

## Economics

21 March 2012 | 84 pages

# Global Economic Outlook and Strategy

March 2012

- We are again edging up our global growth forecasts, and now expect global GDP to rise by 2.5% this year (up from 2.4% last month), while our forecasts for 2013 and 2014 remain at 3.0% and 3.5% respectively. PPP-weighted we expect global GDP to rise by 3.1% in 2012 (up from 3.0% last month), by 3.5% in 2013 and 3.9% in 2014 (both unchanged from last month). This reflects modest but widespread upgrades among industrial countries, notably the US, Euro area, Japan, Canada, Switzerland and Sweden. There are only a few growth downgrades, notably to Argentina and New Zealand. This is the second month in a row that we have slightly raised our global forecasts, after repeated downgrades from April to November 2011.
- Nevertheless, the advanced economies continue to face major headwinds. The EMU sovereign debt crisis probably is not over, and the sovereign ratings of Italy, Spain, Ireland and Portugal are all likely to be downgraded further this year. Spain's weak economic and fiscal prospects are likely to be a particular cause of concern. Moreover, the recent rise in oil prices will probably hit global growth. Activity data in China are weakening markedly, and as in 2010 and 2011, the recent rallies in risk assets may peter out — hitting confidence — if central banks stop adding further stimulus. As a result, the Fed, ECB and UK MPC will probably keep policy loose, and will be ready to ease further if downside risks escalate again. Indeed, our base case includes further ECB rate cuts and UK QE. In China, we expect a series of further RRR cuts.
- Global Economics Essay (Nathan Sheets, see page 6). Central banks in major advanced economies have expanded their balance sheets by 10-20% of GDP since mid-07. We expect present liquidity levels to be maintained for some time; indeed, further balance sheet expansion very much remains on the table. Over the longer term, as recoveries take hold in these economies, central banks will be required to drain substantial quantities of liquidity. We are optimistic that they have the tools and the expertise to manage this exit successfully. However, the scale of this task has few historical antecedents, and we see some risk of unwelcome surprises.

Figure 1. Currency and Interest Rate Forecasts (End of Period, Unless Specified), as of 21 Mar 2012

	21 Mar 2012	2Q 12	3Q 12	4Q 12	1Q 13	2Q 13	3Q 13
		Forecast	Forecast	Forecast	Forecast	Forecast	Forecast
United States: Federal Funds	0.25	0.25	0.25	0.25	0.25	0.25	0.25
10-Yr. Treasuries (Period Ave.)	2.37	2.40	2.40	2.45	2.55	2.65	2.75
Euro Area: US\$/€	1.30	1.30	1.28	1.26	1.25	1.26	1.28
Euro Repo Rate	1.00	1.00	0.75	0.50	0.50	0.50	0.50
10-Yr. Bunds (Period Ave.)	1.90	2.00	2.00	2.00	2.15	2.25	2.50
Japan: Yen/US\$	84	83	82	81	80	81	83
Call Money	0.10	0.10	0.10	0.10	0.10	0.10	0.10
10-Yr. JGB (Period Ave.)	1.05	0.95	1.00	1.20	1.30	1.40	1.40

Source: Citi Investment Research and Analysis

See Appendix A-1 for Analyst Certification, Important Disclosures and non-US research analyst disclosures.

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With thanks to Jan Maguire

Next issue 18 April 2012

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Figure 2. Forecast Highlights and Changes from Last Month

■ Global	We are again edging up our global growth forecasts, and now expect global GDP to rise by 2.5% this year (up from 2.4% last month), while our forecasts for 2013 and 2014 remain at 3.0% and 3.5% respectively. This is the second month in a row that we have slightly raised our global forecasts, after repeated downgrades between April and November 2011.
■ United States	Recovery is on a modest track supported by pent-up demand, rising employment and accommodative policies. The Fed's new easing strategy has bolstered financial conditions but rising gasoline prices will likely temper demand near term. Reserve-neutral QE seems likely if growth falls short of official forecasts or inflation prospects slow too much.
■ Euro Area	We have revised up our GDP for the second consecutive month, partly due to an upward revision for Germany, with some small upward revisions among periphery countries. Nevertheless, we continue to expect deep recessions for those countries. The ECB will probably be on hold for a while, but we expect that renewed EMU strains will prompt the ECB to expand liquidity further and to cut rates to 0.5% by the end of the year.
■ China	We have scaled down our forecast of RMB appreciation in 2012 from 1.5% to 0.6%, in response to recent FX trends and growing conviction among policy makers that the RMB is near equilibrium. We also expect slightly lower average CPI inflation this year (from 3.5% to 3.3%). Real and financial data point to a sharp economic slowdown, and growth in 1Q may fall to 8% or below as we expected. Monetary easing appears to be lagging, which risks prolonging the growth downturn.
■ Japan	We revise up our growth forecast for 2012 again reflecting a higher base effect from the upward revision to Q4 GDP, the further yen depreciation and tentative signs of a pickup in manufacturing activity. While we expect the BoJ to leave policy unchanged in April, additional easing this summer seems possible especially if the Fed takes a further easing measure.
■ United Kingdom	The UK economy probably is avoiding recession, but recovery remains slow and the economy is likely to be roughly flat in coming quarters. Inflation will probably continue to fall steadily, dropping below the 2% target late this year.
■ Canada	Markets are now pricing in monetary policy tightening within the next nine months on unshaken economic fundamentals and above-target inflation. But we posit that the BoC will likely keep rates unchanged this year to lean against headwinds.
■ Australia	The economy is growing below trend, but is expected to pick up as the year progresses. A low Q1 CPI could be the trigger for a final rate cut in this easing cycle.
■ Emerging Asia (ex China)	The growth outlook in the region is conflicted by two opposing views — improving optimism about US recovery, but near-term worries over China's growth on signs of policy easing delays in some cases (e.g. property, RRR) and data disappointments. In general, we think those China growth worries are overdone — and we think most Asian CBs concur with us, prompting "relatively" more hawkish or dissipating dovishness among most central banks in the region.
■ CEEMEA	Attention is likely to be focused on Hungary near term, where we expect that the government and the EU are headed for more visible confrontation that will lead, in time, to negotiations on a lending facility from the EU/IMF. Meanwhile Poland's fundamentals show increasing superiority over Hungary's: we have upgraded our Polish GDP forecast to 2.7% this year, but still believe a slowdown is coming in 2013. Monetary policy is likely to be on hold for the time being, not just in Poland but throughout CEEMEA.

Source: Citi Investment Research and Analysis

Figure 3. Global — Summary of Views of Citi's Market Strategists

	Equities	G10 Rates	Credit	Securitized Products	FX †	Commodities	Global Macro Strategy †
Overall View	Cheap valuations, stabilising EPS, easy monetary policy support further upside	Sell-off may have further to run but cheap money and need for yield will limit the upside in yields	Long but wary of liquidity-related "speed bumps" longer-term. Selectively reduce bear market beta	Short, high-quality sectors optimise defensive positioning. Off-the-run sectors offer upside	USD higher	A more challenging 1H 12 with potential for sharper rebound in 2H 12	Bullish risk assets short term
Most-Favoured Region/Sector	EM, Japan, UK, Asia Pac ex Japan/IT, Financials, Cons. Staples	3-5yr EUR	Low-beta core non-fins and senior SIFI; selectively edge down in quality	US CMBS senior tranches	USD, MXN, CAD	Precious Metals	USD, Metals, equities
Least-Favoured Region/Sector	US/ Healthcare, Utilities, Cons. Disc	>10yr US	French corporates and periphery sub-debt	Spanish and Irish RMBS	EUR, AUD, CHF	Thermal coal Base metals	Core FI
Key Risks	Escalation of EMU crisis, hard landing in China, sharply higher core government bond yields	Stronger data end policy status-quo	Sovereign crisis; bank runs; global slowdown; less accommodative policy	Regulation	US economic disappointment	EMU contagion, risk-off financial outflows China hard landing	EMU breakup, China growth, US fiscal, MENA

Source: Citi Investment Research and Analysis

† Summary view from our Global Macro Strategy Market Commentary team (see page 59 for definition of market commentary). The authors are not independent research analysts and may have knowledge of the Firm's positions and/or the Firm's interest in one or more of the securities referenced herein.

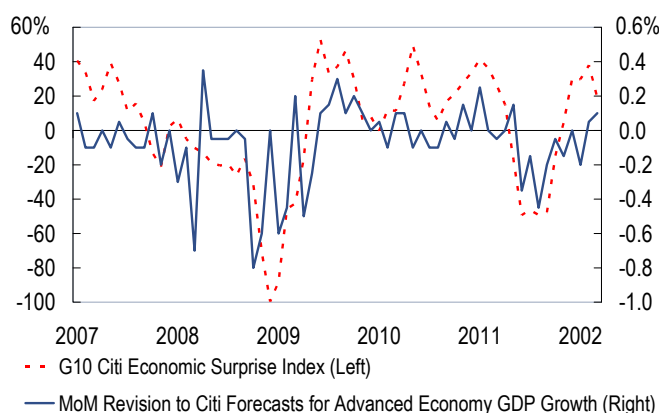
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For the second month in a row, we are edging our global growth forecast upwards

## Overview — Growth Forecasts Up Again, But Headwinds Remain

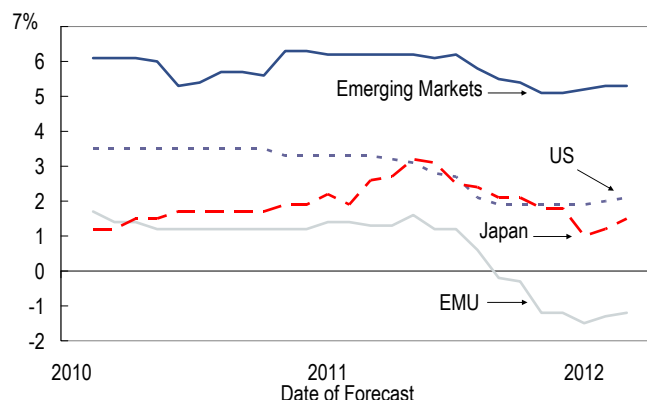
We are again edging up our global growth forecasts, and now expect global GDP to rise by 2.5% this year (up from 2.4% last month), while our forecasts for 2013 and 2014 remain at 3.0% and 3.5% respectively. PPP-weighted we expect global GDP to rise by 3.1% in 2012 (from 3.0% last month), by 3.5% in 2013 and 3.9% in 2014 (2013 and 2014 forecasts unchanged from last month). The upgrades are widely spread among industrial countries, and we are raising our industrial country growth forecast by 0.1% for each year 2012-14, while our 2012 emerging market growth forecast remains at 5.3%. The scale of the upward revision (0.1% for advanced economy growth) is modest, but the breadth is unusually wide. We are edging up our 2012-13 US growth forecast by 0.1-0.2% (from 2.0% to 2.1% for 2012, from 1.8% to 2.0% for 2013), and also lifting slightly our 2012 growth forecasts for Japan, the Euro Area, Canada, Sweden and Poland. This is the second month in a row that we have slightly raised our global forecasts, after a series of downgrades between April and November 2011.

Figure 4. Advanced Economies – G10 Citi Economic Surprise Index and Revisions to Citi Growth Forecasts, 2007-12



Note: We show revisions to Citi forecasts for the current and next year.  
Source: Citi Investment Research and Analysis

Figure 5. Selected Countries – Citi Forecasts for 2012 Real GDP Growth, 2010-12



Source: Citi Investment Research and Analysis

Economic data continue to surprise on the upside, albeit less markedly than in January-February

The upward revisions to our forecasts partly reflect better-than-expected activity data. The Citi Economic Surprise Indices (CESIs) have weakened a little from their February peaks, but activity data in the US and Europe generally continue to outpace expectations. In addition, central bank stimulus measures (eg ECB LTROs, BoE QE) have helped support risk assets, which probably also has underpinned business and consumer confidence. The CESI has risen far more in the US than the euro area, and we expect that economic growth in the US will outperform the euro area by about 3% in 2012, the biggest US-EMU divergence for many years. But, overall, the upgrades to our growth forecasts are a bit less than implied by recent trends in the CESIs, reflecting various headwinds.

Potential headwinds remain from the EMU debt crisis...

- First, we believe that the EMU sovereign debt crisis is not over, and financial market strains will probably increase again at some point. Severe fiscal tightening in peripheral EMU countries will probably lead to deep recessions and, with revenues undershooting, fail to return these countries to fiscal sustainability. Even after the recent sovereign debt restructuring, Greece's fiscal position remains on an unsustainable path and further debt restructuring (centred on official debt holdings) is likely, in our view<sup>1</sup>. We continue to put the probability of

<sup>1</sup> See "Euro Weekly - Greece Not Back On Sustainable Path", Jürgen Michels, 16 March 2012, Citi

Greek EMU exit at about 50%. Portugal and Ireland both will probably need a second bailout and, for Portugal (and perhaps Ireland) this is likely to include a sizeable PSI. Moreover, fiscal slippage is increasing in Spain, with the recent marked upward revision to the 2011 outcome and the upward revision to the 2012 official deficit forecast to 5.3% of GDP from 4.4% of GDP. In practice, we expect that Spain's fiscal deficit in 2012 will exceed 6% of GDP, with another overshoot (versus official forecasts) in 2013. Moreover, ongoing declines in house prices will probably add to weakness in the balance sheets of Spanish banks. We continue to expect further downgrading of EMU periphery sovereign ratings over time. For now, markets are being calmed by the ECB's huge 3-year LTROs. Net purchases of EMU government bonds by Spanish banks exceeded €20bn in both Dec-11 and Jan-12, while net purchases by Italian banks also exceeded €20bn in Jan-12. With the further 3-year LTRO (and, probably, strong pressure from governments), these flows may well have stayed high in February and March. However, this stimulus is probably time-limited, given the ECB's stated current intention to implement no further 3-year LTROs.

...elevated oil prices...

- Second, the recent rise in oil prices will probably hit growth, because oil consumers (whose real incomes fall) will adjust faster and further than oil producers<sup>2</sup>. The two prior occasions when oil prices hit \$125-\$130/barrel, in mid-08 and mid-11, were both followed by marked downturns in the CESIs and consensus growth forecasts.

...the China slowdown...

- Third, China's CESI has turned negative and activity clearly is weakening as last year's policy tightening slows housing activity and credit growth. Further monetary loosening is likely, via continued RRR cuts, and growth will probably rebound later this year, but the extent of the nearterm slowdown remains unclear for now.

...post-election US fiscal policy...

- Fourth, there remain major uncertainties about US fiscal policy for 2013 and beyond. At present, broad tax hikes and spending cuts that could stall recovery are on tap for 2013 but forestalling action is unlikely before late this year or next.

...and questions over the durability of the rally in risk assets

- Fifth, as in 2010 and 2011, the recent rallies in risk assets may peter out – hitting confidence — if central banks stop adding further stimulus. Private debts remain high in the US and Europe, creating an ongoing bias to high savings that could reassert itself.

Figure 6. Selected Countries — Industrial Production Forecasts (Pct.), 2011-13F

	2011F	2012F	2013F
World	3.7%	2.9%	3.5%
United States	4.2	3.8	3.3
Japan	-3.5	4.6	2.3
Euro Area	3.6	-2.8	-0.1
United Kingdom	-1.3	-0.4	1.3
Canada	3.5	-0.1	0.6
China	13.9	11.6	12.2
India	3.9	5.0	6.1
Korea	6.9	6.7	7.9
Brazil	0.3	0.5	2.8

Source: Citi Investment Research and Analysis

Given these headwinds, the main central banks will probably continue to maintain a loose policy stance, and will be ready to loosen further if downside risks escalate again. In the US, policymakers currently do not seem predisposed to additional QE, but the chance that growth could disappoint official projections this year keeps alive the option for reserve-neutral MBS purchases. In the euro area, we continue to expect that the ECB will cut rates below 1% (although we have postponed the next forecast cut from Q2 to Q3). If EMU strains increase (and we highlight Spain's fiscal trends as a key risk), then the ECB could yet have to implement one or more extra ultra-long LTRO to try and calm markets. In China, we expect a series of further RRR cuts. In the UK, markets now imply that further QE is unlikely but, with both growth and inflation likely to undershoot the MPC's forecasts this year, we believe that further QE is more likely than not.

<sup>2</sup> See "Empirical and Thematic Perspectives - How Much Is This Going to Hurt? – New Evidence on Global Adjustment to Oil Shocks", Nathan Sheets, 13 March 2012, Citi.

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## Prospects for Central Bank Balance Sheets

Since the eruption of the global financial crisis in the summer of 2007, major central banks have moved to substantially expand the size of their balance sheets. These initiatives have been designed to provide liquidity to stressed markets and institutions and, once policy rates were near zero, to stimulate economic activity and defuse deflationary pressures.

In this essay, we focus on the recent and prospective balance sheet policies of four leading central banks — the Federal Reserve (Fed), the European Central Bank (ECB), the Bank of England (BoE), and the Bank of Japan (BoJ). As highlighted in Figure 7, the aggregate balance sheets of these central banks presently total a substantial \$9.2 trillion, up from \$3.5 trillion at the onset of the financial crisis. Relative to the global economy, these four balance sheets have more than doubled in size, from 6 percent to 13 percent of global GDP. Although there is scope to debate the precise definition of global liquidity, this expansion has been sizable by any plausible metric.

Figure 7. Central Bank Balance Sheets

	Billions of US\$		
	June 2007	March 2012	Change
(1) Federal Reserve	869	2,887	2,018
(2) European Central Bank	1,622	3,979	2,357
(3) Bank of England	158	513	355
(4) Bank of Japan	816	1,854	1,039
Total	3,465	9,233	5,769
Percent of Global GDP	6.2	13.2	7.0

Note: Converted at market exchange rates. Sources: National Central Banks, International Monetary Fund, Haver Analytics, and Citi Investment Research and Analysis.

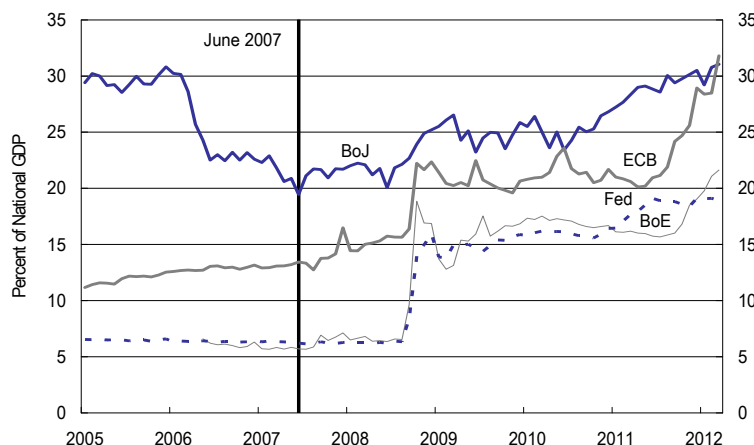
Given the relatively soft outlook for the advanced economies that is embedded in our baseline forecast, we expect that central banks will continue to actively grapple with the possibility of further balance sheet expansion. Notably, even if the performance of the global economy and financial markets surprises on the upside, our expectation is that central banks would be unlikely to start withdrawing policy support any time soon, certainly not before the second half of 2013. Even so, at some point in the future, economic recoveries in these economies will take hold, and central banks will be required to take steps to exit. When that time arrives, central banks will need to move forcefully to ensure that the massive quantum of liquidity in the system does not fuel unsustainable upward pressures on bank lending, inflation, or asset prices.

### The Configuration of Balance Sheets when the Crisis Erupted

At the onset of the financial crisis in June 2007, the balance sheets of these four central banks were of varying sizes relative to their overall economies. As seen in Figure 8, the balance sheet of the Bank of Japan hovered near 20 percent of GDP, but was down significantly from heights of around 30 percent reached earlier in the decade during the BoJ's quantitative easing program. In contrast, the Federal Reserve and the Bank of England had much leaner balance sheets, which were then running at around 6 percent of GDP. The balance sheet of the European Central Bank was roughly twice as large as the Fed's and the BoE's, at a little over 13 percent of GDP.



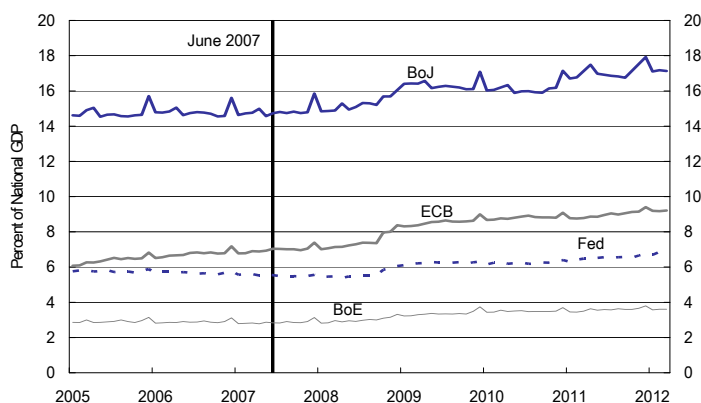
Figure 8. Central Bank Balance Sheets



Sources: National Central Banks and Statistical Agencies, Haver Analytics, and Citi Investment Research and Analysis.

These differences in balance sheet size reflected a whole range of factors. For example, the ECB held a substantial war chest of foreign-exchange reserves and gold, then equal to  $3\frac{1}{2}$  percent of GDP, with such holdings of the other central banks much smaller. In addition, as highlighted in Figure 9, there were widely varying levels of currency in circulation. After more than a decade of deflationary (or near-deflationary) outcomes, Japanese currency outstanding had reached nearly 15 percent of GDP. In a deflationary environment, currency becomes a very attractive asset, yielding a real return equal to the pace of price declines. Currency outstanding in the euro area was lower, but still sizable at 7 percent of GDP—and much larger than in the United States and the United Kingdom.<sup>3</sup> The BoJ and the ECB also had larger quantities of bank reserves outstanding relative to GDP than did the Fed and the BoE, but these differences were much smaller in absolute size.

Figure 9. Currency Outstanding



Sources: National Central Banks and Statistical Agencies, Haver Analytics, and Citi Investment Research and Analysis.

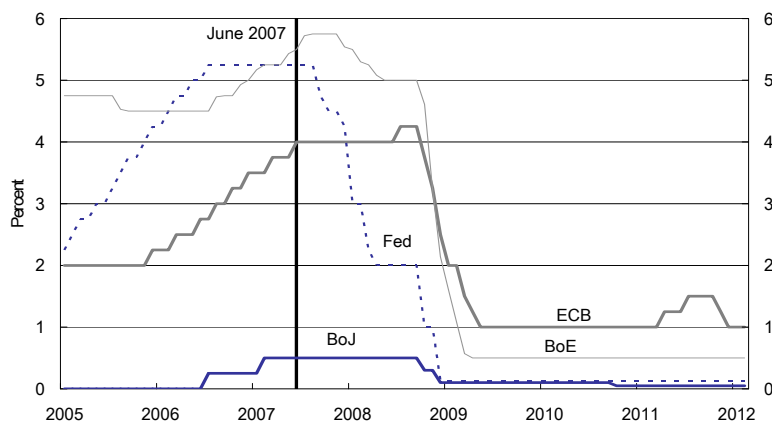
<sup>3</sup> A large body of research finds that a substantial fraction of U.S. currency circulates outside the country's borders. In the case of the euro area, currency outstanding is boosted by the demand for high-value notes in the shadow economy and beyond the euro-area's borders.

At any rate, we do not interpret the initial disparities in balance sheet size as signalling anything systematic about the stance of monetary policy across these economies. Rather, we see these differences as largely reflecting central banks' varied operating procedures and the underlying size and structure of each banking system, as well as a range of historical, social, and economic factors that bear on the demand for currency. That said, it does seem fair to conclude that the BoJ's policy stance was already the most stimulative when the crisis erupted—policy rates in Japan were still near zero and the BoJ's balance sheet remained quite large.

### The Expansion of Balance Sheets during the Financial Crisis

During the first year of the crisis, the balance sheets of the Federal Reserve and the Bank of England moved little. Figure 10 shows that the Federal Reserve instead cut policy rates very aggressively, reducing its target for the Fed Funds rate from 5¼ percent in August 2007 down to 2 percent by the spring of 2008. The Bank of England also cut rates during the first year of the crisis, but much more tepidly. In contrast, the ECB expanded its balance sheet by roughly €250 billion (2 to 3 percent of GDP), between June of 2007 and August 2008, as it provided liquidity to support the euro-area's banking system. Notably, however, the ECB actually hiked its policy rates in July 2008, and did not put rates on a downward trajectory until the coordinated cut with other major central banks in October of that year.

Figure 10. Central Bank Policy Rates



Source: National Central Banks, Haver Analytics and Citi Investment Research and Analysis.

Following the collapse of Lehman in the fall of 2008, the Fed, the ECB, and the BoE, all quickly cut rates to near zero, roughly matching where the BoJ had been for a decade. In tandem with these rate cuts, central banks also rapidly expanded their balance sheets (see Figure 8). A whole range of emergency liquidity measures to staunch the bleeding in the financial system were put in place as the demand for base money surged. Liquidity conditions gradually stabilized through 2009, but asset purchase programs by the Federal Reserve and the BoE kept their balance sheets on a rising trajectory through the year. Similarly, the ECB's hefty one-year LTROs in the summer of 2009 maintained the size of its balance sheet. By the end of 2009, the Fed and the BoE had seen their balance sheets bulge about 10 percent of GDP since the start of the crisis (more than doubling), while the balance sheets of the ECB and BoJ had expanded about 7 percent of GDP.

Over the past two years, the Federal Reserve's balance sheet expanded another \$600 billion during its "QE2" program from late 2010 through mid-2011. Since then,



the Fed's balance sheet has held steady at just under 20 percent of GDP. Notably, "Operation Twist" is now seeking to provide stimulus entirely through changing the composition of assets on the Federal Reserve's balance sheet. This emphasizes the point, which we will take up below, that both the size and the composition of a central bank's balance sheet are important in gauging the extent of stimulus.

The balance sheets of the ECB and the BoE both moved essentially sideways through 2010 and into 2011, before rising again over the past year — largely reflecting concerns about mounting sovereign stresses in the euro area. In response, the ECB shifted back into balance-sheet-expansion mode in mid-2011 and subsequently launched its massive three-year LTROs. Uncertainties about the situation in the euro area, coupled with headwinds on growth from fiscal retrenchment and private-sector indebtedness, also prompted the BoE to resume its already sizable quantitative easing efforts.

Finally, the BoJ's balance sheet is again on an upward trajectory as well, recently rising to levels reached during the quantitative easing campaign in the first half of the 2000s. This expansion has reflected efforts to restrain a strengthening of the yen driven by safe haven inflows and retrenchment in risk positioning, largely reflecting fall-out from stresses in the euro area.

### Where Are We Now?

Figure 11 seeks to put these moves in central bank balance sheets into broader perspective. Since the eruption of the financial crisis, the BoE has expanded its balance sheet in nominal terms by more than 300 percent, followed by the Fed at 230 percent, the ECB at 150 percent, and the BoJ at 45 percent. This ordering strikes us as broadly consistent with conventional perceptions of how stimulative these central banks have been. That said, while there is no perfect metric for judging such issues, we are not at all convinced that the nominal growth of these balance sheets is necessarily the best lens to compare policies. For example, the expansion of the BoJ's balance sheet seems small at least in part because the initial size of its balance sheet was relatively large.

Figure 11. Central Bank Balance Sheets

	Nominal Growth* (Percent)	Percent of Nominal GDP		
		June 2007	March 2012	Change
(1) Federal Reserve	232	6	19	13
(2) European Central Bank	149	13	32	19
(3) Bank of England	307	6	21	15
(4) Bank of Japan	45	19	31	12

\* From June 2007 to March 2012. Sources: National Central Banks and Statistical Agencies, Haver Analytics, and Citi Investment Research and Analysis.

As such, we see value in comparing balance sheet moves relative to each economy's GDP. Very striking, the ECB (which is sometimes seen as the most conservative of these central banks) stands out in such comparisons. Including the substantial balance sheet expansion associated with its massive three-year LTROs, the ECB has now increased its balance sheet more in terms of GDP (19 percent) than the other three central banks. Also notably, the ECB's balance sheet has recently risen to 32 percent of GDP, surpassing the BoJ to have the largest balance sheet by this measure.

In contrast, the Federal Reserve currently has the smallest balance sheet relative to GDP, at 19 percent. Also notably, the Fed's balance sheet has expanded a little less than 13 percent of GDP, very similar to the increase posted by the BoJ. Suffice it to say that in public perceptions the Fed and the BoJ are rarely grouped together in terms of the vigor of their unconventional policies. This accordingly raises broader questions as to how these tallies should be interpreted. We have several observations on this issue.

First, our discussion has very much focused on the *size* of central bank balance sheets. Of course, the composition of the balance is also of importance. For example, the Federal Reserve has argued that extending the maturity of the assets on its balance sheet triggers portfolio rebalancing effects, which prompt other investors to hold riskier or longer-duration assets. As we noted, Operation Twist focuses entirely on this channel. In addition, a lengthening of the maturity of the assets on the central bank's balance sheet may be interpreted as an implicit commitment by the central bank to maintain stimulative policies going forward, given the potential difficulties associated with draining large amounts of liquidity or selling assets back into the market. By comparison, the ECB's three-year LTROs represented a significant extension in the average maturity of the assets on its balance sheet, but its balance sheet is still concentrated in relatively short-maturity assets. But this point requires some further qualification: The ECB, through both its generous collateral policies and its SMP, has arguably been more willing than the Fed to take various forms of credit risk onto its balance sheet, which also tend to provide stimulus to the economy.<sup>4</sup>

Second, in our view, part of the perception that the Federal Reserve has been exceptionally stimulative actually reflects its communication policies, which we see as being complementary to — but distinct from — its balance sheet policies. The Fed has used forward guidance extensively, including the recent commitment to keep rates at “exceptionally low levels” for almost three more years, through late 2014. The ECB, in contrast, has been much more cautious in its communications initiatives, and the BoJ has struggled over the past decade to frame a convincing communications strategy.

Third, as our analysis documents, the evolution of the Fed's balance sheet over the last several years does not seem to differ markedly from that of other central banks. As such, we hypothesize that the remarkable attention that has been brought to bear on the Fed's balance sheet policies reflects the unique position of the United States as the issuer of the reserve currency and the attendant role of U.S. Treasury securities as the global risk-free asset. As such, the Fed's policies have tended to be at center stage.

Our broad conclusion from this discussion is that — while the exact flavor of balance sheet policies has varied from central bank to central bank — the features of this evolution have had common elements. And it is not clear to us that one central bank now stands out as having been significantly more aggressive. Although we have not attempted to systematically examine issues related to the composition of the assets held on central banks' balance sheets, specifically the shifting maturities and potential credit risks associated with these assets, we do not believe that such an examination would significantly alter the substance of this conclusion.

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<sup>4</sup> That said, during the height of the financial crisis, some of the Fed's extraordinary interventions (e.g. the loan to AIG and the Maiden Lane facilities) involved the assumption of meaningful credit risk.

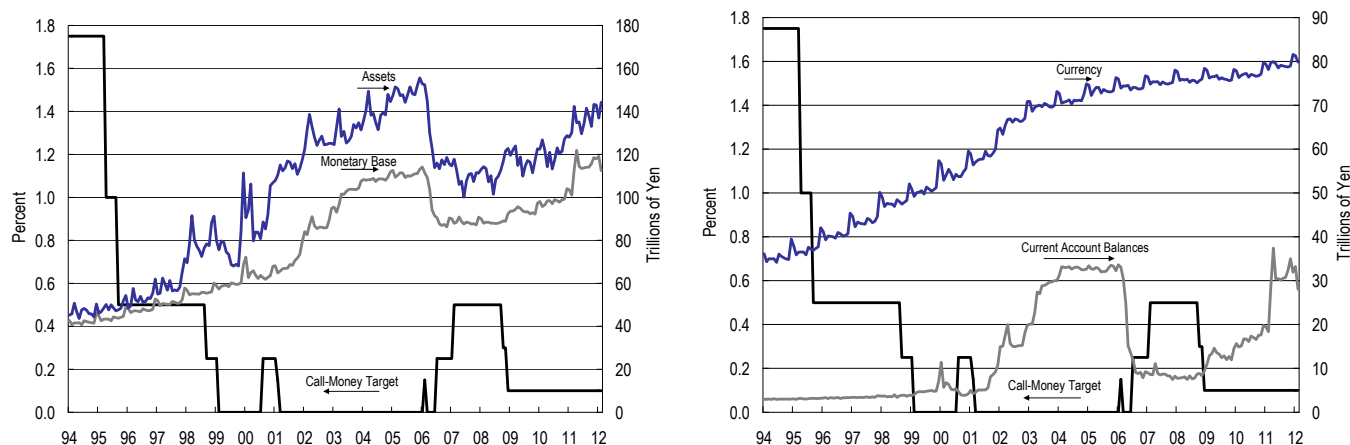
## Prospects for Central Bank Balance Sheets

The relatively soft outlook for the advanced economies that is incorporated in our forecast suggests the possibility of further balance sheet expansion will remain on the table for at least the next year or two. But even if the performance of the global economy and financial markets surprises us on the upside, our expectation is that central banks would be unlikely to start consolidating their balance sheets any time soon, certainly not before the second half of 2013. Given the daunting headwinds and structural problems that are now in play, these central banks will be in no hurry to unwind their extraordinary policies.

