Prefatory Note

The attached document represents the most complete and accurate version available based on original files from the FOMC Secretariat at the Board of Governors of the Federal Reserve System.

Please note that some material may have been redacted from this document if that material was received on a confidential basis. Redacted material is indicated by occasional gaps in the text or by gray boxes around non-text content. All redacted passages are exempt from disclosure under applicable provisions of the Freedom of Information Act.

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Report to the FOMC on Economic Conditions and Monetary Policy

Book A

Economic and Financial Conditions: Current Situation and Outlook

January 18, 2012

Prepared for the Federal Open Market Committee
by the staff of the Board of Governors of the Federal Reserve System

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Domestic Economic Developments and Outlook

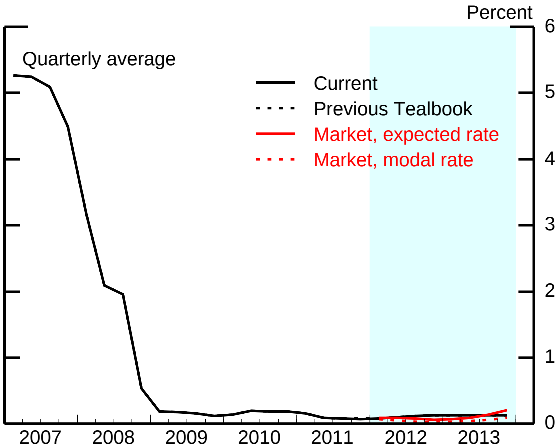
A number of the indicators that we track in gauging the current and near-future pace of economic activity have improved since the December Tealbook. Payroll employment increased a little more in December than in the average of the preceding several months and the unemployment rate continued to decline, manufacturing production rebounded from a dip in November, and even residential construction has shown a bit more vigor recently. In addition, measures of consumer and business sentiment have moved up. However, these developments have not materially exceeded our expectations; rather, for the most part, they have only been sufficient to validate our forecast in previous Tealbooks of a gradually improving pace of real activity. Moreover, despite the bounceback in consumer sentiment from recent lows, consumer spending appears to be on a somewhat shallower trajectory than we had previously expected, and federal outlays for defense have been significantly lower than anticipated. All told, we now estimate that real GDP increased at an annual rate of 3 percent in the fourth quarter of 2011 and will rise 1½ percent in the current quarter, ¼ percentage point and ½ percentage point less, respectively, than in the December Tealbook.

We also made a small downward adjustment to our medium-term projection. The foreign exchange value of the dollar has moved up a little, on balance, since the December Tealbook and is anticipated to subtract a bit from the demand for U.S. products. Real GDP growth is further tempered by a somewhat higher path for crude oil prices, while the changes in our other conditioning factors are neutral, on balance, for the pace of activity: The effects of higher stock prices and lower interest rates are mostly offset in our projection by a downward revision to house prices. With respect to our fiscal assumptions, we have marked down the projected trajectory of defense spending over the medium term. As a result, real GDP is projected to increase 2 percent in 2012, about ¼ percentage point less than in the December Tealbook, and 2½ percent in 2013, about unchanged from the previous projection. This average pace of growth only slightly exceeds our estimate of potential. Accordingly, little progress is made in closing the estimated gap in either the utilization of the workforce or the productive capacity of the overall economy over the next two years.

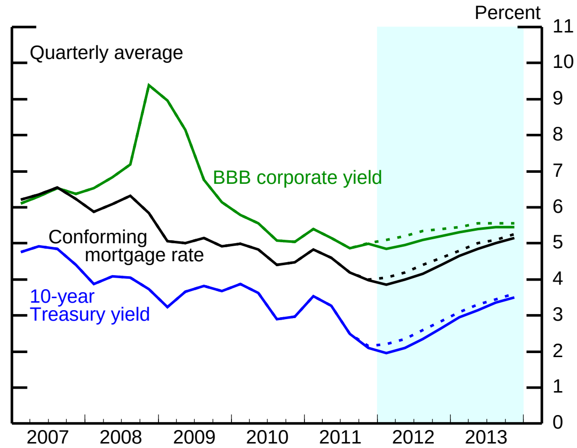
The outlook for inflation is about the same as in the December Tealbook. Core PCE inflation appears to be slowing about as we thought it would based on our

Key Background Factors underlying the Baseline Staff Projection

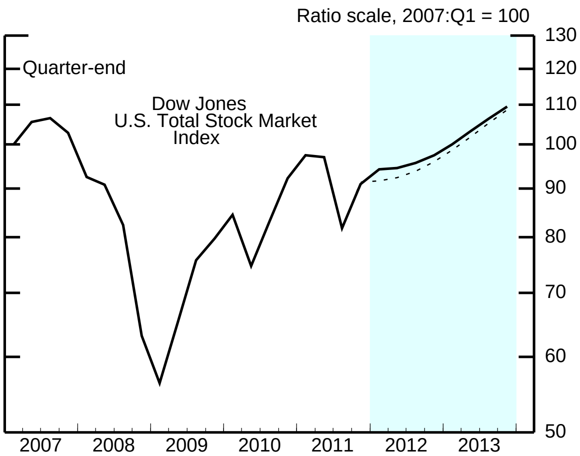
Federal Funds Rate



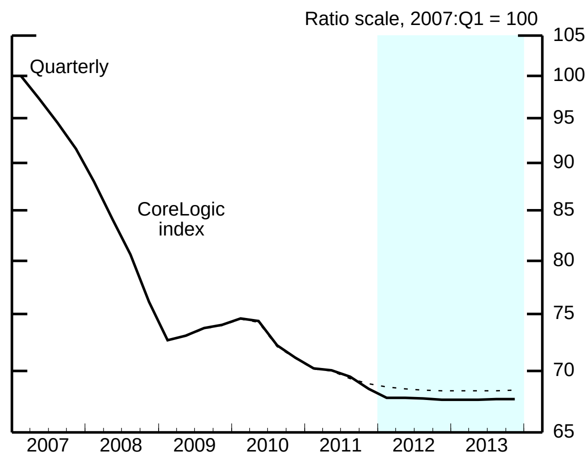
Long-Term Interest Rates



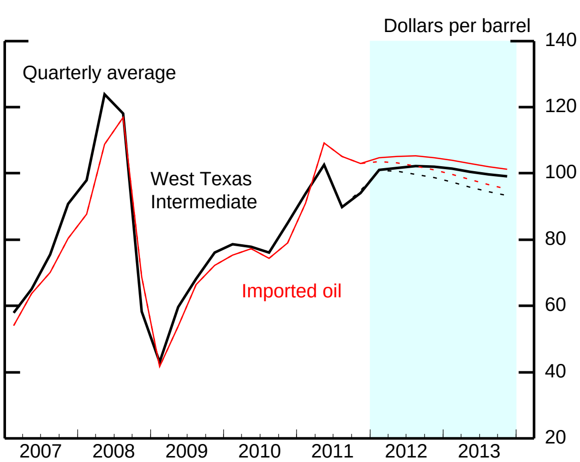
Equity Prices



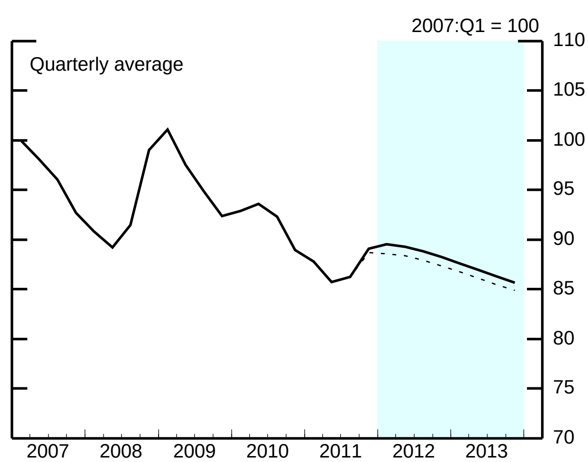
House Prices



Crude Oil Prices



Broad Real Dollar



assessment that last year's upswing mostly represented the pass-through of a surge in import and commodity prices. With labor and product market slack projected to remain considerable and inflation expectations anticipated to hold steady, we continue to project that core PCE inflation will be 1½ percent in both 2012 and 2013. Given our forecast for relatively slight changes in food and energy prices over the next two years, headline inflation is expected to run just a touch below core over the medium term.

