soundness of their balance sheets.

***Rate of Return on Equity***

During 2009, the annualised return on equity (ROE) (using pre-tax profit and shareholders' equity) for the banking sector declined marginally in the first two quarters but rose from 21.1 per cent in the second quarter to 22.2 per cent in the third quarter. The median annualised ROE of the banking sector stood at 14.4 per cent in the third quarter of 2009 compared to 14.2 per cent and 14.5 per cent in the first and second quarters of 2009 thereby indicating that a large number of banks had a comfortable ROE. The trend of ROE as analysed in terms of share of assets held by banks across different ROE ranges indicates the general robustness of earnings. Chart 3.11 shows the distribution of ROE by total assets of banking sector.

Chart 3.11: Dispersion of Banks' Total Assets by ROE

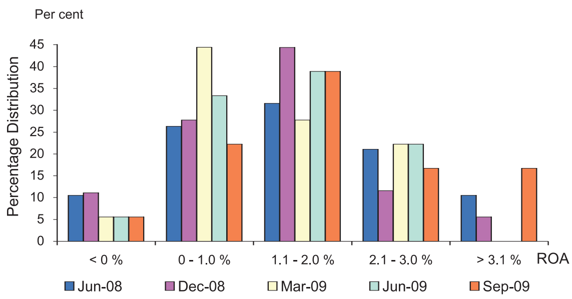



It is seen that in the second quarter of 2009, the share of assets held by banks in the highest ROE range declined indicating a migration of banks to lower ROE.

***Return on Assets and Leverage***

An analysis of the ROA rangewise distribution of assets of the banking sector is an important indicator of the level of efficiency of the sector. A large concentration of assets in a higher ROA bracket points to greater efficiency. Chart 3.12 shows the dispersion of banks' ROA.

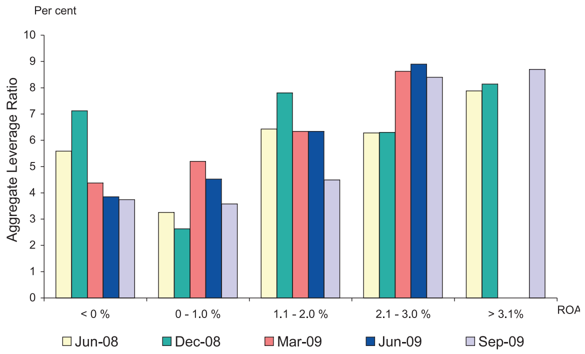
Chart 3.12: Dispersion of Banks' ROA




In the third quarter of 2009, 72.3 per cent of assets in the banking sector generated a ROA of more than one per cent compared to the second quarter during which only 61.1 percent of assets generated that level of ROA. The median ROA of banks improved to 1.4 per cent in the third quarter of 2009 compared to 1.1 per cent and 1.0 per cent in the first and second quarters, respectively. This indicates an improvement in efficiency in the sector.

Leverage, has in general improved over the years as banks in Mauritius, on average, maintained a reasonable percentage of their capital base in Tier 1 to sustain their exposures. In the context of the profitability of banks, the leverage ratio provides an insight into the ability of banks to utilise their regulatory capital efficiently.

Chart 3.13 Dispersion of Banks' Leverage by ROA




As at September 2009, the aggregate leverage ratio of those banks earning a ROA of more than 2.0 per cent stood above the five per cent threshold, considered to be a reasonable norm. On the whole, these banks were making profitable use of their resources.

### *Capital Base of Banks*

The domestic banking sector remained well capitalised over the year September 2008-2009. The capital adequacy ratio increased from 14.7 per cent to 15.3 per cent over this period. Table 3.4 shows the capital position of the banking sector over September 2008 to September 2009.