However, the time for exit will eventually come. As recoveries in these economies gain more solid footing and bank lending eventually gains steam, the existing degree of accommodation will no doubt become excessively stimulative, and central banks will need to begin the process of consolidating their balance sheets. This will require either outright sales of assets or aggressive measures to immobilize the liquidity in the system (e.g., through central bank deposit facilities). Of course, identifying the appropriate timing for such an exit does not differ qualitatively from judgments about the timing of initial policy tightening in previous recovery cycles. But what is different is that the features of the exit process, as well as the attendant effects on the economy and financial markets, are less familiar and thus more uncertain. With this in mind, we turn to some issues bearing on the likely features of the exit.

In terms of historical precedents, the most relevant prelude is no doubt the BoJ's experience exiting from its Quantitative Easing Policy (QEP) in the mid-2000s. Figure 12 shows that from February through June 2006, the BoJ reduced the size of its balance sheet about ¥40 trillion (roughly 7½ percent of GDP). By a year later, June 2007, the balance sheet had narrowed another ¥14 trillion (nearly 3 percent of GDP). All told, this exit — which was sizable, but probably not quite as large as major central banks will face in the current episode — proceeded smoothly and exceptionally rapidly. One factor, however, that facilitated the BoJ's exit was that during QEP it had accumulated sizable holdings of short-term bills, which it could allow to roll off without risking financial market disruptions.

Figure 12. BoJ's Balance Sheet and Call-Money Target



Sources: Bank of Japan, Haver Analytics and Citi Investment Research and Analysis.

Another notable point is that following the winding up of QEP, the size of Japan's monetary base remained far larger than in early 2001 when QEP commenced. Hence, the exit did not require a full unwinding of the liquidity that had been injected. Similarly, in 2007, the BoJ raised its target for the call-money rate to 50 basis points, and this involved a dramatically larger balance sheet and stock of base money than what prevailed in the mid-1990s, when the call-money target had previously been at 50 basis points.

A key conclusion is that at low interest rates, the economy seems to become more intensive in its use of base money, and at least some of these effects are relatively long lived. But the right panel of Figure 12 qualifies this conclusion in an important way. Most of the observed net increase in Japan's monetary base was accounted for by a continued upward trend in currency outstanding, which proved quite durable, at least through the range of interest rates recorded following QEP. The story for bank reserves is somewhat different. The vast majority (roughly 85 percent) of the bank reserves that were injected during QEP were later drained during the exit process. Even so, a fraction of these reserves (equal to about 1 percent of GDP) remained in the system following QEP, as Japanese banks held a higher level of reserves than had been the case previously.<sup>5</sup>

We hesitate to draw any strong conclusions from the Bank of Japan's experience winding up QEP as to how exit may proceed in the current episode. But the following are a few thoughts. First, we note that although the scale of QEP (roughly 10 percent of GDP) was somewhat smaller than the balance sheet expansions that we have seen since the financial crisis erupted (roughly 10 to 20 percent of GDP), QEP is probably still large enough to be a relevant comparator.

Second, similar to the BoJ during QEP, these central banks have seen a sizable increase in the quantity of currency in circulation since the financial crisis erupted (see Figure 9), as households and firms have increased their cash holdings in response to low interest rates and financial uncertainties. For example, cash holdings in the United States have risen by \$280 billion (about 1½ percent of GDP) and in the euro area by €240 billion (2¼ percent of GDP).

Third, as with Japan after QEP, we expect that the banking systems in these economies will have higher demands for reserves than was the case before the financial crisis. Part of this reflects our view that banks are likely to put increased priority on maintaining strong liquidity positions, reflecting both regulatory requirements and more conservative approaches to managing liquidity more generally. In addition, particularly in the United States, a large share of intermediation activity in the years before the financial crisis occurred in the shadow banking system. To the extent that this activity now takes place in the traditional banking system, which is subject to reserve requirements, bank reserves are likely to rise. We are agnostic as to how large the overall increase in reserve holdings might be, but it could easily be worth several percent of GDP.

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<sup>5</sup> A related observation is that transactions volumes in the call-money market rebounded following the BoJ's exit, but remained below those that prevailed before QEP. The higher level of reserves in the system following QEP presumably meant that banks were less reliant on the call-money market as a source of short-term funding, since they were holding more liquidity on their balance sheets.

Finally, given the assets that the BoJ held, it was able to rapidly reduce the size of its balance sheet to more normal levels. We expect that this will be a more gradual process in the current episode. Given the present structure of their balance sheets, central banks will be much more dependent on instruments such as deposit facilities, reverse repos, and the issuance of central bank bills. Such tools will need to be used to drain massive quantities of reserves — likely on the order of 10 percent of GDP — from the financial system.

All told, we are optimistic that the major central banks will be successful in managing their balance sheets going forward, both in choosing the appropriate time to exit and, once the exit has begun, in utilizing their tools to successfully reduce the stimulus in the system. However, given the present size of these balance sheets, this will largely be uncharted territory. As such, even with the greatest caution and forethought, there remains some risk of unwelcome surprises.

Figure 13. Selected Countries — Economic Forecast Overview (Percent), 2011-2016F

	GDP Growth						CPI Inflation						Short-Term Interest Rates					
	2011	2012	2013	2014	2015	2016	2011	2012	2013	2014	2015	2016	2011	2012	2013	2014	2015	2016
Global	3.0	2.5	3.0	3.5	3.8	4.0	3.7	3.1	3.0	3.0	3.0	3.0	2.65	2.58	2.63	2.86	3.16	3.52
<i>Based on PPP weights</i>	<i>3.7</i>	<i>3.1</i>	<i>3.5</i>	<i>3.9</i>	<i>4.1</i>	<i>4.3</i>	<i>4.2</i>	<i>3.5</i>	<i>3.4</i>	<i>3.3</i>	<i>3.4</i>	<i>3.3</i>						
Industrial Countries	1.3	0.8	1.2	2.0	2.4	2.7	2.3	1.9	1.6	1.5	1.6	1.6	0.76	0.62	0.57	0.69	1.08	1.66
United States	1.7	2.1	2.0	3.0	3.5	4.0	2.5	2.1	1.8	2.1	2.2	2.2	0.25	0.25	0.25	0.40	1.15	2.10
Japan	-0.7	1.5	1.4	1.5	1.5	1.2	-0.3	0.0	0.2	0.1	0.3	0.5	0.10	0.10	0.10	0.13	0.48	0.75
Euro Area	1.5	-1.2	-0.2	0.6	1.1	1.6	2.7	2.5	1.9	1.3	1.1	1.2	1.19	0.81	0.50	0.50	0.50	0.75
Canada	2.5	2.0	2.3	2.8	3.2	3.5	2.9	2.1	1.8	2.0	2.0	2.0	1.00	1.00	1.63	2.19	2.50	3.00
Australia	2.0	3.4	3.9	4.3	3.8	3.6	3.4	2.6	3.4	2.9	2.7	2.5	4.63	4.06	4.44	5.00	5.25	5.75
New Zealand	1.5	1.3	2.3	3.0	3.2	3.4	4.0	1.6	2.4	2.6	2.9	2.8	2.50	2.50	3.69	4.75	5.50	5.50
Germany	3.1	0.9	1.6	1.5	1.8	1.8	2.3	2.2	2.2	2.3	2.0	2.0						
France	1.7	-0.3	0.5	1.1	1.5	1.9	2.3	2.8	1.6	1.3	1.8	1.6						
Italy	0.4	-2.3	-0.4	-0.3	0.6	1.5	2.9	3.1	1.7	0.0	-0.1	0.7						
Spain	0.7	-2.7	-1.2	0.7	0.9	1.4	3.1	2.3	1.8	0.8	0.7	1.1						
Greece	-6.9	-6.5	-2.4	1.0	2.1	2.0	3.1	1.3	-0.3	0.2	1.0	1.1						
Ireland	0.8	-0.3	0.0	2.5	3.2	4.0	-0.8	0.2	0.0	0.3	0.5	0.5						
Portugal	-1.6	-5.3	-3.0	0.1	1.9	2.0	3.6	3.1	2.2	0.7	0.2	0.4						
Netherlands	1.3	-1.5	0.3	1.2	1.5	1.6	2.3	2.6	1.8	1.6	1.9	1.8						
Belgium	1.9	-0.3	0.8	1.7	2.1	1.8	3.5	2.9	1.7	1.9	2.3	2.3						
Denmark	1.1	0.7	1.2	1.4	1.6	1.8	2.7	2.0	1.5	1.5	1.6	1.8	1.30	0.41	0.30	0.55	0.60	1.00
Norway	2.7	2.5	2.9	2.7	2.7	2.9	1.3	1.7	2.0	2.0	2.0	2.3	2.10	1.50	1.60	1.90	2.40	2.90
Sweden	4.0	0.7	1.9	2.6	2.7	2.7	2.9	1.2	1.9	1.9	2.1	2.0	1.80	1.20	1.10	1.60	2.10	2.50
Switzerland	1.9	0.1	0.9	1.5	1.6	1.6	0.2	-1.2	-1.7	-0.7	1.1	1.3	0.44	0.00	0.00	0.00	0.00	0.00
United Kingdom	0.9	0.2	0.9	1.6	2.5	3.0	4.5	2.4	1.9	1.9	1.7	1.8	0.50	0.50	0.50	0.50	1.04	2.04
Emerging Markets	6.1	5.3	5.9	5.8	5.9	5.9	6.1	5.1	5.2	5.1	5.2	4.9	6.04	5.70	5.84	6.05	6.13	6.05
China	9.2	8.4	8.6	7.7	7.6	7.5	5.4	3.3	3.7	4.5	5.0	4.5	3.22	3.50	3.63	4.13	4.75	5.00
Taiwan	4.0	3.7	4.2	4.5	4.5	4.5	1.4	1.4	1.7	1.8	1.8	1.8	0.70	0.87	1.08	1.25	1.50	1.75
India	6.9	7.0	7.5	8.2	8.3	8.5	9.0	7.0	6.5	6.0	6.0	6.0	8.19	7.63	7.50	7.50	7.50	7.50
Indonesia	6.5	6.2	6.5	6.7	6.9	6.7	5.4	5.8	5.3	4.6	5.5	5.3	5.43	3.75	3.75	4.00	4.13	4.63
Korea	3.6	3.7	4.4	4.1	4.0	4.2	4.0	3.3	3.3	3.1	3.0	3.2	3.44	3.56	4.06	4.50	5.00	5.19
Czech Republic	1.7	-0.4	1.8	2.8	3.6	3.8	1.9	3.4	2.6	2.2	2.0	1.6	0.75	0.75	0.85	1.33	1.65	2.50
Hungary	1.7	0.0	1.4	2.1	2.0	1.8	3.9	5.6	3.5	3.5	3.1	3.3	6.04	6.98	6.04	5.50	5.44	4.52
Poland	4.3	2.7	2.4	3.1	3.4	3.4	4.2	3.8	2.6	2.5	2.5	2.5	5.91	5.60	5.70	5.65	5.50	5.30
Romania	2.5	1.7	3.1	4.2	4.3	4.3	5.8	2.6	2.0	2.5	2.5	2.5	6.21	5.13	5.00	5.00	5.00	5.00
Russia	4.3	3.5	4.0	4.0	4.0	4.1	8.4	5.5	6.8	5.8	5.5	5.0	8.00	7.50	6.00	6.00	5.50	5.00
Turkey	8.2	2.5	4.3	4.8	4.5	4.5	6.5	9.5	7.0	6.0	5.9	5.4	5.75	5.75	7.25	8.00	7.50	7.50
Nigeria	7.1	6.7	6.5	6.9	7.2	7.0	10.8	10.9	10.4	10.3	9.5	9.0	12.00	15.00	12.50	10.50	10.00	9.50
South Africa	3.1	2.9	3.8	4.4	4.4	4.5	5.0	6.0	5.4	5.4	5.5	5.5	5.50	5.75	7.25	8.50	8.75	8.50
Argentina	9.2	4.0	5.0	3.5	3.5	3.5	9.8	9.6	12.2	15.0	15.0	15.0	14.04	13.46	16.63	16.00	14.00	13.00
Brazil	2.7	3.3	4.5	4.5	4.5	4.5	6.6	5.5	5.5	4.5	4.0	4.0	11.71	9.31	10.29	10.00	9.00	8.25
Mexico	3.9	3.3	3.5	3.6	3.8	3.7	3.4	4.1	3.7	3.9	3.8	3.7	4.50	4.50	4.90	5.79	7.00	6.75
Venezuela	4.2	4.0	3.4	4.0	3.0	2.5	27.1	27.5	30.5	32.6	30.5	30.5	14.60	14.40	14.40	14.50	14.50	14.50

Note: For inflation, we use the PCE deflator in the US, wholesale price index in India, GDP deflator in Ireland. For Indonesia we refer to the FasB1 rate to reflect actual money market rates. Source: CIRA.

Figure 14. Selected Countries — Economic Forecast Overview (Percent), 2011-2016F

	Current Balance (Pct of GDP)						Fiscal Balance (Pct of GDP)						Government Debt (Pct of GDP)					
	2011	2012	2013	2014	2015	2016	2011	2012	2013	2014	2015	2016	2011	2012	2013	2014	2015	2016
Global	0.3	0.2	0.3	0.3	0.3	0.4	-5.0	-4.3	-3.3	-2.7	-0.7	-2.2	74	75	75	74	73	71
<i>Based on PPP weights</i>	<i>0.6</i>	<i>0.3</i>	<i>0.4</i>	<i>0.3</i>	<i>0.3</i>	<i>0.3</i>	<i>-4.4</i>	<i>-3.9</i>	<i>-3.1</i>	<i>-2.6</i>	<i>-0.7</i>	<i>-2.2</i>						
Industrial Countries	-0.8	-0.7	-0.6	-0.5	-0.4	-0.3	-6.9	-5.8	-4.5	-3.6	-0.1	-2.7	106	110	112	113	113	113
United States	-3.1	-3.0	-2.9	-2.9	-3.0	-3.0	-9.4	-7.8	-5.9	-4.6	-4.0	-4.0	98	104	106	108	108	108
Japan	2.1	1.6	2.2	2.1	2.1	2.1	-10.7	-10.9	-8.5	-8.2	-7.8	-7.4	228	237	244	248	253	256
Euro Area	-0.3	-0.3	-0.3	-0.1	0.0	0.2	-4.2	-3.4	-2.6	-1.8	-1.2	-0.6	88	92	91	91	90	88
Canada	-2.8	-1.7	-1.8	-2.1	-2.0	-1.7	-1.8	-1.5	-0.9	-0.4	-0.2	0.0	79	79	79	78	76	75
Australia	-2.3	-2.9	-5.0	-4.9	-3.5	-3.2	-3.4	-1.8	0.2	0.3	1.2	1.7	6	7	7	6	6	5
New Zealand	-4.0	-5.2	-7.6	-6.9	-5.8	-5.5	-8.0	-6.0	-3.0	-0.9	0.2	0.9	21	27	30	30	30	29
Germany	5.8	5.2	4.9	5.2	5.1	5.1	-1.0	-1.0	-1.0	-1.0	-0.7	-0.5	89	92	91	90	88	86
France	-2.3	-2.0	-1.1	-0.4	0.2	0.4	-5.5	-4.5	-3.4	-2.2	-1.3	-0.7	85	90	93	93	92	89
Italy	-3.2	-2.7	-2.2	-2.0	-1.8	-1.5	-3.9	-2.6	-1.4	-1.2	-0.6	0.4	121	129	131	132	131	128
Spain	-3.7	-3.0	-2.3	-1.9	-1.7	-1.4	-8.5	-6.6	-4.0	-2.5	-1.7	-0.7	72	84	90	92	91	90
Greece	-9.6	-8.5	-7.4	-6.7	-5.6	-5.3	-9.2	-6.4	-3.7	-1.4	-1.3	-0.9	165	163	173	175	171	166
Ireland	0.6	2.8	3.5	5.7	8.0	10.2	-10.0	-9.6	-9.8	-7.6	-6.0	-5.7	105	117	127	131	132	132
Portugal	-8.1	-5.0	-2.9	-2.0	-1.8	-1.3	-4.0	-4.7	-4.9	-4.1	-3.1	-2.2	106	121	106	111	113	113
Netherlands	8.1	7.3	7.3	7.3	7.2	7.1	-4.9	-4.5	-3.8	-2.3	-1.5	-1.0	66	73	73	72	72	70
Belgium	-0.7	-2.0	-1.3	-0.5	0.5	1.0	-3.7	-2.8	-1.9	-0.8	0.0	0.3	97	108	108	105	101	96
Denmark	6.5	5.4	5.2	3.7	3.3	3.5	-2.5	-5.2	-3.9	-2.6	-2.1	1.0	45	49	52	53	54	51
Norway	14.0	14.3	14.9	15.2	15.8	16.5	12.0	12.5	13.5	15.0	17.0	18.5	NA	NA	NA	NA	NA	NA
Sweden	7.2	7.5	7.8	6.7	6.9	7.3	0.1	-0.4	-0.2	0.5	1.5	1.9	37	37	36	34	31	27
Switzerland	15.0	13.6	13.7	14.0	14.4	15.2	0.6	0.0	-0.5	-0.3	-0.4	-0.4	53	52	52	52	52	52
United Kingdom	-2.6	-1.6	-0.2	0.5	0.8	0.9	-8.5	-6.7	-7.8	-7.0	-5.7	-4.4	84	90	97	102	105	106
Emerging Markets	2.2	1.5	1.7	1.4	1.3	1.3	-1.5	-1.7	-1.5	-1.4	-1.5	-1.6	16	16	15	15	15	14
China	2.8	2.0	1.5	1.0	1.0	1.0	-1.3	-2.0	-1.5	-1.0	-1.0	-1.0	15	16	15	14	14	13
Taiwan	8.8	8.7	8.4	8.0	8.0	8.0	-1.9	-2.0	-1.8	-1.5	-1.2	-0.7	39	39	40	42	43	44
India	-3.5	-3.6	-3.2	-3.0	-2.9	-2.6	-8.0	-7.7	-7.5	-6.0	-6.0	-6.0	70	69	68	66	64	64
Indonesia	0.2	-0.7	-0.8	-1.1	-1.0	-0.9	-1.2	-1.5	-0.7	-0.3	-0.5	-0.5	26	25	24	23	23	22
Korea	2.5	1.1	1.0	0.7	-0.3	-0.3	0.4	1.4	1.2	1.5	1.4	2.1	33	33	31	30	28	26
Czech Republic	-2.9	-3.6	-3.4	-3.8	-3.3	-2.9	-3.7	-3.7	-3.1	-2.3	-1.5	-0.5	40	44	45	45	44	42
Hungary	1.5	1.4	1.6	2.0	2.2	2.1	3.5	-3.2	-3.0	-3.3	-2.9	-2.7	80	79	77	77	76	75
Poland	-4.1	-3.2	-4.0	-5.2	-5.4	-4.9	-5.1	-3.3	-2.7	-1.9	-1.7	-1.7	54	53	52	50	49	48
Romania	-4.1	-4.5	-4.7	-5.0	-5.0	-5.0	-4.4	-2.0	-2.0	-2.5	-2.3	-2.0	39	39	39	39	38	37
Russia	5.5	3.2	0.6	-1.0	-1.0	-1.0	0.8	-0.3	-0.5	-0.7	-1.7	-1.7	8	9	8	8	9	10
Turkey	-10.2	-8.4	-7.9	-7.2	-6.5	-5.8	-1.3	-2.2	-2.5	-2.5	-2.7	-3.0	40	40	38	38	37	35
Nigeria	5.9	5.3	6.0	4.7	3.7	3.2	-3.2	-2.8	-2.0	-2.4	-2.8	-2.4	NA	NA	NA	NA	NA	NA
South Africa	-3.4	-4.7	-5.6	-6.6	-6.3	-5.8	-5.0	-4.8	-4.2	-3.6	-3.5	-3.5	38	41	42	43	43	42
Argentina	0.4	0.3	0.2	-0.5	-0.5	-0.5	-1.6	-2.0	-2.0	-1.3	-0.6	0.1	49	49	49	52	53	53
Brazil	-2.1	-2.1	-2.4	-2.7	-3.0	-3.3	-2.6	-1.9	-2.6	-2.4	-2.2	-2.5	63	63	63	63	64	64
Mexico	-0.8	-1.6	-1.9	-2.5	-2.5	-2.7	-2.5	-2.2	-2.0	-1.9	-1.9	-1.8	39	40	39	38	38	38
Venezuela	9.1	6.8	8.1	7.2	7.8	7.5	-5.0	-5.0	-4.0	-5.2	-5.0	-4.8	41	43	35	35	36	36

Note: Fiscal deficit and debt figures for all countries are general government debt and deficits. We assume sovereign debt restructuring in Portugal in 2012-13. Source: Citi Investment Research and Analysis



Figure 15. Selected Countries — Changes in Economic Forecast from the Previous Month (Percentage Points), 2011-2013F

	GDP Growth			CPI Inflation			Current Balance (Pct of GDP)			Fiscal Balance (Pct of GDP)		
	2011	2012	2013	2011	2012	2013	2011	2012	2013	2011	2012	2013
Global		0.1		0.1	0.1	0.1	0.1		-0.1	-0.1		
Based on PPP weights		0.1				0.1	0.1		-0.1	-0.1		
Industrial Countries		0.1	0.1		0.1	0.2		-0.2	-0.2		-0.1	-0.1
United States		0.1	0.2	0.1	-0.1			-0.4	-0.4	-0.1	-0.5	0.3
Japan	0.2	0.3			0.4	0.3		0.1	0.2			
Euro Area		0.1	0.1		0.2	0.5				0.1		-0.3
Canada	0.1	0.1			0.1			1.0	0.8			
Australia	0.1		0.1		0.4	0.3	-0.1	0.1			0.7	0.1
New Zealand	0.1	-1.3	-0.3	-0.1	-0.5	0.1	-0.1	0.1	-0.4	1.2	-0.2	-0.4
Germany		0.3	0.1		0.4	-0.1	0.4	0.8	1.0		0.6	0.1
France					0.5						-0.3	-0.6
Italy		0.1	0.1		-0.3	-0.3				0.5	0.4	-0.1
Spain		0.1	0.4			0.1		-0.1	-0.1	-0.5	-0.6	-0.3
Greece	0.1	1.5	0.2		0.1	0.1		-0.2	-0.7	4.9	5.2	5.0
Ireland		0.4	-0.3					-0.4	-0.8	-0.1	0.1	0.2
Portugal	-0.1	0.2	0.4		0.1	0.3	0.3	0.2	-0.5	1.9	-0.1	-0.8
Netherlands		-0.3	-0.1		0.3					-0.4		
Belgium		0.2			0.1						-0.3	-0.6
Denmark	0.1	-0.2				0.1	-0.2	-0.3	-0.3			
Norway					-0.2	-0.2						
Sweden	-0.5	0.2					-0.2	-0.2	-0.2			
Switzerland	0.1	0.3	1.0			-0.4	0.5	-0.5	-0.9		0.2	0.5
United Kingdom			-0.1				-0.2	-1.5	-1.5	-0.5	1.0	-1.0
Emerging Markets					0.1		0.1				0.2	
China					-0.2	-0.2				-0.2		
Taiwan										0.6		
India					0.3					0.3	0.3	
Indonesia		0.2	-0.3		0.9	0.1		-0.4	-0.3		-0.5	
Korea						0.1				-0.1	0.6	
Czech Republic			-0.2		0.2	1.2	-0.6	-0.5				
Hungary		0.0			0.3	0.1	-0.5	-0.1	-0.1			
Poland		0.6	-0.5		0.4			-0.2			0.1	-0.3
Romania												
Russia												
Turkey												
Nigeria												
South Africa												
Argentina	-0.2	-1.0										
Brazil	-0.2					0.3				0.1	0.8	0.2
Mexico					-0.2		0.2	0.5	0.2			
Venezuela	0.2			0.2	1.2	2.4	-1.3	-1.7	-1.8			

Source: Citi Investment Research and Analysis

Figure 16. Selected Countries — Economic Forecast Overview and Exchange Rate Forecasts (Percent), 2011-2016F

	10-Year Yields						Exchange Rates Versus U.S. Dollar*						Exchange Rate Versus Euro					
	2011	2012	2013	2014	2015	2016	2011	2012	2013	2014	2015	2016	2011	2012	2013	2014	2015	2016
<b>Industrial Countries</b>																		
United States	2.79	2.30	2.75	3.10	3.35	3.75	NA	NA	NA	NA	NA	NA	1.39	1.29	1.27	1.31	1.33	1.35
Japan	1.12	1.03	1.40	1.50	1.75	1.75	79	82	82	85	85	85	110	106	104	111	113	115
Euro Area	2.71	1.93	2.30	2.50	2.60	2.90	1.39	1.29	1.27	1.31	1.33	1.35	NA	NA	NA	NA	NA	NA
Canada	2.78	2.36	3.11	3.50	3.45	3.75	1.01	0.98	0.97	0.97	0.97	0.97	1.39	1.26	1.24	1.27	1.29	1.32
Australia	4.63	4.31	5.00	5.25	5.50	6.00	1.01	1.03	0.96	0.90	0.89	0.87	1.37	1.24	1.33	1.46	1.50	1.55
New Zealand	4.74	4.26	5.10	5.30	5.70	6.30	0.77	0.80	0.71	0.63	0.63	0.62	1.79	1.61	1.80	2.08	2.13	2.17
Germany	2.71	1.93	2.30	2.50	2.60	2.90												
France	3.31	3.12	3.25	3.20	3.20	3.40												
Italy	5.19	4.99	5.20	5.10	4.90	4.80												
Spain	5.43	5.30	5.05	4.80	4.60	4.40												
Netherlands	3.04	2.44	2.60	2.75	2.80	3.10												
Belgium	4.21	3.34	3.45	3.40	3.40	3.60												
Denmark	2.80	1.88	2.30	2.60	2.80	3.15	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Norway	3.07	2.38	2.75	3.10	3.30	3.65	5.66	5.87	5.90	5.73	5.62	5.52	7.84	7.54	7.50	7.50	7.49	7.48
Sweden	2.66	1.84	2.23	2.55	2.70	3.15	6.60	6.87	6.85	6.60	6.48	6.36	9.14	8.84	8.71	8.64	8.63	8.62
Switzerland	1.53	0.85	1.15	1.45	1.80	2.02	0.90	0.94	0.97	0.96	0.97	0.98	1.25	1.21	1.23	1.26	1.29	1.32
United Kingdom	3.00	2.35	2.60	2.75	3.00	3.50	1.59	1.56	1.58	1.66	1.68	1.71	0.87	0.83	0.80	0.79	0.79	0.79
<b>Emerging Markets</b>																		
China	3.52	3.27	3.52	3.90	4.52	4.77	6.46	6.30	6.19	6.09	6.06	6.02	8.42	8.10	7.86	7.98	8.07	8.16
Taiwan	1.38	1.35	1.50	1.60	1.70	1.80	29.47	29.40	28.55	28.45	29.05	29.65	38.37	37.79	36.29	37.26	38.70	40.17
India	8.25	8.25	8.25	8.25	8.25	8.25	49.19	50.23	49.37	48.43	48.26	48.10	64.04	64.57	62.75	63.42	64.28	65.15
Indonesia	7.20	6.00	6.38	6.00	6.25	6.50	8768	9174	9258	9200	9200	9200	11416	11794	11768	12047	12254	12461
Korea	3.90	3.94	4.39	4.88	5.40	5.70	1108	1126	1055	983	989	996	1443	1447	1341	1287	1318	1349
Czech Republic	3.51	3.17	3.11	3.42	3.82	4.00	17.7	19.2	19.4	18.1	17.3	16.6	23.0	24.7	24.6	23.7	23.1	22.5
Hungary	8.97	8.46	7.85	7.49	7.27	6.74	201	229	226	220	214	208	262	294	287	289	285	282
Poland	5.91	5.60	5.70	5.65	5.50	5.30	2.96	3.24	3.20	2.98	2.93	2.88	3.85	4.16	4.07	3.90	3.90	3.90
Romania	NA	NA	NA	NA	NA	NA	3.05	3.30	3.37	3.13	2.99	2.86	3.97	4.24	4.29	4.10	3.98	3.87
Russia	NA	NA	NA	NA	NA	NA	29.4	30.9	32.8	31.9	31.2	30.5	38.3	39.7	41.7	41.7	41.5	41.3
Turkey	NA	NA	NA	NA	NA	NA	1.89	1.83	1.86	1.77	1.71	1.65	2.45	2.35	2.36	2.32	2.28	2.23
Nigeria	NA	NA	NA	NA	NA	NA	155	160	163	163	165	164	202	206	208	213	220	222
South Africa	8.24	8.26	8.90	9.15	9.20	9.20	7.26	7.82	8.40	8.96	9.34	9.73	9.45	10.05	10.67	11.74	12.45	13.18
Argentina	NA	NA	NA	NA	NA	NA	4.16	5.31	5.97	6.79	7.54	8.36	5.42	6.83	7.59	8.89	10.04	11.33
Brazil	11.45	10.90	11.15	10.07	8.75	8.25	1.67	1.80	1.71	1.67	1.72	1.77	2.18	2.31	2.17	2.19	2.29	2.40
Mexico	6.87	6.52	7.50	8.10	8.00	8.00	12.5	12.3	12.3	12.3	12.6	12.8	16.3	15.8	15.6	16.1	16.8	17.4
Venezuela	13.65	12.54	12.73	13.50	13.50	13.50	4.30	4.30	6.50	6.50	9.75	9.75	5.60	5.53	8.26	8.51	12.99	13.21

\*Per USD except Euro Area, Australia, New Zealand, United Kingdom. Note: All foreign exchange forecasts are consistent with the rolling forecasts presented in Figure 85. Source: Citi Investment Research and Analysis

Figure 17. Short Rates (End of Period), as of 21 Mar 2012 (Percent)

	Current	2Q 12	3Q 12	4Q 12	1Q 13	2Q 13	3Q 13
United States	0.25	0.25	0.25	0.25	0.25	0.25	0.25
Japan	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Euro Area	1.00	1.00	0.75	0.50	0.50	0.50	0.50
Canada	1.00	1.00	1.00	1.00	1.25	1.50	1.75
Australia	4.25	4.00	4.00	4.00	4.25	4.50	4.50
New Zealand	2.50	2.50	2.50	2.50	3.00	3.50	4.00
Denmark	0.70	0.70	0.35	0.10	0.10	0.10	0.10
Norway	1.50	1.50	1.50	1.50	1.50	1.50	1.50
Sweden	1.50	1.50	1.25	1.00	1.00	1.00	1.00
Switzerland	0.00	0.00	0.00	0.00	0.00	0.00	0.00
United Kingdom	0.50	0.50	0.50	0.50	0.50	0.50	0.50
China	3.50	3.50	3.50	3.50	3.75	3.75	3.75

Note: The rates shown are overnight rates, except for Denmark, where it is the central bank's lending rate; Switzerland, where it is the SNBs three-month LIBOR target; and China, where it is the one-year deposit rate. Source: Citi Investment Research and Analysis

Figure 18. 10-Year Yield Forecasts (Period Average), as of 21 Mar 2012 (Percent)

	Current	2Q 12	3Q 12	4Q 12	1Q 13	2Q 13	3Q 13
United States	2.37	2.40	2.40	2.45	2.55	2.65	2.75
Japan	1.05	0.95	1.00	1.20	1.30	1.40	1.40
Euro area (Germany)	2.07	1.90	2.00	2.00	2.15	2.25	2.50
Canada	2.29	2.45	2.45	2.50	2.85	3.05	3.15
Australia	4.40	4.20	4.30	4.50	4.80	4.90	5.00
New Zealand	4.35	4.10	4.25	4.50	4.70	4.90	5.10
Denmark	2.10	1.86	1.95	1.95	2.10	2.20	2.50
Norway	2.63	2.33	2.43	2.45	2.65	2.75	3.05
Sweden	2.13	1.84	1.90	1.90	2.05	2.15	2.40
Switzerland	0.96	0.79	0.84	0.84	0.91	0.96	1.07
United Kingdom	2.43	2.50	2.25	2.25	2.30	2.50	2.75

Note: Bond yields measured on local market basis (semi-annual for the United States, United Kingdom, Canada, Australia, and New Zealand; annual for the rest). The 10-year yield for the euro area is the Bund yield. Source: Citi Investment Research and Analysis

Figure 19. 10-Year Yield Spreads (Period Average), as of 21 Mar 2012

	Spread vs. US\$						Spread vs. Germany					
	Current	2Q 12	3Q 12	4Q 12	1Q 13	2Q 13	Current	2Q 12	3Q 12	4Q 12	1Q 13	2Q 13
United States	NA	NA	NA	NA	NA	NA	31	51	41	47	42	42
Japan	-134	-146	-141	-127	-127	-127	-103	-95	-100	-80	-85	-85
Euro Area	-31	-51	-41	-47	-42	-42	NA	NA	NA	NA	NA	NA
Canada	-8	5	5	5	30	41	23	57	47	52	72	82
Australia	206	183	193	209	229	229	238	234	235	255	271	271
New Zealand	201	173	188	209	219	229	233	224	230	255	261	271
France	67	59	89	73	68	58	97	110	130	120	110	100
Italy	254	249	279	268	268	248	284	300	320	315	310	290
Spain	289	279	309	283	258	238	319	330	350	330	300	280
Netherlands	23	2	14	-7	-12	-12	53	53	55	40	30	30
Belgium	113	99	109	93	88	78	143	150	150	140	130	120
Denmark	-27	-55	-46	-52	-47	-47	3	-5	-5	-5	-5	0
Norway	26	-8	2	-2	8	8	56	43	45	50	50	55
Sweden	-24	-57	-51	-57	-52	-52	6	-10	-10	-10	-10	-10
Switzerland	-141	-162	-157	-163	-166	-171	-111	-111	-116	-116	-124	-129
United Kingdom	6	9	-16	-22	-27	-17	36	60	25	25	15	25

NA Not applicable. Note: Spreads calculated on annual basis (except those of the United Kingdom, Canada, Australia and New Zealand over the United States).