Key Background Factors

Monetary Policy

In line with the prescription of the outcome-based policy rule, we continue to assume that the FOMC will hold the target federal funds rate in the current range of 0 to ¼ percent until the fourth quarter of 2014, the same span of time as in the December Tealbook. We also assume that the Committee will maintain the Federal Reserve's current portfolio-related policies.[1]

Interest Rates

The yield on 10-year Treasury securities has decreased about 25 basis points, on net, since the December Tealbook, reflecting in part a downward revision to the market's expected policy path, and we have lowered our projection for the Treasury yield this round. We still expect that sluggish progress toward resolving the European debt crisis will continue to result in safe-haven demands for Treasury securities in coming quarters. Even so, as in previous projections, we expect the 10-year Treasury yield to rise substantially from the middle of this year through 2013, ending that year at 3½ percent—about 1½ percentage points above its current level. This projected increase reflects the movement of the valuation window through the period of near-zero short-term interest rates, a gradual waning of the effects of nonconventional monetary policy, and an

[1] The path of the federal funds rate in the extended baseline projection, and in particular the date when conventional monetary policy begins to firm, depends importantly on our use of the estimated outcome-based rule to set policy. If we had instead assumed that the federal funds rate would follow the prescriptions of the Taylor (1999) rule, liftoff would not begin until late 2015; an inertial version of this rule would delay the onset of conventional tightening until mid-2016. In contrast, conventional monetary policy would begin tightening early this year under the Taylor (1993) rule and in mid-2013 under the first-difference rule. These various prescriptions make no adjustment for the stimulus provided by the Federal Reserve's nonconventional policy actions; if they did, the prescribed dates for tightening would be pulled forward. However, in most cases, the advance in timing would be modest because the staff projects the downward pressure on term premiums from the SOMA portfolio to diminish appreciably over the next few years.

unwinding of safe-haven demands as apprehensions related to the European debt crisis eventually abate and the U.S. economic recovery gains a firmer footing.

Spreads on BBB-rated corporate bonds and conforming fixed-rate mortgages have widened a touch, on net, since the December Tealbook. These spreads are currently well above their typical levels, and, as in previous forecasts, we expect them to narrow gradually over the medium term. However, given the outlook for limited progress in resolving the European situation in the near term, both spreads are expected to be roughly flat through the first half of this year before narrowing further out. Coupled with our forecast for Treasury rates, these assumptions imply a moderate increase in yields on these private instruments over the next two years.

Equity Prices and Home Prices

Broad U.S. stock price indexes have increased about 3 percent, on net, since the December Tealbook. We project that stock prices will be about flat over the first half of this year and then move up rapidly in the second half of 2012 and in 2013, as investors gain confidence that European authorities will make progress toward resolving their fiscal and financial crisis. On the current projection, the equity premium will descend somewhat from its current extraordinarily high level.

According to the latest data, home prices in November declined more than we expected. We reacted by reducing the level of home prices by about 1 percent throughout the projection period. Our forecast calls for the CoreLogic Home Price Index to decrease a bit more than 1 percent in 2012 and to be about unchanged in 2013.

Fiscal Policy

We have scaled back our projection for defense spending over the medium term. The spend-out of defense appropriations over the past year has persistently fallen short of our expectations. Even more important, recent information indicates that appropriations for overseas military operations will be smaller than we had previously expected. Our other fiscal policy assumptions are unchanged. In particular, we assume that the 2 percentage point payroll tax reduction for employees and the Emergency Unemployment Compensation (EUC) program—both of which were recently extended through the end of February—will soon be extended through the end of this year. We also continue to assume that discretionary spending will be restrained by the caps set in the Budget Control Act. In addition, although we assume that the Congress will not allow the spending sequester triggered by the failure of the supercommittee last autumn to take full effect in 2013, we expect that other, more gradual budget-saving measures will be enacted to achieve the same $1.2 trillion in deficit reduction over the fiscal 2013–21 period.

Given our revised assumptions, we now expect federal fiscal policy to impose restraint of 0.4 percentage point on the growth of real GDP in 2012 (excluding multiplier effects), 0.1 percentage point more than in the previous Tealbook. In 2013, federal fiscal policy is still anticipated to impose a drag of about 1 percentage point.[2]

We project the budget deficit to narrow from $1.3 trillion (8½ percent of GDP) in fiscal year 2011 to $1.1 trillion (7 percent of GDP) and $850 billion (5¼ percent of GDP) in fiscal 2012 and 2013, respectively. As in the December Tealbook, the narrowing of the deficit primarily reflects the assumed tightening of fiscal policy.

Foreign Activity and the Dollar

Incoming data indicate that foreign economic activity decelerated substantially in the fourth quarter, and by a little more than we had expected. In particular, we now estimate that aggregate real GDP growth in the foreign economies stepped down from an annual rate of 3½ percent in the third quarter to 2 percent last quarter, the latter figure being about ¼ percentage point lower than we projected in the December Tealbook. Our overall foreign outlook is little changed from the December Tealbook; real GDP is projected to rise 2½ percent this year and 3 percent in 2013. We continue to believe that with a quick resolution to the euro-area crisis unlikely to materialize, financial tensions will persist for some time and lead to an appreciable contraction of GDP in the euro area this year, restraining the pace of global economic activity.

Since the time of the December Tealbook, the dollar has appreciated against the euro and has changed little, on net, against most other currencies, leaving the broad real dollar about 1 percent higher than we had assumed in December. From this higher starting point we project the broad real dollar to depreciate 1¾ percent in 2012 and 3 percent in 2013, with these declines concentrated against the emerging market

[2] If the payroll tax reduction and EUC benefits are not extended beyond February, then the restraint from federal fiscal policy on real GDP growth this year would be 0.5 percentage point greater. With the earlier expiration of these policies, the drag from fiscal policy on real GDP growth in 2013 would be 0.35 percentage point less.

Summary of the Near-Term Outlook

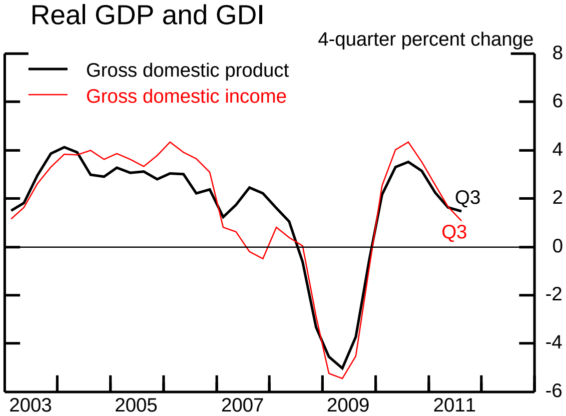
(Percent change at annual rate except as noted)

Measure	2011:Q4 Previous Tealbook	2011:Q4 Current Tealbook	2012:Q1 Previous Tealbook	2012:Q1 Current Tealbook	2012:Q2 Previous Tealbook	2012:Q2 Current Tealbook
Real GDP	**3.2**	**2.9**	**2.1**	**1.6**	**1.9**	**1.8**
Private domestic final purchases	2.6	2.4	1.9	1.9	2.3	2.4
Personal consumption expenditures	2.4	2.2	2.3	2.0	2.2	2.4
Residential investment	3.1	9.7	3.6	8.5	6.3	4.0
Business Fixed Investment	3.7	2.6	-1.2	-.1	1.8	2.1
Government Purchases	-1.9	-4.5	1.1	.0	-.5	-.8
Contributions to change in real GDP						
Inventory investment[1]	1.2	1.6	.1	-.1	-.1	-.1
Net exports[1]	.2	.2	.1	.1	.2	.1
Unemployment Rate[2]	**8.8**	**8.7**	**8.8**	**8.7**	**8.8**	**8.7**
PCE Chain Price Index	**.7**	**.5**	**1.4**	**1.4**	**1.5**	**1.7**
Ex. food and energy	1.1	.9	1.6	1.5	1.5	1.5

1. Percentage points.
2. Percent.

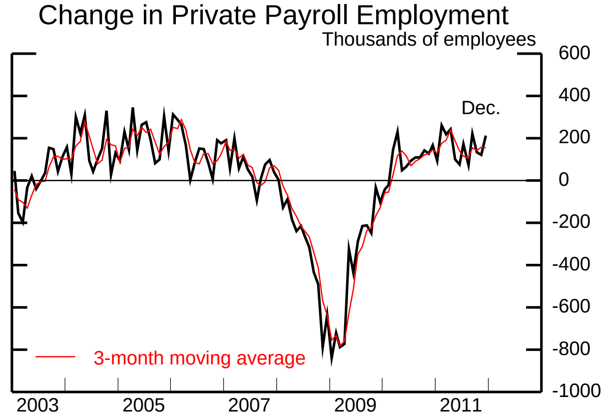
Recent Nonfinancial Developments (1)

Real GDP and GDI



Source: U.S. Dept. of Commerce, Bureau of Economic Analysis.

