2. International Economic Developments

Global growth forecasts for 2011 are slightly upgraded amid the global developments since the release of the October Inflation Report, while downside risks to the growth outlook remain vigorous. The growth discrepancy between advanced and emerging economies continued into the third quarter, with slow-growing major advanced economies failing to reach pre-crisis GDP levels. Moreover, due to disappearing base effects and ebbing stimulus effects in many economies, the global growth rate is expected to slow down in 2011.

The US economic growth in the third quarter has been close to its potential amid strong inventories, thus allaying concerns over the US growth outlook. This outlook is also buoyed by the stronger-than-expected data indicative of the final quarter of 2010. Furthermore, Fed's second round of quantitative easing and the fiscal package extending tax cuts and unemployment benefits have reinforced prospects for the US economy. In fact, the minutes of the latest FOMC meeting confirm that the Fed expects growth to pick up slightly further despite risk factors. High unemployment rates, the real estate market distress amid the renewed housing slump and weak credit expansion constitute downside risks.

Although the US economy rebounded during the third quarter, the euro area growth slowed significantly owing to the decline in the demand for fixed investment following the tensions in the EU periphery. Expectations for a fiscal tightening across core euro area economies in 2011 create major uncertainty amid the weak growth outlook. The sovereign concerns in the peripheral countries are expected to shape the near-term growth outlook for the euro area (Box 2.1). Although the announced rescue packages have currently prevented the contagion of the Irish banking crisis, the prevailing high CDS rates for both government and commercial bonds indicate that the concerns have yet to be fully resolved. Moreover, struggling peripheral economies are facing a heavy debt redemption for the first half of 2011, aggravating concerns about sovereign debt sustainability.

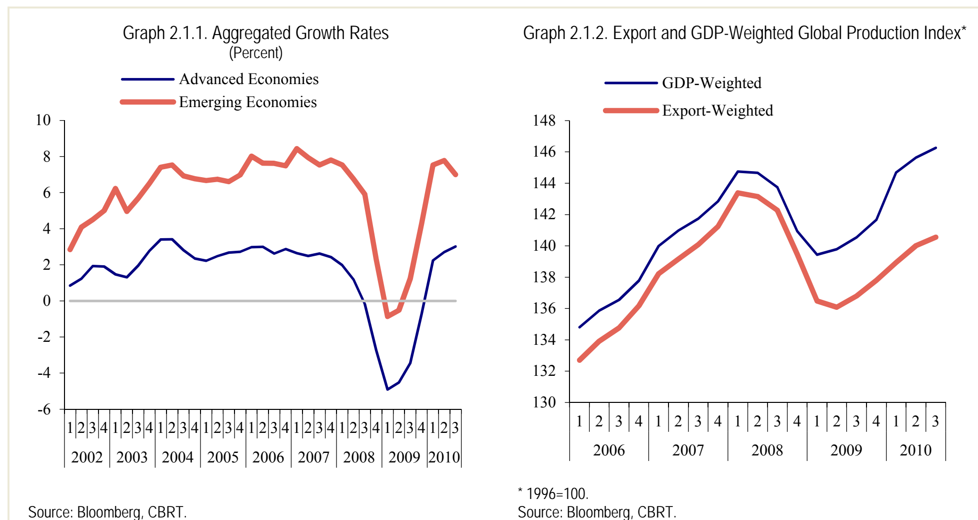
Despite low and fragile growth in advanced economies, emerging economies continued to grow rapidly in the fourth quarter. The most important element of uncertainty for emerging economies is the accelerated capital inflows fueled by the ongoing monetary expansion in advanced economies.

Accordingly, many emerging market central banks have more intensely adopted unconventional policy instruments in order to cushion their economies against loss of competitiveness and excessive credit expansion due to massive capital inflows.

The period following the October Inflation Report was also marked by rising commodity prices, particularly of agricultural products. Since food accounts for a large proportion of the CPI basket in emerging economies, rising food prices would have a major impact on inflation. In addition, the recent depreciation of emerging market currencies adds an upside risk to inflation outlook in the short term.

2.1. Global Growth

The global economic activity continues to recover slowly and gradually. Emerging economies, particularly Asian and Latin American economies, were the main drivers of global growth in the third quarter of 2010, while advanced economies remained fragile (Graph 2.1.1). The strong recovery in emerging economies brought production above pre-crisis levels. However, the global production index weighted by the share of each country in Turkish exports continued to hover below pre-crisis levels in the third quarter (Graph 2.1.2). The fact that Turkey's export destinations recover at a slower pace will continue to have a dampening effect on external demand in coming months.



Production and inventory changes provided the largest contributions to the US growth in the third quarter, while the contribution of fixed investments decreased significantly (Table 2.1.1). Recent data also indicate that both the

second round of quantitative easing and the ongoing fiscal stimulus measures spur economic growth, despite the gloomy outlook for real estates and the labor market. Consumption and net exports continued to be the key drivers of the euro area growth in the third quarter, whereas fixed investments created a drag on growth. The fiscal tightening in the euro area, the weak external demand, the mounting concerns about the sustainability of the export-led growth in core economies and the renewed financial distress in the peripheral Europe all feed into the clouded outlook for euro area growth in the upcoming period.

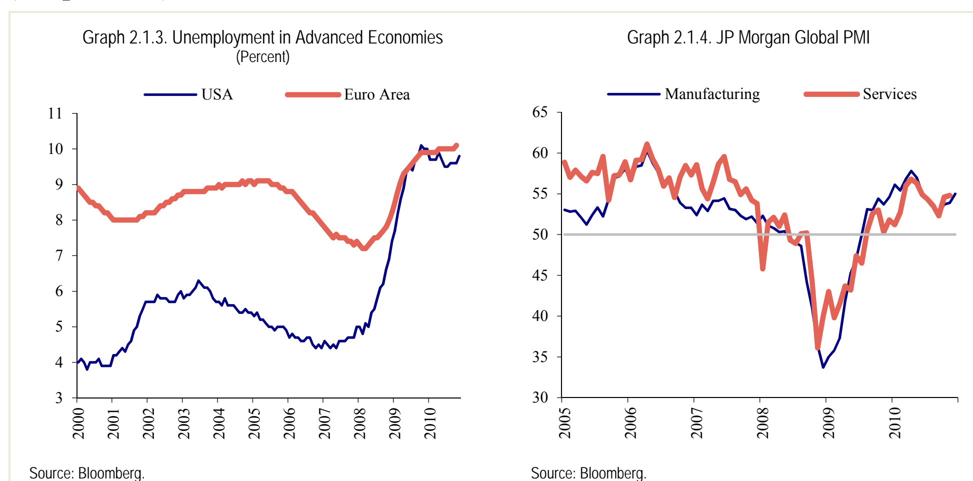
Table 2.1.1. Growth Decomposition in US and the Euro Area in 2010
(Annualized, Percent)