Tier 1 capital is a core measure of a bank's financial strength as it reflects the loss absorption capacity of the bank. It is mainly made up of stated capital, statutory reserves and retained earnings. It also gives an indication of the leverage ratio. In Mauritius, the Tier 1 capital of banks registered a marked improvement of 16.9 per cent from September 2008 to September 2009, impacting positively on both the core capital ratio and the capital adequacy ratio which went up from 13.5 per cent to 13.6 per cent and from 14.7

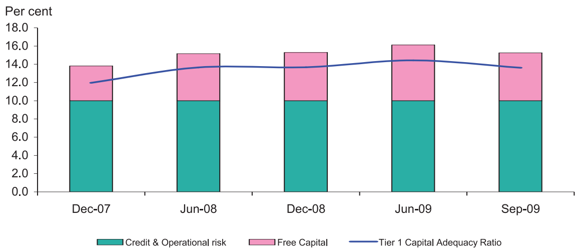
Table 3.4: Capital Base of Banks

| | Rs million | | | Percentage change | |
|---|---|---|---|---|---|
| | Sep-08 | Jun-09 | Sep-09 | Sep 09 vis-à-vis Sep 08 | Sep 09 vis-à-vis Jun 09 |
| Tier 1 (Core) capital | 41,153 | 51,863 | 48,099 | 16.9% | -7.3% |
| Tier 2 capital | 7,708 | 9,955 | 9,629 | 24.9% | -3.3% |
| **Capital Base (net)** | **45,035** | **57,911** | **53,860** | **19.6%** | **-7.0%** |
| Total risk-weighted assets | 305,945 | 359,541 | 353,272 | 15.5% | -1.7% |
| Consolidated adjusted total on balance sheet assets* | 722,870 | 742,472 | 737,614 | 2.0% | -0.7% |
| Consolidated Equity (capital & reserves) | 47 720 | 56,403 | 55,325 | 15.9% | -1.9% |
| ***Ratios*** | | | | | |
| Tier 1 capital ratio | 13.5% | 14.4% | 13.6% | | |
| Capital Adequacy ratio | 14.7% | 16.1% | 15.3% | | |
| Leverage ratio** | 5.7% | 7.0% | 6.5% | | |
| NPL/Total loans | 2.2% | 2.4% | 2.4% | | |

* *adjusted total assets is equal to total assets net of intangible assets, goodwill and deferred tax assets*

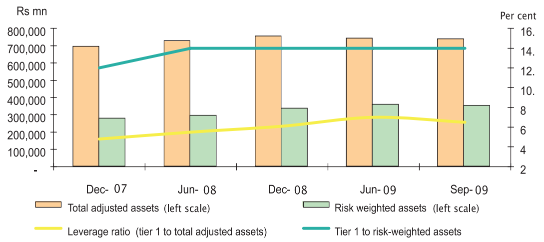
** *tier 1 capital as a percentage of total adjusted assets* per cent to 15.3 per cent, respectively. Chart 3.14 highlights the evolution in the capital ratios over December 2007 to September 2009.

Chart 3.14: Banks' Core Capital and Capital Adequacy Ratios




Internal simulation exercises show that, on a consolidated basis as at September 2009, banks can further sustain a growth of around 36 per cent in total risk-weighted assets without the Tier 1 ratio going below 10 per cent, or alternatively, Tier 1 capital can absorb losses and consequently be depleted up to a maximum of 26 per cent at the existing level of risk-weighted assets.

Chart 3.15: Total Adjusted Assets, Risk-Weighted Assets, Leverage and Tier 1 to Risk-Weighted Assets




*Note: Adjusted total assets is equal to total assets net of intangible assets, goodwill and deferred tax assets.*

The leverage ratio for the banking sector rose from 6.1 per cent in December 2008 to 6.5 per cent in September 2009 owing to a higher growth in Tier 1 capital as opposed to total adjusted assets. On the other hand, the ratio of Tier 1 capital to risk weighted assets remained fairly stable over the same period, indicating that the expansion in risk-weighted assets was matched by an equal rise in Tier 1 capital. Internal accruals (retained earnings) have been the major source of accretion to Tier 1 capital of banks. Therefore, sustained profitability of operations is critical for shoring up banks' balance sheet strength given that external infusion has been minimal.