Change in Private Payroll Employment

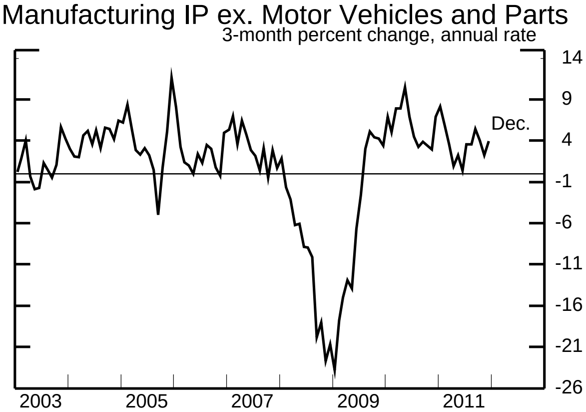


Source: U.S. Dept. of Labor, Bureau of Labor Statistics.

Unemployment Rate

Source: U.S. Dept. of Labor, Bureau of Labor Statistics.

Manufacturing IP ex. Motor Vehicles and Parts



Source: Federal Reserve Board, G.17 Statistical Release, "Industrial Production and Capacity Utilization."

currencies. On average over the forecast period, the level of the broad real dollar is about 1 percent higher than we projected in the December Tealbook.

Oil and Other Commodity Prices

Global oil markets have been buffeted by a number of conflicting developments in recent weeks. Spot prices for most grades of oil are little changed, as greater concern over global growth prospects has largely balanced increased fears of potential supply disruptions, particularly heightened tensions over Iran's nuclear development program. The spot price of West Texas Intermediate (WTI) crude oil closed at $100 per barrel on January 17, about the same as at the time of the December Tealbook. In contrast to spot prices, WTI futures prices have risen slightly since the previous Tealbook; as a result, the futures curve slopes down a bit less steeply. In all, we expect the price of imported oil to fall modestly from $104 per barrel in the current quarter to $101 per barrel by the end of 2013, about $6 per barrel higher than projected in the December Tealbook. The upward revision to the forecast importantly reflects higher futures prices for both WTI and Brent.[3] In light of the escalating tensions with Iran, the Risks and Uncertainty section considers the effects of a significant disruption in global oil supply.

The broad index of nonfuel commodity prices that we follow is, on net, little changed since the time of the December Tealbook. The prices of field crops, including corn, soybeans, and wheat, have moved up modestly in recent weeks because of concerns about growing conditions in Latin America; however, these prices remain well below the peaks reached in the first half of 2011. Meanwhile, metals prices are little changed, on net, from the time of the December Tealbook. Overall, we expect nonfuel commodity prices to increase only slightly through 2013, in line with prices from futures markets adjusted for staff assumptions regarding the path of the dollar and the global growth outlook.

RECENT DEVELOPMENTS AND THE NEAR-TERM OUTLOOK

As noted earlier, we now estimate that real GDP rose at an annual rate of 3 percent in the fourth quarter of 2011, ¼ percentage point less than in our previous projection, and that it will rise just 1½ percent in the current quarter, ½ percentage point

[3] Additionally, because private economists' forecasts of global economic activity have moved down closer to ours, we now expect less downward pressure on oil prices going forward, and we have raised the adjustment factor we apply to the futures curves.

less than before. These downward revisions mostly reflect sharply weaker incoming information on defense spending and a somewhat more moderate pace of increase in consumer spending than we had forecast previously. Residential construction, which has shown a few surprising signs of life, provided a small offset to these downward revisions. Turning to the contour of our projection, the expected deceleration in real GDP growth this quarter is shaped most importantly by the pattern of inventory investment, which is estimated to have contributed more than 1½ percentage points to real GDP growth last quarter but is expected to be about neutral in the current quarter.

The Labor Market

Labor market conditions have firmed somewhat recently. Total nonfarm payroll employment increased 200,000 and private nonfarm payroll employment gained 212,000 in December—both somewhat faster than in recent months—and the unemployment rate edged down 0.2 percentage point in December to 8.5 percent.[4] Other labor market indicators have also shown some improvement: Initial claims for unemployment insurance have, on net, continued to move down, households upgraded their expectations of future labor market conditions after having tamped them down during the summer, and firms report that they expect to step up their rate of hiring in the first quarter. Nonetheless, these indicators have improved less than generally would be consistent with the decline in the unemployment rate over the past four months.

In light of this information and the weaker output growth that we have in this projection, we have marked up our near-term labor market forecast only slightly. In particular, we now expect that private payroll gains will average 150,000 per month in the first quarter; this figure is about 10,000 per month stronger than in the December Tealbook after adjusting for the anticipated payback in January from the overstated December gain. With state and local governments expected to make further cuts to payrolls in response to budget pressures, total payroll employment is expected to increase about 125,000 per month through March. We expect the unemployment rate to edge back up to 8.7 percent in the first quarter, a touch below our projection in the December Tealbook.

[4] As we saw last year, the rise in payroll employment in December seems to have been exaggerated to some degree by a temporary increase in hiring by package delivery firms due to online retailing, which—as a relatively recent phenomenon—is probably not yet fully captured in the BLS's seasonal adjustment procedure. We expect the payroll gain in January to be held down somewhat in seasonally adjusted terms as those workers are laid off.

The Industrial Sector

Manufacturing production posted a solid gain in the fourth quarter. While a portion of this strength reflected the continued recovery in the motor vehicle supply chain from last year's earthquake in Japan and the more recent flooding in Thailand, recent production gains outside the motor vehicle sector also have been relatively firm. After jumping nearly 1 percent in December, manufacturing output appears poised to decelerate in coming months, in part as the temporary boost to factory output resulting from the recovery of the motor vehicle supply chain wanes. Indeed, although the available indicators of near-term production changes—such as the new-orders diffusion indexes from the national and regional manufacturing surveys—have improved in recent months, they continue to suggest near-term gains in factory output that are a bit less rapid than those we have seen since the summer. Nevertheless, after factoring in the strong increase in IP for December, manufacturing output is now expected to rise at an annual rate of 4 percent this quarter, 1¼ percentage points stronger than in the previous Tealbook.

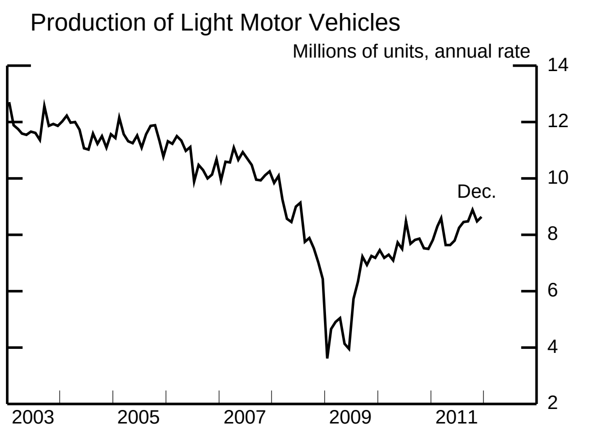
Household Spending

Real PCE appears to have increased at a moderate pace in the fourth quarter. Sales of light motor vehicles rose to an annual rate of 13½ million units last quarter, 1 million units higher than in the third quarter when supply constraints related to the earthquake in Japan were still limiting sales to some degree. However, the increase in spending on goods other than motor vehicles was more moderate, and the available data suggest that spending on services has been somewhat restrained.

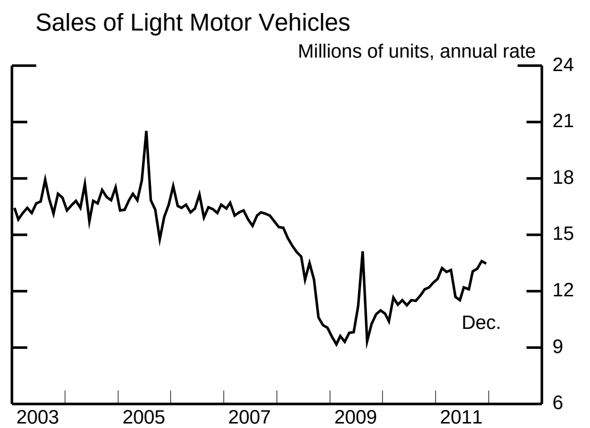
If, as in our baseline projection, energy prices are stable in coming months and the payroll tax cut is extended through the end of this year, then the job gains that we anticipate should show through to a moderate increase in real disposable income over the near term. Nevertheless, households' expectations regarding their future incomes remain bleak, and consumer sentiment remains at relatively low levels despite having improved noticeably over the past several months. All told, we now estimate that real PCE rose 2¼ percent in the fourth quarter and look for a 2 percent increase in the current quarter. This trajectory is a bit weaker than in our previous projection, reflecting a disappointing retail sales report for December.