	USA			Euro Area		
	2010-I	2010-II	2010-III	2010-I	2010-II	2010-III
Private Consumption	1.3	1.5	1.7	0.8	0.4	0.4
Public Sector	-0.3	0.8	0,8	0.0	0.0	0.4
Fixed Investment	0.4	2.1	0.2	-0.4	1.6	-0.4
Inventory Changes	2.6	0.8	1.6	2.8	1.6	0.4
Net Exports	-0.3	-3.5	-1.7	-2.0	0.4	0.4
Total	3.7	1.7	2.6	1.2	4.0	1.2

Source: Bloomberg.

The negative outlook of the labor markets in advanced economies continues to dampen private consumption and hence economic growth. The US unemployment declined to 9.4 percent in December, while the euro area unemployment rose to 10.1 percent in November (Graph 2.1.3). Given that the average unemployment spell is about 34 weeks in the US and the recently announced fiscal package extends the length of the unemployment benefit, the negative impact of unemployment on aggregate demand remains limited.

The JP Morgan Global PMI, the most recent data for the fourth quarter, indicate that the third-quarter downtrend has ended as of September, with manufacturing and services PMI posting gains in the fourth quarter (Graph 2.1.4).



Graph 2.1.3. Unemployment in Advanced Economies
(Percent)

Source: Bloomberg.

Graph 2.1.4. JP Morgan Global PMI

Source: Bloomberg.

Consensus Economics revised its end-2011 global growth forecast slightly upwards after the October Inflation Report (Table 2.1.2), mainly owing to an upgrade in end-2011 US growth forecasts due to signs of a more robust US economic recovery. Overall, the growth discrepancy between advanced and emerging economies is expected to continue into 2011, albeit at a more moderate pace. Furthermore, uncertainties regarding the growth outlook for advanced economies may slow down the external demand of export-oriented emerging economies over the upcoming period, hence making growth in those economies to depend more on domestic demand.

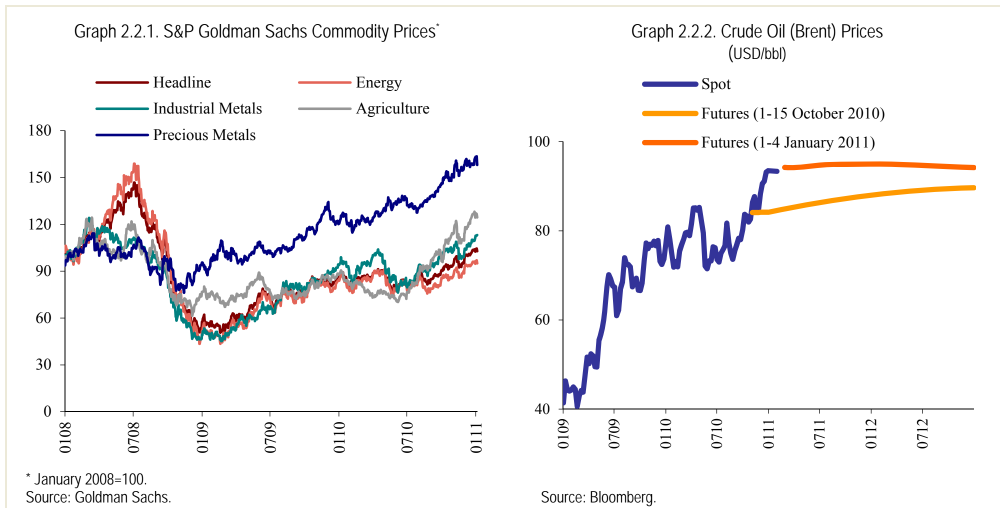
Table 2.1.2. Growth Forecasts
(Annual Percentage Change)

	2010		2011	
	October	December	October	December
World	3.7	3.9	3.1	3.2
USA	2.7	2.8	2.4	2.7
Euro Area	1.6	1.7	1.4	1.5
Eastern Europe	4.0	3.9	3.9	3.9
Latin America	5.,4	5.6	4.0	4.0
Asia-Pasific	6.4	6.6	5.1	5.0

Source: Consensus Forecasts.

2.2. Commodity Prices

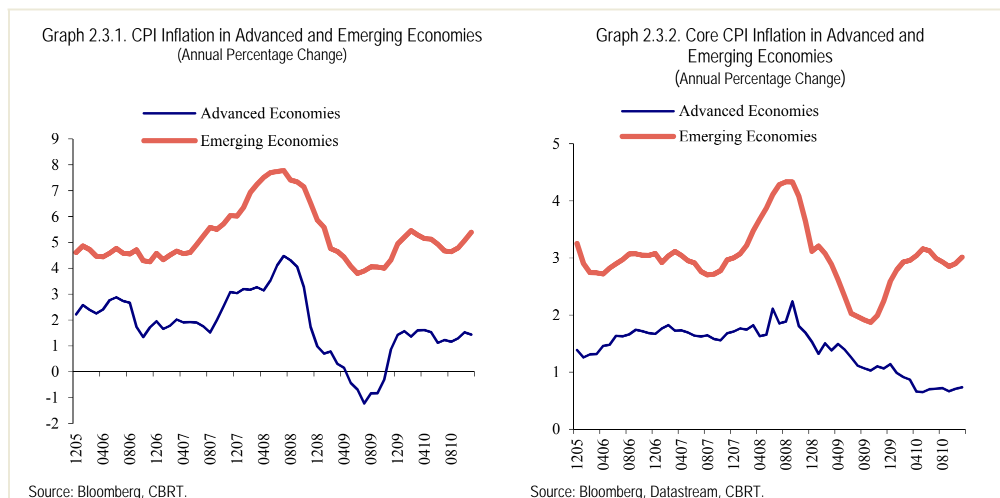
Commodity prices were on rise during the fourth quarter amid the ongoing global economic recovery (Graph 2.2.1). Unexpected weather conditions affected food supply and energy demand, putting an additional upward pressure on food and energy prices. Moreover, during the same period, prices of industrial and precious metals continued to increase. Prices of precious metals have especially risen on higher demand for these metals as a hedge against inflation and economic risks. Meanwhile, crude oil prices picked up as production quotas remained unchanged at the latest OPEC meeting despite ample idle capacity. Oil producers violating quota limits have also cut production in order to improve compliance with OPEC's output quotas. In addition, adverse weather conditions drove crude oil prices higher (Graph 2.2.2). In fact, historically trading below WTI, Brent crude oil prices floated higher on the apparently wintry weather conditions in Europe.