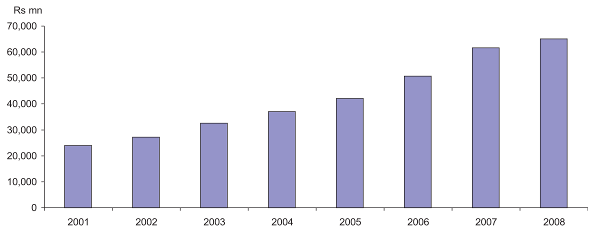
## 3.2 Non-Bank Financial Sector

### 3.2.1 Insurance Sector

The insurance industry in Mauritius is regulated and supervised by the Financial Services Commission (FSC). As at 30 June 2009, 18 active insurers were in operation and one insurer was in a run-off situation. In addition, Shariah' compliant insurance products have been introduced in the market.

Assets of the insurance sector which totalled Rs 65,021 million in 2008, grew by 5.4 per cent compared to growth rates of 21.6 per cent and 20.3 per cent in 2007 and 2006, respectively.

Chart 3.16: Total Assets of the Insurance Sector




*Source: Financial Services Commission, Mauritius*

Total assets of the insurance sector and the banking sector, as a percentage of GDP stood at 25.9 per cent and 290.0 per cent, respectively, in June 2008 compared to 28.2 per cent and 285.1 per cent, respectively, a year earlier.

Gross insurance premium totalled Rs 13,826 million in 2008 compared to Rs 11,647 million in 2007, representing a growth of 18.7 per cent. Growth in gross insurance premium was driven by expansion in both long-term business and general business with the latter being stronger.

The insurance industry is concentrated with more than 80 per cent of the gross insurance premium generated by three insurers in the long-term business while in the general business line six insurers hold the bulk of the market share.

The industry which had posted a positive performance in 2008 was relatively unscathed throughout the crisis as most insurance companies remained solvent. Looking ahead, the anticipated improvement in economic activity is expected to increase activity in the insurance industry and sustain the profitability of that sector.

### 3.2.2 Non-Bank Deposit Taking Institutions

The share of the Non-Bank Deposit Taking Institutions (NBDTIs) in the combined assets of depository institutions increased from 5.3 per cent at end-November 2008 to 5.8 per cent at end-November 2009. The NBDTIs pose a threat to financial stability in much the same way as banks. The regulatory direction adopted by the Bank has therefore been geared to bring convergence in the framework for all deposit-taking institutions.

The performance indicators of NBDTIs show that the sector has posted better results than the banking sector in some respects. Deposits mobilised by NBDTIs registered a higher growth of 14.6 per cent as against 10.9 per cent growth in banks' rupee deposits from November 2008 to November 2009. Profits recorded by the sector in the financial year 2009 grew by 35.2 per cent which well exceeded that of banks. Further, credit growth of the NBDTIs was 6.0 per cent for the year ended November 2009 compared to 4.4 per cent growth of credit under Segment A credit in the banking sector. The surge in the business level could be somewhat misleading if seen in isolation. The growth in the activities of the NBDTIs was largely driven by growth in exposure to the household sector (mortgage and consumption loans) which continued to be buoyant in the banking sector as well.

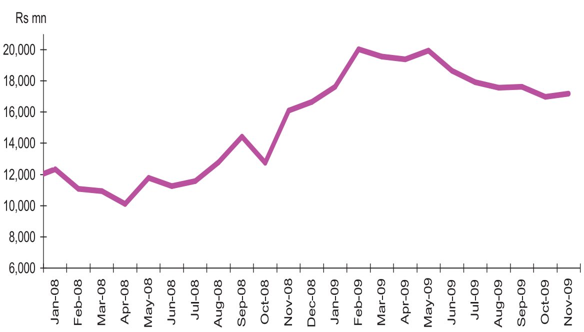
The increase in the relative share of the NBDTIs in the depository corporations' business has some financial stability implications. First, the sector is beset with a higher ratio of non-performing assets to total credit. Over the period September 2008 to September 2009, ratio of non- performing credit to total credit increased from 7.2 per cent to 9.0 per cent. Secondly, the NBDTIs generally have credit-deposit ratios exceeding 100 per cent which cause them to avail credit facilities from banks to augment their lending resources. At end-November 2009, borrowings from banks and other financial institutions increased to Rs 4,051 million from Rs 3,036 million, a year earlier. This may have contagion effects on the banking sector in case the borrowing NBDTI defaults. Further, given their relative smallness, the NBDTIs are more susceptible to macroeconomic shocks.