Recent indicators of single-family housing activity—such as starts, permit issuance, and home sales—hint at incremental increases in demand over the past few

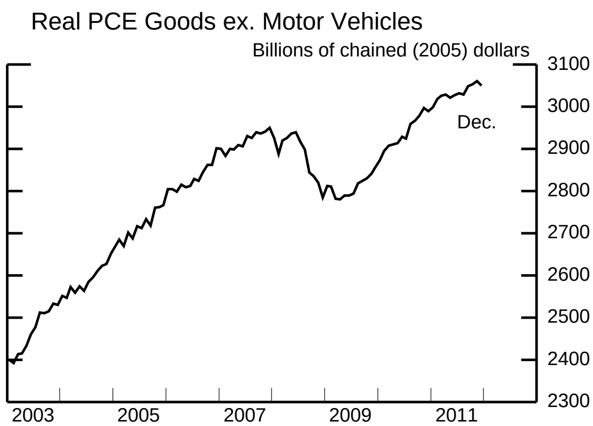
Recent Nonfinancial Developments (2)



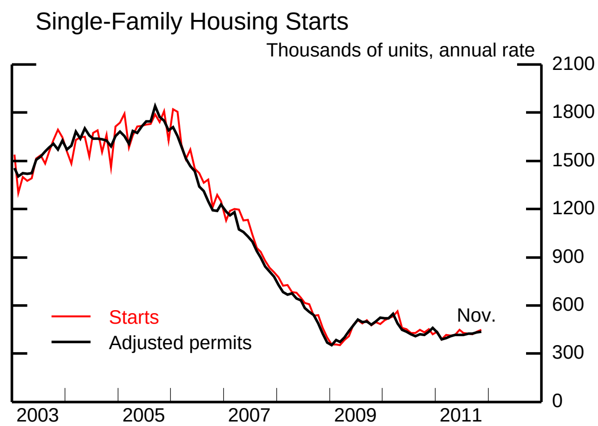
Source: Ward's Auto Infobank.



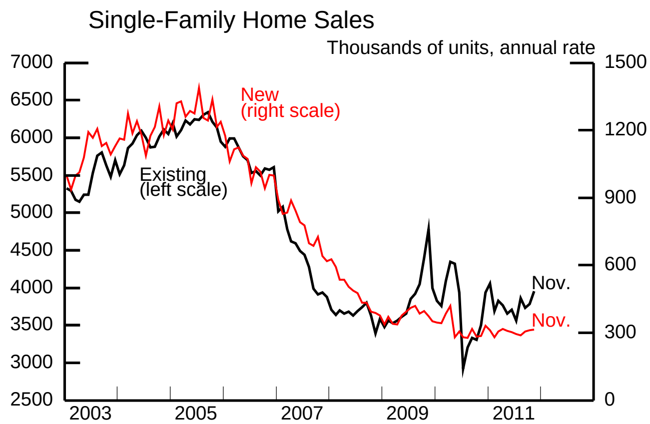
Source: Ward's Auto Infobank.



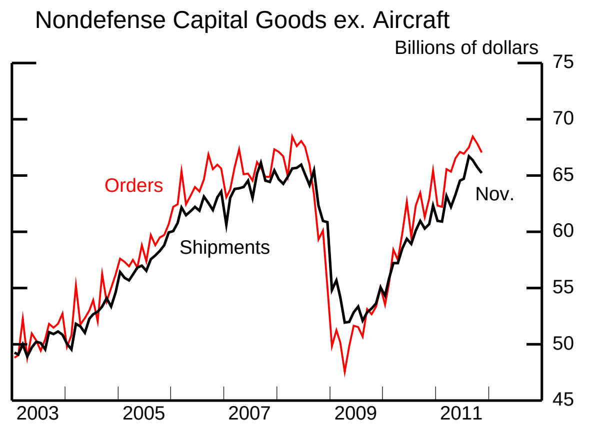
Note: Figures for October, November, and December are staff. estimates based on available source data.
Source: U.S. Dept. of Commerce, Bureau of Economic Analysis.



Note: Adjusted permits equal permits plus starts outside of permit-issuing areas.
Source: U.S. Census Bureau.



Source: For existing, National Association of Realtors; for new, U.S. Census Bureau.



Source: U.S. Census Bureau.

months. However, activity remains at deeply depressed levels, as mortgage credit remains restrictive, the stock of vacant homes is still abundant, and credit availability for builders continues to be tight. Accordingly, while we have taken on board the modestly better news in this sector and have raised our projection for homebuilding a bit, we still expect single-family starts to edge up in the first quarter only to an average annual rate approaching 450,000 units. In response to increased demand for apartments and falling vacancy rates, multifamily starts have slowly risen from very low levels over the past year or so, and we expect further moderate gains in coming months.

Business Investment

Real business spending on equipment and software (E&S) appears to have risen at an annual rate of only 3 percent in the fourth quarter after posting a sizable gain of 16 percent in the third quarter. Although spending on high-tech equipment has held up reasonably well in recent months, spending on a broad range of other equipment appears to have pulled back in the fourth quarter after a third-quarter surge. Forward-looking indicators are mixed: Some indicators of business sentiment and of capital spending plans have improved lately, but corporate bond spreads remain elevated and analysts' earnings expectations for producers of capital goods remain subdued. As a result, we expect E&S spending to rise at only a 2 percent pace in the current quarter, similar to the previous quarter's pace.

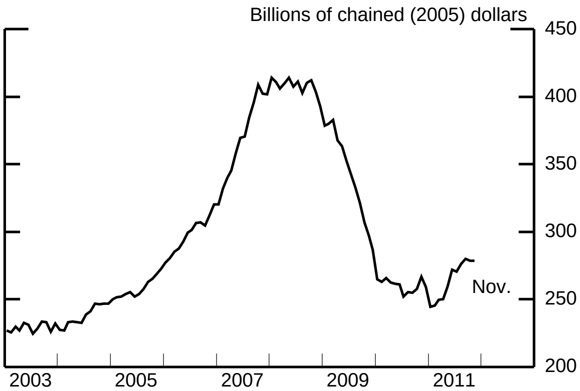
After two quarters of surprisingly large increases, real investment in nonresidential structures appears to have decelerated sharply in the fourth quarter and is expected to decline in the current quarter.[5] The architectural billings index—which is reasonably well correlated with changes in outlays two to three quarters hence—has moved up recently but remains consistent with near-term decreases in spending outside the drilling and mining sector. In contrast, we continue to expect activity in the drilling and mining sector to rise at robust rates over the next few quarters, supported by the high price of crude oil and by the ongoing diffusion of technologies that have increased the expected profitability of drilling.

Real inventory investment in the nonfarm business sector looks to have picked up noticeably in the fourth quarter—contributing more than 1½ percentage points to the rise in

[5] Outside of drilling and mining, activity likely would have fallen quite noticeably at the end of last year if not for an expiring tax provision for alternative energy projects that probably pulled some spending from early this year into the fourth quarter.

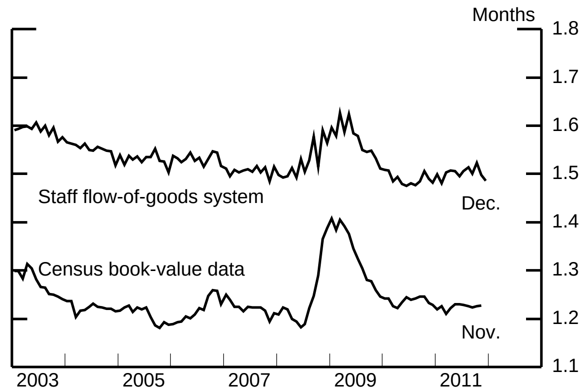
Recent Nonfinancial Developments (3)

Nonresidential Construction Put in Place



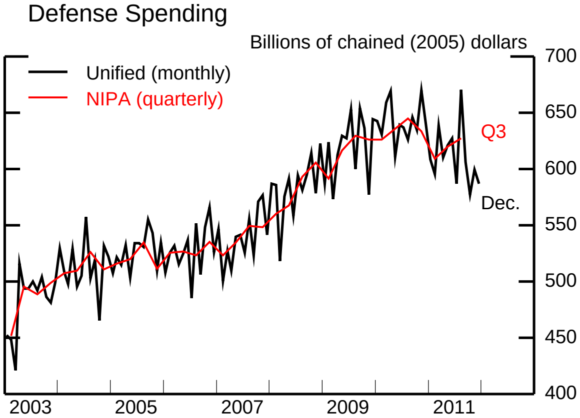
Source: U.S. Census Bureau.

Inventory Ratios ex. Motor Vehicles



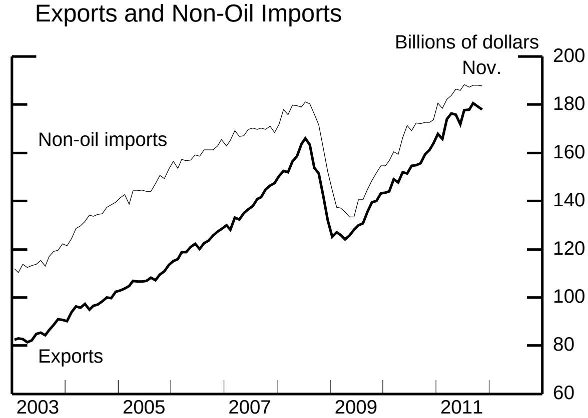
Note: Flow-of-goods system covers total industry ex. motor vehicles and parts, and inventories are relative to consumption. Census data cover manufacturing and trade ex. motor vehicles and parts, and inventories are relative to sales.
Source: U.S. Census Bureau; staff calculation.