Source: Citi Investment Research and Analysis

Figure 20. Emerging Market Countries — Short Rates Actual and Forecast of Additional Rate Moves (End of Period), as of 21 Mar 2012

Country	Current Rate (%)	Jun 12	Sep 12	Dec 12	Total Cumulative Rate Moves Expected
South Africa	5.50	0	50	50	100
China	3.50	0	0	0	0
Czech	0.75	0	0	0	0
Indonesia	5.75	0	0	0	0
Israel	2.50	0	0	0	0
Korea	3.25	0	0	0	0
Malaysia	3.00	0	0	0	0
Mexico	4.50	0	0	0	0
Philippines	4.00	0	0	0	0
Thailand	3.00	0	0	0	0
Turkey	5.75	0	0	0	0
Hungary	7.00	0	0	-25	-25
Russia	8.00	-25	0	0	-25
Chile	5.00	0	-25	-25	-50
Poland	4.50	0	-25	-25	-50
Brazil	9.75	-75	0	0	-75
India	8.50	-50	-25	0	-75

Source: Citi Investment Research and Analysis

Figure 21. Foreign Exchange Forecasts (End of Period), as of 21 Mar 2012

	vs. USD						vs. EUR					
	Current	Jun 12	Sep 12	Dec 12	Mar 13	Jun 13	Current	Jun 12	Sep 12	Dec 12	Mar 13	Jun 13
United States	NA	NA	NA	NA	NA	NA	1.30	1.30	1.28	1.26	1.25	1.26
Japan	84	83	82	81	80	81	109	107	105	102	100	103
Euro Area	1.30	1.30	1.28	1.26	1.25	1.26	NA	NA	NA	NA	NA	NA
Canada	0.99	0.98	0.98	0.98	0.97	0.97	1.29	1.27	1.25	1.23	1.22	1.23
Australia	1.04	1.05	1.03	1.01	1.00	0.97	1.25	1.24	1.24	1.25	1.26	1.30
New Zealand	0.81	0.82	0.80	0.78	0.75	0.72	1.61	1.59	1.61	1.63	1.66	1.75
Norway	5.83	5.82	5.88	5.95	5.99	5.93	7.59	7.55	7.53	7.51	7.50	7.50
Sweden	6.85	6.82	6.88	6.95	6.98	6.89	8.92	8.84	8.81	8.78	8.75	8.72
Switzerland	0.93	0.93	0.95	0.96	0.98	0.97	1.21	1.21	1.21	1.22	1.22	1.23
United Kingdom	1.57	1.56	1.55	1.54	1.54	1.57	0.83	0.83	0.82	0.82	0.81	0.81
China	6.33	6.32	6.29	6.26	6.23	6.20	8.20	8.20	8.10	7.90	7.80	7.80
India	49.9	50.5	50.3	50.1	49.9	49.6	65.0	65.5	64.4	63.3	62.5	62.7
Korea	1126	1134	1125	1117	1104	1072	1466	1470	1440	1411	1383	1355
Poland	3.19	3.20	3.26	3.31	3.34	3.25	4.15	4.15	4.17	4.19	4.19	4.11
Russia	29.6	30.1	31.3	32.4	33.2	32.9	38.5	39.1	40.0	40.9	41.6	41.7
South Africa	7.69	7.72	7.86	7.99	8.13	8.31	10.01	10.02	10.06	10.10	10.18	10.51
Turkey	1.81	1.81	1.84	1.87	1.90	1.87	2.35	2.34	2.36	2.37	2.37	2.37
Brazil	1.82	1.82	1.79	1.77	1.75	1.72	2.37	2.36	2.29	2.23	2.19	2.18
Mexico	12.7	12.1	12.2	12.2	12.3	12.3	16.5	15.7	15.6	15.5	15.4	15.5

Note: All foreign exchange forecasts are consistent with the rolling forecasts presented in Figure 84. Source: Citi Investment Research and Analysis

Figure 22. Foreign Exchange Forecasts (End of Period), as of 21 Mar 2012

	vs. JPY					
	Current	Jun 12	Sep 12	Dec 12	Mar 13	Jun 13
United States	84	83	82	81	80	81
Japan	NA	NA	NA	NA	NA	NA
Euro Area	109	107	105	102	100	103
Canada	84	85	84	83	82	84
Australia	87	87	84	82	80	79
New Zealand	67.6	67.6	65.1	62.7	60.5	58.8
Norway	14.4	14.2	13.9	13.6	13.4	13.7
Sweden	12.2	12.1	11.9	11.6	11.5	11.8
Switzerland	90	89	86	84	82	84
United Kingdom	131	130	127	125	124	128
China	13	13	13	13	13	13
India	1.68	1.64	1.63	1.61	1.61	1.64
Korea	13.46	13.69	13.75	13.82	13.76	13.15
Poland	26.3	25.9	25.1	24.4	24.0	25.1
Russia	2.8	2.7	2.6	2.5	2.4	2.5
South Africa	10.9	10.7	10.4	10.1	9.9	9.8
Turkey	46.3	45.9	44.5	43.1	42.3	43.6
Brazil	45.9	45.6	45.6	45.7	46.0	47.4
Mexico	6.6	6.8	6.7	6.6	6.5	6.6

Note: All foreign exchange forecasts are consistent with the rolling forecasts presented in Figure 84. Source: Citi Investment Research and Analysis

## Country Commentary

### United States

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Economic growth is continuing at a modest pace sustained by increasing employment, supportive policies and a mild winter. Financial conditions have improved in part on perceptions that tail risks have eased as solid job growth in cyclically sensitive areas is bolstering the view that recovery is less vulnerable. Even depressed housing markets are reviving in spots. Near term, the focus will be on possible payback from weather-induced gains as well as drag from surging gasoline prices. The more serious threat of major fiscal restraint looms over 2013.

The Fed's new communications strategy has been a notable success in anchoring rates through a period of rising investor confidence and better economic news. Although policymakers do not seem predisposed to additional QE, the chance that growth could disappoint official projections this year has kept alive the option for reserve-neutral MBS purchases. Officials have cautioned that unemployment remains too high and despite easing financial strains, global threats to financial stability are unresolved. Broad tax hikes and spending cuts that could stall recovery are on tap for 2013 but forestalling action is unlikely before late this year or next.

Competitive pressures and economic slack have checked underlying inflation but rising oil and gasoline prices are pushing up headline measures again. Fed officials see this as a greater threat to growth than inflation as long as inflation expectations are checked. An improving job market may be just beginning to buoy wage growth and consumers remain highly resistant to broad based price increases.

Figure 23. United States — Economic Forecasts, 2011E-2013F

					2011		2012				2013	
		2011E	2012F	2013F	3Q	4QE	1QF	2QF	3QF	4QF	1QF	2Q
GDP	SAAR				1.8%	3.0%	2.0%	1.7%	2.1%	2.3%	1.2%	1.5%
	YoY	1.7%	2.1%	2.0%	1.5	1.6	2.0	2.1	2.2	2.0	1.8	1.8
Domestic Demand	SAAR				2.7	1.1	2.0	1.8	1.9	2.2	0.6	1.3
	YoY	1.8	1.8	1.7	1.8	1.4	1.8	1.9	1.7	2.0	1.6	1.5
Consumption	SAAR				1.7	2.1	2.1	2.1	1.9	2.4	1.1	1.6
	YoY	2.2	2.0	1.9	2.0	1.7	1.7	2.0	2.0	2.1	1.8	1.7
Business Investment	SAAR				15.7	2.8	2.6	5.3	5.5	5.8	6.4	5.3
	YoY	8.7	5.7	5.9	9.1	7.6	7.7	6.5	4.0	4.8	5.8	5.7
Housing Investment	SAAR				1.3	11.5	11.4	11.0	13.2	11.8	12.5	14.5
	YoY	-1.3	9.9	13.8	1.4	3.5	7.0	8.7	11.8	11.9	12.1	13.0
Government	SAAR				-0.1	-4.4	0.5	-1.9	-1.4	-1.4	-5.6	-3.4
	YoY	-2.1	-1.4	-2.7	-2.4	-2.8	-1.2	-1.5	-1.8	-1.1	-2.6	-3.0
Exports	SAAR				4.7	4.3	6.3	4.9	5.2	5.7	5.9	5.6
	YoY	6.8	5.1	5.6	6.0	5.1	4.7	5.0	5.2	5.5	5.4	5.6
Imports	SAAR				1.2	3.8	8.8	4.0	3.5	4.0	2.6	3.5
	YoY	4.9	4.5	3.6	2.1	3.6	3.7	4.4	5.0	5.0	3.5	3.4
PCE Deflator	YoY	2.5	2.1	1.8	2.9	2.7	2.3	2.0	1.9	2.0	1.8	1.7
Core PCE Deflator	YoY	1.4	1.8	1.7	1.6	1.8	1.9	1.8	1.7	1.7	1.7	1.6
Unemployment Rate	%	9.0	8.0	7.8	9.1	8.7	8.3	8.1	8.0	7.8	7.9	7.9
Federal Gov't Balance (Fiscal Year)	\$Bn	-1297	-1175	-875								
	% of GDP	-8.7	-7.6	-5.5								
General Gov't Balance (Cal Year)	% of GDP	-9.4	-7.8	-5.9								
Federal Debt	% of GDP	68	74	78								
General Gov't Debt	% of GDP	98	104	106								
Current Account	US\$b	-466	-470	-479	-441	-447	-459	-483	-460	-476	-457	-476
	% of GDP	-3.1	-3.0	-2.9	-2.9	-2.9	-3.0	-3.1	-2.9	-3.0	-2.8	-2.9
S&P 500 Profits (US\$ Per Share)	YoY	14.4	3.3	4.5	17.9	8.7	5.5	4.6	-0.6	3.8	3.0	4.0

Notes: F Citi forecast. E Citi Estimate. YoY Year-to-year percent change. SAAR Seasonally adjusted annual rate

Sources: Bureau of Economic Analysis, Bureau of Labor Statistics, I/B/E/S, Treasury Department, *Wall Street Journal* and Citi Investment Research and Analysis

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## Japan

We are again revising up our 2012 growth forecast, and now expect 1.5% growth, versus 1.2% in the February forecast and 1.0% in the January forecast. This latest revision reflects the upward revision to Q4 GDP, the further yen depreciation and tentative signs of a pickup in manufacturing activity. While we expect only modest growth in the first half of 2012 amid export weakness, activity will likely accelerate to an annual rate of 2% or higher in the second half thanks to moderately faster global growth and reconstruction demand from the earthquake. We also revise up our inflation forecasts on the back of higher energy prices and the yen depreciation.

The Bank of Japan left the size/composition of the asset purchase program unchanged this month after unexpected decisions in mid-February. This suggests that policymakers want to monitor the impact of previous policy actions. While there is some expectation that the BoJ will take another easing measure in April, we expect the BoJ to leave policy unchanged next month, assuming that domestic economic data are consistent with a gradual pick-up in economic activity. The more likely timing for the next action is probably June or July. We think the Fed may take a further easing measure in this summer and that might trigger further action by the BoJ. In that case, another expansion of the asset purchase program and/or an extension of the maximum maturity of JGBs purchased under the program (currently up to 2 years) are most likely.

Debates about the consumption tax hike are a key policy issue this year. PM Noda plans to propose this month a consumption tax bill calling for a tax rate hike from 5% currently to 8% in April 2014 and to 10% in October 2015. Given significant political hurdles to the tax hike, we have yet to reflect the government's plan in making our economic forecasts. However, if the plan is implemented, GDP growth in 2013 will probably be pushed up by nearly 2% thanks to frontloaded demand ahead of price hikes but growth in 2014 will worsen due to a resulting decline in spending as well as a permanent negative impact on real household income

Figure 24. Japan — Economic Forecasts, 2011-13F

		2011F	2012F	2013F	2011		2012				2013	
					3Q	4QF	1QF	2QF	3QF	4QF	1QF	2QF
Real GDP	YoY	-0.7%	1.5%	1.4%	-0.6%	1.6%	2.1%	1.0%	1.6%	1.6%	1.7%	1.1%
	SAAR				-0.7	1.4	0.7	2.8	1.5	1.3	1.0	0.7
Domestic Demand	YoY	0.1	2.1	1.0	0.5	2.7	2.3	1.9	1.7	1.4	1.3	0.7
	SAAR				2.0	2.1	1.1	2.6	1.2	0.6	0.7	0.3
Private Consumption	YoY	0.0	1.3	0.7	0.6	2.2	1.6	0.8	0.6	0.4	0.8	0.8
	SAAR				1.4	1.9	-1.2	0.9	0.8	1.1	0.4	0.9
Business Investment	YoY	1.0	3.3	2.9	4.5	4.0	4.4	5.0	-0.1	2.3	2.8	2.6
	SAAR				20.7	-3.8	1.1	3.6	-1.1	5.6	3.3	2.5
Housing Investment	YoY	5.1	4.2	5.6	2.9	1.8	5.4	2.5	7.1	9.2	8.1	5.5
Public Investment	YoY	-3.2	7.5	-8.1	0.2	4.3	4.7	9.6	11.5	2.5	-7.5	-14.0
Exports	YoY	0.0	1.2	4.8	-1.6	-1.2	5.8	-1.7	2.4	3.8	4.8	5.3
	SAAR				-11.8	0.8	1.3	3.5	4.0	6.2	5.3	5.5
Imports	YoY	5.8	5.2	3.0	5.8	6.2	7.0	4.2	3.7	2.8	2.6	3.0
	SAAR				4.3	5.5	4.5	2.4	2.5	2.0	3.7	3.9
CPI	YoY	-0.3	0.0	0.2	-0.3	-0.3	-0.1	0.3	0.3	0.2	0.1	0.1
Core CPI	YoY	-0.3	0.0	0.2	-0.2	-0.2	-0.2	0.3	0.3	0.2	0.1	0.1
Nominal GDP	YoY	-2.8	0.8	1.2	-2.3	0.0	1.4	0.5	1.2	1.5	1.5	0.9
Current Account	¥ tn	9.6	7.5	10.3	7.0	6.8	6.9	7.7	8.6	9.9	10.2	10.4
	% of GDP	2.1	1.6	2.2	1.5	1.5	1.5	1.6	1.8	2.1	2.1	2.2
Unemployment Rate	%	4.6	4.5	4.4	4.5	4.6	4.5	4.5	4.4	4.5	4.4	4.4
Industrial Production	YoY	-3.5	4.6	2.3	-2.8	3.7	6.7	3.2	4.8	1.4	3.3	2.9
Corporate Profits (Fiscal Year)	YoY	-17.0	21.0	18.0								
General Govt. Balance (Fiscal Year)	% of GDP	-10.7	-10.9	-8.5								
General Govt Debt	% of GDP	228	237	244								

F Citigroup forecast. SAAR Seasonally adjusted annual rate. YoY Year-to-year percent change. Corporate profits are TSE-I nonfinancials consolidated recurring profits.  
Source: Citi Investment Research and Analysis

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## Euro Area

We are slightly raising our euro area GDP forecast for a second consecutive month by 0.1 point to -1.2% for 2012, mainly caused by an increase of our forecast for Germany. While we revised somewhat up the GDP forecasts for some periphery countries as well, we continue to expect deep recessions in the periphery amid additional fiscal tightening and – even with the ECB liquidity operations — tight bank lending conditions for the private sector.

In our view, the Greek debt restructuring has not ended the sovereign debt crisis. To be clear, supported by the ECB's 3Y LTROs, peripheral markets have recently performed well. But, the underperformance of Spanish versus Italian bonds after the Spanish government's announcement that it is raising its deficit target highlights fragilities in the economic and fiscal fundamentals and in investor confidence. There are various possible triggers that could re-escalate market stress, for example: signs that fiscal deficits in peripheral countries will overshoot official targets; additional delay in the introduction and extension of the ESM; failure to agree a timely increase of the IMF's lending capacity; failure to fully ratify the fiscal compact. Increased market strains, in turn, probably would have negative consequences on the economy.

ECB officials made clear that after the strong use of the 3Y LTROs, it is now time for governments and banks to take action. Hence, unless there is another severe escalation of the crisis the ECB will likely be on hold. Without government action on fiscal and structural reforms, the ECB will probably be more reluctant to run additional 3Y LTROs in 2H 2012. The ECB is likely to leave the refi rate unchanged at 1.0% until 3Q, looking through the temporary boost to inflation from increases in energy prices and indirect taxes. As we expect more negative news on the economy and lower medium-term inflation risks, we still pencil in ECB easing (taking the refi rate to 0.5%) in the second half of this year.

*We publish further details of our European forecasts monthly in European Economic Forecast Highlights*

Figure 25. Euro Area — Economic Forecasts, 2011F-13F

		2011F	2012F	2013F	2011		2012				2013	
					3Q	4QF	1QF	2QF	3QF	4QF	1QF	2QF
Real GDP	YoY	1.5%	-1.2%	-0.2%	1.3%	0.7%	-0.7%	-1.1%	-1.5%	-1.3%	-0.6%	-0.3%
	SAAR				0.6	-1.3	-2.5	-1.3	-0.8	-0.4	0.0	0.0
Final Domestic Demand	YoY	0.5	-1.6	-0.6	0.4	-0.3	-1.4	-1.6	-1.9	-1.6	-1.0	-0.6
Private Consumption	YoY	0.2	-1.0	-0.4	0.3	-0.6	-1.1	-0.8	-1.3	-0.9	-0.6	-0.5
Government Consumption	YoY	0.1	-2.0	-1.5	0.0	-0.3	-1.4	-2.0	-2.3	-2.4	-1.7	-1.5
Fixed Investment	YoY	1.6	-2.9	-0.1	1.0	0.6	-2.4	-3.2	-3.3	-2.9	-1.4	-0.3
— Business Equipment	YoY	3.3	-2.5	0.8	2.9	1.1	-1.7	-2.6	-3.3	-2.6	-0.9	0.5
— Construction	YoY	-0.3	-4.1	-1.2	-1.1	-0.3	-3.8	-4.6	-4.2	-3.9	-2.6	-1.3
Stocks (Contrib. to Y/Y GDP Growth)		0.0	-0.2	0.0	0.0	-0.2	-0.3	-0.4	-0.2	0.0	0.0	0.0
Exports	YoY	6.3	1.7	3.7	5.5	3.6	2.2	1.7	1.0	1.8	3.0	3.3
Imports	YoY	4.0	0.1	3.1	3.3	0.6	-0.2	-0.1	-0.3	1.2	2.4	2.7
CPI	YoY	2.7	2.5	1.9	2.7	2.9	2.5	2.5	2.7	2.3	2.2	1.9
Core CPI	YoY	1.4	1.5	1.5	1.3	1.6	1.3	1.4	1.7	1.5	1.8	1.6
CPI Ex Energy and Food	YoY	1.7	1.9	1.6	1.7	2.0	1.8	2.0	2.0	1.8	1.9	1.7
Unemployment Rate	YoY	10.2	10.9	11.0	10.2	10.5	10.7	10.8	10.9	11.0	11.0	11.0
Current Account Balance	EUR bn	-29.2	-28.3	-27.8								
	% of GDP	-0.3	-0.3	-0.3								
General Government Balance	EUR bn	-394.9	-325.0	-251.1								
	% of GDP	-4.2	-3.4	-2.6								
General Government Debt	EUR bn	8217.3	8497.3	8682.4								
	% of GDP	88.4	92.5	91.2								
Gross Operating Surplus	YoY	2.6	-0.6	0.3								

Sources: Eurostat and Citi Investment Research and Analysis



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## Germany

With ongoing strong sentiment data and unusually benign weather conditions in 1Q, we no longer expect a contraction in GDP this quarter and have revised up our forecast for 2012 for the second consecutive month. While increasing energy prices undermine purchasing power of German households, we expect that wage negotiations in major sectors will result in wage gains between 3.5% and 4% on average. Furthermore, construction is likely to propel domestic demand. Depending on the outcome of the upcoming early elections in three federal states, Angela Merkel's centre-right coalition might come under pressure.

## France

With less than six weeks before the first round of the Presidential elections, the gap between the two main protagonists, incumbent Nicolas Sarkozy and Socialist primary winner François Hollande, has narrowed. A Hollande win on 6 May<sup>6</sup> would have negative consequences for France's potential growth rate, in our view, given his greater reliance on tax increases than expenditure cuts to balance the budget deficit in 2017. We argue that rating agencies would likely maintain a downward bias on the country's sovereign ratings. Turning to the fiscal compact ratification exercise, we believe that Hollande is more likely to negotiate a face-saving compromise with Angela Merkel, supplementing the Treaty by a protocol or a statement of intent on growth considerations (including Eurobonds) without any binding constraints, rather than risk another crisis.

## Italy

We expect the Italian economy to contract by 2.3% this year and by 0.4% in 2013 driven by a large contraction in domestic demand and a weak contribution from exports. The austerity measures worth around 3.6% of GDP will contribute to a fall in public and household consumption. The latter will also suffer from an increase in unemployment which is partly due to structural reforms which are likely to lead to job losses before they pave the way for the creation of new jobs over the medium-term. Investment is likely to fall sharply amid the slowdown and uncertainty regarding domestic and foreign demand and tight financing conditions.

Figure 26. Germany, France and Italy — Economic Forecasts, 2011F-13F

		Germany			France			Italy		
		2011F	2012F	2013F	2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	3.1%	0.9%	1.6%	1.7%	-0.3%	0.5%	0.4%	-2.3%	-0.4%
Final Domestic Demand	YoY	2.4	0.9	1.3	0.9	-0.3	0.4	-0.3	-3.0	-1.7
Private Consumption	YoY	1.4	0.8	1.0	0.3	-0.1	0.5	0.2	-2.2	-0.9
Fixed Investment	YoY	6.6	1.4	3.6	2.9	-1.6	0.4	-1.2	-4.8	-2.2
Exports	YoY	8.4	3.9	5.1	5.0	3.1	4.2	6.4	0.0	1.2
Imports	YoY	7.5	4.1	4.9	5.0	0.0	3.4	1.3	-4.2	-1.4
CPI	YoY	2.3	2.2	2.2	2.3	2.8	1.6	2.9	3.1	1.7
Unemployment Rate	%	6.0	5.6	5.6	9.2	9.4	9.2	8.2	9.4	11.0
Current Account	€bn	147.7	135.0	132.8	-46.8	-40.4	-23.8	-50.6	-42.1	-34.2
	% of GDP	5.8	5.2	4.9	-2.3	-2.0	-1.1	-3.2	-2.7	-2.2
General Govt. Balance	€bn	-26.7	-25.2	-27.4	-110.7	-93.6	-71.6	-61.7	-40.3	-22.4
	% of GDP	-1.0	-1.0	-1.0	-5.5	-4.5	-3.4	-3.9	-2.6	-1.4
General Govt. Debt	% of GDP	88.9	91.7	91.0	85.1	90.4	93.4	120.9	128.8	130.6
Gross Trading Profits	YoY	1.5	-0.1	6.1	3.0	-2.0	1.0	NA	NA	NA

F Citi forecast. YoY Year-to-year growth rate. Note: The German annual figures are derived from quarterly Bundesbank data and adjusted for working days. Forecasts for GDP and its components are calendar adjusted. Sources: Deutsche Bundesbank, Statistisches Bundesamt, INSEE, and Citi Investment Research and Analysis

<sup>6</sup> See "French Elections: Hollande's Elysian Dream", *Euro Weekly*, 9 March 2012, Citi

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## Spain

We expect the Spanish economy to contract by 2.7% this year and by 1.2% in 2013 driven by huge fiscal tightening, which aims to meet the deficit targets of 5.3% and 3.0% of GDP for 2012 and 2013, respectively. We expect investment to continue to contract sharply in 2012 whilst exports are expected to grow but at a more subdued rate than in 2011. The weakness of the economy means that the fiscal deficit will probably, once again, clearly overshoot the government targets.

## Greece

The Greek economy shrank by 6.9% in 2011 and we expect it to continue to contract sharply. Taking into account the latest available data for 2011 we have revised the 2011 deficit reading from 14.1% of GDP to 9.2% and we expect a reduction to 6.4% in 2012 due to further austerity measures. The PSI deal helped Greece avoid a disorderly default but we do not expect it to return the country to a sustainable fiscal path. With our outlook on growth and revenues, we project the Greek debt to GDP to be about 145% in 2020.

## Ireland

We are edging up our 2012 GDP growth forecast from minus 0.7% to minus 0.3%, following recent gains in the PMI surveys and jobs. Nevertheless, we continue to believe that Ireland's economy is likely to undershoot official forecasts, leading to repeated fiscal deficit overshoots. Even with the expected deal to restructure the government's Promissory Notes, we believe that Ireland will probably need a second bailout package — and this is likely to include a serious debate as to whether PSI is needed to return Ireland to fiscal sustainability.

## Portugal

We continue to expect the Portuguese economy to experience a sharp recession over the next two years mainly caused by the large fiscal adjustment required to meet the 4.5% and 3% of GDP deficit targets for 2012 and 2013, respectively. The export sector, which was the only source of growth in 2011, is expected to slow this year. As Portugal will probably be unable to return to market funding we expect the discussions on a second bailout package to start this year and we expect a PSI-style debt restructuring, probably in 2013.

Figure 27. Spain, Greece, Ireland and Portugal — Economic Forecasts, 2011F-13F

		Spain			Greece			Ireland			Portugal		
		2011F	2012F	2013F	2011F	2012F	2013F	2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	0.7%	-2.7%	-1.2%	-6.9%	-6.5%	-2.4%	0.8%	-0.3%	0.0%	-1.6%	-5.3%	-3.0%
Final Domestic Demand	YoY	-1.7	-5.7	-3.4	-9.6	-8.4	-3.6	-4.2	-6.6	-3.3	-5.3	-8.6	-4.1
Private Consumption	YoY	-0.1	-2.6	-1.8	-7.1	-7.2	-3.6	-3.2	-1.6	-2.2	-3.9	-5.8	-2.9
Fixed Investment	YoY	-5.1	-9.9	-5.5	-20.6	-11.3	0.1	-16.2	-26.7	-20.6	-11.5	-15.9	-7.6
Exports	YoY	9.1	2.1	4.6	-0.8	1.2	2.0	4.8	4.1	3.3	7.4	1.8	3.1
Imports	YoY	-0.1	-8.3	-2.3	-8.0	-10.5	-2.0	-0.3	-0.4	1.3	-5.4	-7.3	-0.7
CPI	YoY	3.1	2.3	1.8	3.1	1.3	-0.3	-0.8	0.2	0.0	3.6	3.1	2.2
Unemployment Rate	%	21.6	24.3	25.7	17.3	22.6	24.9	14.4	15.1	16.6	12.7	15.5	17.3
Current Account	€bn	-39.8	-31.5	-25.0	-21.1	-17.1	-13.9	0.9	4.4	5.5	-13.9	-8.3	-5.0
	% of GDP	-3.7	-3.0	-2.3	-9.6	-8.5	-7.4	0.6	2.8	3.5	-8.1	-5.0	-2.9
General Govt. Balance	€bn	-90.4	-70.1	-43.8	-19.9	-12.8	-7.3	-18.1	-16.1	-13.5	-6.9	-7.8	-8.5
	% of GDP	-8.5	-6.6	-4.0	-9.2	-6.4	-3.7	-10.0	-9.6	-9.8	-4.0	-4.7	-4.9
General Govt. Debt	% of GDP	71.8	83.9	90.0	165.1	163.1	173.3	105.4	116.7	127.2	105.8	120.5	106.2

F Citi forecast. YoY Year-to-year growth rate. For Ireland we show the GDP deflator rather than the CPI.  
Sources: ISTAT, INE, Haver Analytics, Eurostat, and Citi Investment Research and Analysis

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## Netherlands

Surveys and data suggest the economy remains in recession. With further declines in house prices and rising unemployment, we have revised down our 2012 GDP forecast. The centre-right minority government initially agreed to add extra fiscal tightening if the deficit-to-GDP ratio exceeds the target, as in 2011. However, in our view, extra tightening will probably not be put in place this year, given the opposition party's threat to veto the ratification of the fiscal compact if fiscal policy turns more restrictive. Although the eurosceptic freedom party asked for a referendum regarding membership in the euro, we do not expect that this initiative will go ahead.

## Belgium

Despite solid GDP growth of 1.9% in 2011, Belgium slipped into recession in the final two quarters, with GDP contracting at an average annualised rate of 0.34%. With an extra round of fiscal policy tightening announced in mid-March worth a combined €2.5bn, we are more confident that the government will hit its objective of reducing the budget deficit to 2.8% of GDP and exit the excessive debt procedure in 2012. While modest additional budget savings will likely be required before the summer, the gradual reduction in Belgian spreads and recovery in sentiment should help limit the GDP contraction to 0.3% instead of our previous forecast of -0.5%.

## Slovakia

Growth improved further in early 2012. Hence, we are raising our 2012 GDP forecast to 1.5%YoY in 2012 from 0.7%YoY previously, but keeping our 2013 forecast around 2%YoY. The new single party left-wing government is likely to introduce measures to raise revenues and, probably also measures to restrain spending, aiming to cut the deficit below 3% of GDP. We expect the government debt-to-GDP ratio will stabilize around 48%, which does not provide room to relax without activating the debt brake procedure.

## Slovenia

The 2011 fourth quarter GDP outturn points to a more severe recession in 2012 with GDP falling 1.2%YoY whereas we had initially expected a milder recession of -0.4%. Our forecast is more negative than official expectations. The European Commission plans to visit Slovenia in April to assess economic policy and is likely to propose a set of structural reforms. This could provide the political capital for the new right-wing coalition that was established in February and which wants to cut the fiscal deficit to 3.5% of GDP in 2012 from 6% in 2011. Our forecast suggests public debt will peak at around 53% of GDP in 2013-14.

Figure 28. Netherlands, Belgium, Slovakia and Slovenia — Economic Forecasts, 2011F-2013F

		Netherlands			Belgium			Slovakia			Slovenia		
		2011F	2012F	2013F	2011F	2012F	2013F	2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	1.3%	-1.5%	0.3%	1.9%	-0.3%	0.8%	3.3%	1.5%	2.1%	0.2%	-1.2%	1.5%
Final Domestic Demand	YoY	0.8	-1.5	0.1	2.1	-0.2	0.4	0.6	0.7	1.4	-2.6	-2.8	-0.2
Public Consumption	YoY	0.4	-0.9	0.2	0.8	0.2	0.0	-3.5	-1.1	-0.7	-0.9	-1.5	0.2
Private Consumption	YoY	-0.9	-1.0	0.2	0.8	0.1	0.4	-0.4	-0.5	0.9	-0.1	-0.9	1.0
Investment (Ex Stocks)	YoY	5.6	-3.5	-0.5	5.1	-0.7	0.7	5.7	4.4	3.5	-10.2	-2.3	2.2
Exports	YoY	3.7	0.1	2.5	4.8	-1.1	2.6	10.8	3.2	4.6	7.8	-1.0	2.0
Imports	YoY	3.5	-0.4	2.4	5.2	-1.0	2.0	4.5	3.1	3.8	4.7	-2.9	1.6
CPI (Average)	YoY	2.3	2.6	1.8	3.5	2.9	1.7	3.9	3.1	2.9	1.8	0.6	2.4
Unemployment Rate	%	5.3	6.2	6.1	7.2	7.9	8.3	13.2	13.7	13.7	8.2	9.6	10.5
Current Account	% of GDP	8.1	7.3	7.3	-0.7	-2.0	-1.3	0.3	0.3	0.2	-0.7	0.0	0.5
General Govt Balance	% of GDP	-4.9	-4.5	-3.8	-3.7	-2.8	-1.9	-5.0	-4.8	-3.2	-5.8	-4.5	-3.3
General Govt Debt	% of GDP	66.4	72.7	72.6	96.7	108.4	107.8	43.9	46.8	48.3	47.7	51.7	53.1

F Citi forecast. YoY Year-on-year growth rate. Sources: National sources and Citi Investment Research and Analysis

## UK

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Our UK forecasts are little changed from last month, and we continue to look for GDP growth of about 0.2% this year and about 1% in 2013. This is the second month in a row with little change to our forecasts, and follows a series of downgrades from May-2011 to early 2012. We suspect that the economy is roughly flat but with an erratic “saw-toothed” pattern. GDP fell slightly (0.2% QoQ) in Q4-11, and we expect a slight rise in Q1-2012 (0.2%), a negative Q2 (down 0.3% QoQ, hit by the extra Bank Holiday) and a positive Q3 (up 0.5%, helped by the rebound from the adverse Q2 effect). Inflation is likely to continue to fall rapidly. CPI inflation already has fallen from 5.2% YoY in Sep-11 to 3.4% YoY in Feb-12 and will probably drop below the 2% target around September this year. The inflation boost from the low pound is past its peak, while there are powerful disinflationary headwinds from weakness in real incomes, the rise in internet shopping plus the ample slack in the labour market (exacerbated by the inflow of workers from other EU countries). We expect that inflation will fall slightly below the 2.0% target on average in 2013 and later years.