The recent global crisis revealed that it is not only the 'too big to fail' institutions that can create a systemic crisis. From the systemic stability viewpoint, the NBDTIs are critical and therefore continued vigilance is required on their performance.

### 3.2.3 Global Business Companies

Global Business Companies (GBCs), by their nature, are more exposed to the international environment. For the fiscal year ended June 2009, 2,827 new Global Business Licenses were issued by the FSC against 3,943 licenses issued in the previous fiscal year. Credit extended by banks to GBCs fell in October 2008 but continued to grow through early 2009 before declining slightly in the second half of the year. Movement in credit granted by banks to GBCs is depicted in Chart 3.17 below.

Chart 3.17: Banks' Exposure to GBCs




Assets of Global Business Service Providers, notwithstanding the decline in the number of new licenses issued, grew at a rate of 30.4 per cent in 2008 compared to a growth of 10.4 per cent in 2007 and profits of GBCs grew by 57.1 per cent in 2008 compared to a growth of 76.7 per cent in 2007. Activities in the Global Business sector remain attractive with a total profit of USD 20.7 million in 2008 and are expected to expand further as the world economy recovers.

# 4. Financial System Infrastructure

An essential part of the financial system is its infrastructure which is composed of the payment systems, securities settlement systems, central counterparties and messaging services among others. These enable transactions ranging from individual consumer payments to transactions in both domestic and international wholesale financial markets. Failure or sub-optimal performance of any of these infrastructures will impact on the whole economy.

## 4.1 Performance of the Payment System

The Mauritius Automated Clearing and Settlement System (MACSS) is the sole interbank payment system infrastructure of the country which is based on latest technology and is capable of handling larger number of payments. The performance of MACSS is described in terms of throughput and usage of the system.

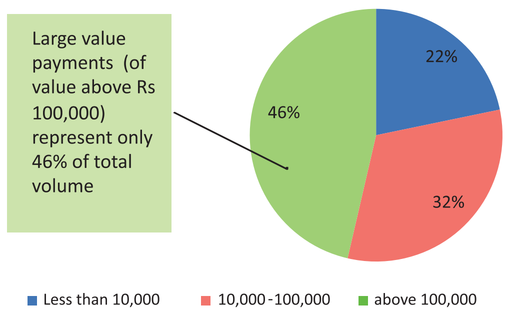
### 4.1.1 Volume and Value of Transactions on the MACSS

The volume and value of transactions processed on the MACSS increased by 59 per cent and 51 per cent, respectively, in 2009. All transactions were processed immediately and no transactions were rejected on account of system or application related faults.

***Proportion of Low and High Value Transactions on MACSS***

Chart 4.1 depicts the usage of MACSS in terms of proportion of low and high value payments. It may be noted that in 2009, high value payments (above Rs 100,000) accounted for 46 per cent of the total number of transactions and represented more than 99 per cent of the total value transacted while low value transactions (less than Rs 10,000) accounted for 22 per cent of all MACSS transactions.

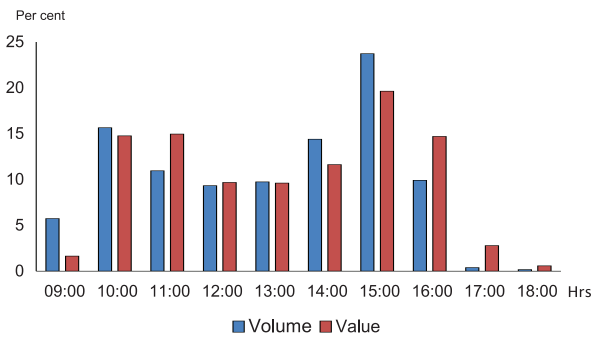
Chart 4.1: Distribution of Payments by Value Range for the Year 2009




***Hourly Distribution of MACSS Transactions***

The hourly distribution shows the throughput or volume/value of transactions per day period. This indicator provides information on the liquidity circulation through the payment system.