Defense Spending



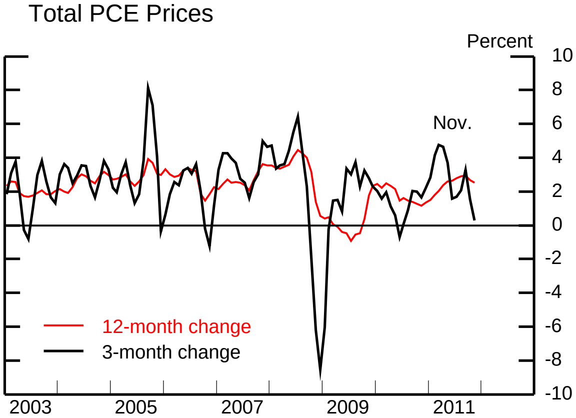
Note: The unified series is seasonally adjusted and deflated by BEA prices. The NIPA series excludes the consumption of fixed capital.
Source: *Monthly Treasury Statement*; U.S. Dept. of Commerce, Bureau of Economic Analysis.

Exports and Non-Oil Imports



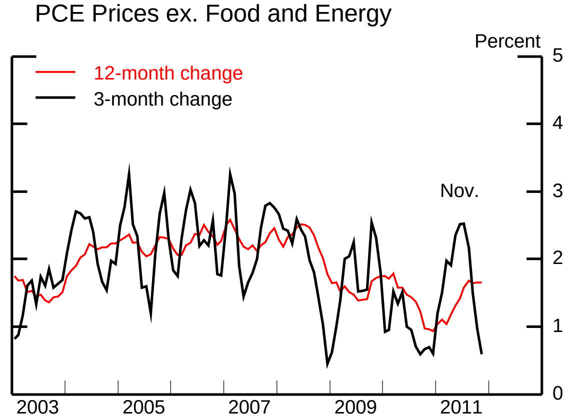
Source: U.S. Dept. of Commerce, Bureau of Economic Analysis; U.S. Census Bureau.

Total PCE Prices



Note: 3-month changes are at an annual rate.
Source: U.S. Dept. of Commerce, Bureau of Economic Analysis.

PCE Prices ex. Food and Energy



Note: 3-month changes are at an annual rate.
Source: U.S. Dept. of Commerce, Bureau of Economic Analysis.

real GDP—after slowing abruptly in the third quarter. On the whole, inventory stocks generally appear well aligned with sales. One exception is in motor vehicles, where dealers' stocks remain lean and we anticipate further stockbuilding—albeit at a diminishing pace—in coming quarters. All told, we expect the contribution to real GDP growth from inventory investment to be about neutral in the current quarter.

Government

Incoming data suggest that total real federal purchases fell at an annual rate of nearly 10 percent in the fourth quarter, pulled down by defense spending that proved much weaker than we had expected. Given our revised assumptions for defense spending, we now anticipate that real federal purchases will only edge up this quarter; previously, we expected a 4 percent rate of increase. Meanwhile, data for the state and local sector continue to suggest that the rate of decline in real purchases is moderating. Over the second half of 2011, state and local employment declined 11,000 jobs per month, on average, compared with decreases of roughly 30,000 per month over the first half of the year. Moreover, real construction expenditures appear to have leveled out in the second half of 2011 following sharp decreases in the first half of the year. As in our previous projection, we continue to expect that real purchases by state and local governments will decline at an annual rate of about 1 percent in the fourth and first quarters.

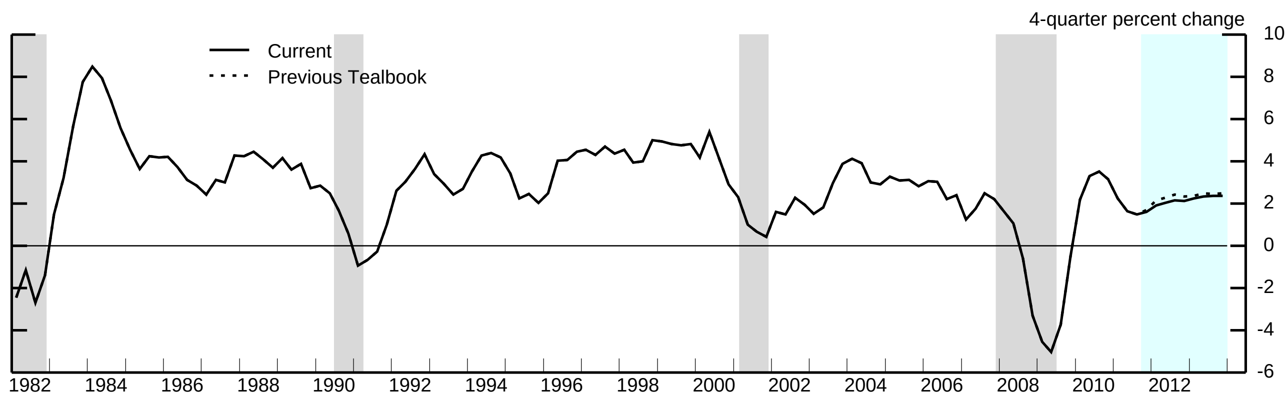
Foreign Trade

After incorporating the trade data for October and November, we estimate that real exports of goods and services rose at an annual rate of 5 percent in the fourth quarter. In the current quarter we expect exports to increase at a similar pace, supported by continued growth in the emerging market economies and by the lagged effect of the declines in the dollar that occurred in the first half of 2011. Real imports of goods and services are estimated to have increased 3 percent in the fourth quarter and are projected to rise at a 4 percent pace in the current quarter as imports of oil pick up following a flat fourth quarter. Given the relative strength of exports, we expect the contribution of net exports to U.S. GDP growth to be about ¼ percentage point in the fourth quarter and to be slightly positive in the current quarter, a forecast largely unchanged from the December Tealbook.

Projections of Real GDP and Related Components
(Percent change at annual rate from final quarter
of preceding period except as noted)

Measure	2010	2011 H1	2011 H2	2012	2013
Real GDP	**3.1**	**.8**	**2.4**	**2.1**	**2.4**
Previous Tealbook	3.1	.8	2.6	2.3	2.5
Final sales	2.4	.8	2.2	2.0	2.2
Previous Tealbook	2.4	.8	2.7	2.1	2.2
Personal consumption expenditures	3.0	1.4	2.0	2.4	2.4
Previous Tealbook	3.0	1.4	2.2	2.4	2.3
Residential investment	-6.3	.8	5.4	6.6	7.3
Previous Tealbook	-6.3	.8	2.4	5.8	7.9
Nonresidential structures	-1.8	2.5	7.8	-2.1	1.1
Previous Tealbook	-1.8	2.5	10.2	-1.1	.9
Equipment and software	16.6	7.5	9.4	3.8	6.4
Previous Tealbook	16.6	7.5	9.4	3.2	6.4
Federal purchases	2.9	-3.9	-3.9	-1.0	-4.1
Previous Tealbook	2.9	-3.9	-.8	.4	-3.9
State and local purchases	-1.7	-3.1	-1.2	-.5	.7
Previous Tealbook	-1.7	-3.1	-1.2	-.4	.8
Exports	8.8	5.7	4.9	4.8	5.2
Previous Tealbook	8.8	5.7	5.4	5.1	5.5
Imports	10.7	4.8	2.1	3.9	4.1
Previous Tealbook	10.7	4.8	2.3	3.8	4.2
	Contributions to change in real GDP (percentage points)				
Inventory change	.7	.0	.1	.1	.2
Previous Tealbook	.7	.0	-.2	.3	.3
Net exports	-.6	-.1	.3	.0	.0
Previous Tealbook	-.6	-.1	.3	.0	.0

Real GDP



Note: The gray shaded bars indicate a period of business recession as defined by the National Bureau of Economic Research.
Source: U.S. Department of Commerce, Bureau of Economic Analysis.

Prices and Wages

Recent data on consumer prices have been mostly in line with our December forecast. With regard to core inflation, the latest readings continue to suggest that the upswing in the spring and summer was mainly due to transitory factors, including the first-half surge in commodity and import prices as well as the increase in motor vehicle prices that stemmed from supply shortages related to the earthquake in Japan. Indeed, prices for motor vehicles declined again in November. In addition, core prices in the fourth quarter were held down by two temporary factors—a decline in nonmarket prices from which we take little signal, and a weak reading on prices for medical services that appears unlikely to persist. All told, we continue to expect core PCE prices to rise at an annual rate of about 1 percent in the fourth quarter and to increase 1½ percent this quarter.