The fiscal deficit probably totaled about £120bn (7.9% of GDP) in 2011/12, and will temporarily fall to about 6% of GDP in 2012/13 because of the absorption of the pension fund of the state-owned postal service. The deficit will then rebound to an underlying level of about 7% of GDP in 2013/14. The medium-term trend is of a gently falling deficit, with the general government gross debt/GDP ratio likely to reach about 100% in 2014 or 2015. Markets no longer expect any further expansion of QE. The MPC believe they have already provided enough stimulus to lift growth above trend in H2 this year and in 2013. If they are correct, further QE will indeed be unlikely. In practice, we expect that both growth and inflation will undershoot MPC forecasts, while EMU risk will resurface. As a result, we believe that extra QE is more likely than not.

Figure 29. United Kingdom — Economic Forecasts, 2011F-2013F

					2011		2012				2013	
		2011F	2012F	2013F	3Q	4QF	1QF	2QF	3QF	4QF	1QF	2QF
Real GDP	YoY	0.9%	0.2%	0.9%	0.5%	0.7%	0.5%	0.1%	0.1%	0.2%	0.4%	1.1%
	SAAR				2.1	-0.8	0.6	-1.3	1.8	-0.3	1.3	1.6
Domestic Demand (Incl. Inventories)	YoY	-0.8	-0.5	-0.1	-1.4	-0.7	0.5	-0.5	-1.0	-0.9	-0.8	0.1
	SAAR				3.0	-2.8	0.7	-2.8	1.1	-2.5	0.8	0.8
Consumption	YoY	-0.8	1.2	1.6	-1.3	-0.6	0.4	1.2	1.7	1.4	1.4	1.6
	SAAR				-0.5	1.9	2.0	1.6	1.3	0.9	2.1	2.2
Investment	YoY	-1.7	-5.9	-7.7	-1.0	-3.7	-3.5	-6.2	-5.5	-8.5	-9.6	-8.4
	SAAR				-3.8	-10.6	-2.0	-8.1	-1.1	-21.5	-6.3	-3.3
Exports	YoY	4.8	4.5	5.4	2.9	1.1	1.1	4.4	6.6	5.8	5.1	5.5
	SAAR				-2.8	9.5	6.9	4.5	5.5	6.3	4.2	6.0
Imports	YoY	0.6	2.2	2.2	-1.4	-2.2	1.5	2.2	2.9	2.2	1.3	2.2
	SAAR				0.9	1.7	6.8	-0.2	3.3	-0.9	2.9	3.5
Unemployment Rate	%	8.1	9.2	9.9	8.3	8.4	8.8	9.1	9.5	9.6	9.9	9.9
CPI Inflation	YoY	4.5	2.4	1.9	4.7	4.7	3.2	2.5	2.2	1.7	1.8	2.0
Merch. Trade	£bn	-97.9	-84.7	-68.3								
	% of GDP	-6.5	-5.5	-4.3								
Current Account	£bn	-38.9	-25.4	-3.9								
	% of GDP	-2.6	-1.6	-0.2								
PSNB	£bn FY	-120.5	-95.8	-115.5								
	% of GDP	-7.9	-6.1	-7.2								
General Govt. Balance	% of GDP	-8.5	-6.7	-7.8								
Public Debt	% of GDP	83.9	90.1	96.5								
Gross Nonoil Trading Profits	YoY	12.2	5.9	7.2								

Note: Fiscal deficit shown excluding financial interventions. F Citi forecast. YoY Year-to-year growth rate. Sources: ONS and Citi Investment Research and Analysis

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## Switzerland

Recent gains in the PMI and Kof surveys suggest that the Swiss economy is doing a bit better than we expected, and hence we are raising our 2012 GDP forecast from minus 0.2% to plus 0.1%, and lifting our 2013 forecast from minus 0.1% to plus 0.9%. The revisions are concentrated in investment and exports. Deflation is likely to continue for the next 2-3 years, prompting the SNB to keep rates ultra-low for an extended period.

## Sweden

Stronger than expected growth in 4Q 2011 has pushed up our GDP growth forecast for this year (by 0.2pp to 0.7% y/y). This, however, does not change the overall picture of a marked growth slowdown. In February, the key policy rate was cut by another 25bp to 1.50% and the new conditional interest rate path signals no additional easing ahead. Continued downgrades to the Riksbank's growth outlook, however, should justify further near-term easing. We expect the Riksbank will cut the key policy to 1.0% by midyear.

## Denmark

Although recovering, GDP only showed meagre growth in 4Q, supporting the outlook for a prolonged period of limited economic expansion. Without the government's expansionary policy stance this year, economic growth would have been around zero this year. The euro area debt crisis has led to upward pressures on the krone and rising currency reserves, prompting the DNB to cut deeper than the ECB. If, as we expect, the ECB cuts further and the DKK remains firm, the DNB will probably continue to cut as well.

## Norway

The domestic data flow has, so far, this year been strong, driven by a recovery in private consumption and high activity in the oil sector. Thanks to the stabilizing effect that the petroleum industry has on the Norwegian economy, mainland GDP growth is set to outpace most other European economies this and next year. The Norges Bank cut rates again in March (by 25bp to 1.5%), reflecting weaker global growth, low inflation, the strong NOK and unrest on financial markets. Unless we see another marked strengthening of the NOK, the policy rate should remain stable for the remainder of the year. Domestic conditions do not warrant lower key rates and low rates could fuel a housing bubble.

Figure 30. Switzerland, Sweden, Denmark and Norway — Economic Forecasts, 2011-2013F

		Switzerland			Sweden			Denmark			Norway		
		2011F	2012F	2013F	2011F	2012F	2013F	2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	1.9%	0.1%	0.9%	4.0%	0.7%	1.9%	1.1%	0.7%	1.2%	2.7%	2.5%	2.9%
Final Domestic Demand	YoY	1.8	1.5	0.0	2.8	0.4	1.9	-0.3	1.1	1.1	3.2	2.6	2.9
Public Consumption	YoY	1.7	1.2	0.9	1.8	0.8	1.2	-0.7	0.8	0.1	1.6	2.3	2.2
Private Consumption	YoY	1.0	0.8	0.4	2.1	0.6	2.0	-0.2	0.9	1.3	2.3	2.0	2.4
Investment (Ex Stocks)	YoY	3.9	3.7	-1.3	6.3	-0.5	2.7	0.3	2.5	2.1	8.4	4.6	5.4
Exports	YoY	3.4	-1.4	2.0	7.0	0.3	3.8	7.1	1.1	2.7	1.2	2.4	4.8
Imports	YoY	1.9	-1.3	0.5	6.3	0.2	3.8	5.4	1.0	2.7	1.9	3.0	3.5
CPI (Average)	YoY	0.2	-1.2	-1.7	2.9	1.2	1.9	2.7	2.0	1.5	1.3	1.7	2.0
Unemployment Rate	%	3.1	3.5	4.2	7.5	7.8	8.0	7.6	7.7	7.8	3.3	3.4	3.4
Current Account	% of GDP	15.0	13.6	13.7	7.2	7.5	7.8	6.5	5.4	5.2	14.0	14.3	14.9
General Govt Balance	% of GDP	0.6	0.0	-0.5	0.1	-0.4	-0.2	-2.5	-5.2	-3.9	12.0	12.5	13.5
General Govt Debt	% of GDP	53.0	52.0	52.0	36.9	36.6	35.7	45.4	49.4	52.0	NA	NA	NA

<sup>a</sup> For Norway, mainland GDP. F Citi forecast. YoY Year-on-year growth rate. Sources: National sources and Citi Investment Research and Analysis

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## Canada

The outlook for Canada is marginally improved, reflecting positive inroads towards the containment of the EA crises, somewhat more robust demand from the U.S. and temporary lifts from unseasonably warm weather in North America.

The Canadian economy also performed somewhat better than expected in the later half of 2011, helping the nation to register a 2.5% Y/Y rate of growth for the entire year. Nonetheless, we maintain our anticipation of lackluster activity over the medium term amid moderating foreign and domestic demand.

The European recession; deceleration of Asian growth to more sustainable levels; U.S. fiscal consolidation and household deleveraging; and the strong Canadian dollar will weigh on Canadian exports. Internally, a less robust capex revival; smaller government; and softer consumer spending amid weakening labor markets and mounting debt, should dampen domestic demand.

Risks remain two-sided. Contagion and reduced risk appetite stemming from the EA sovereign debt and banking crises are the premier threat to the outlook. Other downside risks include the possibility of extremely weak U.S. demand amid fiscal restraint; and Canadian consumer retrenchment under the weight of massive debt obligations and/or on account of a disorderly unwind in housing market activity.

Meanwhile, upside risks include faster-than-expected EM growth and higher global commodity price inflation; above-forecast U.S. activity; and leverage-driven Canadian consumer spending. A sharper-than-anticipated slowdown in Asian growth and rising oil prices are emerging risks to the inflation outlook.

Markets are now pricing in monetary policy tightening within the next nine months on unshaken economic fundamentals and above-target inflation. But we posit that the BoC will likely keep rates unchanged this year to lean against headwinds.

Figure 31. Canada — Economic Forecast, 2011F-2013F

		2011F	2012F	2013F	2011		2012				2013	
					3Q	4QF	1QF	2QF	3QF	4QF	1QF	2QF
Real GDP	YoY	2.5%	2.0%	2.3%	2.6%	2.2%	1.8%	2.4%	1.9%	2.1%	2.1%	2.2%
	SAAR				4.2	1.8	2.0	1.6	2.1	2.6	2.0	2.1
Final Domestic Demand	YoY	3.0	2.1	2.6	2.8	2.1	2.2	1.9	2.0	2.2	2.2	2.6
	SAAR				1.7	2.1	2.6	1.1	2.2	2.8	2.9	2.7
Private Consumption	YoY	2.2	2.4	2.3	2.2	1.8	2.5	2.3	2.4	2.3	2.1	2.4
	SAAR				1.8	2.9	3.2	1.1	2.4	2.6	2.4	2.4
Government Spending	YoY	0.5	-2.2	0.6	0.1	-1.5	-2.4	-2.7	-2.4	-1.3	0.1	0.7
	SAAR				-1.1	-3.1	-4.9	-1.5	0.1	1.0	0.9	0.9
Private Fixed Investment	YoY	9.3	5.6	5.7	8.5	8.1	6.7	5.5	5.2	4.9	5.0	5.5
	SAAR				5.2	6.3	6.5	4.0	4.0	5.3	6.9	5.7
Exports	YoY	4.4	5.0	3.5	5.6	4.5	4.6	7.1	4.2	4.1	3.2	3.0
	SAAR				16.0	4.6	5.0	3.3	3.8	4.4	1.6	2.5
Imports	YoY	6.5	2.8	4.5	4.6	5.3	4.0	1.3	2.7	3.2	3.7	4.4
	SAAR				-1.5	2.2	2.5	2.0	4.0	4.5	4.5	4.5
CPI	YoY	2.9	2.1	1.8	3.0	2.7	2.4	2.2	2.1	1.8	1.8	1.2
Core CPI	YoY	1.7	2.0	2.0	1.9	2.0	2.1	2.0	1.9	1.8	1.9	1.9
Unemployment Rate	%	7.5	7.2	6.9	7.3	7.5	7.5	7.3	6.9	7.2	7.2	7.0
Current Account Balance	C\$bn	-48.3	-31.0	-33.2	-49.3	-41.3	-29.1	-28.3	-32.6	-34.1	-29.8	-35.0
	% of GDP	-2.8	-1.7	-1.8	-2.9	-2.4	-1.6	-1.6	-1.8	-1.9	-1.6	-1.9
Net Exports (Pct. Contrib.)		-1.3	0.4	-0.8	5.2	0.7	0.6	0.2	-0.5	-0.5	-1.5	-1.1
Inventories (Pct. Contrib.)		0.2	-0.3	0.2	-2.8	-1.0	0.2	0.2	0.2	0.1	0.3	0.3
Budget Balance (Fiscal Year)	% of GDP	-1.8	-1.5	-0.9								
Federal Budget Debt	% of GDP	33.7	33.8	33.2								
General Govt. Debt	% of GDP	79.0	79.2	78.6								

F Citi forecast. YoY Year-to-year percent change. SAAR Seasonally adjusted annual rate. Sources: Statistics Canada, and Citi Investment Research and Analysis



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## Australia

Despite a soft end to last year, our latest forecasts continue to envisage a solid pick up in economic growth later this year and into 2013. Our GDP forecasts of 3.4% in 2012 and 3.9% in 2013 are above consensus. Domestic demand is already strong, thanks to the boom in business investment, so the forecast pick-up in GDP growth reflects the normalisation of exports after last year's flood damage to coal exports. That said, the economy remains divided between rapid growth in mining, energy and related sectors but soft household demand. The high AUD also is weighing on non-mining parts of manufacturing and tourism. It also is possible that the economy's speed limit has come down with the slowdown in population and labour force growth. But the near term inflation outlook still appears favourable enough to allow the RBA to lower the cash rate, probably the final time in this cycle, before the middle of the year.

## New Zealand

RBNZ Governor Alan Bollard has further distanced himself from previous references for tighter monetary policy by stating that the OCR could remain at its current level for much of 2012. In an appearance on public television, he has even gone so far as to say the OCR could even fall, although we view this as an attempt at jawboning the currency lower, and little more. At it stands, the NZD is hampering rebalancing of the New Zealand economy and we have lowered our forecast for GDP in 2012. Growth is forecast to accelerate in 2013 as Christchurch reconstruction work begins in earnest. The boost to construction will lift prices for materials and labour, but we expect the CPI to remain well contained. Near-term downside risks from Europe have abated, only to be replaced with the threat of rising global oil prices.

Figure 32. Australia and New Zealand — Economic Forecast, 2011F-2013F

	Australia			New Zealand		
	2011	2012F	2013F	2011F	2012F	2013F
Real GDP <sup>a</sup>	2.0%	3.4%	3.9%	1.5%	1.3%	2.3%
Real GDP (4Q versus 4Q)	2.3	3.8	3.7	1.7	2.1	2.0
Real Final Domestic Demand	4.1	4.0	4.4	2.3	1.7	2.8
Consumption	3.4	3.1	3.2	2.6	2.3	2.1
Govt. Current & Capital Spending <sup>b</sup>	-0.6	0.8	3.2	2.0	1.3	1.3
Housing Investment	1.1	-0.8	4.5	-13.7	7.4	12.6
Business Investment <sup>c</sup>	16.9	13.4	9.3	5.5	0.1	5.0
Exports of Goods & Services	-1.6	8.9	8.0	2.6	4.0	1.6
Imports of Goods & Services	11.6	8.9	8.0	6.6	2.7	3.7
CPI	3.4	2.6	3.4	4.0	1.6	2.4
CPI (4Q versus 4Q)	3.1	3.4	3.1	1.8	2.2	2.4
Unemployment	5.1	5.4	4.9	6.5	6.4	5.6
Merch. Trade, BOP (Local Currency, bn)	18.1	5.8	-19.1	3.3	2.4	-0.4
Current Account, (Local Currency, bn)	-32.6	-43.3	-79.6	-8.1	-10.8	-16.3
Percent of GDP	-2.3	-2.9	-5.0	-4.0	-5.2	-7.6
Budget Balance <sup>d</sup> (Local Currency, bn)	-47.7	-25.5	3.0	-16.0	-12.0	-6.0
Percent of GDP	-3.4	-1.8	0.2	-8.0	-6.0	-3.0
General Govt. Debt (% of GDP) <sup>e</sup>	5.9	7.2	6.7	20.9	26.8	30.0
Gross Trading Profits <sup>f</sup>	6.2	5.4	7.3	NA	NA	NA

BOP Balance of payments basis. CPI Consumer Price Index. F Citigroup forecast. NA Not available. <sup>a</sup>Averaged-based GDP in Australia and New Zealand. <sup>b</sup>In New Zealand excludes capital spending. <sup>c</sup>In New Zealand includes government capital spending. <sup>d</sup>Fiscal year ending June. Australia's underlying cash balance. <sup>e</sup>Australia and New Zealand Budget definition and forecasts. <sup>f</sup>Company gross operating surplus. Source: NZIER and Citi Investment Research and Analysis.



## China

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Recent data point to a sharp slowdown of economic activity. Real growth of industrial production fell to 11.4% YoY from 12.8% in Dec, the slowest rate since Jul 2009. Electricity output increased by 7.1% YoY, and steel and cement output rose by 4-5%, all registering the lowest pace in the past year. Retail sales grew by 14.7% in nominal terms, significantly lower than the 16-18% range observed in 2011. Fixed asset investment grew by 21.5% YoY and property investment increased by 27.8%, beating expectations. However, we doubt this speed will be sustainable, in light of the sharp slowdown toward the end of 2011, and sluggish land acquisition and new starts. Two-month export and import growth both fell to single digits, reflecting weakening external and domestic demand. In addition, broad money growth fell short of the 2012 target of 14%, while two-month new lending and total social financing declined relative to the same period of last year, partly due to lower demand. We continue to think 1Q growth may fall to 8% YoY or lower from 8.9% in 4Q-2011.

The drop in inflation clears the way for further policy easing. CPI inflation fell to 3.2% YoY in Feb, the lowest level in 20 months. As a result, the one-year deposit rate (3.5%) is now positive in real terms. Meanwhile, PPI inflation fell to zero. Economic slowdown and stabilizing food prices should help contain inflationary pressures, and we expect CPI inflation to fall briefly below 3% around the middle of the year, and annual average inflation may ease to 3.3%, undershooting the official target of 4%. The combination of falling inflation and weakening growth creates conditions for policy easing.

Nevertheless, delays in the policy response may risk prolonging the growth downturn. We believe the government is effectively targeting 8.0-8.5% growth in 2012, despite the downgrade of official growth target to 7.5%. The recently approved budget allows a deficit of 1.5% of GDP, but according to our assessment, the budget deficit is actually 2.4% of GDP if standard fiscal accounting is employed. Both the fiscal and monetary policies should be supportive of above-8% growth. However, we think the monetary easing so far is not sufficient to prevent a further slowdown in investment, and more RRR cuts are needed to boost money and credit growth and investment appetite. The risk of further economic slowdown in 2Q would increase if policy actions fall behind the curve.

Figure 33. China — Economic Forecasts, 2011F-2013F

					2011		2012				2013	
		2011	2012F	2013F	3Q	4Q	1QF	2QF	3QF	4QF	1QF	2QF
Real GDP	YoY	9.2%	8.4%	8.6%	9.1%	8.9%	8.0%	8.2%	8.8%	8.6%	8.7%	9.3%
Real Final Domestic Demand	YoY	10.4	9.3	9.2								
Consumption	YoY	10.0	9.7	9.7								
Fixed Capital Formation	YoY	10.8	8.8	8.8								
Industrial Production	YoY	13.9	11.6	12.2	13.8	12.8	11.6	11.0	11.0	11.9	12.0	12.3
Exports	YoY	20.3	5.1	12.9	20.6	14.3	7.8	3.8	3.8	3.1	6.2	10.0
Imports	YoY	24.8	8.3	15.9	24.8	20.1	8.3	5.3	5.3	8.1	11.2	13.0
Merchandise Trade Balance	\$bn	155.1	107.6	65.6	62.7	48.2	-4.3	41.8	41.8	41.8	28.3	-17.8
FX Reserves	\$bn	3181	3322	3444	3,202	3,181	3,177	3,229	3,280	3,322	3,319	3,367
Current Account	% of GDP	2.8	2.0	1.5								
Fiscal Balance	% of GDP	-1.3	-2.0	-1.5								
General Govt. Debt	% of GDP	15.3	15.6	15.2								
Urban Unemployment Rate	%	4.1	4.2	4.1	4.1	4.2	4.2	4.2	4.2	4.1	4.1	4.1
CPI	YoY	5.4	3.3	3.7	6.3	4.6	3.7	3.2	2.8	3.6	3.9	3.7
Exchange Rate (end period)	CNY/\$	6.29	6.26	6.14	6.38	6.29	6.33	6.32	6.29	6.26	6.23	6.20
1-Yr Deposit Rate (end period)	%	3.50	3.50	3.75	3.50	3.50	3.50	3.50	3.50	3.50	3.75	3.75

Note: F Citi forecast. E Citi estimate. YoY Year-to-year percent change. SAAR Seasonally adjusted annual rate. \*Based on official data. The ratio was roughly 50% in 2010 if the debt of Ministry of Railway and local government debt as audited by the National Auditing Office are included. Sources: Haver Analytics and Citi Investment Research and Analysis

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## India

Growth trends continue to be weak with 3QFY12 GDP (Oct-Dec) growth coming in at 6.1% v/s 7.7% and 6.9% growth in 1Q and 2QFY12 respectively. This is the weakest reading in three years. Moreover, the January factory output numbers, which came in strong at 6.8% YoY, benefited from erratic strength by "food products" which were up 93% YoY (with a weight of 7.3%). If we exclude that, growth was in the red. We are maintaining our 7% GDP estimate for FY13 as recent steps taken on the infrastructure front are positive and bodes well for the investment cycle recovering in 2HFY13.

Set against a weak political backdrop, the FY13 budget posted no surprises, playing safe economically as well as politically. Consequently, it had none of the reform thrust that the market was hoping for. Looking at the budget arithmetic, the budget deficit is budgeted at 5.1% in FY13 from 5.9% in FY12 (this marks a 100bps+ slippage from the FY12 budgeted deficit of 4.6%). While growth assumptions are realistic, we could see slippage on revenues and expenditures. The revenue numbers are dependent on growth sustaining and the markets holding up. On the expenditure front, the slippage could stem from fuel subsidies. We expect to see the FY13 deficit being missed by ~40bps, to 5.5% of GDP.

Reversing four months of a declining trend, headline WPI inflation in Feb came in at 6.95% YoY while the CPI print came in at 8.8%. The key reason for this was the wearing out of the seasonal/base effect in fruit and vegetables. On rates, in addition to trends in core inflation, taking into account the additional variables for monetary easing — (a) higher oil prices and suppressed inflation, (b) currency depreciation, (c) fiscal slippages and (d) price pressures at the retail level and (e) the likelihood of less than expected fiscal consolidation in FY13 — we are revising our rate call reduction for 2012 from 100bps to 50-75bps.

Trends in the currency are likely to remain volatile through 2012 and depend on both domestic and global factors. We expect the unit will oscillate around Rs50/USD for the next twelve months. However, a risk-off environment or oil trending higher could result in rupee weakness.

Figure 34. India — Economic Forecasts, FY2011/12-2013/4F

		FY 11/12F	FY 12/13F	FY 13/14F
Real GDP	YoY	6.9%	7.0%	7.5%
Final Domestic Demand	YoY	5.9	6.3	7.1
Private Consumption	YoY	6.5	6.5	6.7
Fixed Investment	YoY	5.6	6.5	8.0
Exports	YoY	14.3	13.5	15.0
Imports	YoY	17.5	8.3	10.8
Wholesale Price Index*	YoY	9.0	7.0	6.5
Consumer Price Index	YoY	8.0	7.0	5.0
Unemployment Rate	%	NA	NA	NA
Current Account	US\$ bn	-64.2	-73.6	-76.8
	% of GDP	-3.5	-3.6	-3.2
Consolidated Fiscal Balance	% of GDP	-8.0	-7.7	-7.5
Centre Fiscal Balance	% of GDP	-5.9	-5.5	-5.0
US Dollar Exchange Rate	Average	49.2	50.2	49.0

Note: \* In India, policymakers look at the wholesale price index. Sources: Haver Analytics and Citi Investment Research and Analysis

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## Korea

After the big decline in January, exports rebounded sharply in February by growing 20.6%YoY, resulting in 5.6%YoY growth during the first two months. The February increase was partly attributable to more working days in the month than a year ago due to the Lunar New Year holidays falling in January this year. However, it is worth noting that exports to China and Europe increased by 9.9%YoY and 20.9% during the month. Although the jobless rate spiked to 3.7% s.a. in February (vs. 3.2% s.a. in January), job growth continued, registering +132K MoM. Headline inflation fell to 3.1% YoY in February from 3.4% in January, due to the moderation of agricultural goods inflation and base effects. Despite concerns on economic growth and moderation of headline inflation, the BoK decided to hold its policy rate at the March MPC meeting and expressed its worry on inflation expectations. Expected inflation surveyed by the BoK in February was still high at 4.0% YoY and the recent oil price hike may bring second-round impacts to industrial goods prices as well as services prices in the coming months. Therefore, we believe a rate cut to support economic growth is unlikely this year.

## Indonesia

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Negotiations are ongoing between the government and parliament surrounding plans to hike fuel and electricity prices on 1-Apr by 33% and 10%, respectively. We see a high chance that the fuel price hike will go through, although the electricity tariff hike may be subject to compromise. Without the latter, our YE12 headline CPI forecast would be closer towards 6.9% instead of 7.2% if the electricity price hike goes through. We are slightly lowering our GDP growth forecast to 6.2% from 6.3% for 2012E; although we do not think the further downside from this is significant. While consumption may be impacted temporarily by higher inflation, there could be compensatory stimulus from the budget. The broader macro backdrop is also different today versus that in 2008 (when fuel prices were also hiked 33%). The response of monetary policy should be less pro-cyclical (we expect BI will not raise its policy rate this year) and the financial sector is more resilient given higher reserve coverage and stronger liquidity positions, as well as lower NPL levels, in the overall banking sector. We think the structural deterioration in the trade balance deserves more attention. The non-natural resource trade deficit continues to grow and this could be exposed further if non-oil commodity prices (e.g. coal) soften further. We recently revised our YE12 IDR forecast weaker to 9,247/US\$ (from 9,100 previously).

Figure 35. Korea and Indonesia — Economic Forecasts, 2011-2013F

		Korea			Indonesia		
		2011	2012F	2013F	2011	2012F	2013F
Real GDP	YoY	3.6%	3.7%	4.4%	6.5%	6.2%	6.5%
Final Domestic Demand	YoY	1.0	1.6	4.3	5.7	7.0	7.1
Private Consumption	YoY	2.2	1.0	3.2	4.7	4.5	4.8
Fixed Investment	YoY	-2.1	2.5	5.3	8.8	11.4	11.4
Exports	YoY	10.0	4.4	8.3	13.6	9.0	12.0
Imports	YoY	6.6	1.4	6.8	13.3	11.6	15.0
Consumer Price Index	YoY	4.0	3.3	3.3	5.4	5.8	5.3
Unemployment Rate	%	3.4	3.3	3.2	6.6	6.3	6.0
Current Account	US\$ bn	27.7	12.4	12.9	2.1	-6.3	-8.6
	% of GDP	2.5	1.1	1.0	0.2	-0.7	-0.8
Fiscal Balance	% of GDP	0.4	1.4	1.2	-1.2	-1.5	-0.7
US Dollar Exchange Rate	Average	1108	1126	1055	8768	9174	9258

Sources: Haver Analytics and Citi Investment Research and Analysis

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## Hong Kong

We continue to expect 1Q12 to be the trough of this GDP downturn, with growth expected to be only about 1.2% YoY. The January data added to our worries, with retail sales and trade flows below expectations – although the data probably were distorted by the earlier Chinese New Year this year. Some reversal of this weakness is likely in February. Nevertheless, the January slowdown may well go beyond seasonal factors. Inflation is likely to fall after the festive season, but will probably remain at elevated levels, averaging about 4% YoY for 2012 as a whole. Swings in risk appetite continue to drive liquidity inflows, keeping the HKD at the stronger end of the trading band. Given the Fed's commitment to keep interest rates low for a while, our 3M HIBOR forecast only factors in a very gradual rise over our forecast horizon. The political heat intensifies in the run-up to the Chief Executive election (Mar 25) and could spillover into the transition period to the new Government.

## Singapore

1Q GDP will likely more than reverse the 2.5% QoQ SAAR contraction in 4Q, and we see upside risks to our 2012 GDP forecast of 3%. Data confirm the bottoming of the manufacturing cycle in 4Q11, and export orders resumed expansion in February. The tight labor market has cushioned domestic demand and hiring intentions may be picking up. Average Jan-Feb monthly developer home sales were more than double the 4Q average. Headline and core CPI will likely stay elevated in 1Q12. We have raised our 2012 CPI forecast to 3.8% (from 3%) on wage and oil pressures, and MAS has hinted at an upgrade in its inflation forecast. We thus expect no change to the slope, width or centre of the SGD NEER policy band in Apr. A slope steepening is likely in Oct. Interim inflation risks can be tackled by allowing the SGD NEER to drift to the strong side of the band, which could depress SOR fixings and SIBOR.

## Taiwan

Rising inflation risks have gradually overtaken risks of economic slowdown. The economy is expected to bottom out in 1Q12, while CPI inflation likely faces a one-off jump from government's long-delay price adjustment in electricity and water fees. In addition, planned tax hikes will likely add to inflation. The detail of the tax rises will not become clear until July, but we believe the most likely tax hikes are VAT tax, energy tax, housing tax and capital gains tax. The CBC will likely take a wait-and-see attitude and keep policy rates unchanged for an extended period before resuming a rate hike cycle. Negotiations with Mainland China will likely accelerate after the expected signing of the investment protection agreement in the next round of cross-straits meetings in June. This would benefit the financial sector in particular.

Figure 36. Hong Kong, Singapore and Taiwan — Economic Forecasts, 2011F-2013F

		Hong Kong			Singapore			Taiwan		
		2011F	2012F	2013F	2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	5.0%	3.0%	4.2%	4.9%	3.0%	5.0%	4.0%	3.7%	4.2%
Final Domestic Demand	YoY	7.5	3.3	1.9	3.4	2.6	5.3	1.3	1.5	3.1
Private Consumption	YoY	8.4	3.1	2.0	5.3	2.3	5.1	3.0	2.8	3.3
Fixed Investment	YoY	7.3	4.0	2.0	1.4	2.7	6.9	-3.8	-1.3	4.9
Exports	YoY	4.2	2.8	7.0	2.4	3.1	6.4	4.5	4.0	6.0
Imports	YoY	4.6	2.6	6.1	2.6	3.8	6.7	-0.6	1.2	5.1
CPI	YoY	5.3	4.0	2.9	5.2	3.8	3.2	1.4	1.4	1.7
Unemployment Rate	%	3.4	3.7	3.6	2.1	2.3	2.0	4.4	4.3	4.2
Current Account	US\$ bn	19.6	34.3	34.1	43.9	42.7	41.3	41.3	42.7	45.3
	% of GDP	8.1	13.1	12.2	16.5	15.0	13.0	8.8	8.7	8.4
Fiscal Balance	% of GDP	3.5	0.8	0.7	1.5	1.0	1.0	-1.9	-2.0	-1.8
US Dollar Exchange Rate	Average	7.78	7.76	7.76	1.26	1.25	1.22	29.47	29.40	28.55

Sources: Haver Analytics and Citi Investment Research and Analysis

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## Russia

Annual GDP growth could accelerate above the base case of 3-3.5% to 4%+ if oil prices remain at the current level. We expect inflation to accelerate back to about 6.5-7% by year-end from 3.7% in February as a result of postponed state-regulated price adjustments. The capital account remained negative by about US\$10bn in both January and February (despite a reversal in portfolio flows and the high oil price). We think the large negative capital account reflects political uncertainty and the lack of external borrowing. We expect the current account (CA) surplus to be mainly absorbed by continuous capital outflows in 2012. While tight liquidity and the still-reasonable BoP outlook are supportive for the ruble in the short run, we see little fundamental reasons for strengthening beyond the current level. In the base case (average oil of US\$110/bbl) we expect the ruble basket to return to 36-37 at end-2012. Each US\$10/bbl add about US\$20bn to the CA surplus, and we see the ruble basket close to 34-35 with average oil price of US\$120-125/bbl. As expected, Putin won the presidential elections on 4 March, with about 64% of the votes, although irregularities were reported. Protest activity remains high, but rather than result in further headline-grabbing demonstrations, we expect it to transform into a political movement (for example, formation of new parties and higher public interest in the municipal elections) over the coming year. Should all pre-election promises materialize, the budget break-even oil price may reach US\$150/bbl.