Economic growth is likely to be the key driver of energy prices in coming months, once the effects of bad weather conditions taper off. The brisk demand in emerging economies as well as the newly fiscal stimulus packages in advanced economies are expected to spur energy demand. However, the outlook for industrial metal prices would continue to rely on the growth performance of emerging economies.

2.3. Global Inflation

CPI inflation has been trending upward in both advanced and emerging economies since the end of the third quarter of 2010 amid rising commodity prices and the ongoing global recovery. Core inflation has also edged up, particularly in rapidly recovering emerging economies (Graphs 2.3.1 and 2.3.2).



The global inflation forecast for end-2011 was slightly revised upward in December from the previous reporting period on higher inflation expectations for the Eastern Europe and Asia-Pacific, while, inflation forecasts for the US and the euro area remained unchanged (Table 2.3.1).

Table 2.3.1. Inflation Forecasts
(Annual Percentage Change)

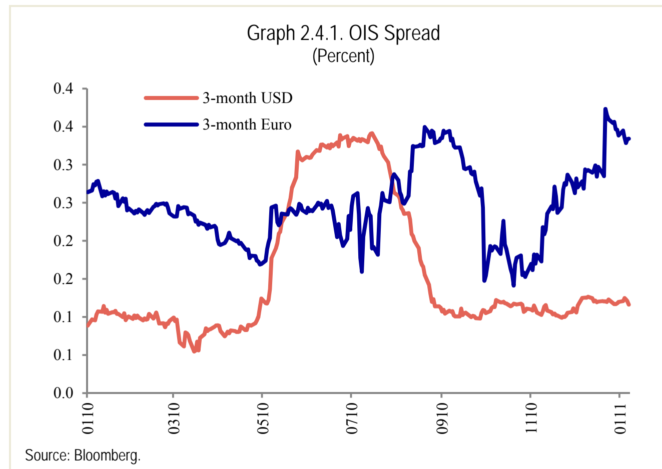
	2011	
	October	December
World	2.6	2.7
USA	1.5	1.5
Euro Area	1.6	1.6
Emerging Economies		
Eastern Europe	5.7	6.0
Latin America	7.1	7.0
Asia-Pasific	2.3	2.7

Source: Consensus Forecasts.

2.4. Financial Conditions and Risk Indicators

In the fourth quarter, financial markets were dominated by the renewed concerns about the sovereign debt sustainability in the European periphery and the consequent rescue package, and the Fed's second round of quantitative easing. As a result, the USD/euro parity has exhibited sharp volatility. On the other hand, additional monetary expansion measures adopted by advanced economies helped foster expectations of a prolonged environment of low interest rates and ample liquidity in advanced economies, thus improving the global risk sentiment. Accordingly, emerging economies have attracted more capital in the form of portfolio investments.

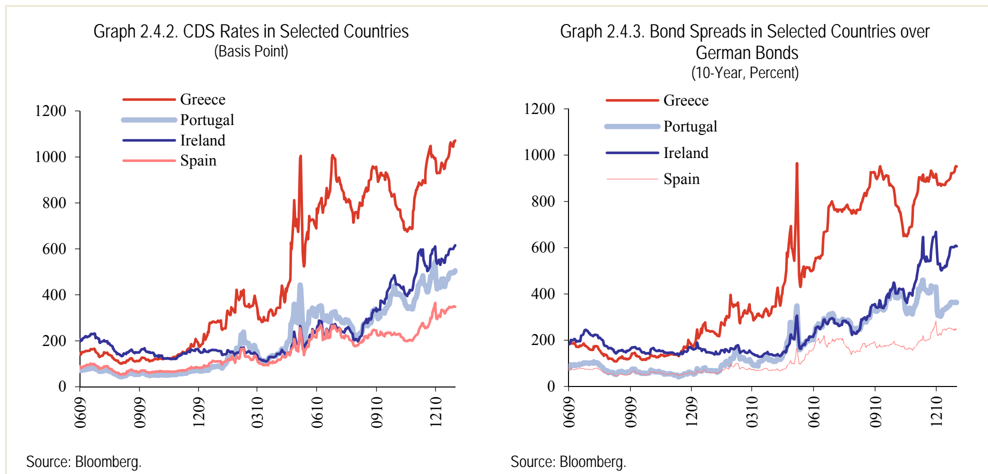
Graph 2.4.1. OIS Spread
(Percent)



Source: Bloomberg.

Across money markets, the OIS spread on both USD and the euro has widened. The euro OIS spread was particularly wider on euro area debt woes (Graph 2.4.1).

Although the risk perception about struggling euro area economies has eased in early fourth quarter, mounting fears of a worse-than-expected Irish banking crisis and concerns about counterparty risk have pushed the risk premiums for other peripheral euro area economies higher (Graphs 2.4.2 and 2.4.3).