Consumer food prices look to have decelerated a bit more than we anticipated in the fourth quarter, and we expect food price increases to slow further over the first half of this year, as the declines in crop prices since last spring continue to pass through to retail prices. Meanwhile, our forecast for consumer energy prices—a sharp decline in the fourth quarter and little change in the current quarter—is largely unrevised relative to the previous projection. All told, total PCE price inflation appears on track to slow from an annual rate of 2¼ percent in the third quarter to ½ percent in the fourth, a bit below our previous projection, and then to step back up to 1½ percent in the first quarter.

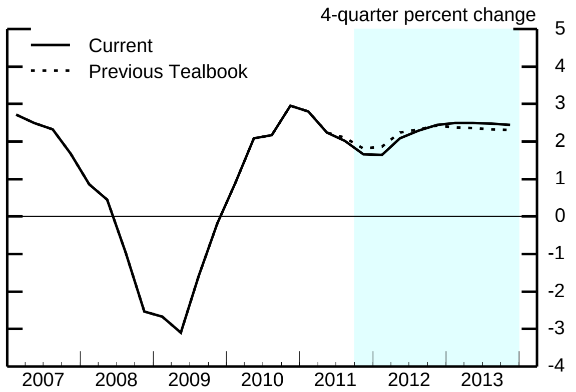
We have received little new information on labor compensation since the December Tealbook. Employee compensation in November was lower than anticipated, but average hourly earnings in December were stronger than expected. As a result, we continue to estimate that compensation per hour advanced at an annual rate of 2¼ percent in the fourth quarter, and we expect it to increase at the same rate in the current quarter.

THE MEDIUM-TERM OUTLOOK

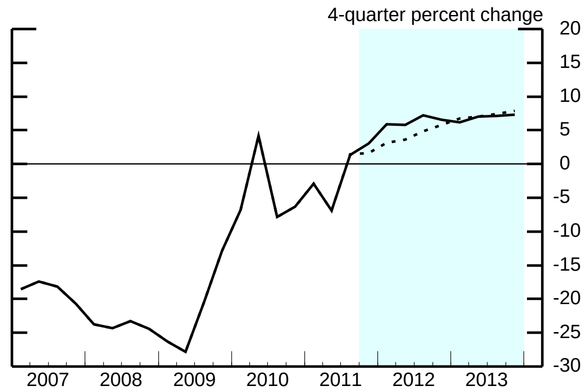
Our medium-term forecast for the growth of real GDP is a little weaker than at the time of the December Tealbook. This change primarily reflects a higher projected foreign exchange value for the dollar, a little higher path for oil prices, and a weaker trajectory for defense spending. The other factors shaping the broad contour of our projection are largely the same as in the previous projection. In particular, as before, developments in Europe are expected to cast a pall over the U.S. economy during the first half of this year; thereafter, Europe-related concerns are assumed to abate gradually.

Components of Final Demand

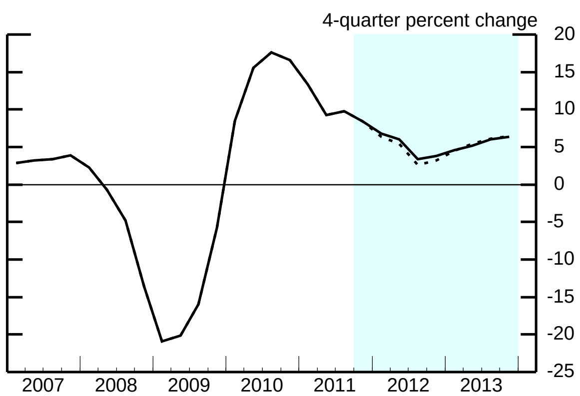
Personal Consumption Expenditures



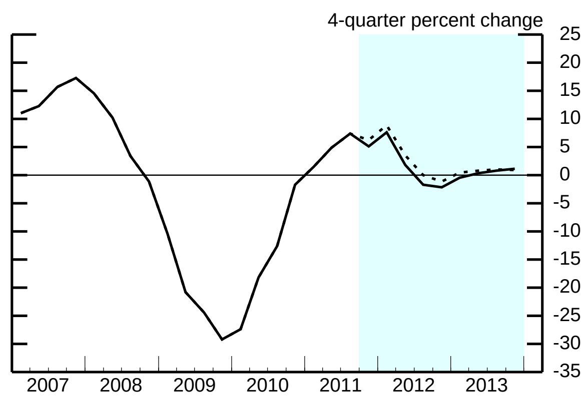
Residential Investment



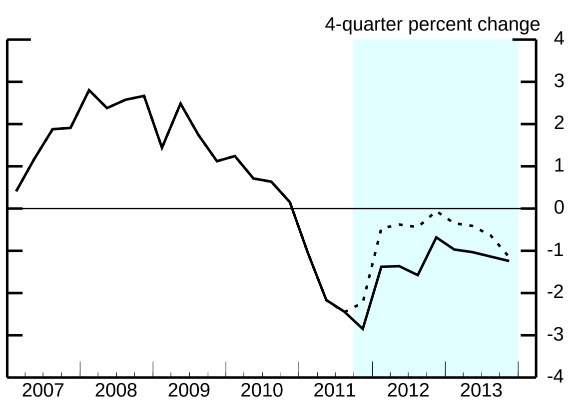
Equipment and Software



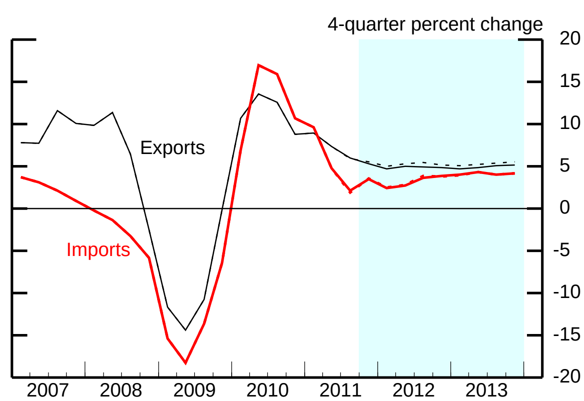
Nonresidential Structures



Government Consumption & Investment



Exports and Imports



Source: U.S. Department of Commerce, Bureau of Economic Analysis.

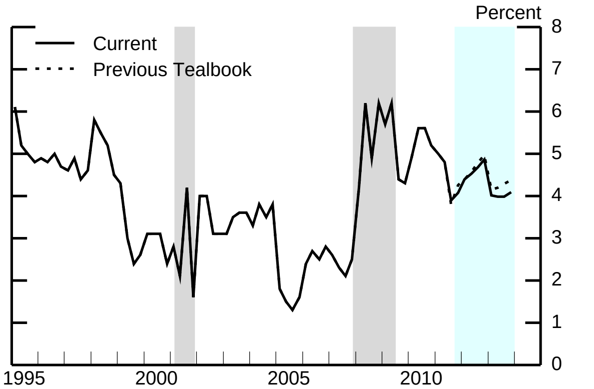
Similarly, the adverse effects of impaired credit availability are anticipated to ebb slowly during the next two years, leading to further increases in consumer and business confidence and causing households and businesses eventually to become more responsive to the low level of interest rates. In contrast, federal fiscal policy is expected to become substantially more restrictive over time, curtailing the growth rate of real GDP by a full percentage point in 2013. Moreover, as discussed earlier, we project a substantial rise in long-term interest rates through the end of next year. In all, real GDP is expected to increase 2 percent in 2012 and 2½ percent in 2013, the same pace as the assumed rate of growth in potential output this year and a little faster than potential growth next year.

As noted earlier, the path for the dollar is a little higher in this projection. Accordingly, we trimmed our outlook for export growth. Nevertheless, we think that continued increases in demand from the emerging market economies will support gains in U.S. exports overall. As a result, real exports of goods and services are expected to rise about 5 percent in both 2012 and 2013, about ¼ percentage point slower in each year than in the previous projection. Meanwhile, real imports are forecast to increase at a modest 4 percent annual rate, on average, this year and next, consistent with the relatively lackluster pace of U.S. GDP growth. On net, because imports still exceed exports, trade is expected to make an essentially zero arithmetic contribution to real GDP growth over the next two years, a slightly weaker forecast than in the December Tealbook.