## Turkey

The January industrial production reading, which posted a decline of 3.1%MoM (SWA), has stimulated much debate about the state of the real economy. Given the importance of economic activity in the current account adjustment process — as Turkey's imports are considerably more sensitive to growth than to the real exchange rate — getting the likely trajectory of growth right will be crucial. In our view, there is little doubt growth will soften in 2012. However, barring unforeseen shocks, the degree of the likely slowdown this year will probably not be as sharp as implied by the January IP reading, which reflected a number of temporary factors (eg harsh weather conditions, gas supply disruptions and electricity outages). This backdrop, coupled with higher oil prices and the low likelihood of a tighter policy stance, continues to paint a challenging picture for the much-needed external adjustment process. With the current account deficit projected to stay well above 8% of GDP this year and the CBT remaining reluctant to normalize monetary policy, we believe Turkish assets will continue to be at the mercy of global risk appetite and oil prices.

Figure 37. Russia and Turkey — Economic Forecasts, 2011F-2013F

		Russia			Turkey		
		2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	4.3%	3.5%	4.0%	8.2%	2.5%	4.3%
Final Domestic Demand	YoY	5.1	5.2	5.5	10.3	1.6	4.5
Private Consumption	YoY	6.3	5.3	5.3	7.9	1.0	4.5
Fixed Investment	YoY	6.0	7.0	9.0	18.2	2.3	5.0
Exports	YoY	1.1	2.0	2.7	6.6	1.8	5.5
Imports	YoY	21.0	3.5	5.8	13.5	-1.4	6.2
CPI	YoY	8.4	5.5	6.8	6.5	9.5	7.0
Unemployment Rate	%	6.6	7.5	7.5	10.0	10.2	10.2
Current Account	US\$ bn	101.1	62.3	12.0	-77.1	-67.4	-69.9
	% of GDP	5.5	3.2	0.6	-10.2	-8.4	-7.9
Fiscal Balance	% of GDP	0.8	-0.3	-0.5	-1.3	-2.2	-2.5
US Dollar Exchange Rate	Average	29.4	30.9	32.8	1.89	1.87	1.82

Sources: Haver Analytics and Citi Investment Research and Analysis

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## Hungary

The prospects of finalizing a quick loan agreement with international lenders have faded further in the absence of political compromise on the preconditions. Given the supportive global liquidity that contributes to sufficient coverage in local currency auctions and the government's cash reserves, there is no rush to finalize the deal in the absence of market pressure. We believe the market will finally force the government to finalize the deal, given that liquidity reserves may be eroded by year-end without new FX debt issuance, and Hungary's access to international markets remains limited in the absence of an IMF program. In our view, the government is unlikely to be able to back out from an IMF deal. A failure to agree a deal would hurt the government's political credibility and probably worsen Hungary's weak growth potential further. We believe lower funding costs, structural adjustments and muting the pace of banks' deleveraging are both inevitable for the Hungarian economy to ensure debt sustainability over the long term. Given the upward shift in the CPI outlook and the prospect of prolonged IMF loan negotiations keeping risk premiums elevated, we believe the MPC is likely to keep rates on hold until 4Q12 and start gradual rate cuts in late 2012.

## Poland

Thanks to relatively strong performance in late 2011, growth in 2012 is likely to be slightly stronger than previously expected. We now look for GDP growth of around 2.7% this year vs. 2.1% last month, mainly because the slowdown in public investment will probably begin later than initially thought. However, in line with our expectations, private consumption slowed substantially and we believe it will likely remain muted in the coming quarters, due to the weak labour market and low savings rate. The upward revision to our 2012 growth forecast is balanced by a 0.4% downgrade (to 2.4%) to our 2013 forecast: our forecast implies the same average pace of growth in 2012-2013 as last month, and would mean sub-potential growth in two consecutive years. With this in mind, we look for gradual weakening of inflation pressures in the coming quarters and we expect the CPI to fall below 3% by year-end. The central bank's new projection indicates that the CPI will remain on a downward trend and that economic growth is to slow significantly in 2H 2012. Taking this into account, we expect increasingly dovish central bank rhetoric and stable interest rates in the coming months. We still believe the rate cut cycle could begin later this year, but probably not earlier than September.

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Figure 38. Hungary and Poland — Economic Forecasts, 2011F-2013F

		Hungary			Poland		
		2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	1.7%	0.0%	1.4%	4.3%	2.7%	2.4%
Final Domestic Demand	YoY	-1.2	-2.5	-1.3	3.6	2.8	2.0
Private Consumption	YoY	0.0	-2.5	-1.5	3.1	2.2	2.5
Fixed Investment	YoY	-5.4	-3.0	0.5	8.7	5.6	1.0
Exports	YoY	8.4	4.0	6.4	5.9	4.8	4.5
Imports	YoY	6.3	2.2	4.7	4.8	2.5	2.3
CPI	YoY	3.9	5.6	3.5	4.2	3.8	2.6
Unemployment Rate	%	0.0	11.8	11.0	12.4	12.9	11.7
Current Account	US\$ bn	2.1	1.8	2.2	-21.3	-16.2	-21.5
	% of GDP	1.5	1.4	1.6	-4.1	-3.2	-4.0
Fiscal Balance	% of GDP	3.5	-3.2	-3.0	-5.1	-3.3	-2.7
US Dollar Exchange Rate	Average	201	229	226	3.0	3.2	3.2

Sources: Haver Analytics and Citi Investment Research and Analysis



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## Czech Republic

The smaller-than-expected GDP contraction in 4Q11 does not change our view that the economy will shrink by about 0.4%YoY this year on weak domestic demand, while the improved outlook on foreign demand represent an upside risk. The PMI suggests industrial output is likely to accelerate to 3-5%YoY growth in Feb/Mar (supported by stronger output in the energy sector in February). The sharp acceleration of new orders appears temporary. If not, it would point to 10%YoY industrial production growth going forward, which is well above our forecast of 2%YoY in 2012 (7%: 2011). Though industrial activity may improve slightly thanks to robust exports, labour market slack is likely to remain due to weak growth. While base effects are supportive for a recovery in retail sales, confidence indicators remain poor and do not suggest any pick up from the 4-year stagnation in sales. The currency is underpinned by strong export activity and a large trade surplus. Although our short-term forecast of EURCZK at 24.4 is stronger than the CNB assumption for 1Q12; we do not think that is going to evoke a cut in policy rate on 29 March, as we think it would have to be below 24.2 before thoughts of a cut come into the picture. By contrast, CPI is above the CNB's forecast, due to the VAT hike (likely to add also 1% to prices in 2013) and fuel prices, and is likely to ease in 4Q12. We still expect the CNB policy rate at 0.75% until mid 2H13, given the weakness in wage growth.

## Romania

Following a robust 3Q 2011, the 4Q GDP outturn and recent indicators suggest the economic recovery may be losing steam. While the observed softening in economic activity may, in part, be related to temporary factors such as harsh winter conditions, this does not bode well for growth prospects given the fragile nature of the recovery and the challenging global environment. This backdrop, coupled with benign inflation developments, is likely to lead the NBR to maintain its easing bias going forward. Barring a marked weakening in the leu, we believe the January and February inflation readings should pave the way for a 25bp rate cut at the March Board meeting. In the absence of major slippages in the EU-IMF supported program ahead of the upcoming elections, we believe further easing of at least another 25bp is likely in 2Q, bringing the policy rate to 5.0%. Looking ahead, the evolution of growth indicators is likely to attract considerable attention, as market participants try to gauge whether the observed slowdown is largely driven by one-off factors. Although continued IMF support is likely to contain uncertainty, further weakening in economic activity may increase pressure on the government to pursue populist measures, as elections approach.

Figure 39. Czech Republic and Romania — Economic Forecasts, 2011-2013F

		Czech Republic			Romania		
		2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	1.7%	-0.4%	1.8%	2.5%	1.7%	3.1%
Final Domestic Demand	YoY	-0.9	-0.5	0.6	1.2	1.1	2.9
Private Consumption	YoY	-0.5	-0.4	0.4	1.0	1.0	2.9
Fixed Investment	YoY	-1.2	-0.7	1.6	4.0	1.5	3.5
Exports	YoY	11.0	1.1	5.8	13.0	5.4	4.2
Imports	YoY	7.5	-1.3	5.3	10.8	4.8	3.2
CPI	YoY	1.9	3.4	2.6	5.8	2.6	2.0
Unemployment Rate	%	8.5	9.0	9.1	5.4	5.2	5.2
Current Account	US\$ bn	-6.3	-7.1	-7.0	-7.9	-8.0	-9.0
	% of GDP	-2.9	-3.6	-3.4	-4.1	-4.5	-4.7
Fiscal Balance	% of GDP	-3.7	-3.7	-3.1	-4.4	-2.0	-2.0
US Dollar Exchange Rate	Average	17.7	19.2	19.4	3.0	3.0	3.0

Sources: Haver Analytics and Citi Investment Research and Analysis



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## Brazil

2011 GDP growth reached 2.7%, in line with expectations and below our potential GDP growth estimate slightly above 4%. For this year, we expect GDP growth to accelerate steadily, reflecting the increasing impacts of monetary, credit and fiscal stimuli already applied over the economy. In all, we keep our 2012 and 2013 GDP growth forecasts of 3.3% and 4.5% respectively. The YoY rate of CPI inflation should likely continue its downward trend up to April/May, closing this year at 5.3% and at 5.6% in 2013 year end, both above the mid-point target. Regarding monetary policy, after the central bank's surprising decision to accelerate the pace of interest rate cuts to 75bp and its scenario expressed in the minutes, we now expect a final 75bp cut in April, driving the Selic rate to 9.0%. For 2013, the narrower output gap and rising risks on the inflation front will likely require Copom to increase the Selic rate to 10.50%. The government has intensified capital controls over FX markets recently. Given the evidence that the effects of those measures usually do not last long, we expect USD/BRL to reach 1.75 and 1.65 at 2012 and 2013 year ends. This outlook is reinforced by our better-than-consensus estimates for external accounts this year. On the fiscal side, the primary surplus will probably remain at a level consistent with a downward trend in public debt/GDP in our view.

## Mexico

Industrial production accelerated in January and the data signal that 1Q12 GDP growth could be above our forecast (3.7% YoY), although for now we are keeping our outlook unchanged (3.3% GDP growth in 2012) and waiting for more activity data to confirm this trend. Meanwhile, annual headline inflation came in lower than expected in February and at 3.9% was again within Banxico's variability range. Accordingly, we now think that the rebound in headline inflation will be a tad less pronounced than previously anticipated and, therefore, we have revised our year-end forecast to 3.6% from 3.8%. This reinforces our view that Banxico will stay on hold during 2012. For 2013 we still expect Banxico to tighten, but now we have modified our call to include only two increases of 25bp: thus, we now see the policy rate ending 2013 at 5%. Our new scenario is based on perceptions of activity expanding at a healthy pace but far from overheating. Moreover, the Fed's decision to postpone its normalization process to "late-2014" — from "mid-2013" before — also should play a role in Banxico's reaction function. Last but not least, the strengthening of the MXN against the USD could create the necessary room for the exchange rate to become the main adjusting variable once the Fed begins to move.

Figure 40. Brazil and Mexico — Economic Forecasts, 2011F-2013F

		Brazil			Mexico		
		2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	2.7%	3.3%	4.5%	3.9%	3.3%	3.5%
Final Domestic Demand	YoY	3.8	3.9	4.8	4.8	3.9	4.2
Private Consumption	YoY	4.1	4.1	4.8	4.6	3.4	3.6
Fixed Investment	YoY	4.7	4.2	6.5	8.0	6.4	7.5
Exports	YoY	4.5	5.8	6.2	8.0	7.3	8.4
Imports	YoY	9.7	8.4	7.0	7.7	8.5	9.7
CPI	YoY	6.6	5.5	5.5	3.4	4.1	3.7
Unemployment Rate	%	6.1	6.3	6.5	5.3	5.2	5.3
Current Account	US\$ bn	-48.6	-51.4	-65.4	-8.7	-18.5	-25.3
	% of GDP	-2.1	-2.1	-2.4	-0.8	-1.6	-1.9
Fiscal Balance	% of GDP	-2.6	-1.9	-2.6	-2.5	-2.2	-2.0
US Dollar Exchange Rate	Average	1.67	1.77	1.70	12.5	12.4	12.3

Sources: Haver Analytics and Citi Investment Research and Analysis

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## Argentina

Controls on capital mobility and imports continue unabated. During the two first months of 2012, the trade surplus increased 69% y/y, while the traded volume in the spot FX market shrank 52% y/y. Controls have been tightened since February, as companies are now required to submit a sworn deposition before importing, which needs the approval from the Tax Authority (AFIP) and from the Internal Commerce Secretariat. In the meantime, the government has sent Congress a proposal increasing the BCRA's lending capacity in domestic and foreign currency. We believe this bill will be approved. Although we were expecting an expansion in BCRA's lending capacity in foreign currency, we were not expecting an increase in its lending limit in pesos. If the government increases the money supply's growth rate, this will likely increase the demand for foreign currency and lead to even tighter controls on capital and trade flows. Thus, we believe this course of action is likely to be ineffective at boosting growth, as almost ¾ of Argentine imports are intermediate or capital goods. All in all, we maintain our view that economic growth will decelerate markedly in 2012.

## Venezuela

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The evolution of President Chávez's health continues to be the main uncertainty factor in Venezuela. In an environment in which the boost to economic activity should persist thanks to significant increases in fiscal spending and inflation should remain in the 25-30% range - unless scarcities increase due to the law of costs and fair prices - attention will probably remain focused on the ongoing presidential campaign. We have analyzed various different political scenarios and conclude that the likelihood of the incumbent government staying in power is high, regardless of which candidate represents the PSUV. In particular, we recognize that Mr. Chávez is the best possible candidate but if his health condition makes it difficult for him to run, there are several names within Chavismo who could replace him. Among the list of political heirs are Diosdado Cabello, Adán Chávez, Elías Jaua and Nicolás Maduro. We believe that within this group of people, the pragmatic wing of Chavismo would have a better chance of winning the nomination over the more radical faction. In addition, if the idea is to continue with the Chávez brand, political analysts we consulted suggested that Mr. Chávez's older daughters are more likely candidates than Mr. Chávez's brother, Adán Chávez.

Figure 41. Argentina and Venezuela — Economic Forecasts, 2011-2013F

		Argentina			Venezuela		
		2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	9.2%	4.0%	5.0%	4.2%	4.0%	3.4%
Final Domestic Demand	YoY	12.5	5.2	6.1	7.6	3.4	1.7
Private Consumption	YoY	10.6	3.7	4.8	4.0	8.0	0.7
Fixed Investment	YoY	9.0	3.6	8.0	4.4	-7.0	2.2
Exports	YoY	4.4	5.4	4.6	4.7	8.2	5.2
Imports	YoY	19.6	9.6	12.1	15.4	3.6	-0.9
CPI	YoY	9.8	9.6	12.2	27.1	27.5	30.5
Unemployment Rate	%	8.1	7.8	8.2	6.5	6.4	6.6
Current Account	US\$ bn	1.8	1.5	1.1	27.2	25.7	30.6
	% of GDP	0.4	0.3	0.2	9.1	6.8	8.1
Fiscal Balance	% of GDP	-1.6	-2.0	-2.0	-5.0	-5.0	-4.0
US Dollar Exchange Rate	Average	4.2	4.6	5.3	4.3	4.3	6.5

Sources: Haver Analytics and Citi Investment Research and Analysis

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## Saudi Arabia

Concerns regarding global oil supply have prompted Saudi Arabia to maintain its highest production in over 30 years. February figures show Saudi production steady at 9.7mbpd, and we believe this is likely to be maintained for the rest of 2012, meaning an increase in average production of around 5% over last year. This has prompted us to raise our GDP growth forecast to 7.1% in 2012, from 5.9% previously. With oil prices likely to average US\$110 per barrel this year we think the surge in production will result in record fiscal revenues. Expenditures will once again overshoot budget (although will remain lower than 2011 levels due to the one-off nature of many such expenditures), but the net result will be a budget surplus of around 16.5% of GDP in 2012, up from just under 14% in 2011. We believe growth in the non-oil economy will remain strong, around 8.5%, on the back of continued high government expenditure and increased domestic demand. We continue to expect progress on passing of the mortgage law in 2012, which we believe will create a significant boost to the local housing sector and domestic demand. Inflation remains sticky, but we continue to expect demand side pressure to pose a significant threat to price stability.

## United Arab Emirates

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Two of Abu Dhabi's largest real-estate developers, Aldar and Sorouh, announced they are considering a merger. While many details are unknown so far, we think the possibility of industry consolidation is positive given the sector's downturn since 2008, and the ongoing risk of oversupply in Abu Dhabi. It is likely any merger would result in a rationalisation of future development plans, in keeping with the government's own efforts to reduce supply risks and bolster the financial soundness of the Emirate's key companies, especially Government Related Entities (GREs). In Dubai, the Dubai International Financial Centre (DIFC) occupancy numbers suggest continued recovery and growth in the financial services industry. Buoyed by Asian demand, the number of companies operating in the DIFC rose 7% in 2011, and occupancy in DIFC-owned buildings rose to 95%. Occupancy in existing third-party buildings also rose to 72%, but new supply should reverse these numbers in 2012. Monarch Alternative Capital, a hedge fund suing Dubai Drydocks over the default on a US\$2.2bn loan, won its case in a London court. This highlights the legal risk restructuring of Dubai debt entails when claims are able to be pursued in foreign jurisdictions. However, whether this legal risk has a material economic impact will depend on the ability of funds such as Monarch to enforce their claims, which is much more uncertain.

Figure 42. Saudi Arabia and United Arab Emirates — Economic Forecasts, 2011F-2013F

		Saudi Arabia			United Arab Emirates		
		2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	6.8%	7.1%	6.5%	5.4%	0.5%	3.4%
Final Domestic Demand	YoY	9.9	7.8	7.9	3.1	3.5	3.5
Private Consumption	YoY	10.0	5.0	5.0	1.0	2.0	2.0
Fixed Investment	YoY	15.0	10.0	10.0	5.0	5.0	5.0
Exports	YoY	10.5	8.0	8.0	13.0	13.0	13.0
Imports	YoY	15.0	12.0	12.0	15.0	15.0	15.0
CPI	YoY	5.0	7.0	8.0	2.0	2.4	2.9
Current Account	US\$ bn	154.3	143.6	160.9	48.7	11.9	20.7
	% of GDP	26.8	24.6	24.4	14.9	3.5	5.7
Fiscal Balance	% of GDP	13.7	16.5	12.6	-	-	-
US Dollar Exchange Rate	Average	3.8	3.8	3.8	3.7	3.7	3.7

Sources: Haver Analytics and Citi Investment Research and Analysis

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## Egypt

Politics will very much remain centre stage in 1H 2012, with the focus increasingly on the presidential elections set for June. The slightly odd aspect of this election is that — without a new constitution — the exact role of the new president remains unclear. Nevertheless, we still expect the country's first post-Mubarak president to be a key player in the political scene in 2H 2012 and into 2013, most crucially as an important force for political reconciliation. Government economic policy will probably seek to preserve the status quo in 2012, as shown by the rise in the fiscal deficit in 2011, while attempting to curtail inflation and maintaining a stable exchange rate. However, the drop in foreign exchange reserves suggests that this policy option may well have run its course. Harder choices will probably have to be made in 2H 2012, especially on the exchange rate. As such, discussions with the IMF and other donors will continue over the coming months, although the difficulty of reaching an agreement and the determination of the government to try to muddle through as long as possible should not be overstated.

## South Africa

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The February 22 budget highlighted the unfavourable external environment facing the country and indicated that growth, which is now officially forecast at only 2.7% in 2012, will remain subpar and only start to really recover into 2013. Although the Treasury remains committed to budget deficit reduction and debt stabilisation — focusing more on micro policy steps to foster stronger growth — weak revenue growth and pressure from the public wage bill mean that a significant reduction in the deficit is only likely in 2013. In the meantime, even with weak housing sector growth and the inflation-induced erosion of household purchasing power, the ongoing monetary stimulus is supporting resilient consumer spending. In addition, corporate finances are healthy and there are signs of an upturn in private investment. We expect no immediate change in the monetary policy stance, with a rate hike unlikely before 2H12 and only gradual normalisation afterwards, although inflation will probably hover around the top end of the 3%-6% target range in the next 15 months. However, we think it is unlikely to make a sustained breach of the upper limit, although rand fragility and wage stickiness pose upside risks. Poor export performance and the high import content of capital spending suggest that the current account deficit will gradually widen, after being kept low by favourable trends in the terms of trade.

Figure 43. Egypt, Nigeria and South Africa — Economic Forecast, 2011-2013F

		Egypt			Nigeria			South Africa		
		2011F	2012F	2013F	2011F	2012F	2013F	2011F	2012F	2013F
Real GDP	YoY	1.8%	3.0%	3.9%	7.1%	6.7%	6.5%	3.1%	2.9%	3.8%
Final Domestic Demand	YoY	2.9	3.7	3.8	NA	NA	NA	4.6	3.3	4.0
Private Consumption	YoY	5.0	0.2	1.5	NA	NA	NA	4.9	2.8	3.3
Fixed Investment	YoY	-5.6	9.9	3.4	NA	NA	NA	4.3	4.4	5.7
Exports	YoY	3.7	-3.8	6.3	NA	NA	NA	5.9	5.3	6.2
Imports	YoY	8.1	-2.3	5.5	NA	NA	NA	9.1	6.7	7.0
CPI	YoY	10.2	12.1	14.4	10.8	10.9	10.4	5.0	6.0	5.4
Unemployment Rate	%	12.1	13.0	13.5	NA	NA	NA	26.0	25.7	25.2
Current Account	US\$ bn	-5.5	-6.8	-8.0	15.9	16.5	21.9	-13.6	-18.8	-23.0
	% of GDP	-2.4	-2.7	-3.1	5.9	5.3	6.0	-3.4	-4.7	-5.6
Fiscal Balance	% of GDP	-10.1	-8.6	-6.5	-3.2	-2.8	-2.0	-5.0	-4.8	-4.2
US Dollar Exchange Rate	Average	5.94	6.24	7.22	155	160	163	7.26	7.82	8.40

Source: Citi Investment Research and Analysis

Figure 44. Selected Emerging Market Countries — Economic Forecast Overview, 2011F-2013F

	GDP Growth			CPI Inflation			Current Balance (% of GDP)			Fiscal Balance (% of GDP)		
	2011F	2012F	2013F	2011F	2012F	2013F	2011F	2012F	2013F	2011F	2012F	2013F
<b>Asia</b>	<b>7.2%</b>	<b>6.9%</b>	<b>7.3%</b>	<b>5.7%</b>	<b>4.1%</b>	<b>4.2%</b>	<b>4.0%</b>	<b>2.3%</b>	<b>1.6%</b>	<b>-2.2%</b>	<b>-2.6%</b>	<b>-2.2%</b>
China	9.2	8.4	8.6	5.4	3.3	3.7	2.8	2.0	1.5	-1.3	-2.0	-1.5
Hong Kong	5.0	3.0	4.2	5.3	4.0	2.9	8.1	13.1	12.2	3.5	0.8	0.7
India*	6.9	7.0	7.5	9.0	7.0	6.5	-3.5	-3.6	-3.2	-8.0	-7.7	-7.5
Indonesia	6.5	6.2	6.5	5.4	5.8	5.3	0.2	-0.7	-0.8	-1.2	-1.5	-0.7
Korea	3.6	3.7	4.4	4.0	3.3	3.3	2.5	1.1	1.0	0.4	1.4	1.2
Malaysia	5.1	5.0	5.3	3.2	2.5	2.8	11.5	10.5	9.0	-5.0	-5.0	-4.7
Pakistan	2.8	3.1	4.2	10.5	11.0	11.0	-2.2	-2.7	-3.8	-6.5	-6.2	-5.5
Philippines	3.7	4.0	4.5	4.8	3.5	4.0	2.5	2.0	1.3	-1.6	-2.0	-1.3
Singapore	4.9	3.0	5.0	5.2	3.8	3.2	16.5	15.0	13.0	1.5	1.0	1.0
Sri Lanka	8.0	7.6	7.8	6.8	6.0	6.0	-6.7	-6.1	-5.2	-7.0	-6.5	-6.0
Taiwan	4.0	3.7	4.2	1.4	1.4	1.7	8.8	8.7	8.4	-1.9	-2.0	-1.8
Thailand	0.1	3.8	5.0	3.8	2.9	3.3	3.4	-1.3	-0.5	-1.5	-3.8	-2.7
Vietnam	5.9	6.0	6.3	18.6	11.4	8.2	-3.5	-2.3	-2.4	-5.0	-4.8	-4.5
<b>Latin America</b>	<b>4.2%</b>	<b>3.6%</b>	<b>4.4%</b>	<b>7.0%</b>	<b>6.6%</b>	<b>6.8%</b>	<b>-1.0%</b>	<b>-1.0%</b>	<b>-1.3%</b>	<b>-2.3%</b>	<b>-2.0%</b>	<b>-2.3%</b>
Argentina	9.2	4.0	5.0	9.8	9.6	12.2	0.4	0.3	0.2	-1.6	-2.0	-2.0
Brazil	2.7	3.3	4.5	6.6	5.5	5.5	-2.1	-2.1	-2.4	-2.6	-1.9	-2.6
Chile	6.0	4.2	5.0	3.3	3.8	3.1	-1.4	-1.9	-1.9	1.6	0.7	0.6
Colombia	5.8	5.1	5.2	3.4	3.7	4.2	-2.8	-3.0	-2.9	-2.9	-3.0	-2.5
Mexico	3.9	3.3	3.5	3.4	4.1	3.7	-0.8	-1.6	-1.9	-2.5	-2.2	-2.0
Panama	10.6	7.0	7.0	5.9	5.6	3.2	-12.7	-11.8	-10.2	-2.3	-2.7	-1.5
Peru	6.9	5.5	6.5	3.4	3.5	3.0	-1.3	-2.4	-2.8	1.7	1.2	-0.3
Venezuela	4.2	4.0	3.4	27.1	27.5	30.5	9.1	6.8	8.1	-5.0	-5.0	-4.0
<b>Europe</b>	<b>4.9%</b>	<b>2.9%</b>	<b>3.7%</b>	<b>6.7%</b>	<b>5.8%</b>	<b>5.7%</b>	<b>-0.4%</b>	<b>-0.2%</b>	<b>-1.0%</b>	<b>-0.9%</b>	<b>-1.5%</b>	<b>-1.4%</b>
Czech Republic	1.7	-0.4	1.8	1.9	3.4	2.6	-2.9	-3.6	-3.4	-3.7	-3.7	-3.1
Hungary	1.7	0.0	1.4	3.9	5.6	3.5	1.5	1.4	1.6	3.5	-3.2	-3.0
Kazakhstan	7.5	6.3	6.3	8.4	5.5	6.6	7.3	1.9	2.3	5.9	1.7	3.0
Poland	4.3	2.7	2.4	4.2	3.8	2.6	-4.1	-3.2	-4.0	-5.1	-3.3	-2.7
Romania	2.5	1.7	3.1	5.8	2.6	2.0	-4.1	-4.5	-4.7	-4.4	-2.0	-2.0
Russia	4.3	3.5	4.0	8.4	5.5	6.8	5.5	3.2	0.6	0.8	-0.3	-0.5
Slovakia	3.1	1.5	2.1	3.9	3.1	2.9	-2.7	0.3	0.2	-4.6	-4.8	-3.2
Turkey	8.2	2.5	4.3	6.5	9.5	7.0	-10.2	-8.4	-7.9	-1.3	-2.2	-2.5
Ukraine	5.2	3.0	4.5	8.0	8.4	7.2	-5.6	-7.9	-4.4	-4.0	-3.4	-3.7
<b>Africa/Mideast</b>	<b>5.8%</b>	<b>4.3%</b>	<b>5.1%</b>	<b>5.6%</b>	<b>6.2%</b>	<b>6.5%</b>	<b>4.9%</b>	<b>11.6%</b>	<b>10.2%</b>	<b>2.7%</b>	<b>2.8%</b>	<b>3.3%</b>
Bahrain	4.5	-4.4	4.7	1.9	2.0	3.0	2.7	16.7	1.2	-5.6	-3.4	-7.0
Egypt	1.8	3.0	3.9	10.2	12.1	14.4	-2.4	-2.7	-3.1	-10.1	-8.6	-6.5
Ghana	13.5	7.5	6.5	8.7	9.2	10.6	-9.0	-7.5	-4.8	-5.4	-5.6	-4.7
Iraq	9.4	12.4	11.2	4.0	5.0	6.0	-7.0	35.3	72.8	21.7	10.5	32.9
Israel	4.7	2.7	3.0	3.4	2.6	2.7	-0.8	-1.5	-1.0	-2.7	-3.7	-2.7
Jordan	2.3	2.5	3.0	4.4	5.0	5.0	-11.3	-6.0	-5.2	-3.9	-8.0	-9.5
Kenya	4.7	5.2	5.8	12.1	11.3	8.7	-8.2	-7.5	-6.5	-5.5	-5.0	-4.9
Kuwait	4.3	0.2	2.5	4.2	5.0	5.0	47.5	41.9	46.6	26.7	20.4	23.1
Lebanon	6.0	3.5	4.3	5.1	6.0	5.0	-14.7	-11.1	-12.0	-6.4	-7.5	-8.6
Nigeria	7.1	6.7	6.5	10.8	10.9	10.4	5.9	5.3	6.0	-3.2	-2.8	-2.0
Oman	1.4	3.0	4.5	4.0	3.0	3.0	3.4	2.9	21.8	6.1	2.8	4.6
Qatar	18.1	6.0	8.3	3.0	3.0	3.0	38.7	33.5	29.5	8.1	4.9	2.9
Saudi Arabia	6.8	7.1	6.5	5.0	7.0	8.0	26.8	24.6	24.4	13.7	16.5	12.6
South Africa	3.1	2.9	3.8	5.0	6.0	5.4	-3.4	-4.7	-5.6	-5.0	-4.8	-4.2
Tanzania	6.3	6.7	7.0	12.7	15.7	7.4	-8.5	-7.8	-9.1	-7.8	-6.2	-5.8
UAE	5.4	0.5	3.4	2.0	2.4	2.9	14.9	3.5	5.7	0.0	0.0	0.0
Uganda	5.7	4.5	6.1	18.6	17.2	6.3	-4.0	-8.9	-8.0	-7.2	-5.5	-5.2
Zambia	6.6	6.5	6.9	8.7	7.5	8.0	4.2	1.2	-2.5	-3.2	-4.2	-5.2
<b>Total</b>	<b>6.1%</b>	<b>5.3%</b>	<b>5.9%</b>	<b>6.1%</b>	<b>5.2%</b>	<b>5.2%</b>	<b>2.3%</b>	<b>2.2%</b>	<b>1.5%</b>	<b>-1.5%</b>	<b>-1.7%</b>	<b>-1.5%</b>

\* Note: In India, policymakers look at the wholesale price index. Sources: National sources and Citi Investment Research and Analysis

Figure 45. Citi Global Economics Team *For Informational Purposes Only*

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Source: Citi Investment Research and Analysis.



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Source: Citi Investment Research and Analysis.



**Figure 41. (Continued) Citi Global Strategy and Macro Team** *For Informational Purposes Only*

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## Sovereign Ratings Outlook

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The Sovereign Ratings Outlook is a joint product between the Citi economics and rate strategy teams, with input from various other research teams. We aim to forecast the direction and scale of sovereign debt ratings (local currency), as well as any changes in the ratings outlook, for a range of countries. These are our judgments over the ratings outlook, rather than model-determined recommendations. This publication does not aim to make a judgment on the financial market implications of ratings changes, except in so far as we expect any such market implications to affect other sovereign ratings. The full piece is released roughly once per quarter, with a brief summary in the "Global Economic Outlook and Strategy".