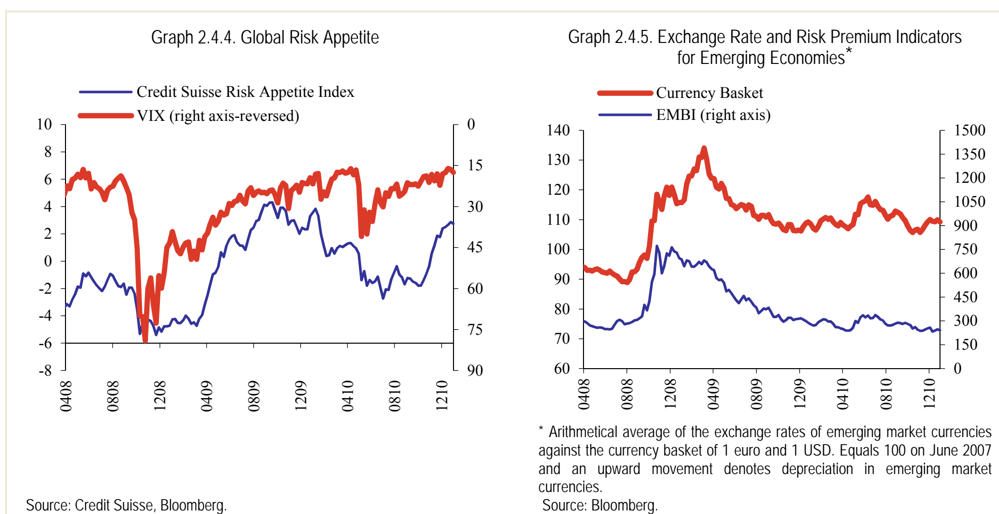
Graph 2.4.2. CDS Rates in Selected Countries (Basis Point)

Source: Bloomberg.

Graph 2.4.3. Bond Spreads in Selected Countries over German Bonds (10-Year, Percent)

Source: Bloomberg.

Despite Europe's sovereign debt problem, the global risk appetite picked up in the fourth quarter amid signs of an improved US growth outlook, driving investors towards higher-risk assets and markets (Graph 2.4.4). Accordingly, the risk premiums for emerging economies declined quarter-on-quarter. After having appreciated until the end of October, emerging market currencies began depreciating amid debt woes and adopted policy measures by central banks (Graph 2.4.5).



Graph 2.4.4. Global Risk Appetite

Source: Credit Suisse, Bloomberg.

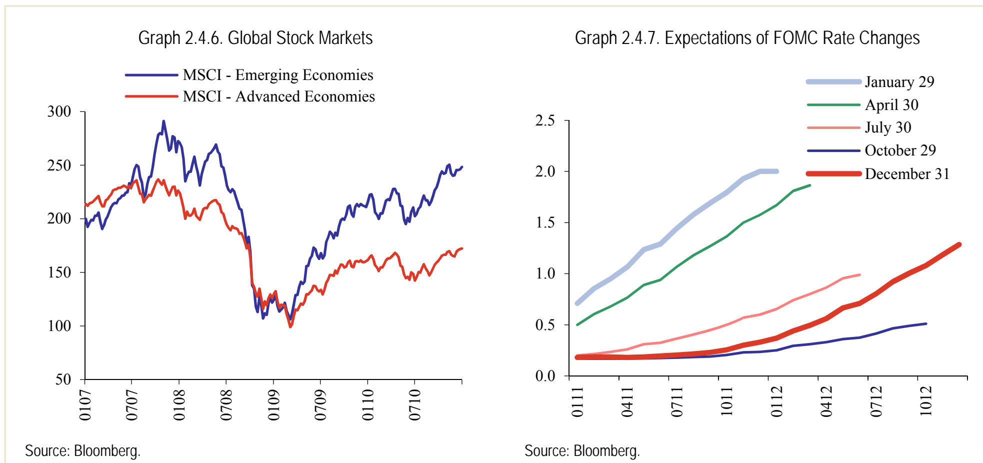
Graph 2.4.5. Exchange Rate and Risk Premium Indicators for Emerging Economies*

* Arithmetical average of the exchange rates of emerging market currencies against the currency basket of 1 euro and 1 USD. Equals 100 on June 2007 and an upward movement denotes depreciation in emerging market currencies.

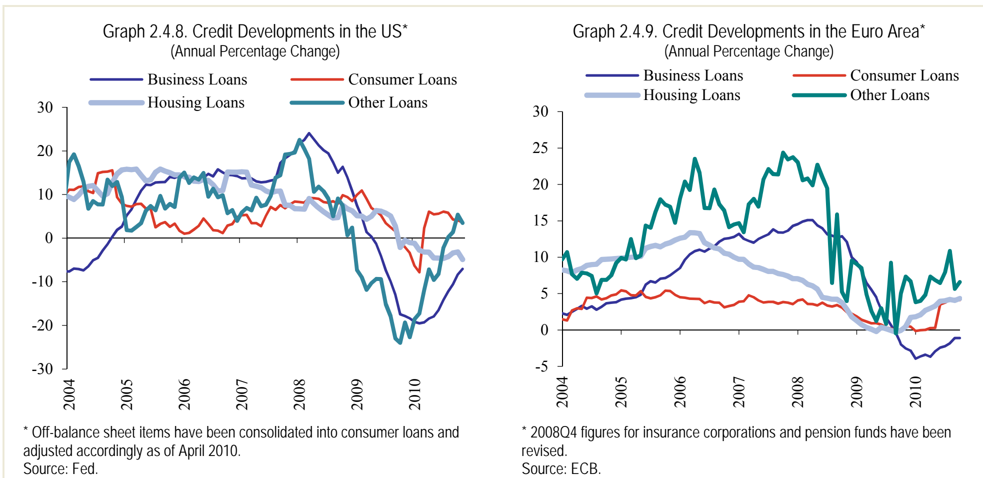
Source: Bloomberg.

The growing risk appetite and ample liquidity helped stock markets rebound in both advanced and emerging economies (Graph 2.4.6). Fed's

quantitative easing policy and promising growth figures increased prospects of a rate hike in the US. Consequently, FOMC policy rate hike is expected to come sooner and be more sizeable than envisioned in October (Graph 2.4.7). Yet, the first rate hike is expected to come not earlier than the final quarter of 2011.



US loans dropped further in the fourth quarter, albeit at a slower pace. Yet, year-on-year changes are increasing due to base effects (Graph 2.4.8). In the euro area, although loans remained broadly stable, housing loans continued to rise steadily (Graph 2.4.9).