We also have increased the projected drag from government spending over the medium term relative to that in our previous forecast. As before, we expect federal discretionary spending to be restrained by the Budget Control Act. But, as discussed earlier in "Key Background Factors," we now think that appropriations for overseas military operations will be smaller than we had previously expected, and we have tempered the anticipated rebound in defense spending this year from the surprisingly low level of spending relative to appropriations in 2011. As a result, we now expect real federal purchases to fall 1 percent in 2012 and 4 percent in 2013, a bit more than in the December Tealbook. In the state and local sector, we continue to see an anemic recovery in real purchases. Although state tax revenues are rising at a solid pace, federal stimulus grants are being phased out and tax collections (especially property taxes) at the local level have been weak. In this tight fiscal environment, we expect state and local purchases to change little, on net, over the projection period.

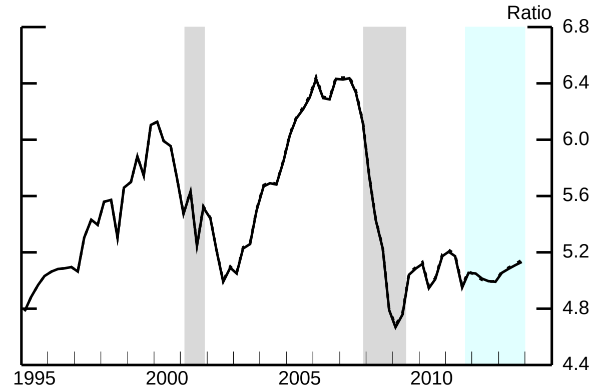
Aspects of the Medium-Term Projection

Personal Saving Rate



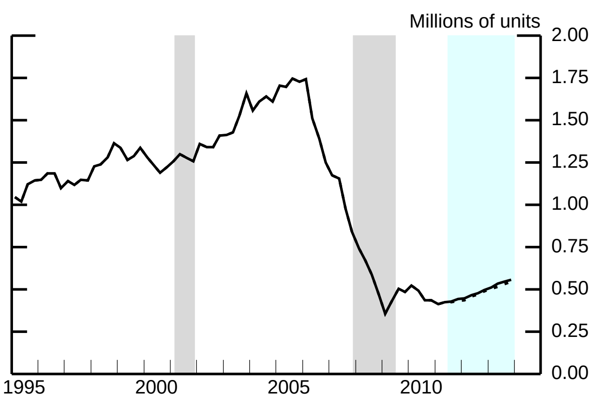
Source: U.S. Dept. of Commerce, Bureau of Economic Analysis.

Wealth-to-Income Ratio



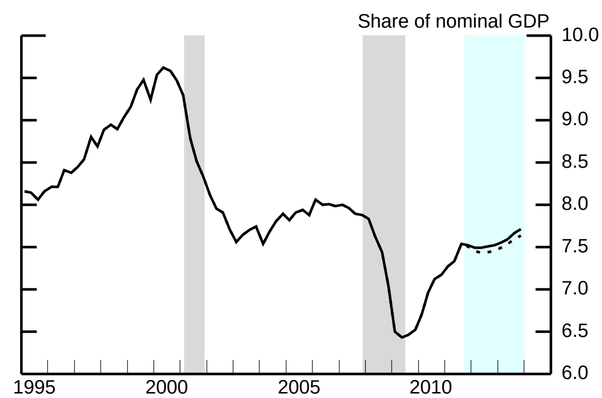
Note: Household net worth as a ratio to disposable personal income.
Source: For net worth, Federal Reserve Board, flow of funds data; for income, Dept. of Commerce, Bureau of Economic Analysis.

Single-Family Housing Starts



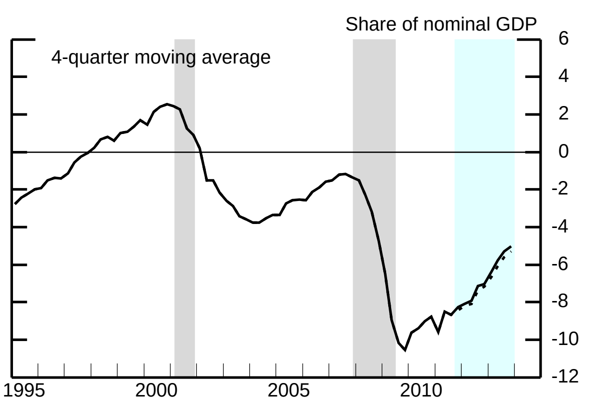
Source: U.S. Census Bureau.

Equipment and Software Spending



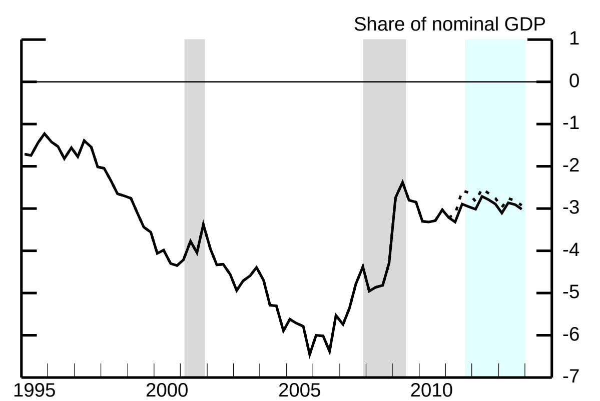
Source: U.S. Dept. of Commerce, Bureau of Economic Analysis.

Federal Surplus/Deficit



Source: *Monthly Treasury Statement*.

Current Account Surplus/Deficit



Source: U.S. Dept. of Commerce, Bureau of Economic Analysis.

Note: The gray shaded bars indicate a period of business recession as defined by the National Bureau of Economic Research.

The other factors influencing our medium-term projection are mostly unrevised. As we noted in the previous Tealbook, the news during the past several months about real disposable personal income (DPI) has been very weak. Although we have taken down the trajectory of consumer spending in response to that news, we have not done so to the full extent called for by a mechanical reading of our models. The box "The Role of Surprisingly Weak Income Data in the PCE Projection" provides our rationale for tempering our response to the income data. All told, we continue to expect spending to accelerate in 2012 as the growth in real DPI steps back up and as consumers become more confident about the economic outlook.

As before, we expect a very slow recovery in the housing sector over the medium term. The recent data on starts, permits, and new home sales have been slightly encouraging. However, access to mortgage credit is still exceedingly tight, and households remain pessimistic and uncertain about their future incomes and about the direction of house prices; these factors are likely to weigh on the demand for housing for some time. Moreover, the stock of vacant houses remains sizable, and the flow of homes from foreclosure into the resale market is expected to remain substantial. Accordingly, our projection calls for single-family housing starts to rise only gradually to an annual rate of 560,000 units by the end of 2013, a pace we judge to be far below the longer-run demand for housing.

In the business sector, we have not materially changed our view of the way E&S investment is progressing. In particular, we continue to view many firms as being hesitant to invest despite having the cash to do so. As firms grow more confident about the economic outlook and as financing conditions for smaller businesses improve further, we expect business spending to accelerate somewhat. As a result, growth in real E&S outlays is projected to step up from about 4 percent in 2012 to about 6½ percent in 2013; these moderate rates of increase are consistent with only a slow expansion of the capital stock.

Our outlook for business investment in nonresidential structures remains sluggish. Outside of drilling and mining, investment is expected to be essentially flat, on net, over the next two years, reflecting the weak fundamentals for this sector: Vacancy rates are still elevated, valuations for commercial real estate remain depressed, and financing conditions continue to be difficult. In contrast, outlays for drilling and mining structures are anticipated to persist at high levels over the projection period, although spending

The Role of Surprisingly Weak Income Data in the PCE Projection

Real disposable personal income (DPI) has been considerably weaker than we had expected in the fall. Indeed, real DPI now looks to have edged up just $40 billion (or ½ percent) over 2011; at the time of the October Tealbook, we anticipated an increase of close to $160 billion (or 1½ percent), as shown in the table below.[1] The meager gains in personal income—which are also reflected in the very subdued increases in gross domestic income (GDI) over the second and third quarters—have weighed on our projection of consumer spending for this year and next.

Despite the slow growth in real disposable income, consumption expenditures in the second half of last year seem to have held up reasonably well, and, as a result, the personal saving rate fell from 5 percent in the first half of the year to around 4 percent in the second half—a decline that seems out of line with the weaker consumer sentiment and lower household wealth over the same period.

The Board staff's preferred consumption models react to the relatively high level of consumption (given the level of income and other determinants)—and hence the relatively low saving rate—by projecting that future consumption growth will slow enough to bring the level of consumption back in line with income and other observable explanatory variables. In other words, the models imply that surprises in the saving rate are unwound subsequently. The implications of one such model are shown by the blue bars in the figure on the facing page: According to this model, the downward revisions to income over the past two Tealbooks imply, all else being equal, reductions in the growth rate of PCE of close to ½ percentage point in 2012 and about ¼ percentage point in 2013.