Figure 47. Advanced Economies — Sovereign Long-Term Debt Ratings and Citi Ratings Forecasts

	S&P Ratings				Moody's Ratings			
Country	Current Rating	Current Outlook	Citi Nearterm (Up to 9 Months) Forecast Rating	Citi Longterm (Next 2-3 Years) Forecast Rating & Outlook	Current Rating	Current Outlook	Citi Nearterm (Up to 9 Months) Forecast Rating	Citi Longterm (Next 2-3 Years) Forecast Rating & Outlook
US	AA+	Neg	AA+ (Neg)	AA ↓	Aaa	Neg	Aaa (Neg)	Aa1 ↓
Canada	AAA	Stable	AAA	AAA	Aaa	Stable	Aaa	Aaa
Japan	AA-	Neg	AA- (Neg)	A+ ↓	Aa3	Stable	Aa3	A1 ↓
Germany	AAA	Stable	AAA	AAA (Neg)	Aaa	Stable	Aaa	Aaa (Neg)
France	AA+	Neg	AA+ (Neg)	AA ↓	Aaa	Neg	Aaa (Neg)	Aa1 ↓
Italy	BBB+	Neg	BBB ↓	BBB- ↓↓	A3	Neg	Baa1 ↓	Baa3 ↓↓↓
Spain	A	Neg	A- ↓	BBB ↓↓↓	A3	Neg	Baa1 ↓	Baa2 ↓↓
Austria	AA+	Neg	AA+ (Neg)	AA ↓	Aaa	Neg	Aaa (Neg)	Aa1 ↓
Belgium	AA	Neg	AA (Neg)	AA- ↓	Aa3	Neg	Aa3 (Neg)	Aa3
Finland	AAA	Neg	AAA (Neg)	AA+ ↓	Aaa	Stable	Aaa	Aaa (Neg)
Greece	SD		CCC ↑↑↑↑	CCC ↑↑↑↑	C		Caa2 ↑↑↑↑	Caa2 ↑↑↑↑
Ireland	BBB+	Neg	BBB- ↓↓	BB ↓↓↓↓	Ba1	Neg	Ba1 (Neg)	Ba3 ↓↓
Netherlands	AAA	Neg	AAA (Neg)	AA+ ↓	Aaa	Stable	Aaa	Aaa (Neg)
Portugal	BB	Neg	B+ ↓↓	CCC ↓↓↓↓↓	Ba3	Neg	B1 ↓	Caa2 ↓↓↓↓↓
UK	AAA	Stable	AAA (Neg)	AAA (Neg)	Aaa	Neg	Aaa (Neg)	Aaa (Neg)
Switzerland	AAA	Stable	AAA	AAA	Aaa	Stable	Aaa	Aaa
Sweden	AAA	Stable	AAA	AAA	Aaa	Stable	Aaa	Aaa
Denmark	AAA	Stable	AAA	AAA	Aaa	Stable	Aaa	Aaa
Norway	AAA	Stable	AAA	AAA	Aaa	Stable	Aaa	Aaa
EFSF	AA+	Neg	AA+ (Neg)	AA+ (P) Aaa	Stable	Aaa	Aa1 ↓	

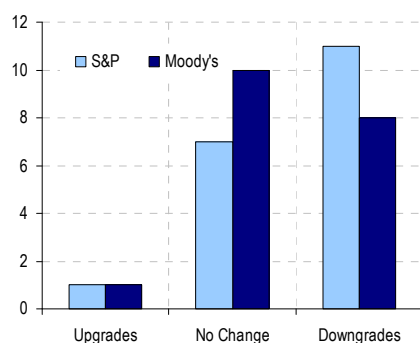
Note: Arrows denote expected ratings changes from the current rating. (Neg) denotes negative outlook. (Neg W) denotes negative watch. SD means Selective Default. (P) means Provisional. The number of arrows denotes the expected change in ratings notches from the current level. We show a maximum of five arrows even for countries where we expect more than five notches of ratings change. In the outlook we have not included an extension of the actual EFSF lending beyond the now targeted €440bn maximum capacity. In the event that a substantial extension of the EFSF takes place and is likely to incur sizeable fiscal costs, various Euro Area countries may be at risk of downgrade. NA Not available. Sources: Moody's, S&P and Citi Investment Research and Analysis

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## Key Expected Ratings Issues

Citi continues to expect further downgrades over the longer term (Figure 48). This is predicated on many factors from deteriorating economic prospects, failure to meet fiscal targets and various idiosyncratic factors including political risks. Our broad views also reflect that for the sovereigns covered in Citi's *Sovereign Ratings Outlook*, S&P and Moody's have many on "Negative Outlook" (Figure 49). For the vast majority of countries, our long-term views are unchanged. However, we have adjusted our near-term views to accommodate ratings gradually moving towards our longer-term outlooks. We highlight country specific ratings issues below.

Figure 48. Citi's Long-term Expectations for Rating Changes for all Countries Covered in the Sovereign Ratings Outlook



Source: Citi Investment Research and Analysis

**France:** We are making no changes to our near-term or long-term views (one notch downgrade over the next 2-3yrs). However, ratings pressure could emerge after the Presidential election if evidence mounts that fiscal targets might not be met.

**Greece:** S&P indicated that following the exchange of Greece's international debt (to be concluded around 11<sup>th</sup> April), they would "*likely consider Greece's selective default to be cured and assign a forward-looking sovereign credit rating of CCC*"<sup>7</sup>. We believe ratings will move upward in the short term (although complications in the international bond exchange could undermine this). Over the longer-term, we think ratings will remain in the mid CCC range as further restructuring is likely.

**Ireland:** Although Ireland is making progress in its current programme and has high institutional strength, questions remain about the sovereign's high and rising debt stock and its ability to access markets as intended next year. We think that renewed focus on additional financial support is likely in Q3/Q4 which in turn will generate downward ratings pressure. The ratings differential between S&P (BBB+) and Moody's (Ba1) is already wide (by three notches). We think some convergence is possible in the near-term with a potential two notch downgrade by S&P to BBB-.

**Italy:** Confidence in Monti's government has risen and, over the longer-term, credible and implemented economic reforms could alleviate some negative ratings pressure. However, in the very near-term the economic outlook remains bleak. Given that Citi expects disappointments in growth and fiscal performance, we see scope for a one notch downgrade by S&P and Moody's sometime later in 2012.

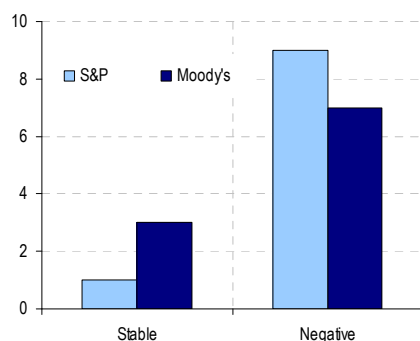
**Netherlands:** Like France, we are keeping our views unchanged for the Netherlands. However, we note that downward ratings pressure could emerge in the near-term on political uncertainties, or should fiscal consolidation progress slow.

**Portugal:** In 2013, Citi continues to believe some form of debt restructuring for Portugal will likely take place. We therefore expect ratings to move to the mid CCC range over the longer-term. Crucial from a ratings perspective in the near-term is the relatively sharp recession Portugal is likely to endure (Citi expects a GDP growth rate of -5.3% in 2012). Together with its relatively large stock of debt and high financing risk<sup>8</sup>, we see scope for lower ratings (possibly two notches downwards by S&P, one notch downward by Moody's) by end 2012.

**Spain:** We also see scope for Spain's ratings to move downwards this year (perhaps by one notch by Moody's and S&P). This is predicated on the likelihood of further fiscal slippage and weaker economic growth (Citi expects -2.7% GDP growth this year - under which the country is unlikely to meet its fiscal targets).

**UK:** We think it plausible that S&P puts the UK on Negative Outlook sometime over the next 9 months. This would be in line with Moody's (and Fitch).

Figure 49. Current S&P and Moody's Outlooks for EMU Countries Covered in Citi's Sovereign Ratings Outlook



Source: S&P, Moody's and Citi Investment Research and Analysis

<sup>7</sup> S&P "Greece remains in Selective Default; New Bond Issues Rated CCC", 15<sup>th</sup> March 2012

<sup>8</sup> Moody's "Portugal" 19<sup>th</sup> March 2012

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## Rates Strategy

A sharp reversal in bond yields alongside a seemingly increasingly durable rally in risk assets has many of the hallmarks of a cyclical reversal. We doubt, however, that a sustained bear-market in bonds is beginning just yet. Despite some improvement in the recent economic data, policy rates are set to remain at current low levels for a protracted period and we continue to believe that a policy reversal is required in order for a structural bear market to be sustained. More likely, we will see trading ranges redefined over the next three to six months with carry and roll and the reach for yield providing support for fixed income assets while rising term risk premia provide the opposing stimulus.

The current sell-off in bonds looks as if it may have further to run; 10yr real yields in the US and UK remain negative and this is probably unsustainable in the medium term. However a larger than normal proportion of the recent sell-off has been driven by higher inflation breakevens than by rising real yields and with current 5yr forward breakevens at 2.65% in the US and 3.25% in the UK the scope for significant further rises is becoming limited. Europe, on the other hand, has lower inflation breakevens but higher real yields than the US or the UK. So long as the ECB retains a strong inflation based mandate the policy mix is likely to prevent a significant rise in inflation expectations and with the economy still facing significant headwinds from fiscal tightening, it seems that there is still room for real yields to decline.

We therefore remain of the opinion that Bund yields will continue to trade in a tight range and at low levels, while US Treasury yields are likely to drift higher over the remainder of the year. As a result of the higher than normal inflation break-even to real-yield beta we are of the opinion that 10yr US Treasuries may well test 2.75-3% in the coming months. While this may limit the scope for Bund yields to fall significantly we do expect further widening of the spread between the two markets and thus expect Bunds to remain in a 1.75-2.25% range and for the spread between 10yr US Treasuries and Bunds to push out towards 75-100bp. From a risk-reward perspective we continue to favour cross-market trades over outright duration risk; selling US Treasuries against Bunds.

The Gilt market remains a very tough call. Fundamentally we think the weak growth outlook against a backdrop of aggressive fiscal tightening should support lower gilt yields. Elevated inflation risk premia and higher inflation betas on top of congested market positioning may continue to weigh on Gilts.

JGBs remain highly correlated to US Treasuries with a low beta. We are currently approaching levels that have triggered increased demand in the past so we may see the beta fall even further if US yields continue to rise.

Figure 50. Interest Rate and Bond Market Forecasts (End of Period), as of 21 March 2012

		Forecast End Period					
	Current	2Q 12	3Q 12	4Q 12	1Q 13	2Q 13	3Q 13
US							
Policy Rate (Fed Funds) End Quarter	0.25	0.25	0.25	0.25	0.25	0.25	0.25
3-Month Libor	0.47	0.48	0.50	0.55	0.65	0.75	0.90
2 Year Treasury Yield	0.36	0.35	0.40	0.50	0.65	0.85	1.00
5 Year Treasury Yield	1.13	1.15	1.25	1.40	1.50	1.70	1.85
10 Year Treasury Yield	2.37	2.40	2.45	2.50	2.60	2.75	3.00
30 Year Treasury Yield	3.44	3.60	3.65	3.70	3.80	4.00	4.25
2-10 Year Treasury Curve	201	205	205	200	195	190	200
2 Year Swap Spread (Swap Less Govt.), bp	26	45	40	35	35	35	35
10 Year Swap Spread (Swap Less Govt.), bp	6	15	20	22	24	25	25
30 Year Swap Spread (Swap Less Govt.), bp	-30	-35	-40	-50	-50	-50	-50
30 Year Mortgage Yield	4.03	4.10	4.20	4.35	4.50	4.70	4.85
10 Year Breakeven Inflation	241	240	235	235	235	240	240
Euro Area							
Policy Rate	1.00	1.00	0.75	0.50	0.50	0.50	0.50
Overnight Rate (EONIA)	0.36	0.36	0.20	0.15	0.15	0.15	0.15
3-Month Libor	0.75	0.67	0.58	0.50	0.50	0.63	0.75
2 Year Treasury Yield	0.32	0.25	0.30	0.30	0.30	0.45	0.65
5 Year Treasury Yield	1.03	0.90	0.95	0.95	1.05	1.20	1.50
10 Year Treasury Yield	2.07	1.90	2.00	2.00	2.15	2.25	2.50
30 Year Treasury Yield	2.67	2.60	2.65	2.65	2.75	2.80	2.95
2-10 Year Treasury Curve	175	165	170	170	185	180	185
10 Year BTP-Bund Spread	280	250	300	275	250	225	200
10 Year Swap Spread (Swap Less Govt.), bp	40	30	50	40	30	30	30
10 Year Breakeven Inflation	173	170	175	180	190	195	200
Japan							
Policy Rate	0.10	0.10	0.10	0.10	0.10	0.10	0.10
3-Month Libor	0.20	0.20	0.20	0.20	0.20	0.20	0.20
2 Year Treasury Yield	0.11	0.10	0.10	0.15	0.15	0.20	0.20
5 Year Treasury Yield	0.38	0.30	0.35	0.45	0.55	0.65	0.65
10 Year Treasury Yield	1.05	0.95	1.00	1.20	1.30	1.40	1.40
30 Year Treasury Yield	1.99	1.90	1.95	2.10	2.15	2.25	2.25
2-10 Year Treasury Curve	94	85	90	105	115	120	120
2 Year Swap Spread (Swap Less Govt.), bp	25	24	24	27	27	30	30
10 Year Swap Spread (Swap Less Govt.), bp	5	3	3	7	8	10	10
10 Year Breakeven Inflation	NA	NA	NA	NA	NA	NA	NA
UK							
Policy Rate	0.50	0.50	0.50	0.50	0.50	0.50	0.50
3-Month Libor	1.04	1.00	0.90	0.85	0.85	0.90	1.00
2 Year Treasury Yield	0.45	0.40	0.40	0.40	0.40	0.50	0.60
5 Year Treasury Yield	1.20	1.00	0.85	0.75	0.85	0.85	0.95
10 Year Treasury Yield	2.43	2.50	2.25	2.25	2.30	2.50	2.75
30 Year Treasury Yield	3.45	3.40	3.00	2.85	2.90	3.00	3.25
2-10 Year Treasury Curve	198	210	185	185	190	200	215
10 Year Swap Spread (Swap Less Govt.), bp	20	15	35	35	40	40	40
10 Year Breakeven Inflation	278	265	250	260	275	285	300
Australia							
Policy Rate	4.25	4.00	4.00	4.00	4.25	4.50	4.50
3-Month Libor	4.43	4.20	4.20	4.40	4.50	4.70	4.70
2 Year Treasury Yield	3.78	3.60	3.90	4.00	4.30	4.60	4.75
5 Year Treasury Yield	3.87	3.80	4.00	4.10	4.40	4.70	4.90
10 Year Treasury Yield	4.40	4.20	4.30	4.50	4.80	4.90	5.00
2-10 Year Treasury Curve	62	60	40	50	50	30	25
10 Year Swap Spread (Swap Less Govt.), bp	80	80	75	70	65	60	60

Source: Citi Investment Research and Analysis

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## Credit Outlook

Given how quickly and dramatically expectations for QE3 have shifted in recent days, we examined overall liquidity conditions in the marketplace and potential influences of these conditions on credit spreads. Note that as recently as last week many investors that we talked with placed the odds of QE3 occurring in the coming quarters in the 25% to 50% range. The bottom line is that despite the prospect of less accommodative policy we remain bullish near-term, but are wary of (monetary) policy-related speed bumps in the intermediate- to longer-term.

### Near-term: Low vol + too much liquidity = tight spreads

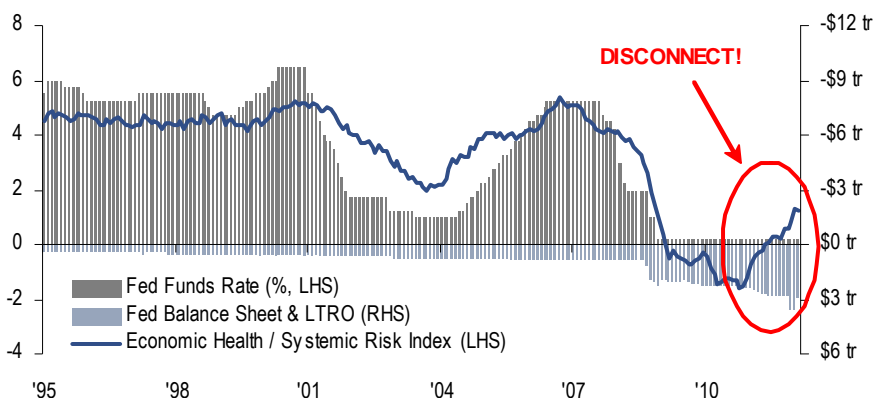
Three factors that help to shape central bankers' behavior – inflation, labor market conditions, and banking system stability – have, in aggregate, improved dramatically over the past few months. Labor market conditions and inflation have been moving in the right direction for a while, but **banking system stability is the one that has had the most improvement, and this only started early December.**

The sharp improvement may mean that the investment environment is inconsistent with monetary policy – one changed a lot, the other did not. (Note that we are not making a statement about what central bankers should or should not be doing, we are simply wondering if investors can take advantage.)

To get a sense of the extent of disconnect, in Figure 51 we plot monetary policy (defined by the funds rate and the Fed balance sheet adjusted for inflation) vs. an index of economic health (modified Taylor rule consisting of core inflation, unemployment, and risk in the bank sector). Historically these two have tracked well (R-square of 92%), but recently have not.

- **An inconsistent amount of liquidity:** Using a very “back of the envelope” approach we calculate that there may be, by one methodology anyway, about \$600 bn of excess liquidity in the system. That is, current economic/systemic risk conditions are consistent with a Fed balance sheet of about \$2.3 tn rather than \$2.9 tn (current level). Our calculation is based on our economists' forecasts for inflation and unemployment six months forward and assumes that the funds rate and risk premiums in the bank sector are unchanged at that time.

Figure 51. Monetary policy and an economic health/systemic risk index have historically tracked well, but not recently. Risk has gone down, but policy is unchanged. Take advantage!



Source: CIRA, Bloomberg      Note: As of February 29, 2012; economic health index is a linear regression of unemployment, core inflation, banking sector OAS on Fed Funds Rate from 1995 to Feb '12



- **What does \$600 bn mean for corporates?** In an earlier publication ([If I Were a Hedge Fund Manager](#) dated Jan. 6<sup>th</sup>) we introduced a simple “fair value” model for credit spreads that was based on credit risk and systemic risk. We add another element to the mix, the Funds rate and the Fed’s balance sheet. So what is \$600 bn worth in terms of credit spreads? About 25 bp in the high-yield cash market, for example. (Again, we acknowledge that this is more of an art than science.)

## Longer-term: Potential speed bumps

But for two key reasons evolving liquidity conditions may weigh on spreads, at least in the longer-term. First, the rally that began in early December was prompted by the mindset that a safety net was put in place. What if this mindset changes? Second, QE programs create disconnects from “fair” valuations. A re-coupling can be unpleasant.

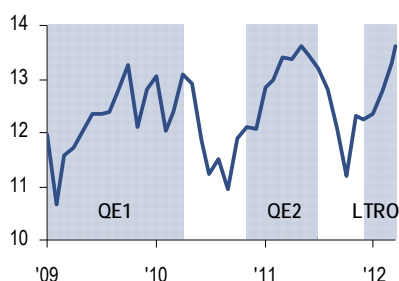
### 1. Where did that safety net go?

The LTRO and related central bank efforts late last year were successful in turning investor sentiment from extremely bleak to quite positive. But plenty of problems, and potentially systemic problems, still remain. The Greek curve remains inverted (10Y/30Y yield curve inverted by about 340 bp currently), Portuguese yields still trade at distressed levels, risk premiums in the Middle East remain at elevated levels, etc. Has the world really changed that much since early December?

The one thing that has changed is expectations of central bank reactions to problems. But what worries us is that the reaction function of policy makers and investors is not static. That is, if Greece runs into problems again and requires assistance, is simply writing a check politically feasible? Or will policymakers need to craft something that may disappoint investors? Will investors respond positively to another bailout or will they view it as a never-ending problem? What about the response of policymakers and investors to the fiscal challenges that Washington faces later this year – is everyone on the same page?

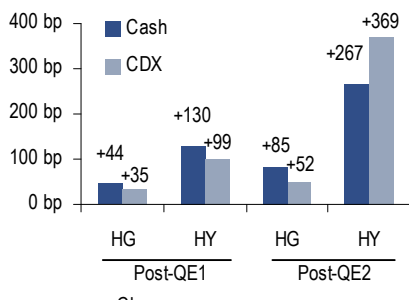
**Key point:** Policymaker and investor reaction functions are probably not static, and it may be a risk to assume that the safety net will always be there (or perceived to be there). Never say never...

Figure 52. S&P 500 P/E ratio using forward operating EPS



Source: CIRA  
Note: As of March 13, 2012

Figure 53. Three-month spread performance after QE programs ended



Source: CIRA

### 2. Re-coupling with fair value

The goal of QE programs is essentially to bolster demand for assets above and beyond the market-clearing level. Of course, in order to maintain prices above “fair” value one of two things has to happen — either growth must occur or the pump has to keep pumping (or both).

To get a sense of what happens when the pump stops pumping *after adjusting for growth*, in Figure 52 we present the P/E ratio of the S&P 500 index based on *forward-looking* operating EPS (i.e., take the growth part out of the equation). We see that the P/E ratio spiked during the periods of QE programs, which means that investors were willing to pay more for any anticipated cash flow stream, but we observe the opposite after the programs ended. For example, when QE1 ended, the P/E ratio fell from the peak of 13.1 to 11.0 over the next five months, and we saw the similar re-coupling action at the end of QE2. In effect, QE was a transient impact on valuations, not a permanent one even after factoring in growth expectations.

And we see something similar in the credit space. In Figure 53 we present the spread performance of the cash and synthetic high-grade and high-yield markets three months after the QE programs ended. Spread widening after QE1 ended ranged from 35 bp (CDX.IG) to 130 bp (HY cash), and after QE2 spreads increased by as much as 369 bp (CDX.HY).

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## Global Equity Strategy

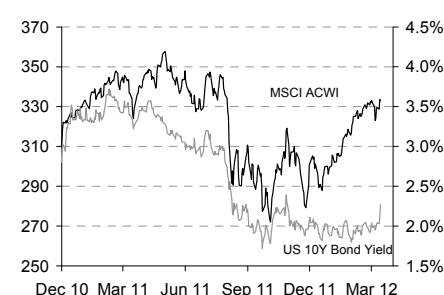
Global equities are up 23% from their October lows. While stock indices are due for a period of consolidation, we expect more upside by year-end. Current valuations imply equity investors are pricing in a decline in global EPS. Stabilising earnings revisions and economic expectations suggest this is less likely. Our MSCI AC World end-2012 target is 360, implying 7% upside from current levels. This implies a recoupling of global share prices and EPS over the year (see Figure 54). The main risks to our outlook are sharply rising core government bond yields and a further escalation of the EMU crisis.

Figure 54. MSCI AC World Price vs EPS (9m Lagged)



Source: MSCI and CIRA

Figure 55. MSCI AC World Price and US 10 Year BY



Source: MSCI and Citi Investment Research and Analysis

While we think there is more upside from here, investors shouldn't be anticipating the gains we had during the 2009 rally. Back then there were both a re-rating of stock markets and a recovery in global EPS, both from depressed levels. Currently, valuations are low, but global profits are not depressed like they were in 2009. Our forecast is for a moderate rise in EPS over the next two years. This should mean that the current rally will look more like the one we had in 2010-11.

We believe there are a number of reasons for the current rally to continue. Rising core government bond yields choked off the last two equity rallies in this cycle. Although there has been a rise in core government bond yields recently, they are yet to be a headwind in our view. Currently US 10 year government bond yield is around 2.3%, still some way to go before becoming a competitive alternative to global equities. We would become more cautious when bond yields get closer to the global equity market dividend yield which is currently 2.9%.

Another factor supporting the current rally is that flows into equity funds are only just beginning after large outflows in 2011. The first parts of previous rallies have been times of equity outflows. However, as stock indices rise, investors begin to participate. In the past equity fund flows have helped sustain the rally for longer.

Global earnings revisions recently turned positive after 41 consecutive weeks of downgrades. This surprised many investors in part because they are worried about peak corporate profit margins in the US and Europe. Many worry they are unsustainable at these levels. However, while Western margins have risen significantly, they have been falling in the East. We believe changing business models are responsible for much of the shift in margins. While Asian companies have adopted a sales-maximising strategy, their Western counterparts have pursued a margin maximising model. Both business models exploit competitive advantages and do not look like they will be reversing soon. While Western margins are close to their all time peaks, capex has been lagging and is not competing away

these super-normal profits. Profit margins remain susceptible to cyclical downturns, but we think margins are more sustainable at these levels than many think. This is another reason why we remain positive on markets.

The Eurozone crisis still remains a concern, but the liquidity provided by the central bank seems to have removed the tail risks. Strong macro data in the US have also helped offset the uncertainties coming out of Eurozone. In addition, cheap valuations limit the downside risk when pullbacks occur. Even after the 20% increase, global equities are trading at 18x CAPE while the long-term average is 24x.

Figure 56. Strategists' Forecasts

Region	Index	Current Level (19 Mar 12)	End 2012 Target	Exp Gain (%)
US	S&P 500	1410	1425	1%
Pan Euro	DJ Stoxx600	272	285	5%
UK	FTSE 100	5961	6200	4%
Japan	Topix	868	960	11%
Asia xJpn	MSCI Asia x JP	527	575	9%
Australia	S&P/ASX 200	4291	4750	11%
GEMs	MSCI EM	1061	1225	15%
LATAM	MSCI Latam	4205	4900	17%
CEEMEA	MSCI EM EMEA	361	350	-3%
Global	MSCI ACWI	337	360	7%

Source: MSCI, CIRA

Our key regional and global sector recommendations are summarised in Figure 57. We remain Overweight Global Emerging Markets. Despite a strong start to 2012, valuations remain attractive in EM and the region should benefit from easier monetary policy this year. We are also Overweight Japan. Despite the strong rally in Japanese equities YTD, they are still trading at around 1x book value. We favour EM plays in the developed world. We are Overweight the UK, as companies have a heavy exposure to Emerging Markets. Another reason to be positive on UK equities is that the Bank of England is currently one of the most aggressive major central banks in the world. This should be a positive for risk assets like equities. We are Neutral on Europe ex UK equities. While sovereign concerns will continue to weigh on growth, liquidity provisions by the central bank should help support equity markets. We also remain Neutral on Australia. We are Underweight the US as it is expensive relative to other equity markets where we see better opportunities.

Our global sector strategy has a more cyclical/pro-beta tilt. This is consistent with our positive view on markets. We are Overweight Financials. Despite the strong rally YTD, the sector still looks cheap and capital returns in the US certainly help improve sentiment. We remain Overweight IT and Consumer Staples. These sectors have solid earnings momentum and they are strong de-equitisers. Consumer Staples companies generate much of their growth in emerging economies, which makes the sector attractive. Consumer Discretionary is our least preferred cyclical. We are Underweight Health Care as valuations look unattractive. We are also Underweight Utilities. This defensive sector, hampered by regulatory issues, should continue to be left behind as markets rise.

Figure 57. Regional And Global Sector Recommendations

Overweight	Neutral	Underweight
Global Emerging Markets	Australia	US
Asia Pac ex Japan	Europe ex-UK	
Japan		
UK		
Overweight	Neutral	Underweight
Consumer Staples	Energy	Consumer Disc.
Financials	Industrials	Health Care
IT	Materials	Utilities
	Telecoms	

Source: CIRA

## Securitized Products Strategy

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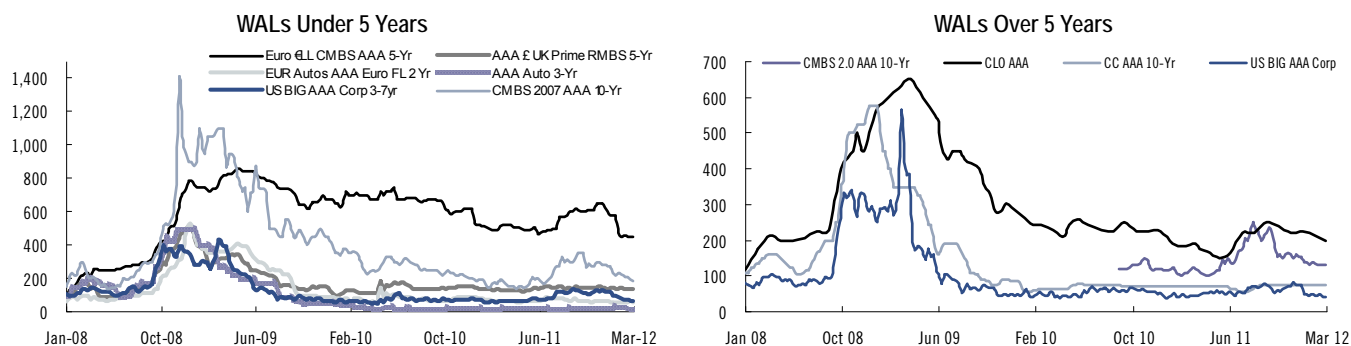
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**Off-the-run sectors continue to offer the most promise among securitized products to find extra spread, as the core sectors should remain roughly range bound.** If the broader markets remain calm, core sectors such as CMBS or longer term credit cards could tighten a bit further. But we would expect to see some consolidation at the recent tighter new levels in the near term. As dealer inventories grow, they may need to widen offers at some stage to lighten up again.

### Market Weight Core Sectors Amid “Risk-on” Momentum

**Tight technicals sustain our market weight recommendations for core sectors such as consumer ABS, CMBS, and European ABS.** The ABS market, for example, absorbed more than \$13 billion of new issue supply during February, yet runoff exceeds new issuance by roughly \$8 billion for the year-to-date. This positive technical is lending support to spreads. YTD total supply registers \$23.1 billion, about 40% ahead of the comparable 2011 supply. In CMBS, sellers have been bringing supply to market to take advantage of the strong rally the sector has experienced since the start of the year.

Figure 58. Selected Securitized Products Sectors — Spread Performance, Jan 08-Mar 12



Source: Citi Investment Research and Analysis

In turn, European securitized products have benefited from the ECB's large boost of liquidity. The ECB's second 3YR Long Term Repo Operation (LTRO), on February 29, provided banks with €530 billion of funds (a net increase of €314 billion), bringing the total provision of funding to over €1 trillion. Beyond improving liquidity, as unsecured markets spreads settle back and re-approach stable UK prime RMBS levels, the relative value of secured assets becomes more attractive.

### Spread Pick-up Sectors

**Given the limited upside in the core sectors, our strategists recommend several non-core or off-the-run sectors for spread pick up.** We summarize our recommendations as follows:

- **US ABS top pick — prime auto subordinates.** Prime auto ABS subordinate remain cheap to the historical 10YR adjusted mean spread. Current spreads range from swaps + 150–200bp for 3YR single-A and triple-B auto ABS, picking up 90–117bp over their respective means.
- **Dealer floorplan and private label credit cards.** We continue to recommend off-the-run dealer floorplan and private label credit card ABS, which pick up 24–69bp to generic credit cards.
- **European off-the-run diversification.** We prefer short duration bonds offering stable and strong collateral, augmented by select off-the-run sectors. Several off-the-run sectors offer value, in our view. Certain older vintage Spanish RMBS with

enhanced levels of collateral protection are attractive. We also like first-pay short WAL UK nonconforming bonds and select European CMBS opportunities.

- **Dutch RMBS Attractive.** Dutch prime RMBS looks attractive in comparison to our 7YR average spread target, offering a pickup of 39bp. Dutch prime RMBS offers further upside potential from current levels of EURIBOR + 142bp, in our view.
- **Non-agency.** The absolute yields in non-agencies are significantly higher than other sectors, especially for investors with a medium- term horizon. We prefer better quality, fixed rate paper because of high carry, a strong investor base, and lower supply risks. In the lower credit sectors, however, servicer selection will be a key.
- **CMBS 2007 Dupers.** Even with the rally, the late-vintage 2007 dupers have not fully recaptured their relative spread differentials to more seasoned ones. Through the first half of last year, the 2007 dupers traded within 45bp of the 2005 bonds. During the volatility in the second half, that differential steadily widened out, peaking at around 155bp. With the rally this year, that differential to seasoned dupers began compressing again, is currently around 100bp, and is still very attractive to first-half 2011 levels.

#### Many Decisions to Make on Capital Charge Rules, as the Comment Period Ends

Senior securitized products will likely see the most impact from any changes US regulators make in the coming months to their proposed “alternatives to ratings” framework. The current proposal, released in early December, appears to unfavorably treat senior bonds.<sup>9</sup>

Regulators introduced risk-based capital charges rules that do not rely on ratings...

**The final framework the regulators adopt could have far-reaching implications for banks’ incentives to hold securitizations on their trading books, and thus, to provide market liquidity.** Regulators proposed a Simplified Supervisory Formula Approach (SSFA) for calculating trading book risk-based capital charges. Unlike the Basel II risk-based capital rules, SSFA does not rely on ratings at all. The Dodd-Frank Act required regulators to remove regulatory reliance on credit ratings.

#### Sector Relative Value and Allocation Recommendations

Our securitized products strategists have mixed views on the market, ranging from bullish to neutral, and Figure 59 shows Citi strategists’ recommendations for major structured products sectors on a scale of -3 (maximally bearish) to +3 (maximally bullish). The table also incorporates the strategists’ most current thinking about value and presents one or two trade ideas.