Chart 4.2: Hourly Distribution of MACSS Transactions for the Year 2009




The number and value of transactions peak at the two clearing cycles and close to final cut-off. It is observed that nearly 2.5 per cent of the total value of transactions was sent after cut-off.

This pattern indicates that some payments are sent close to or after cut-off time and if they include high value payments, this behaviour can cause settlement risks on the system. The Bank however found that the belated payments are not related to any liquidity constraints at the banks concerned but is mainly due to the intrinsic cost of liquidity of real time payment systems. Nevertheless, due to its potential financial stability implications, the Bank is closely following the pattern of payments and is working on arrangements to address this issue.

## 4.2 Assessment of Risk and Mitigation

Risks associated with MACSS are typically those of large value payment systems, namely: settlement risk, liquidity risk and operational risk. Given that liquidity is the main constraint to the smooth operations of payments systems, Real Time Gross Settlement Systems applications allow management of the resultant liquidity burden on banks and prevent disruption to the flow of liquidity within the system. MACSS has a built-in intraday liquidity mechanism to help mitigate liquidity risk.

The bunching of payments can cause gridlocks and increase settlement risk in the system. In Mauritius, the MACSS has not recorded any incidence of gridlock as the rules imposed on participants require them to have a responsible behaviour, among others. However various measures are being considered to address the potential risks of bunching of payments.

The system also faces operational risk as a result of the high volume of low value payments (more than 50 per cent) in MACSS which may cause transactions to be "clogged", denying settlement of important high value payments. The Bank is currently envisaging putting in place a low value clearing system where these transactions will be cleared and settled on a net basis on the RTGS. This measure would mitigate operational risks largely.

***Business Continuity Plan***

MACSS has been designed on the basis of the BIS Core Principles for Systemically Important Payment Systems (SIPS) with a view to eliminating all 'single points of failures'. Participants on the Mauritian payment system are required to comply with the MACSS rules which require them, among others, to put in place a Business Continuity Plan (BCP). The Bank assesses the BCP of participants through the yearly MACSS Self Assessment returns. The assessment revealed that, in 2009, there were no instances of actual or attempted MACSS-Related Fraud. Further, all foreign-owned international banks have now moved their SWIFT operations to their central data centre located overseas and the backup and contingency services are also centrally managed. Reports also indicate that there was no downtime in SWIFT operations. Domestic banks have fully operational main and backup sites for SWIFT and participants have not experienced any significant or recurring downtime or disruption. The MACSS related systems are considered to have sufficient capacity and resilience to service MACSS payment traffic in a timely and safe manner.

### 4.3 Outlook

The payment system infrastructure is presently considered robust enough to support the volume of activities in the banking sector. Besides being designed on the basis of the BIS Core Principles for SIPS, MACSS also operates according to best international practices. Nevertheless, there is a need to constantly monitor the system to identify vulnerabilities that might impact adversely on the payments system infrastructure and the stability of the financial system a large.

# 5. Risks to and Outlook for Financial Stability

Despite the global turbulences, which caused some fears on the domestic economic front, risks to financial stability from macroeconomic factors in Mauritius were relatively subdued in 2009. Since the publication of the last issue of the Financial Stability Report, there have been continued signs of economic improvement with growth forecasts successively revised upwards, declining inflationary pressures, improvement in the balance of payments and the level of international reserves reaching historical high. The fiscal deficit has been contained at levels which do not jeopardise sustainability of public debt. Conditions in financial markets remained orderly, notwithstanding some excess volatility at the end of 2009. Though the worst of the crisis may be behind us, some key sectors of the economy need a close monitoring due to the lagged impact of the global recovery on the domestic economic environment.

Amid the generally optimistic outlook for the global economy and due to expected spillover effects from the implementation of significant infrastructural projects, domestic growth is projected to accelerate to near trend levels in 2010, which should contribute to an improvement in the labour market. The short-term risks to inflation remain benign and Government is committed to pursue fiscal consolidation efforts. Notwithstanding the projected deterioration in the trade and current account deficit, the domestic economy's external financing needs should be covered without undue pressure on our foreign exchange reserves. The major risk to sustainability of growth is the pace of recovery of the economies of our main export markets.