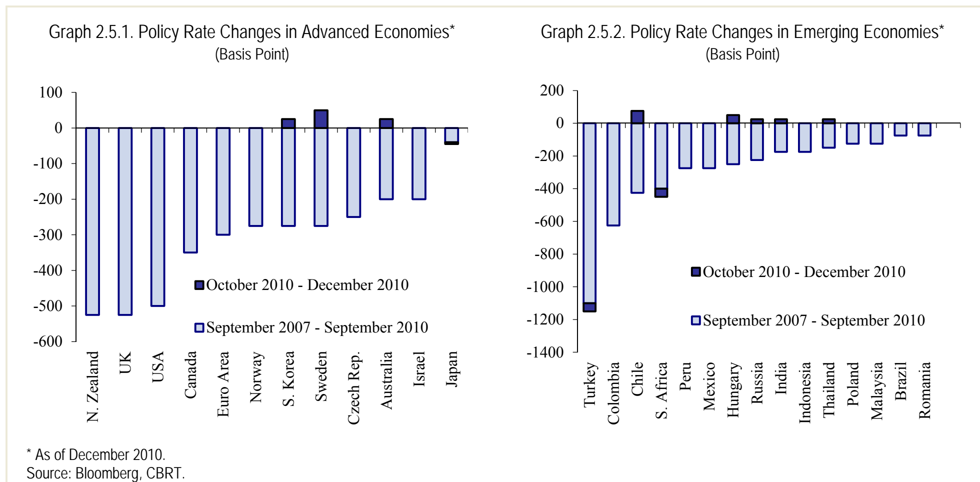


2.5. Global Monetary Policy Developments

Both advanced and emerging economies have yet to normalize policy rates that were slashed extremely during the crisis. While advanced economies have maintained quantitative easing in the fourth quarter, the fast-growing

emerging economies facing inflationary pressures have engaged in quantitative tightening.

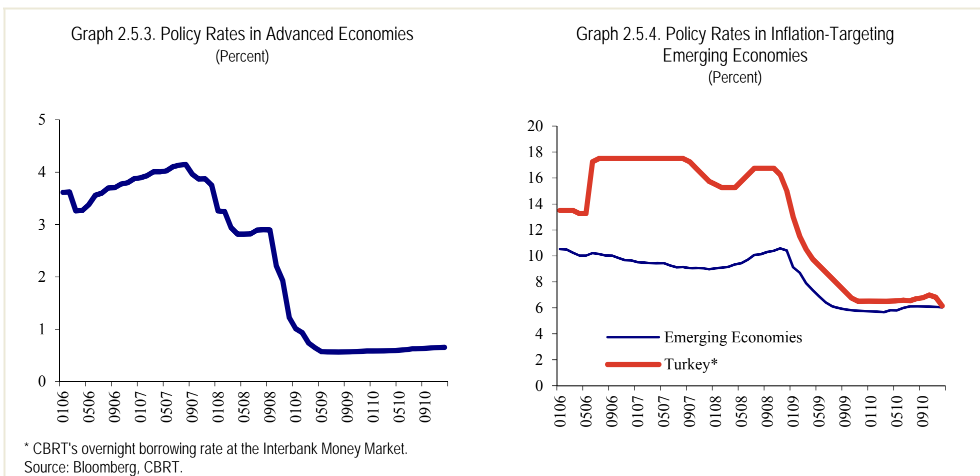
The previous Report indicated that the sovereign debt problems in the EU periphery created a major element of uncertainty about global growth prospects, and therefore, suggested that central banks would postpone the policy normalization process. Accordingly, excluding some Asia-Pacific and Latin American economies facing inflationary pressures, neither advanced nor emerging economies have started normalizing policy rates in the fourth quarter (Graphs 2.5.1 and 2.5. 2). Indeed, in aggregated indices, global policy rates were flat over the fourth quarter, and the composite policy rate for both advanced and emerging economies remained largely unchanged quarter-on-quarter (Graphs 2.5.3 and 2.5.4).



Graph 2.5.1. Policy Rate Changes in Advanced Economies* (Basis Point)

Graph 2.5.2. Policy Rate Changes in Emerging Economies* (Basis Point)

* As of December 2010.
Source: Bloomberg, CBRT.



Graph 2.5.3. Policy Rates in Advanced Economies (Percent)

Graph 2.5.4. Policy Rates in Inflation-Targeting Emerging Economies (Percent)

* CBRT's overnight borrowing rate at the Interbank Money Market.
Source: Bloomberg, CBRT.

The quantitative easing across G3 economies that started in 2008 continued into the final quarter of 2010. In fact, following the first round of

quantitative easing that started in the last quarter of 2008 and ended in the first quarter of 2010, a second round was launched on November 3, 2010. The second package involving a purchase of 600 billion USD of securities by the end of the second quarter of 2011, is expected to put downward pressure on long-term interest rates and to reduce borrowing costs. However, the package has so far pushed long-term interest rates up rather than down (Box 2.2). Similarly, the Bank of Japan and the ECB continued to run an expansionary monetary policy in order to soothe markets in the last quarter of 2010 as well.

Across emerging economies, central banks have resorted to quantitative tightening to control the potential effects of the additional easing packages implemented in advanced economies on their economies. Higher global liquidity fueled by the above policy measures in advanced economies has prompted a massive capital flow into emerging economies with higher yields, exposing these economies to various risks. This massive capital flow, by placing an upward pressure on exchange rates, may reduce the competitiveness, and thus, can adversely affect the economic activity. Moreover, the possibility of a sudden stop in capital flows warrants caution in terms of its potential threats to financial stability. In addition, an excessive capital inflow may put an additional pressure on the medium-term inflation outlook in emerging economies that are already facing inflationary pressures due to rapid growth. However, as raising policy rates to contain inflation will further accelerate capital inflows, emerging economies have adopted various restrictive capital controls to counteract any additional inflationary pressures (Table 2.5.1).