Figure 59. Sector Relative Value and Asset Allocation Recommendations — Selected Sectors, March 2012

Sector	Strategist Recommendation	Spreads Relative to Long-Term Averages	Comments
CABS	0	Fair	Remain market weighted. Subordinate auto ABS is our top pick. We also like equipment ABS.
CMBS	+0	Fair	Most CMBS sectors are now in line with our most likely 2012 spread targets, which assume a level of volatility that is comparable to the 2011 average. Volatility has retreated a bit, but further tightening is unlikely until market conditions demonstrate a more sustainable stability.
Agency MBS	+1	Fair to Rich	We recommend overweighting lower coupons versus the belly to get long the mortgage basis in a convexity neutral fashion. We expect the basis to benefit from a likely decline in longer-dated implied volatility, strong carry, and the long QE3 option.
European Securitized Products	+0	Cheap to Fair	Market weighted. Peripheral markets to continue to benefit from ongoing technicals. We prefer a barbell strategy with stable, short sectors, combined with select off-the-run opportunities. We like autos, UK Credit Cards, UK prime RMBS, with higher yielding older vintage Spanish RMBS, CMBS seniors and off-the-run opportunities in first pay short WAL UK NCRMBs.

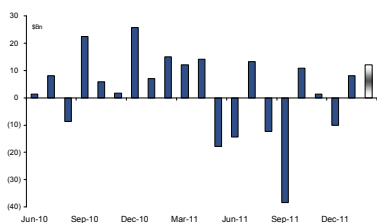
Source: Citi Investment Research and Analysis

<sup>9</sup> The full proposal, “Risk-Based Capital Guidelines: Market Risk; Alternatives to Credit Ratings for Debt and Securitization Positions,” can be found [here](#).

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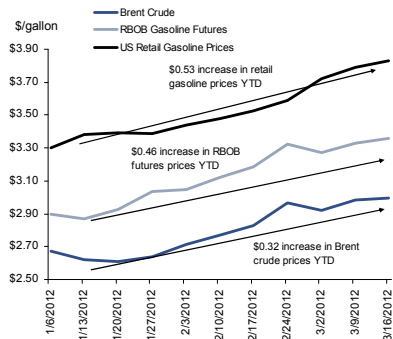
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Figure 60. Net Commodity Flows: Index, ETPs



Source: Citi Investment Research and Analysis

Figure 61. Brent Crude, RBOB Futures, and US Retail Gasoline Prices YTD



Source: Citi Investment Research and Analysis

## Commodity Outlook and Forecast

Commodities have outperformed during the first quarter of this year versus our initial outlook in January<sup>10</sup>, posting a 3.5% year-to-date total return as of mid-March. The fruition of geopolitical tail risks to crude supply in the MENA region has been particularly supportive for petroleum market prices while disappointing Latin American corn and soybean outlays due to adverse weather has lifted agriculture markets on the back of low inventories and resilient global crop demand. Base metals benefited from a short-covering rally in January but LME levels have been surprisingly stable ever since, despite total copper warehouse stocks up on the year with Shanghai builds counteracting London declines. We expect the impact of production outages and supply risks to continue lifting commodity prices in the energy and key grains sectors while the specter of further policy rate cuts, liquidity programs and monetary easing in China, Europe and possibly the US could be especially beneficial for precious and industrial metals markets in 2H'12.

Improving macroeconomic conditions have also provided a stiff tailwind for asset markets and are likely to induce further price appreciation on surprises to the upside. Easing tensions in European sovereign credit markets, advancing household spending and job growth data in the US and the sheer collapse of market volatility across FX, equity and credit has only boosted this 'risk-on' sentiment. To be sure, net commodity inflow estimates for the first two months of 2012 were a constructive +\$20Bn; in affinity to the +\$22Bn assessment during the same period in 2011. Our base expectation remains that aggregate inflows and assets under management shall continue to grow this year. A potential headwind for nominal prices is the strength of the US dollar and its expected appreciation versus the Euro into 2H'12 to \$1.26. Additionally, the prospects for another round of QE in the US seem to have diminished in size and scope based on recent FOMC statements.

On the other hand, commodity risks themselves could place the strengthening macroeconomic outlook itself in jeopardy. As discussed in previous research (see "[Here We Go Again: Oil Price Shocks, US Economic Growth, and Demand Destruction](#)," published March 1, 2012) oil price shocks remain a significant concern to headline US GDP and job growth, though the damage may be mitigated by lower imports and softer monetary policy compared to previous historical oil shocks.

The higher crude prices resulting from the Iranian oil embargo and related risk premia are finally hitting final consumers with a vengeance. Gasoline prices in the US East Coast are expected to peak this summer due to substantial refinery closures suffering from high crude input costs in the Atlantic basin. Futures prices for April-dated RBOB Gasoline have already risen more than seventy cents since the beginning of the year, and retail prices may reach as high as \$4.50 to \$5 per gallon if refinery shutdowns result in disproportionate product price increases. Policy actions, such as a coordinated stockpile release, may help mitigate some of the sharpest price spikes, but the impact is likely to be only temporary.

All eyes will be on the ability of Saudi Arabia to perform its historical swing supplier role. Recently, Saudi Arabia has escalated its rhetoric but even taking Saudi production capacity figures of 11.8-m b/d at face value, its current production of nearly 10-m b/d leaves precious little maneuvering room when facing even a temporary disruption of the 17-18m-b/d of oil that transits through the Strait of Hormuz. Saudi export and rig count numbers have indeed increased but markets may shrug off any verbal Saudi promise in favor of looking at observable inventory

<sup>10</sup> Morse, Edward and Jansen, Heath. "2012 Commodity Outlook: A Year of Tail Risks" 8 January 2012.



levels in the OECD, which the Saudis may struggle to deliver in time due to logistical issues.

Figure 62. Crude Oil Price Forecast

Crude Oil Prices	Q1 2012	Q2 2012	Q3 2012	Q4 2012
Brent (\$/bbl)				
Old	105	110	110	115
New	115	125	130	125
WTI (\$/bbl)				
Old	95	100	100	105
New	100	105	115	105

Source: Citi Investment Research and Analysis

As to specific outlooks, we notably revise our 2012 crude oil price forecast. An ongoing perfect storm of supply disruptions (the '1-m b/d problem' out of Iran, Sudan, Yemen, and Africa), low product inventories (particularly in Europe) and remarkably tight spare capacity globally (to 2% of world demand as the Saudis pump over 10-m b/d) lifted prompt month prices to the high end of our initial \$100-\$120/bbl range for ICE Brent throughout February. We accordingly adjust our cal'12 ICE Brent price to \$125/bbl from \$110/bbl. Meanwhile, NYMEX WTI prompt month levels are projected to stay at a significant discount of \$15-\$20/bbl to waterborne Brent levels this year; surging US mid-continent production and rising Cushing stocks pressuring current infrastructure. The crude market is therefore seen as very firm despite our anemic +800-k b/d 2012 global demand growth estimate; solely underpinned by an increase in emerging markets consumption of +1.1-m b/d vis-à-vis contraction of -300-k b/d in developed economies. Unexpected demand in the US or Western Europe may only add proverbial fuel to this bullish fire—as could higher prints in non-OECD demand, which is expected to surpass OECD consumption in 2013. We are similarly bullish corn and oilseeds, revising upwards our 0-3 and 6-12 point prices for soybeans to \$13/bu and \$13.5/bu with the potential for US exports to surge 30% in 2H'12 to make up for lost South American supply.

Figure 63. Commodity Price Forecast\*

		Recent Spot	Forecasts		5Y Cyclical	2012E	2013E
			0-3M	6-12M			
<b>Energy</b>							
NYMEX WTI	USD/bbl	107.9	105.0	110.0	81.0	106.0	113.0
ICE Brent	USD/bbl	125.3	120.0	125.0	85.0	124.0	120.0
Henry Hub Natural Gas	USD/MMBtu	2.3	2.5	3.1	N/A	3.3	3.6
<b>Base Metals</b>							
LME Aluminum	USD/MT	2,262	2,100	2,350	2,500	2,275	2,525
LME Copper	USD/MT	8,578	7,000	8,300	7,500	7,825	8,525
LME Lead	USD/MT	2,097	1,950	2,325	2,300	2,150	2,400
LME Nickel	USD/MT	19,024	20,000	19,750	22,000	19,500	22,820
LME Tin	USD/MT	23,580	19,500	23,250	24,500	22,125	25,700
LME Zinc	USD/MT	2,071	1,900	2,125	2,300	2,050	2,295
<b>Precious Metals</b>							
Gold	USD/T. oz	1,664	1,675	1,750	1,050	1,710	1,910
Silver	USD/T. oz	33	31	29	15	30	27
Platinum	USD/T. oz	1,683	1,555	1,665	1,500	1,610	1,675
Palladium	USD/T. oz	706	720	830	600	775	925
<b>Bulk Commodities</b>							
Hard Coking Coal (benchmark Asia)	USD/MT	285	235	270	220	256	248
Thermal Coal (API2)	USD/MT	100	118	130	105	120	139
Iron Ore Spot (TSI)	USD/MT	145	125	165	100	149	135
<b>Agriculture</b>							
Corn	USD/bu	664	620	628	N/A	635	N/A
Soybeans	USD/bu	1,367	1,300	1,325	N/A	1,240	N/A
Wheat	USD/bu	652	610	621	N/A	625	N/A
Rice	USD/cwt	15	14.9	15.1	N/A	15.1	N/A
Cotton	USD/lb	89	95	85	N/A	90	N/A
Sugar	USD/lb	26	23	22	N/A	22	N/A
Coffee	USD/lb	183	210	200	N/A	210	N/A
Cocoa	USD/MT	2,289	2,200	2,400	N/A	2,375	N/A

Source: CIRA, \*Subject to change and revision



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† This author is not an independent research analyst and may have knowledge of the Firm's positions and/or the Firm's interest in one or more of the securities referenced herein.

## Citi Foreign Exchange Forecasts

### Market Commentary

*This market commentary has been prepared by a member of the Institutional Clients Group of Citi. The information in this communication is not intended to constitute "research" as that term is defined by applicable regulations.*

\*\* For specific trade ideas associated with this sector review, please contact the contributors listed at the end of this piece

- USD strength, with equities still rising, suggests higher bond yields and better data could be the driver
- We expect further ECB easing medium term to drive EUR down to 1.25
- Chinese growth concerns and overvaluation should see AUD moving back towards parity
- Unexpectedly weak data (Sweden) and unanticipated rate cuts (Norway) may significantly dampen trend appreciation in SEK and NOK respectively
- A weaker China and flat-lining CNY have important implications for EM FX
- Asian EM FX will now have less upside, particularly with the USD generally stronger
- Latam FX is likely to be the outperformer relative to forwards, particularly MXN

*These forecasts are a joint venture between Citi's foreign exchange, global macro and technical strategy groups and our developed and emerging markets economists. Under normal circumstances, we expect to present Forecasts on a monthly schedule although we may offer intra month updates if circumstances dictate.*

*While these forecasts should be considered the best guide to Citi's short to medium term views on the outlook for the exchange rates covered, individual analysts within various strategy teams may offer separate trade ideas in spot, forward, options or futures when this seems appropriate for technical, tactical or strategic reasons.*

Figure 64. Citi Foreign Exchange Forecasts

		Market data			Forecasts			Returns**	
		spot	3m Fwd	12m Fwd	0-3 mos	6-12 mos	long-term	3 mos rtn	12 mos rtn
<b>G10</b>									
Euro	EURUSD	1.30	1.30	1.31	1.30	1.25	1.30	-0.3%	-4.3%
Japanese yen	USDJPY	84	84	83	83	80	85	-0.7%	-3.9%
British Pound	GBPUSD	1.57	1.57	1.56	1.57	1.53	1.65	0.0%	-1.8%
Swiss Franc	USDCHF	0.93	0.93	0.93	0.93	0.98	0.96	0.0%	5.4%
Australian Dollar	AUDUSD	1.04	1.03	1.00	1.05	1.00	0.90	1.7%	-0.4%
New Zealand Dollar	NZDUSD	0.81	0.80	0.79	0.82	0.76	0.63	2.2%	-3.5%
Canadian Dollar	USDCAD	0.99	0.99	1.00	0.98	0.98	0.97	-1.4%	-2.6%
Dollar Index*	DXY	80.51	80.53	80.46	80.44	82.26	80.17	-0.1%	2.2%
<b>G10 Crosses</b>									
Japanese yen	EURJPY	109	109	109	108	100	111	-1.0%	-8.0%
Swiss Franc	EURCHF	1.21	1.21	1.21	1.21	1.22	1.25	-0.2%	0.8%
British Pound	EURGBP	0.83	0.83	0.84	0.83	0.81	0.79	-0.3%	-2.6%
Swedish Krona	EURSEK	8.92	8.96	9.06	8.85	8.75	8.65	-1.3%	-3.4%
Norwegian Krone	EURNOK	7.59	7.62	7.72	7.55	7.50	7.50	-1.0%	-2.8%
Norwegian Krone	NOKSEK	1.18	1.18	1.17	1.17	1.17	1.15	-0.3%	-0.6%
Australian Dollar	AUDNZD	1.29	1.29	1.27	1.28	1.32	1.43	-0.5%	3.2%
Australian Dollar	AUDJPY	87	86	84	87	80	77	1.0%	-4.2%
<b>Asia</b>									
Chinese Renminbi	USDCNY	6.33	6.35	6.36	6.32	6.24	6.11	-0.4%	-1.8%
Hong Kong Dollar	USDHKD	7.76	7.76	7.76	7.75	7.76	7.75	-0.1%	0.0%
Indonesian Rupiah	USIDIDR	9173	9409	9782	9100	9300	9200	-3.3%	-4.9%
Indian Rupee	USDINR	49.9	51.3	53.3	50.5	50.0	48.5	-1.5%	-6.2%
Korean Won	USDKRW	1126	1138	1151	1135	1110	980	-0.3%	-3.6%
Malaysian Ringgit	USDMYR	3.05	3.07	3.11	3.06	2.98	2.89	-0.3%	-4.2%
Philippine Peso	USDPHP	42.9	43.5	43.9	43.0	42.0	41.5	-1.2%	-4.4%
Singapore Dollar	USDSGD	1.27	1.27	1.27	1.26	1.23	1.19	-0.7%	-2.5%
Thai Baht	USDTHB	30.8	31.0	31.4	30.8	30.3	30.0	-0.5%	-3.5%
Taiwan Dollar	USDTWD	29.5	29.5	29.3	29.7	28.8	28.2	0.6%	-1.6%
<b>EMEA</b>									
Czech Koruna	EURCZK	24.6	24.6	24.7	24.4	25.1	24.0	-1.0%	1.6%
Hungarian Forint	EURHUF	293	297	306	300	285	290	1.1%	-6.9%
Polish Zloty	EURPLN	4.15	4.19	4.31	4.15	4.20	3.90	-1.0%	-2.5%
Israeli Shekel	USDILS	3.79	3.81	3.85	3.80	3.95	3.90	-0.3%	2.6%
Russian Ruble	USDRUB	29.6	29.9	31.0	30.0	33.3	32.2	0.1%	7.1%
Russian Ruble Basket		33.6	34.0	35.3	34.0	37.0	36.5	0.0%	4.7%
Turkish Lira	USDTRY	1.81	1.84	1.94	1.80	1.90	1.80	-2.3%	-2.2%
South African Rand	USDZAR	7.69	7.79	8.12	7.70	8.10	8.80	-1.1%	-0.2%
<b>LATAM</b>									
Brazilian Real	USDBRL	1.82	1.86	1.94	1.82	1.75	1.65	-2.1%	-9.8%
Chilean Peso	USDCLP	487	492	506	480	500	490	-2.5%	-1.2%
Mexican Peso	USDMXN	12.7	12.8	13.1	12.1	12.3	12.2	-5.4%	-6.1%
Colombian Peso	USDCOP	1764	1782	1834	1730	1800	1850	-2.9%	-1.9%

\* The DXY forecasts are implied from the forecasts of the constituent crosses.

\*\* Returns are relative to forwards

Source: Citi Investment Research and Analysis

## Overview

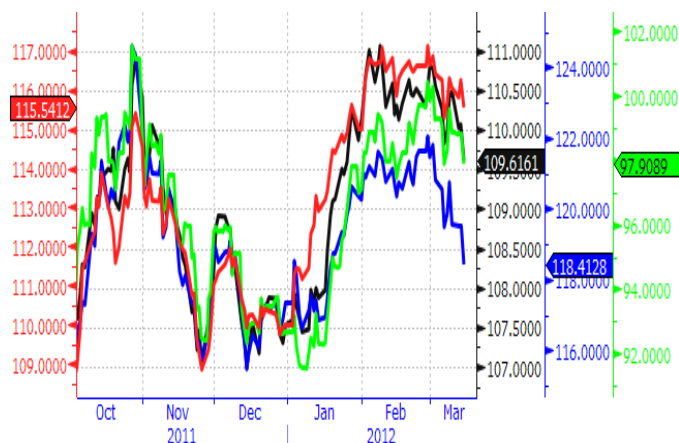
The USD has been strengthening since our last issue. While a small move so far, this has nonetheless been pretty much across the board and has included both other G10 and EM currencies (see Figure 65). This is something of a surprise to us given that we tend to expect USD gains to be mainly in periods of either very robust US economic activity or very weak data with associated withdrawal of investor risk appetite.

One factor may be that investors detect a pause in Central Bank stimulus after a surge in liquidity additions previously. The ECB LTRO is done, for example, and no further actions may be imminent. In the US, the Fed has shied away from committing to QE3. In the UK, the QE2 programme has not been expanded further. There are also tentative signs of a turn lower in Citi Economic Surprise Indices in both developed and emerging economies. More specifically, news from China has been disappointing in recent weeks with money data and trade flows weaker than anticipated. This carries negative implications for commodity exporters and many EMs in the region.

That said, our overall indicator of risk aversion – the GRAMI – continue to trend lower reflecting lower sovereign spreads, range trading credit spreads and lower implied market volatilities (see Figure 66). So a key question is likely to be will other asset prices follow the USD lead – thus validating USD strength – or will risk assets more generally remain strong and the associated rise in investor optimism likely lead to renewed USD weakness medium term?

A final possibility is that we are witnessing the first signs of a return to a more fundamental FX market where growth outperformance by the US generates USD strength via the expectation of higher yields, not weakness via better risk appetite. As such, higher bond yields, equities and USD could all co-exist.

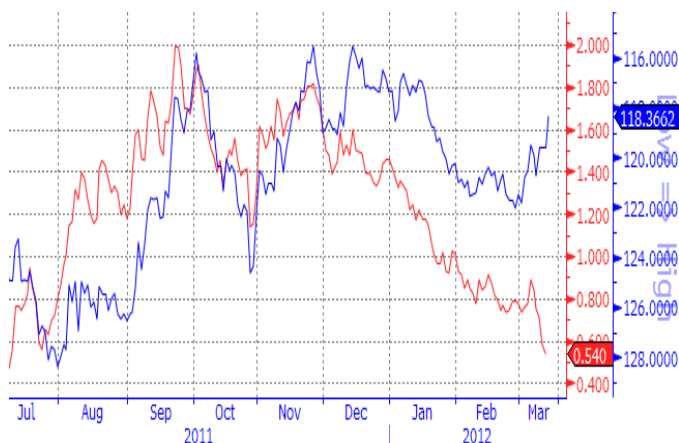
Figure 65. USD vs. Asia (Black), G10 (Blue), LATAM (Red), CEEMEA (Green). Lower Means Stronger USD



.DXY10 S 44281277 Index (G10 FX Equally Weighted, Jan09) Global USD even weight Copyright© 2012 Bloomberg Finance L.P. 14-Mar-2012 15:27:32

Source: Bloomberg and Citi Investment Research and Analysis

Figure 66. USD vs G10 FX (Blue) Normally Follows Overall Risk Appetite (GRAMI, Red)



.DXY10 S 44281277 Index (G10 FX Equally Weighted, Jan09) grami and usd Daily 1 Copyright© 2012 Bloomberg Finance L.P. 14-Mar-2012 15:25:44

Sources: Bloomberg and Citi Investment Research and Analysis

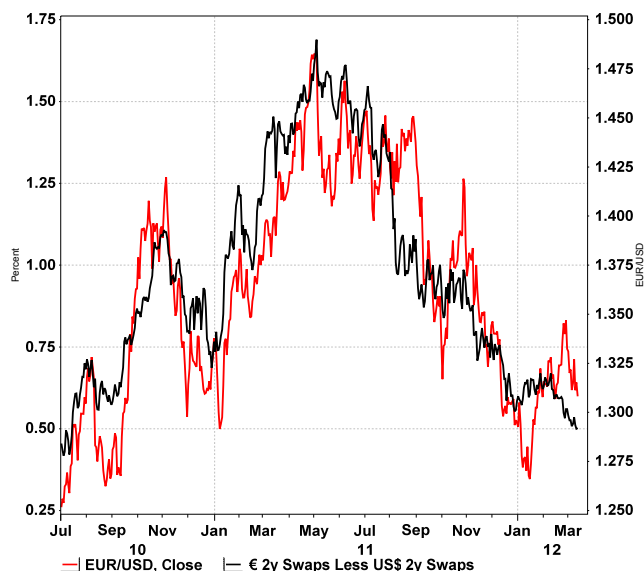
## G10 Exchange Rates

### EUR/USD – Lower Medium Term

EUR/USD continues to be buffeted both by news on the fiscal/ balance of payments crisis within EMU and by relative monetary policy news. On the latter, Figure 67 shows that the exchange rate continues to fluctuate around rate differentials albeit under and over shooting at times. This chart suggests scope for a further decline even without additional ECB measures. Figure 68 tells a similar story. In the recent past, the ECB has expanded its balance sheet faster than the Fed and this is likely to be EUR negative. According to our FX strategy team, these relative monetary influences on EUR/USD tend to persist for longer than does the effect of lower sovereign spreads and associated risk premia. Effectively, what is good for EMU can be bad for the EUR.

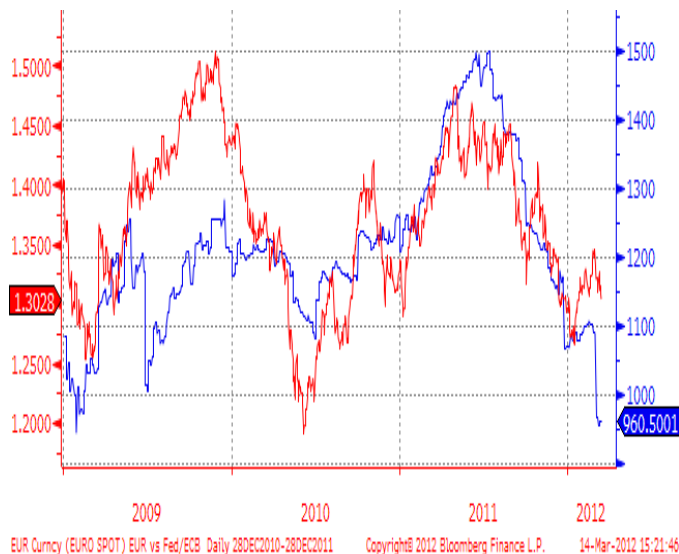
Our forecasts assume this effect continues to be a critical driver. Near term, neither the ECB nor the Fed are likely to announce significant new monetary initiatives. On the Fed side, the FOMC has been backing away from an explicit commitment to QE3 while the ECB signalled at its February policy meeting that little additional action was imminent. Citi economists have therefore postponed forecast rate cuts from Q2 until later in the year. As a result, our 0-3m forecast is for little change.

Figure 67. EUR/USD (Red) vs. 2y Swap Rates (USD Less EUR, Black)



Source: Reuters EcoWin

Figure 68. EUR/USD (Red) vs Ratio of Fed and ECB Balance Sheets (Blue)



Source: Bloomberg

Longer term, we expect further EUR/USD downside. There are a number of tail risks that could help the USD anyway over this time frame (Iran, China) but more mainstream influences may also drive EUR/USD lower. ECB rates should still drop again over this period as EA growth disappoints and risk premia in EMU markets could also rebound.

Furthermore, while the lack of competitiveness of periphery EMU countries vs. the core is not addressed by generalised EUR weakness, it does at least help broader measures of competitiveness and a weaker EUR may yet be one way to mitigate adverse effects of fiscal tightening in these countries longer term. Overall, our 0-3 and 6-12 months forecasts are 1.30 and 1.25 respectively.

### Yen – USD/JPY Probably Overshooting

USD/JPY has continued to rally strongly since our last *Forecasts*, exceeding the 81 we had posted as a 0-3m projection. This move seems to have been driven by a combination of events. First, trade flows have been much less favourable for Japan over the winter reflecting extra oil imports to replace nuclear energy. Second, the special BoJ monetary measures announced 14 February<sup>11</sup> have led to expectations of a more significant shift for the first time in Japanese policy towards ending deflation. And third, hedge funds are (once again) loading up with new short JPY positions partly based on the first two factors and partly on longer term fundamentals.

<sup>11</sup> The BoJ unexpectedly announced new monetary policy measures on 14 February. These included additional QE of ¥10trn (total up to ¥65trn), or around \$125bn, and an inflation target of 1%.

On the latter, medium term demographics should lead to a deterioration in the current account while low yields will make substantial bond portfolio inflows unlikely. Most likely, USD/JPY is in the process of a bottoming out in its downtrend since 2007.

However, these long term factors are relatively slow moving and short term dynamics tend to suggest that USD/JPY is overshooting. Specifically, Japanese real interest rates are higher than in the US while short rate differentials point to more like 78-79 as fair value rather than spot at about 83 (Figure 69). Furthermore, the Fed remains likely to expand its balance sheet much more aggressively than the BoJ (Figure 70) a medium term negative for USD/JPY. Until the Fed is ready to start a new hiking cycle, our Tokyo FX strategy expect a 75-85 range with a central tendency around 80.

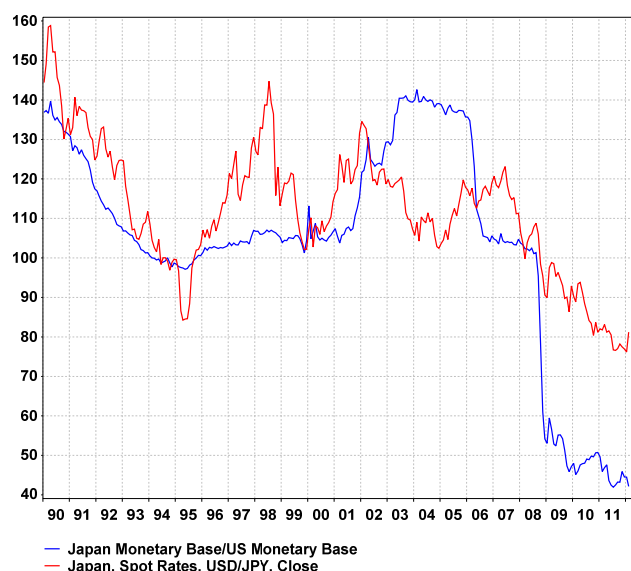
As a result, we expect modest near term upside in the exchange rate while risk appetite is strong but that over the medium term USD/JPY is flat to slightly lower again. Our point forecasts are: 0-3 months 83 and 6-12 months 80.

Figure 69. USD/JPY: Regressed on US-Japan Rate Differentials



Source: Reuters EcoWin and Citi

Figure 70. Relative Monetary Policy Still Much Looser in the US Than Japan



Source: Reuters EcoWin and Citi

## Dollar Bloc – AUD Expensive, China Sensitive

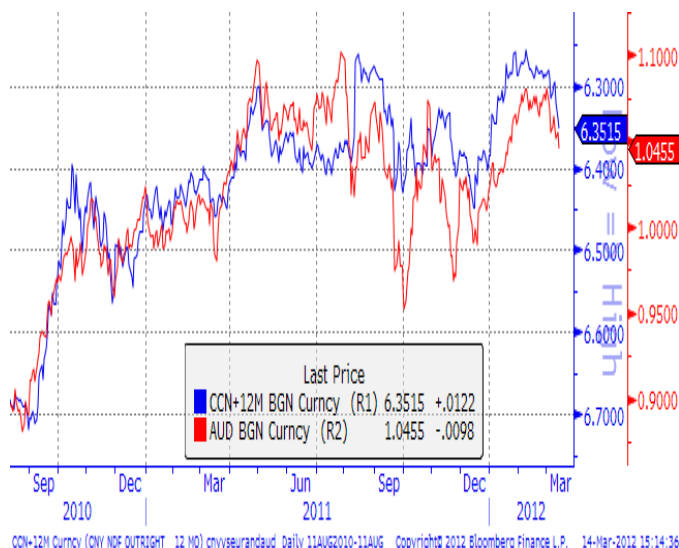
AUD looks expensive by most metrics. Key market drivers of AUD historically – carry, commodity prices, Asian currencies and global risk appetite – imply that AUD/USD should be closer to parity. Longer term value, characterised by our WERM model, would point to nearer 87c. While conditions for a return to the latter level are not likely to prevail anytime soon, according to Citi economic forecasts, some part of this overvaluation may unwind, reflecting less favourable short term dynamics.

For example, China's ever more evident economic slowdown is relevant. Already, key commodity prices produced in Australia have fallen and AUD is yet fully to respond to this. As demand for exports falls, the RBA may well be tempted to cut rates again, reducing carry support to the currency a little more. Markets recognise these links in the close relationship between movements in CNY forwards and

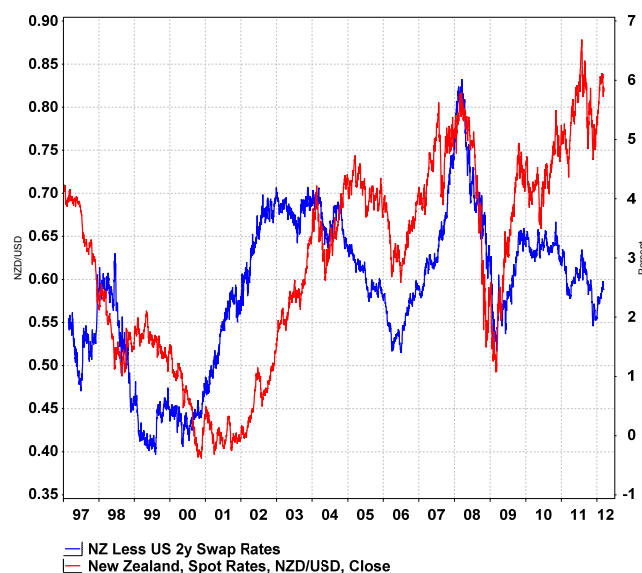
AUD/USD (Figure 71). Since we think USD/CNY may now be rather more stable, a spike higher in CNY forwards should not be ruled out, potentially lowering AUD/USD at the same time.

Overall, we continue to look for a move back towards parity over the 6-12 months horizon.

Figure 71. AUD/USD (Red) and USD/CNY 12m NDF (Blue, Inverse Scale) Figure 72. NZD/USD vs. 2y Swap Rate Differentials



Sources: Bloomberg and Citi



Source: Reuters EcoWin

NZD too remains significantly over valued against long term metrics. This position is supported somewhat by ongoing strength in commodity prices but economic weakness and the associated lack of any upwards pressure on low policy rates is an offset. Indeed, Figure 72 suggests NZD has significantly de-coupled from rate spreads in recent times, possibly dangerously so. Reserve manager diversification may explain some of the NZD relative strength but, as with AUD, our forecasts assume some reduction in this overvaluation over the medium term. We expect a shift down towards 76c over 6-12 months.

USD/CAD is probably a slightly different story to the other two \$ bloc currencies. First, CAD is more linked to the US and less to Asian economies. Second, oil prices are supportive of CAD more than non-oil commodity prices are for NZD and AUD. Third, valuation is much more favourable for CAD.

So far as rates go, carry is less helpful for CAD but market expectations are for roughly flat rates for some time, a view with which Citi economists concur. Current rate spreads with the US seem consistent, broadly speaking, with a rate around 1.01 while WERM is at 0.97. With spot currently in this band, we see little pressure on the exchange rate and project only mild CAD appreciation in our forecasts.

## European Crosses

### GBP – Stable vs. USD & EUR Basket

GBP continues to be extraordinarily stable versus a 50:50 EUR and USD basket (Figure 73). We see this broadly continuing in our forecasts with any moves in GBP/USD being roughly offset by shifts in EUR/GBP.



Sterling has struggled with conflicting forces for a while: cheap valuations vs. poor economic performance and monetary policy easing/ fiscal tightening. GBP remains the cheapest G10 currency, with the latest WERM estimate putting fair value on Cable at 1.72 and EUR/GBP at 0.79.

On the other hand, ongoing fears about the weakness of the UK recovery, the need to keep going with a restrictive fiscal policy and the associated need for easy money all act as a drag on the currency. While disappointed recently, Citi economists still expect a further increase to the UK QE2 programme. Tight fiscal policy and easy money is normally currency unfriendly and policymakers probably see stable GBP at competitive levels as part of the policy package.