Banks in Mauritius continue to reflect strength and resilience. This has been confirmed by the IMF Article IV Consultation Report on Mauritius published in February 2010, which stated that 'capital adequacy, liquidity and profitability of the banking system remain sound and the system appears resilient.' Capital adequacy levels have been maintained at above minimum levels, with a strong Tier 1 capital component.

Banks' profitability has declined only moderately in 2009, mainly as a result of the contraction in global business operations. No bank reported a loss in the calendar year 2009. Liquidity levels remain comfortable and asset quality is good, notwithstanding the slight deterioration in non-performing loan ratios in recent quarters.

The close monitoring of banks, both at on- and off-site level, together with a sound regulatory framework help to promote the soundness, safety and stability of the financial system. With a view to further consolidating its supervisory framework, the Bank is closely following international developments regarding pro-cyclicality mitigation, the reinforcement of capital buffers and the proposed framework for effective macro-prudential surveillance.

Prospects for further expansion of banking business appear brighter as the international economy as well as the domestic economy pick up. Capital adequacy levels of banks are expected to remain strong pointing to their resilience in withstanding potential shocks.

Overall, risks to financial stability have receded and the outlook has improved. However, given the uncertainties about the sustainability of global economic recovery, concerns remain.

# Appendix I: Selected Financial Stability Indicators

| Core Set of Financial Soundness Indicators | Mar-09 | Jun-09 | Sep-09 |
|---|---|---|---|
| ***Capital Adequacy*** | | | |
| Regulatory capital to risk-weighted assets | 17.2% | 16.1% | 15.3% |
| Regulatory Tier 1 capital to risk-weighted assets | 15.1% | 14.1% | 13.2% |
| Non-performing loans net of provisions to capital | 10.1% | 10.7% | 11.1% |
| ***Asset Quality*** | | | |
| Non-performing loans to total gross loans | 2.5% | 2.6% | 2.6% |
| ***Earnings and Profitability*** | | | |
| Return on assets | 1.6% | 1.6% | 1.8% |
| Return on equity | 22.0% | 21.1% | 22.2% |
| Interest margin to gross income | 68.9% | 68.6% | 69.0% |
| Non-interest expenses to gross income* | 38.2% | 38.8% | 37.5% |
| ***Liquidity*** | | | |
| Liquid assets to total assets (liquid asset ratio) | 31.8% | 28.7% | 26.3% |
| Liquid assets to short-term liabilities | 36.7% | 34.4% | 31.8% |
| ***Sensitivity to Market Risks*** | | | |
| Net open position in foreign exchange to capital | 6.0% | 6.7% | 5.2% |
| **Encouraged Set of Financial Soundness Indicators** | | | |
| Capital to assets | 8.0% | 7.9% | 7.8% |
| Large exposures to capital | 196.3% | 215.7% | 217.7% |
| Trading income to total income | 12.4% | 12.5% | 18.5% |
| Personnel expenses to non-interest expenses | 51.0% | 51.0% | 51.0% |
| **Macroeconomic Indicators** | | | |
| Headline Inflation | 8.5% | 6.9% | 4.4% |
| Year-on-Year Inflation | 4.8% | 3.3% | 0.9% |
| Key Repo Rate (end of period) | 5.75% | 5.75% | 5.75% |
| Bank Rate (end of period) | 6.31% | 4.75% | 4.44% |
| Public Sector Debt/GDP (end of period) | 55.5% | 58.7% | 58.2% |
| Total External Public Sector Debt/GDP (end of period) | 8.0% | 9.5% | 9.3% |
| Import Coverage of Net Interantional Reserves (No. of months) | 8.7 | 9.6 | 9.2 |
| | 1st Quarter 2009 | 2nd Quarter 2009 | 3rd Quarter 2009 |
| Real GDP Growth (year-on-year) | 1.6% | 2.3% | 3.8% |
| Unemployment Rate | 8.0% | 8.3% | 7.4% |
| Current Account Deficit/GDP | 2.7% | 13.1% | 8.0% |

* Gross income = net interest income + other income

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