Table 2.5.1 Quantitative Easing in Emerging Economies

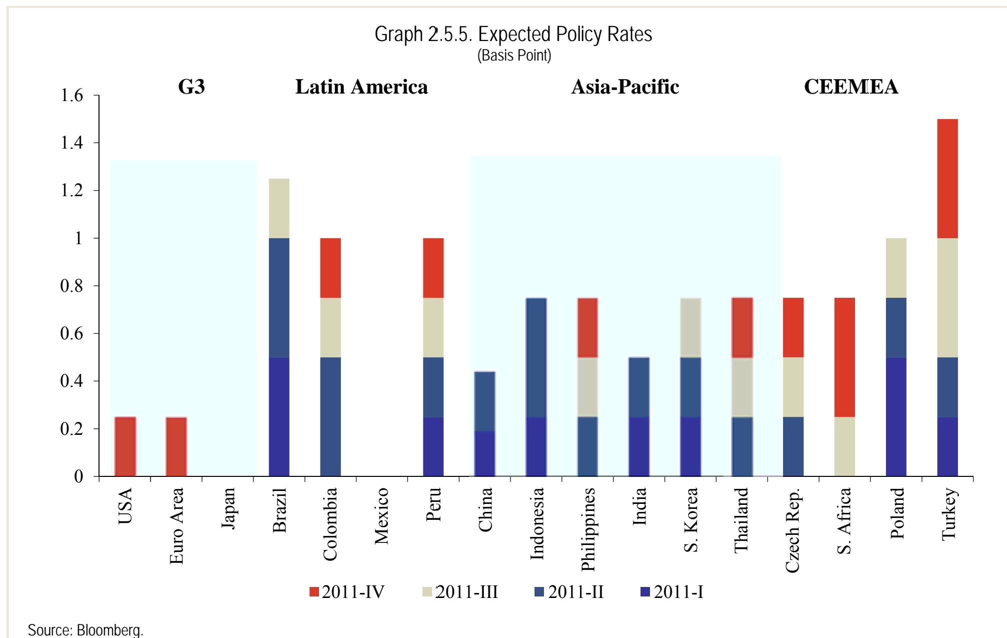
	Changes in Required Reserve Ratio (Percent)		Capital Controls		
	During the Crisis (-)	After the Crisis (+)	More Restrictions on Capital Inflow	Less Restrictions on Capital Outflow	Other Measures*
Brazil	2	7	√		
Colombia	3		√	√	
Peru	5	3	√	√	
China	2	3			
Indonesia	4	3			√
South Korea				√	√
Philippines				√	
Taiwan					√
Thailand			√	√	
India	2.5	1.5			√
Poland	0.5	0.5			
South Africa			√	√	
Russia	5	2			√
Turkey	TL: 1 FX: 2	TL: 2.4** FX: 2			

* Indonesia: Measures to encourage long-term investment. South Korea, Taiwan: Measures to control speculative flows. India: Measures to discourage external borrowing. Russia: Tax adjustments to discourage borrowing in foreign currency.
** As of January 7, 2011, required reserve ratio for TL has been diversified according to maturity of the deposits. The figure presented in the table is the weighted average.
Source: Relevant Central Bank websites, CBRT Financial Stability Report December 2010.

Aside from capital controls, required reserve ratios that were lowered during the crisis in order to help the lending channel operate effectively are raised in most emerging economies facing inflationary pressures, leading to a tight monetary stance. While many emerging economies lowered required reserve ratios gradually down to pre-crisis levels during the exit from expansionary policies, Brazil and China raised required reserve ratios above pre-crisis levels to tame their skyrocketing inflation. In sum, emerging economies, particularly in Asia-Pacific and Latin America, opted for monetary tightening in the previous quarter by using quantitative methods (Table 2.5.1).

Advanced economies are expected to continue with quantitative easing, while emerging economies are likely to maintain quantitative tightening in coming months. The sovereign debt crisis in the EU periphery still posing significant downside risk to global growth confirms that policy rates are unlikely to return to pre-crisis levels in G3 economies in the near future. Hence, a policy rate hike is not expected before the last quarter of 2011. However, many emerging economies, particularly in Latin America and Asia-Pacific, are expected to take a step towards normalizing monetary policies by the second quarter (Graph 2.5.5).

Graph 2.5.5. Expected Policy Rates
(Basis Point)



Source: Bloomberg.

Box 2.1 The Sensitivity of the EU Periphery to the Debt Crisis

The sovereign debt crisis that erupted in the peripheral euro area during the second quarter of 2010 poses downside risk to global growth. A possible contagion to other countries due to EU's integrated markets warrants a close monitoring of peripheral economies. This Box analyzes the vulnerability of peripheral economies amid the sovereign debt crisis that caused Greece and Ireland to request assistance from the EU, and discusses cross-border banking exposures, a key channel of contagion.

During the rapidly spreading sovereign debt crisis in the EU periphery, firstly, Greece asked the EU to activate a rescue package due to problems about its sovereign debt rollover in May, and a bailout plan was announced on May 10. The similar and integrated structure of peripheral economies fueled concerns about Ireland, Portugal, Spain, Italy and Belgium with already distressed public and banking sectors. Indeed, Ireland requested financial assistance for its troubled banking sector, and EU announced a bailout plan on November 28.

This Box derives a "vulnerability index" for the above-mentioned countries. The index is based on Gros and Mayer (2010)[1] and uses eight variables including main indicators on public finances and economic activity as well as variables on sovereign default and banking vulnerability. The stance of public finance is captured by debt-to-GDP and fiscal deficit-to-GDP ratios. Requirement for external finance is measured by current account-to-GDP ratio, while economic activity is measured by the unemployment rate. Sovereign default risk is measured by the CDS rate and bond spreads from 10-year German bonds. In order to identify banking sector vulnerabilities, banking sector CDS rates and ECB funding have been included to the analysis. To make these various measures comparable, each variable, calculated as of the fourth quarter of 2010, is standardized by subtracting the cross-country mean and dividing by the standard deviation. The overall vulnerability index is the sum of these standardized variables where fiscal balance and current account balance have a negative sign.

[1] Gros, D. and Mayer, T. (2010), "How to Deal with Sovereign Default in Europe: Create the European Monetary Fund Now!", CEPS Policy Brief, No. 202.