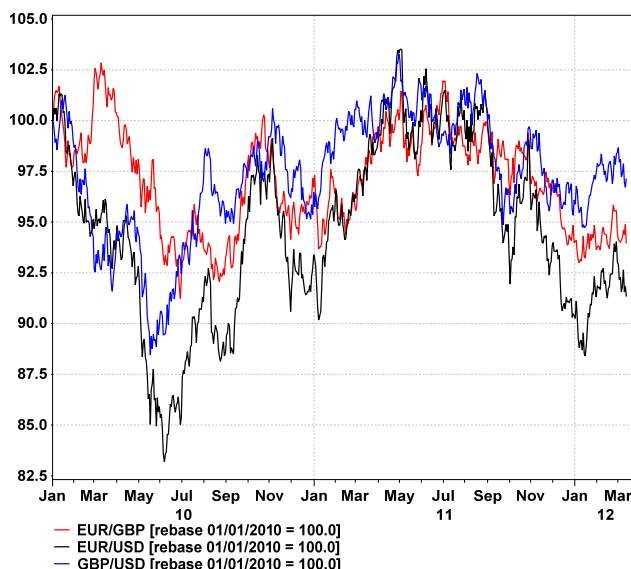
Our forecasts show EUR/GBP more or less tracking what happens in EUR/USD over the short and medium term (as per Figure 74). Thus with EUR/USD at 1.25, we think this is consistent with EUR/GBP at 0.81 and GBP/USD around 1.53. This would leave the 50:50 basket roughly stable.

Figure 73. GBP vs. Average of USD and EUR (Higher = Stronger GBP)



Source: Reuters EcoWin

Figure 74. EUR/USD Drives EUR/GBP and GBP/USD Trend



Source: Reuters EcoWin

### Scandis – Close To Long Term Fair Value, Dynamics Less Helpful

EUR/SEK has entered a period of volatile trading with a higher bias since bottoming in January at 8.75. Somewhat worryingly, the cross has so far found support at a level slightly above that seen at the February 2011 low (8.70). This period has, unusually, not coincided with a generalised correction in risk appetite; instead equities have moved on to new highs, GRAMI and VIX have fallen and so on (see Figure 75). The rally in the USD may indicate some concerns about Europe generally in FX markets, particularly with EUR/USD moving lower again, though the inverse relationship between EUR/USD and EUR/SEK is not that tight.

Instead, local fundamentals may be playing a role. Swedish GDP growth will slow markedly this year according to Citi forecasts (+0.5% from 4.5% in 2011) with weaker exports to the depressed EA countries a major drag. With inflation likely to stay well below the 2% Riksbank target, a further easing of monetary policy seems likely after December and February rate cuts. While this is not currently signalled by the conditional Riksbank interest rate path, history shows that in the 2008/09 crisis,



the conditional path mainly also signalled no cuts but rates fell 450bp. Citi expects 50bp of cuts in the 1.5% repo by mid-2012, with about half that priced in to short rate markets. This reduction in carry may undermine SEK somewhat.

Bearing all this in mind, we forecast only slight further SEK appreciation over the medium term.

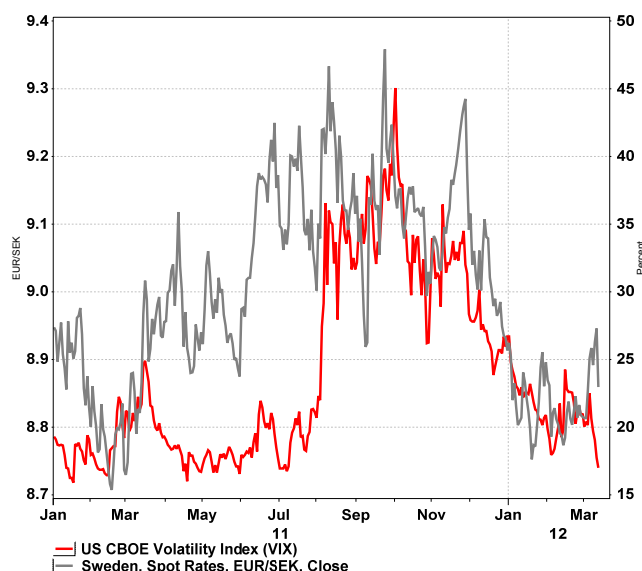
EUR/NOK fell to a low of 7.40 in early March within 3% of the all time low of around 7.21 seen in early 2003, helped no doubt by the further rally in oil prices. This strength in the currency has become a headache for the Norges Bank as NOK outperformed not only EUR but also SEK.

On several occasions, Norges Bank commentary has tried to talk down the currency but formal FX intervention was ruled out and has been since the monetary policy tool changed from an FX target to an inflation target back in early 2001.

Nonetheless, despite relatively strong local fundamentals including strong credit and house price growth and high household debt, the Norges Bank announced a 25bp rate cut on 14 March. Since this followed a 50bp cut in December, it would seem that the international outlook – and associated effects on the currency – are important drivers.

The latest rate cut was unexpected and generated a sharp rally in EUR/NOK. With the ECB unlikely to move rates soon, a chunk of this move will likely persist over the short term and we have raised our 0-3m forecast to 7.55. Over the medium term, ECB rate cuts will likely weaken the EUR again, pulling EUR/NOK back towards fair value just below 7.50 on our WERM estimate.

Figure 75. EUR/SEK vs. VIX



Source: Reuters EcoWin

Figure 76. EUR/CHF Approaching Peg With Little Realised Volatility



Source: Bloomberg

## CHF – 1.20 Peg Holds

Since mid-December last year, EUR/CHF has been slowly edging towards its 1.20 peg, forming a local low at 1.2032 at the beginning of February. While drifting lower in line with its 200d moving average, it has exhibited hardly any realised volatility

(Figure 76) though there has been some pick up in the moribund market over the past few days. We are not really sure why but maybe some market participants put a small probability on the peg being raised at some point.

Meanwhile, the Swiss Franc remains highly overvalued according to many metrics (e.g. our EUR/CHF WERM estimate puts long term fair value at 1.37). Furthermore, with deflation risks very evident, it is unlikely that the SNB will baulk anytime soon at the explosive base money growth that results from making the money supply endogenous to the FX market. As a result, we expect a continued robust defence of the existing 1.20 floor.

Given this, our forecasts show EUR/CHF moving glacially higher over the medium term.

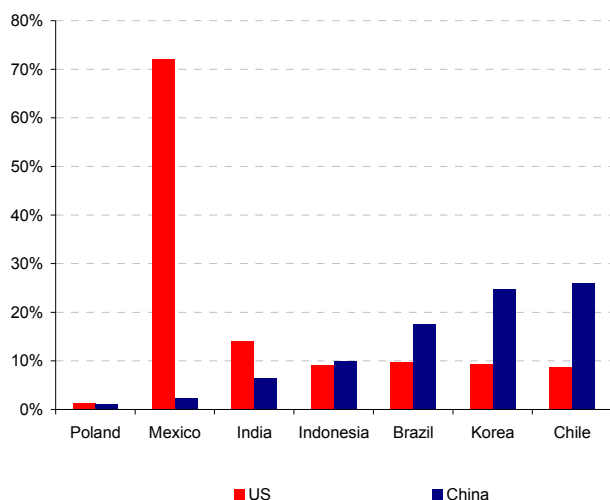
### EM Exchange Rates

Since our last FX forecast round, the dollar has strengthened against each of our equally weighted FX baskets (Figure 1). A basket of Asian currencies has fallen the least, and CEEMEA the most, with Latam running a middling course. Our EM forecasts this month show a shift in this pecking order: Latam does best against the US dollar; CEEMEA fares worst and Asia moves somewhere in between.

The Chinese economy is now weakening perceptibly, and the CNY is forecast to now flat-line for the next twelve months. The knock on to EM FX from a weaker China and steady CNY is expected to be powerful – not just in Asia, but also in Latam – and is an important guiding factor for the forecasts presented here.

EM policymakers' reaction to Chinese developments and (partly related) concerns surrounding stronger local exchange rates have already been an important factor propping up the dollar, in our view. EMs are easing monetary policy and in many cases, also intervening to curb previous local currency strength. This is poised to intensify in coming months.

Figure 77. Exports By Destination – China Exposure Differs Radically



Sources: Citi, IMF DOTS and Bloomberg

Figure 78. CNY Vs USD (Black) and Equally Weighted Asian FX (Red)



Sources: Citi and Bloomberg

## EM Asia – It's All About the CNY

The near-term weakness that we anticipated in Asia FX has broadly transpired. The largest influence on our Asian forecasts from here on, however, is China. Continued softening in Chinese data – and related “freezing” of the peg – have a powerful influence on Asian FX. This is particularly the case for the big exporters with tight trading links to China (Figure 77).

Chinese data, both real and monetary, have deteriorated perceptibly so far in 2012, and inflation is sharply lower. The two growth engines of recent years – property investment and exports – are stuttering. Inflation meanwhile has halved from last summer to 3.2%. This combination – of reduced growth *and* inflation – means that the authorities may prefer a stable, as opposed to “trend appreciating”, exchange rate. With deposit rates low and required reserves a blunt policy tool, CNY could be in many aspects the sharper way to stimulate China's export-led economy.

The knock-on effect of a flat-lining CNY to the big Asian exporters is clear – particularly as the underperformance of CNY against a equally weighted basket of Asian EM FX is noticeable recently (Figure 78). As such, our CNY forecasts have important bearings on much of Asia, with domestic demand led INR and IDR the chief exceptions.

KRW/CNY is up by over 3.5% this year, but we doubt that this lasts. On the one hand, Korea's resilient “twin surpluses” – both the fiscal balance and current account are expected to stay in surplus through to 2013 at least – and a cheap real effective exchange rate provide some structural support to KRW. But this matters less in a weaker global/China setting. KRW is both intensely China-sensitive and directly exposed to the European banking debacle. A quarter of all Korean exports head to China, and recent data have been soft across the board. Meanwhile, BIS data point to heavy exposure to European banks, of around 17% of Korean GDP. Our forecasts have USD/KRW at around 1135 over the next three months.

Our forecasts for TWD, meanwhile, show sharp underperformance vis-à-vis the broader region in the next three months, relative to forwards. As has been the case for a couple of months, the near term outlook is driven first, by quickly weakening domestic data and second, by our view that the CBC has perhaps the strongest incentive and willingness to cap TWD strength. Monetary data has slowed, the housing market is cooling and industrial production growth, for example, has fallen in year-on-year terms each month since November.

A PHP that is trading at the stronger end of its post-crisis trading range, meanwhile, is at odds with very weak activity. Taken at face value, data from the Philippines may appear to have bounced back. But this needs to be viewed in context – e.g., strong performance of exports in January comes after an eight month run of outright falls in year-on-year terms, and the 3m/3m growth rate, which is a better guide for the underlying trend, has only just turned positive for the first time in fourteen months. With exports still clearly at risk from developments in China, we expect USD/PHP to stay around current spot for the next three months.

MYR, meanwhile, looks stretched to us: so far this year MYR has been one of the top regional performers against the USD (and CNY), which especially matters for MYR given that is the most export dependant EM around, with a 96% export to GDP ratio. The nominal effective exchange rate is now at the very top end of its range of the last decade. Our forecasts show USD/MYR at 3.06 over 0-3 months.

THB is expected to stay flat in the near term, and to hold above 30 for the forecast horizon. The recovery of capex and manufacturing following massive floods last

year offsets some of the downside from poor export prospects. The pegged HKD, meanwhile, has been a bit more jittery than usual, on conflicting messages from contenders for the Hong Kong leadership. We don't expect actual widening of the band, however – i.e., HKD stays flat at 7.75 for the forecast horizon.

The two crosses that are more immune to moves in CNY are IDR and INR. To be sure, both central banks have recently intervened in the opposite direction to the rest of Asia, to strengthen their exchange rates vs. the US dollar. In part, this is because, at different points in the last couple of months, sell-offs in their currencies have been more intense than elsewhere. More fundamentally, as domestic demand led economies, with low export to GDP ratios of around a fifth to a quarter, stronger exchange rates matter less than elsewhere in the region.

We have IDR as the strongest performer in Asia for the next three months, reflecting some recovery following the apparent “decoupling” of IDR from broader regional FX moves since the end of January. Indeed, while our equally weighted Asian basket has basically moved sideways, IDR has sold off and is close to recent lows against the US dollar. We see USD/IDR at 9100 in 0-3 months, and at 9300 6-12 months out. Simply put, the sell off looks overdone, particularly in the context of firmer oil that should help IDR.

It is not difficult to reason INR weaker, with twin deficits on the current and fiscal accounts and soft domestic data. Notwithstanding the surprise CRR cut earlier in March, and an improvement in industrial production in January, the overall picture is one of weakness: Q4 GDP growth, for instance, of 6.1%, was the weakest since March 2009. Until monetary easing begins in earnest, high nominal interest rates of 8.5% and rising real rates (as inflation falls) are expected to continue to choke real activity. Our forecasts have INR oscillating around 50 for the coming twelve months.

### **CEEMEA – HUF Loses Its Puff**

Having lagged the appreciation of its regional EM counterparts earlier this year (Figure 65), CEEMEA FX has held up better in light of recent USD strength (Figure 79). In the short run, with the exception of HUF, most of our forecasts are close to spot. More medium term, the region remains vulnerable to the EMU crisis, as Western European banks own the bulk of the region's banking system, and many smaller countries rely on German/European final demand for growth.

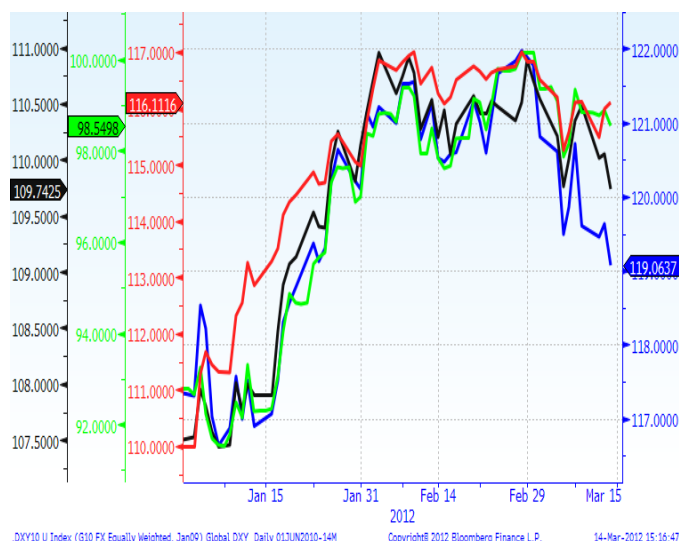
The prospects for a quick IMF deal in Hungary are fading fast, and we have revised our forecasts to reflect this development. We now see EUR/HUF at 300 in 0-3 months' time: the government's “credibility deficit” and continued contradictory statements keep the risks surrounding the implementation of the program high, leaving risk premia elevated. Equally, we note that the government may run out of cash reserves by the end of this year, which should force the authorities' hand in the second half of the year. As such, we see EUR/HUF going to 285 6-12 months out assuming an IMF deal until then.

Our view on the zloty is mostly unchanged from last month. An improving fiscal outlook and relatively resilient growth setting should draw further capital inflows in the short term, supporting PLN near current spot. However, high foreign involvement in Polish asset markets makes the currency more vulnerable to shifting global tides. Together with our forecast for some slowdown in GDP growth in the second half and into 2013, and the risk of gradual rate cuts by the end of this year, we see a slight weakening of the zloty in 6-12 months, to around 4.20.

Unlike Poland, the Czech Republic is highly export-dependent, and the economy is now in technical recession, defined as two successive quarters of falling GDP. With

low interest rates (0.75%) that could go lower still by mid-year, CZK also doesn't have the carry allure of others in the region. Acting in the opposite direction, however, are good fiscal ratios and a broadly balanced current account, which should limit the downside. Our forecasts have the koruna near current spot vs. the euro in the short and medium term.

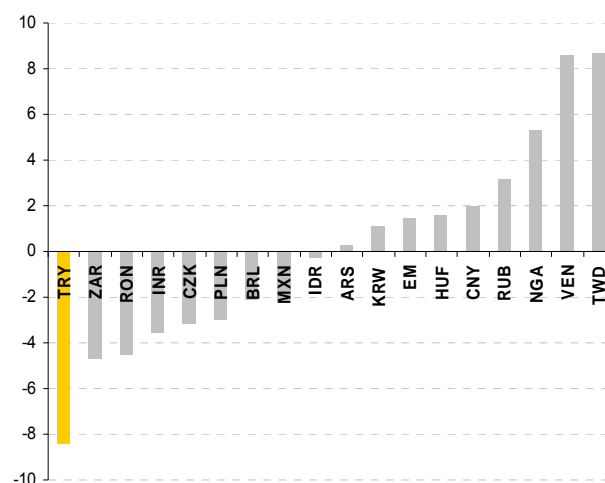
Figure 79. CEEMEA FX has Held Up Better Recently



USD vs. Asia (Black), G10 (Blue), LATAM (Red), CEEMEA (Green)

Source: Citi and Bloomberg

Figure 80. Current Account Balances, % of GDP 2012 F



Source: Citi Investment Research and Analysis

Risks around the TRY, meanwhile, have increased from two sources: the central bank has unexpectedly (and probably prematurely) turned more dovish and oil prices at current levels threaten to worsen an already poor balance of payments position (Figure 80). To be sure, Turkey is probably the most sensitive EM economy to higher oil prices given Turkey's elevated current account deficit, which was projected at 8.4% without the latest oil spike, and indeed because the deficit is funded largely by short term capital inflows. Our forecasts have USD/TRY at 1.80 and 1.90 0-3 and 6-12 months ahead respectively.

We have turned slightly more bearish on the rand in the short run, as we believe the rally we envisaged in our last *Forecasts* has now been completed. South Africa's commodity terms of trade have remained under pressure and we question whether portfolio inflows will remain strong enough to prevent a weakening of the ZAR, especially as the rand has been an outperformer in its commodity currency cohort since the start of the year. Our forecasts have USD/ZAR at 7.70 and 8.10 0-3 and 6-12 months out respectively, around forward rates.

In Russia, supportive oil prices and tight RUB liquidity remain supportive, but we do not anticipate further appreciation in the very near term. Capital flight remains a key risk, and perhaps even more so after recent Presidential elections. On balance, we expect RUB to weaken to 36.5-37 over the medium to long term.

Finally, having continued to depreciate since our last *Forecast*, we now expect ILS to remain close to current spot in 0-3 months, and perhaps edging a bit below it, to say 3.70. The market seems overly bearish in the short run and as such, the appeal of the shekel as a political risk hedge has diminished. More medium term, the risk surrounding geopolitical tensions are still skewed to the upside. Along with a

slipping current account position and dovish central bank, we see renewed weakness in 6-12 months' time.

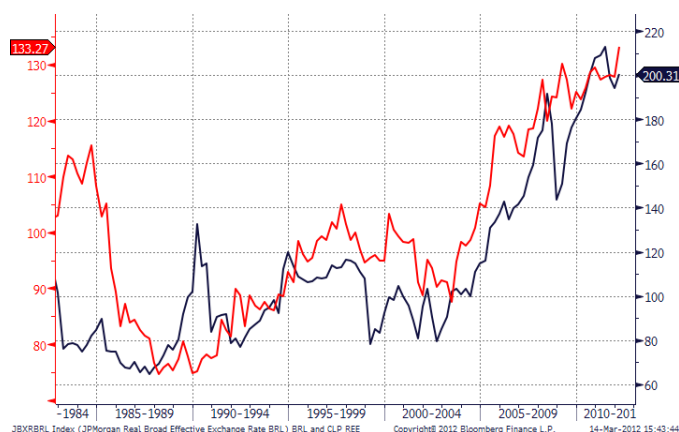
### Latam – It Is Still Carry vs. Intervention

Carry-rich Latam FX has outperformed other EM FX since the end of last year (Figure 79). We doubt that this lasts. At least in the near term, increased FX intervention and/or capital controls are likely to reverse some of these gains; the region also remains closely linked with China. Mexico stays the outlier as a “true” free-floater, not just in Latam but also in the broader EM context – and has the US, not China, as its dominant trade partner.

Brazil and Chile are both intimately linked to a softening Chinese economy, where FX appreciation is also being ground to a halt by the PBoC. As in previous such episodes of the CNY flat-lining, Brazil has been most vociferous and indeed proactive stemming BRL appreciation. Colombia too has an intervention program in place. Chile has yet to join in, but given policy focus on the REER, which has spiked up perceptibly, and hefty exposure to China, the risks seem skewed towards intervention.

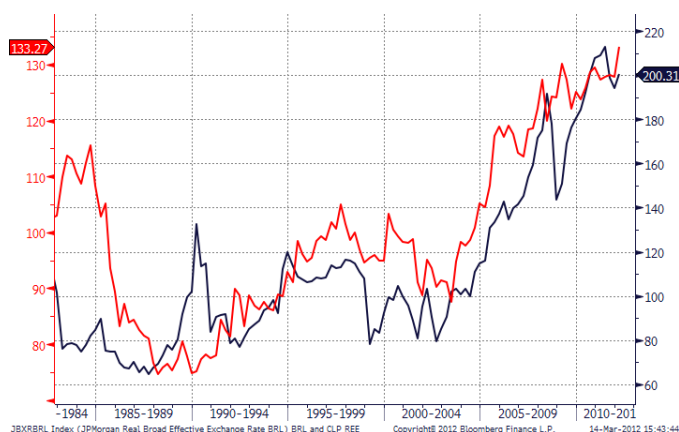
Brazilian policy makers have so far been successful: BRL has been the worst performing EM currency by some distance since the end of February, down by nearly 4% vs. the US dollar. The combination of forceful rate cuts, central bank intervention, IOF tax extensions and tighter capital controls have clearly taken effect, and we expect continued downward pressure on BRL, in the near term. USD/BRL at 1.70 remains the critical “line in the sand” for BRL intervention for the forecast horizon, and the currency could move towards this level in the second half of 2012 as fundamentals – including improving external balances, firm expected growth and attractive FX carry (even with rate cuts) – reassert themselves.

Figure 81. Real Effective Exchange Rates Compared



Red – CLP REER, Blue – BRL REER  
Sources: Citi and Bloomberg

Figure 82. EM Industrial Production Compared



Sources: Citi, Bloomberg and Reuters Ecowin

Unlike BRL, where the REER has been steadily coming down since the middle of last year, CLP REER has spiked up to a multi-decade high (Figure 81). The central bank has tended to be especially sensitive to this in the past – so although USD/CLP is not especially peaky, moves in the REER are a clear risk. Better global risk appetite, firm copper prices and the central bank's more cautious stance when it comes to lowering interest rates should provide CLP with some near term support, particularly vs BRL. But the combination of some intervention risk, China exposure (26% of all exports) and forecast softer copper prices in the second half should act

in the opposite direction. Our forecasts show USD/CLP at 480 in the next three months.

We stay broadly neutral on COP in the very near term, expecting COP at around forward rates in 0-3 months. Although we expect the ongoing intervention program to impact the COP in due course, we are also cognisant that a similar exercise in Q4 09 took some time to have a meaningful impact on both COP and forward points. Furthermore, should the USD/COP dip below 1740, we would expect additional measures. Our forecasts have USD/COP at 1730 and 1800, 0-3 and 6-12 months' ahead respectively.

MXN should stay the regional and EM outperformer in the very near term, gaining from a positive confluence of factors. These include: a better US outlook, to which MXN is very high beta; improving Mexican data; limited China exposure, with less than 10% of exports China-bound; and positive relationship with oil prices. The currency is also cheap in REER terms. Our forecasts have USD/MXN at between 12.1 and 12.3 for the forecast horizon.



## Contributors

**\*\* Citi Foreign Exchange: Forecasts** is a joint venture between Citi's foreign exchange, global macro and technical strategy groups and our developed and emerging markets economists. The analysts listed below have contributed to these forecasts in one form or another.

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Figure 84. Citi Quarterly Interpolated Forecasts

### Quarterly Interpolated Forecasts

	Currency	Spot	Mar-12	Jun-12	Sep-12	Dec-12	Mar-13	Jun-13	Sep-13	Dec-13	Mar-14
<b>G10-US Dollar</b>											
Euro	EURUSD	1.30	1.30	1.30	1.28	1.26	1.25	1.26	1.28	1.29	1.30
Japanese yen	USDJPY	84	84	83	82	81	80	81	83	84	85
British Pound	GBPUSD	1.57	1.57	1.56	1.55	1.54	1.54	1.57	1.60	1.62	1.65
Swiss Franc	USDCHF	0.93	0.93	0.93	0.95	0.96	0.98	0.97	0.97	0.96	0.96
Australian Dollar	AUDUSD	1.04	1.05	1.05	1.03	1.01	1.00	0.97	0.95	0.92	0.90
New Zealand Dollar	NZDUSD	0.81	0.81	0.82	0.80	0.78	0.75	0.72	0.69	0.66	0.63
Canadian Dollar	USDCAD	0.99	0.99	0.98	0.98	0.98	0.97	0.97	0.97	0.97	0.97
Dollar Index*	DXY	80.51	80.54	80.54	81.15	81.76	82.16	81.63	81.10	80.57	80.12
<b>G10 Crosses</b>											
Japanese yen	EURJPY	109	109	107	105	102	100	103	106	108	111
Swiss Franc	EURCHF	1.21	1.21	1.21	1.21	1.22	1.22	1.23	1.24	1.24	1.25
British Pound	EURGBP	0.83	0.83	0.83	0.82	0.82	0.81	0.81	0.80	0.79	0.79
Swedish Krona	EURSEK	8.92	8.91	8.84	8.81	8.78	8.75	8.72	8.70	8.67	8.65
Norwegian Krone	EURNOK	7.59	7.58	7.55	7.53	7.51	7.50	7.50	7.50	7.50	7.50
Norwegian Krone	NOKSEK	1.18	1.18	1.17	1.17	1.17	1.17	1.16	1.16	1.16	1.15
Australian Dollar	AUDNZD	1.29	1.29	1.28	1.29	1.31	1.32	1.35	1.38	1.41	1.43
Australian Dollar	AUDJPY	87.4	87.3	86.7	84.3	81.9	79.8	79.0	78.1	77.2	76.5
<b>EM Asia</b>											
Chinese Renminbi	USDCNY	6.33	6.33	6.32	6.29	6.26	6.23	6.20	6.17	6.14	6.11
Hong Kong Dollar	USDHKD	7.76	7.76	7.75	7.75	7.76	7.76	7.76	7.75	7.75	7.75
Indonesian Rupiah	USDIDR	9173	9159	9112	9179	9247	9295	9270	9245	9220	9200
Indian Rupee	USDINR	49.9	50.0	50.5	50.3	50.1	49.9	49.6	49.2	48.8	48.5
Korean Won	USDKRW	1126	1128	1134	1125	1117	1104	1072	1039	1006	980
Malaysian Ringgit	USDMYR	3.05	3.05	3.06	3.03	3.00	2.98	2.95	2.93	2.91	2.89
Philippine Peso	USDPHP	42.9	42.9	42.9	42.6	42.3	42.0	41.9	41.7	41.6	41.5
Singapore Dollar	USDSGD	1.27	1.27	1.26	1.25	1.24	1.23	1.22	1.21	1.20	1.19
Thai Baht	USDTHB	30.8	30.8	30.8	30.6	30.4	30.3	30.2	30.1	30.0	30.0
Taiwan Dollar	USDTWD	29.5	29.6	29.6	29.3	29.0	28.8	28.6	28.5	28.3	28.2
<b>EM Europe</b>											
Czech Koruna	EURCZK	24.63	24.59	24.44	24.68	24.91	25.05	24.77	24.50	24.22	23.97
Hungarian Forint	EURHUF	293	294	299	294	289	285	286	288	289	290
Polish Zloty	EURPLN	4.15	4.15	4.15	4.17	4.19	4.19	4.11	4.04	3.96	3.90
Israeli Shekel	USDILS	3.79	3.79	3.81	3.86	3.91	3.95	3.94	3.92	3.91	3.89
Russian Ruble	USDRUB	29.6	29.6	30.1	31.3	32.4	33.2	32.9	32.7	32.4	32.1
Russian Ruble Basket	RUB	33.6	33.7	34.2	35.2	36.2	37.0	36.9	36.7	36.6	36.5
Turkish Lira	USDTRY	1.81	1.81	1.81	1.84	1.87	1.90	1.87	1.85	1.82	1.80
South African Rand	USDZAR	7.69	7.69	7.72	7.86	7.99	8.13	8.31	8.48	8.66	8.82
<b>EM Latam</b>											
Brazilian Real	USDBRL	1.82	1.82	1.82	1.79	1.77	1.75	1.72	1.70	1.67	1.65
Chilean Peso	USDCLP	487	486	481	488	495	500	497	495	492	491
Mexican Peso	USDMXN	12.7	12.6	12.1	12.2	12.2	12.3	12.3	12.2	12.2	12.2
Colombian Peso	USDCOP	1764	1758	1734	1758	1781	1802	1815	1827	1840	1852

\* The DXY forecasts are implied from the forecasts of the constituent crosses.

Source: Citi Investment Research and Analysis

Figure 85. Citi Annual Forecasts

### Annual Forecasts

	Currency	Spot	2012*	2013*	2014*	2015*	2016*
<b>G10-US Dollar</b>							
Euro	EURUSD	1.30	1.29	1.27	1.31	1.33	1.35
Japanese yen	USDJPY	84	82	82	85	85	85
British Pound	GBPUSD	1.57	1.56	1.58	1.66	1.68	1.71
Swiss Franc	USDCHF	0.93	0.94	0.97	0.96	0.97	0.98
Australian Dollar	AUDUSD	1.04	1.03	0.96	0.90	0.89	0.87
New Zealand Dollar	NZDUSD	0.81	0.80	0.71	0.63	0.63	0.62
Canadian Dollar	USDCAD	0.99	0.98	0.97	0.97	0.97	0.97
Dollar Index**	DXY	80.51	80.99	81.36	79.75	78.78	77.84
<b>G10 Crosses</b>							
Japanese yen	EURJPY	109	106	104	111	113	115
Swiss Franc	EURCHF	1.21	1.21	1.23	1.26	1.29	1.32
British Pound	EURGBP	0.83	0.83	0.80	0.79	0.79	0.79
Swedish Krona	EURSEK	8.92	8.84	8.71	8.64	8.63	8.62
Norwegian Krone	EURNOK	7.59	7.54	7.50	7.50	7.49	7.48
Norwegian Krone	NOKSEK	1.18	1.17	1.16	1.15	1.15	1.15
Australian Dollar	AUDNZD	1.29	1.29	1.36	1.42	1.41	1.40
Australian Dollar	AUDJPY	87.4	85.1	78.5	76.1	75.2	74.3
<b>EM Asia</b>							
Chinese Renminbi	USDCNY	6.33	6.30	6.19	6.09	6.06	6.02
Hong Kong Dollar	USDHKD	7.76	7.76	7.76	7.75	7.75	7.75
Indonesian Rupiah	USDIDR	9173	9174	9258	9200	9200	9200
Indian Rupee	USDINR	49.9	50.2	49.4	48.4	48.3	48.1
Korean Won	USDKRW	1126	1126	1055	983	989	996
Malaysian Ringgit	USDMYR	3.05	3.03	2.94	2.91	2.94	2.98
Philippine Peso	USDPHP	42.9	42.7	41.8	41.6	41.7	41.9
Singapore Dollar	USDSGD	1.27	1.25	1.22	1.19	1.19	1.20
Thai Baht	USDTHB	30.8	30.6	30.1	30.0	30.0	30.0
Taiwan Dollar	USDTWD	29.5	29.4	28.5	28.5	29.1	29.7
<b>EM Europe</b>							
Czech Koruna	EURCZK	24.63	24.65	24.64	23.73	23.10	22.47
Hungarian Forint	EURHUF	293	294	287	289	285	282
Polish Zloty	EURPLN	4.15	4.16	4.07	3.90	3.90	3.90
Israeli Shekel	USDILS	3.79	3.84	3.93	3.83	3.66	3.50
Russian Ruble	USDRUB	29.6	30.9	32.8	31.9	31.2	30.5
Russian Ruble	RUB	33.6	34.8	36.8	36.6	36.7	36.9
Turkish Lira	USDTRY	1.81	1.83	1.86	1.77	1.71	1.65
South African Rand	USDZAR	7.69	7.82	8.40	8.96	9.34	9.73
<b>EM Latam</b>							
Brazilian Real	USDBRL	1.82	1.80	1.71	1.67	1.72	1.77
Chilean Peso	USDCLP	487	487	496	498	518	538
Mexican Peso	USDMXN	12.7	12.3	12.3	12.3	12.6	12.8
Colombian Peso	USDCOP	1764	1758	1821	1864	1897	1931

\*Averages of end-quarter data shown in quarterly interpolation table.

\*\* The DXY forecasts are implied from the forecasts of the constituent crosses.

Source: Citi Investment Research and Analysis

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## **Notes**



## **Notes**

**Notes** |

## Appendix A-1

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