Table 1. Vulnerability Index in the Euro Area Periphery Countries

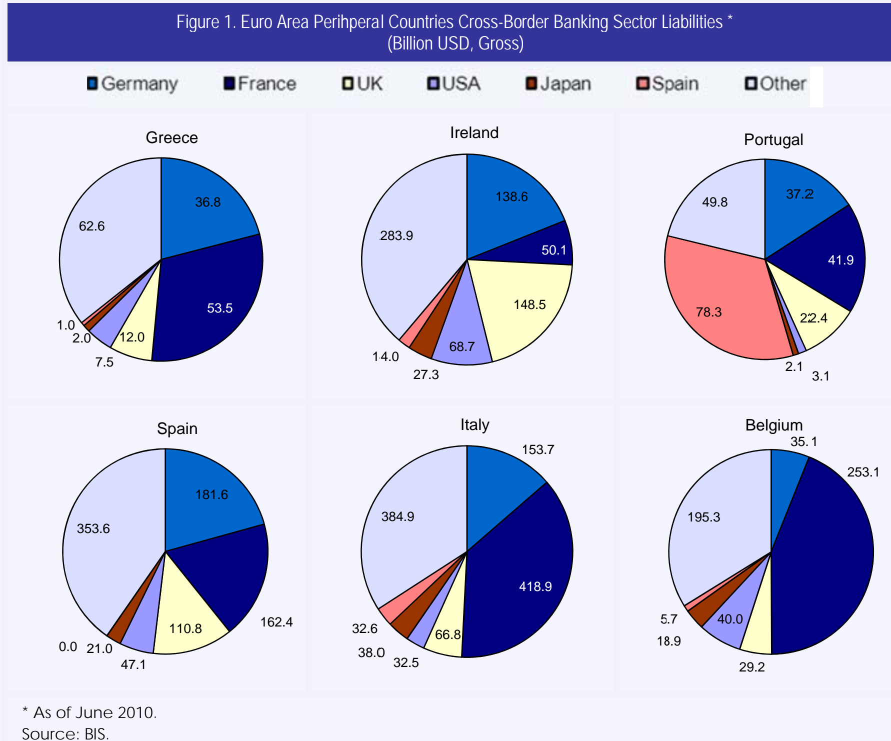
	Debt Stock/GDP	Budget Balance/GDP	Current Account/ GDP*	Unemployment**	CDS	Bond Spreads over 10-year German Bonds	Banking CDS	ECB Funding***	Vulnerability Index
Greece	1.21	0.27	-1.28	0.07	1.74	1.70	1.09	0.69	**7.52**
Ireland	-0.02	-2.01	0.55	0.30	0.41	0.53	1.14	1.60	**5.41**
Portugal	-0.65	0.37	-1.07	-0.35	0.09	0.03	0.41	-0.45	**-0.21**
Spain	-1.50	0.19	0.00	1.78	-0.49	-0.56	-0.71	-0.03	**-1.69**
Italy	0.93	0.59	0.52	-0.86	-0.76	-0.74	-0.93	-0.65	**-4.12**
Belgium	0.03	0.60	1.28	-0.94	-0.99	-0.97	-0.99	-1.16	**-6.91**

Source: Bloomberg, CBRT.
* IMF end-2010 forecasts for Ireland, Greece and Portugal.
** As of 2010Q3 for Greece.
*** As of November 2010 for all countries except Belgium.

The index shows that Greece is the most vulnerable country in the euro area as of end-2010, followed by Ireland, Portugal, Spain, Italy and Belgium, respectively (Table 1). Reaching 130 percent of GDP, a strikingly high ratio compared to other countries, the government debt has been the major component of Greece's vulnerability, while banking sector vulnerabilities are much higher in Ireland. In fact, while Greece has faced a fiscal crisis, Ireland has faced a banking crisis. Despite the less damaged public finance, Portugal is the third most vulnerable country due to the significantly higher current account deficit and very high banking sector risks. In Spain, economic activity is still well below pre-crisis levels and unemployment rate hovers around a dramatic 20 percent as of end-2010. In Italy and in Belgium, the weakening public finances is a major concern. The debt stock-to-GDP ratio is 120 percent in Italy, well above the average of countries, and increases the vulnerability of the Italian economy. In Belgium, although the debt stock-to-GDP ratio hovers around the average, considering that the average 98 percent is already quite high, the high debt stock-to-GDP ratio stands out as the primary driver of the Belgian economy’s vulnerability.

The above table shows that one of the major factors that increase the vulnerability of these countries is the vulnerabilities in the banking sector. Given that the crisis in Ireland has erupted in the banking sector and in view of the integrated structure of the EU banking sector, a cross-border contagion among EU banking systems is very likely. Figure 1 shows the liabilities of peripheral banks to foreign banks. In this context, German and UK banks are Ireland's two biggest creditors, and therefore, a crisis in Irish banks would directly affect German and British banking systems. In Portugal, the third most vulnerable economy after Greece and Ireland, domestic banks are mostly debtor to Spanish banks. Thus, given the high banking sector vulnerability in Portugal, a potential problem in Portuguese banks may adversely affect Spain's large banking sector. As the biggest creditors of Spanish banks are German, British and French banks, a problem in the Spanish banking system may have a direct and significant impact on the banking systems of EU's core economies. Hence, a “default” risk in the peripheral banking systems carries the potential to significantly damage the banking sectors of core EU countries.

Figure 1. Euro Area Perihperal Countries Cross-Border Banking Sector Liabilities *
(Billion USD, Gross)



* As of June 2010.
Source: BIS.

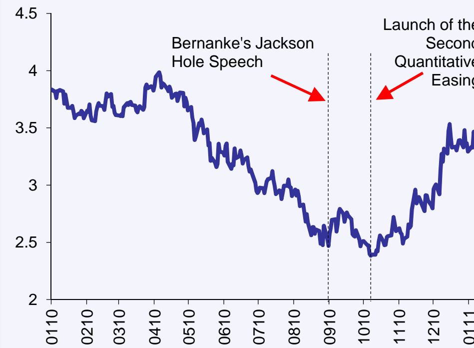
In sum, vulnerabilities of the EU's periphery countries mainly originate from public and banking sectors, and any problems in these countries would spill over across core countries, especially via the banking sector. The sovereign debt crisis should be closely monitored given the periphery's already troubled public finances and high banking sector risks as well as the sizeable redemption payments due in 2011. It is critical for peripheral economies to take all necessary measures in order to alleviate concerns about debt sustainability and ensure a healthy banking system over the upcoming period.

Box 2.2 Causes of the Increase in the US Long-Term Nominal Bond Returns Following the Second Round of Quantitative Easing

With short-term interest rates approaching the zero bound, central banks in advanced economies have resorted to unconventional monetary policies. One of these policies has been the Fed's recent announcement of a second round of "quantitative easing". This program which aims to purchase a total of 600 billion USD of long-term Treasury securities by the end of the second quarter of 2011, was first announced in Fed Chairman Bernanke's Jackson Hole speech on August 28, 2010 and put into effect on November 3, 2010.

The above purchase may either lower real and nominal bond yields amid increased money supply or push them up through increased prospects for growth and inflation. After the launch of the second quantitative easing program, long-term (10-year) bond yields have trended upward (Graph 1), fueling arguments that the program has failed. Indeed, some call the program ineffective due to rising yields, while some argue that the program has a negative impact on inflation expectations. This Box suggests that the increase in yields may not be due to the failure of the program, but rather due to normalization of growth and inflation expectations.

Graph 1. Yields on 10-Year US Bonds



Source: Bloomberg.

In order to better interpret this yield increase, the first factor to consider is the strong possibility that bond prices were affected in advance as the program was announced a few months before the launch date. The announcement of the launch date has merely served to inform about the size of the program. As the second round of purchases is not as high as, and in fact, smaller than expected, the announcement of the launch date is unlikely to cause bond yields to fall or inflation expectations to deteriorate.

Another factor to consider is the difficulty to isolate the program's effects from other influencing developments in the same period. The most important of these simultaneous developments are the favorable readings on the US economy during and after the launch of the program, and prospects of a robust growth replacing double dip fears.

Table 1. National Income and Inflation Forecasts for US

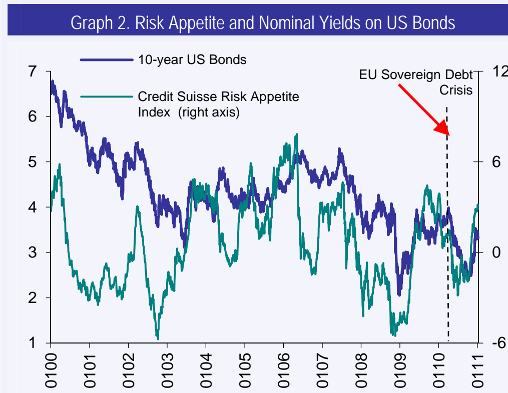
	National Income		Inflation	
	2010	2011	2010	2011
Jun-10	3.3	3.1	1.7	1.7
Jul-10	3.1	3	1.7	1.5
Aug-10	2.9	2.8	1.6	1.4
Sep-10	2.7	2.4	1.6	1.4
Oct-10	2.7	2.4	1.6	1.5
Nov-10	2.7	2.4	1.6	1.4
Dec-10	2.8	2.7	1.6	1.5

Source: Consensus Forecasts.

Table 1 shows the month-on-month Consensus Economics forecasts of 250 participants with strong expertise in producing financial and economic forecasts for the US economy. Growth forecasts were revised downward until the announcement of the program, remained flat between the announcement and the launch date, and have been upgraded following the launch date. The bond yields in Graph 1 are largely consistent with the growth forecasts in Table 1.

Put differently, the announcement date coincides with a period of slumping risk appetite due to European sovereign debt crisis and rising double dip concerns (Graph 2). In this period, investors rushed into safe-haven US bonds, pushing yields further down. On the other hand, the launch date of the quantitative easing coincides with the beginning of the period of growing risk appetite amid relatively eased concerns about European debt problems and a double dip recession, putting upward pressure on yields. It is difficult to single out the effects of the second quantitative easing program where the growing risk appetite is expected to push yields up.

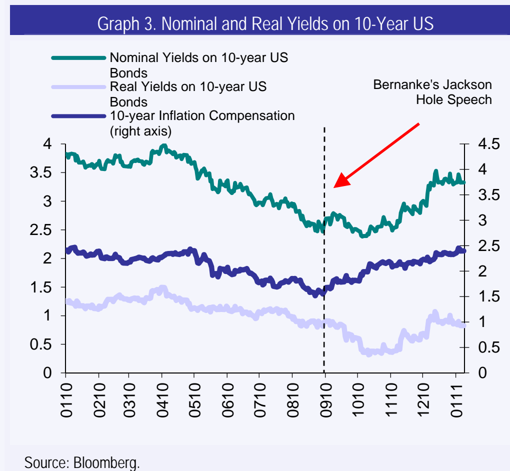
Graph 2. Risk Appetite and Nominal Yields on US Bonds



Source: Bloomberg, Credit Suisse.

The current nominal yields in the bond market can be explained by the increases in real interest rates and/or the rise in inflation expectations fueled by increased prospects of growth. The average 10-year real interest rates can be derived from the yields on inflation-indexed bonds. The real interest rates on inflation-indexed bonds are correlated with growth prospects. Assuming that the inflation risk premium remains unchanged, changes in nominal minus real interest rates reflect changes in inflation expectations.[2] Accordingly, real interest rates declined after the first announcement, but increased rapidly on November's positive labor force data and announcement of tax incentives in December (Graph 3). Hovering around record lows during the first announcement in August, inflation expectations increased gradually back to more normal levels afterwards.

Graph 3. Nominal and Real Yields on 10-Year US



Source: Bloomberg.

To sum up, the recent upsurge in nominal US bond yields points to a normalization in growth and inflation expectations. The current levels of interest rates can be interpreted as a correction driven by expectations of a higher growth and the eased uncertainty about double dip concerns and the European debt crisis. Yet, the effects of quantitative easing cannot be clearly distinguished. The fact that the decline in inflation expectations has ended and even been reversed after the announcement of the second round of quantitative easing can be interpreted as the contribution of the program to normalization. However, the fact that the inflation compensation but not real interest rates has increased during both the announcement and the launch of the program (Graph 3), suggests that market participants expect the program to have a limited impact on economic growth in the long run. The main factors affecting near-term growth prospects are favorable economic data and announcements of fiscal incentives.

[2] Assuming that inflation risk premium increases on heightened uncertainty, the increase in inflation compensation cannot be fully attributed to rising inflation expectations.