In the baseline forecast, we have discounted somewhat the implications of this and similar models for the PCE outlook for the following reasons. For one thing, real-time readings on spending and income are subject to considerable measurement error. One interpretation of the relative strength of consumption recently is that the currently published data may understate the actual level of disposable income. (Indeed, the deceleration in published compensation in the middle of the year seems out of step with

Projections of the 2011 Q4/Q4 Change in Real DPI
(Billions of real dollars)

	Oct 2011 TB	Jan 2012 TB	Revision
DPI	157	38	-120
Selected components			
Compensation	95	69	-27
Transfers	-9	-53	-44
Dividends and interest	50	9	-41

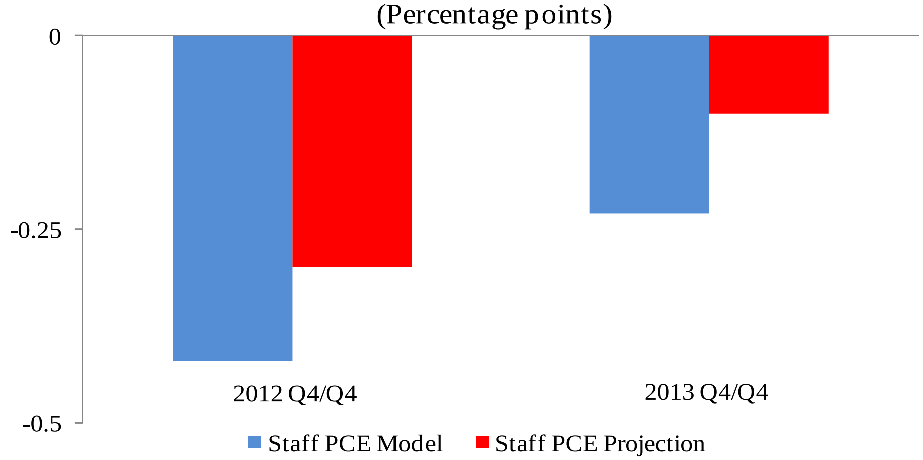
[1] Most of the revision to income ($85 billion out of $120 billion) occurred between the October and December Tealbooks.

the stability in both employment growth and the unemployment rate observed over the same period.) Moreover, during the past decade, there has been some tendency for large income revisions in a quarter—such as the recent downward revision to second-quarter compensation—to be partially unwound subsequently. To the extent that the currently published estimates of income are too low, the outlook for consumption should be brighter than a mechanical reading of the model results would indicate. Similarly, current estimates of consumption may be too high, in which case the *level* of actual consumption would be better aligned with income than is now apparent; accordingly, there would be less reason to project a slower *growth rate* of consumption going forward.[2]

Even if income and consumer spending were measured without error, a standard PCE model might still overstate the implications of the current estimated imbalance between consumption and income for future consumption growth because these apparent imbalances may instead reflect factors or behavior that the model does not capture. For example, changes in credit conditions, income uncertainty, or the proportion of current income that is perceived to be transitory could all have important influences on the saving rate. However, because we cannot accurately observe or estimate these variables, the ability of our models to condition on them is very limited.

After weighing the various interpretations of the recent income data, we revised down our projection of consumption growth from the October Tealbook to the January Tealbook (the red bars in the figure below) by a little less than our preferred model would have suggested (the blue bars).

Effect of Revision to the Level of 2011:Q4 Income from the October to January Tealbook on Projected Consumption Growth
(Percentage points)



[2] Although understated income and overstated consumption have similar implications for consumption growth over the projection, they have opposite implications for the level of consumption over the projection.

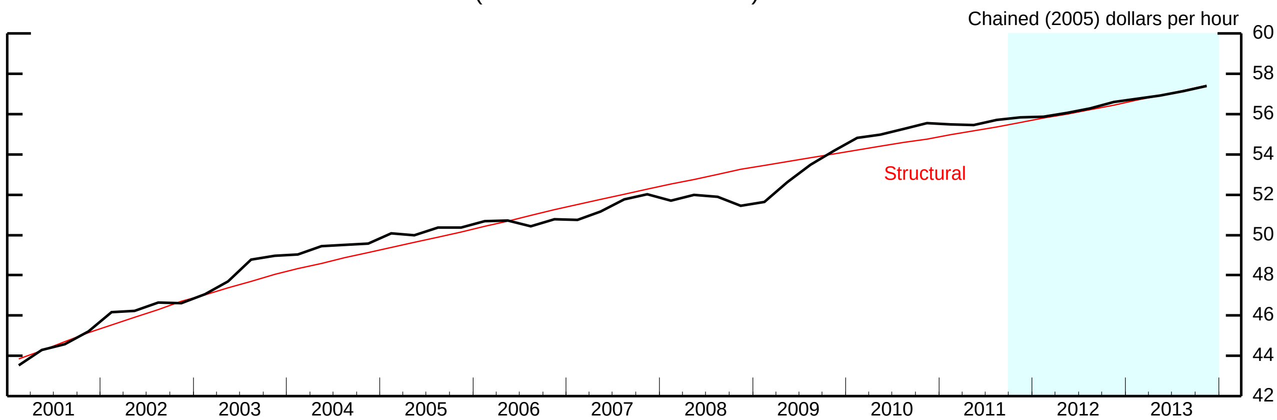
Domestic Econ Devel & Outlook

Decomposition of Potential GDP
(Percent change, Q4 to Q4, except as noted)

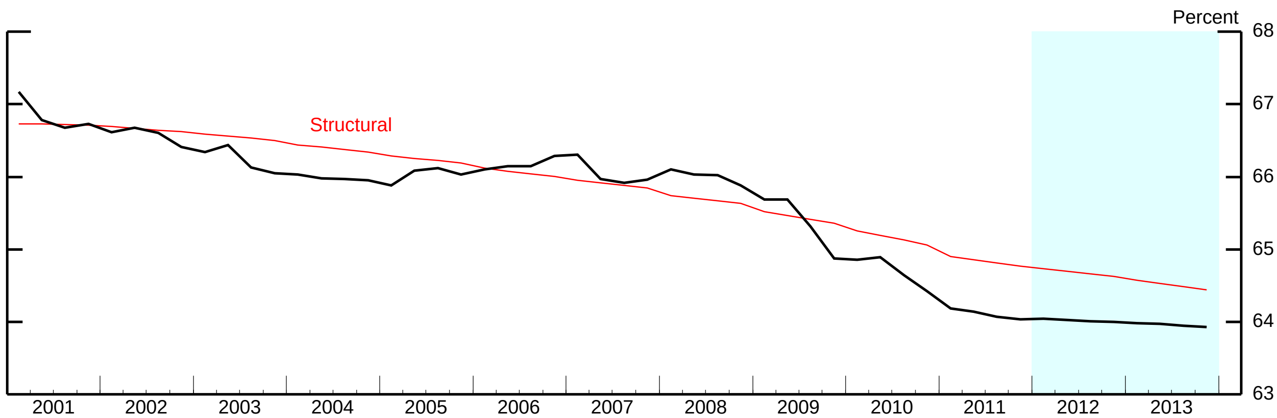
Measure	1974-1995	1996-2000	2001-2009	2010	2011	2012	2013
Potential Real GDP	3.0	3.5	2.4	1.6	1.7	2.0	2.1
Previous Tealbook	3.0	3.5	2.4	1.6	1.7	2.0	2.1
Selected contributions[1]							
Structural labor productivity	1.5	2.7	2.4	1.4	1.5	1.6	1.7
Previous Tealbook	1.5	2.7	2.4	1.4	1.5	1.6	1.7
Capital deepening	.7	1.5	.8	.4	.5	.5	.7
Previous Tealbook	.7	1.5	.8	.4	.5	.5	.7
Multifactor productivity	.5	.9	1.4	.9	.8	.9	.9
Previous Tealbook	.5	.9	1.4	.9	.8	.9	.9
Structural hours	1.5	1.0	.6	.5	.6	.7	.6
Previous Tealbook	1.5	1.0	.6	.5	.6	.7	.6
Labor force participation	.4	.0	-.3	-.4	-.3	-.2	-.3
Previous Tealbook	.4	.0	-.3	-.4	-.3	-.2	-.3

Note: Components may not sum to totals because of rounding. For multiyear periods, the percent change is the annual average from Q4 of the year preceding the first year shown to Q4 of the last year shown.
1. Percentage points.

Structural and Actual Labor Productivity
(Nonfarm business sector)



Structural and Actual Labor Force Participation Rate



Source: U.S. Department of Labor, Bureau of Labor Statistics; Bureau of Economic Analysis; and staff assumptions.

growth in this sector should moderate in response to lower projected prices for natural gas.

Finally, inventory investment is projected to have only a small influence on real GDP growth this year and next. As noted earlier, stocks currently appear well aligned with sales in most sectors, and thus we expect the pace of inventory accumulation to about match the rise in final sales during the projection period.

AGGREGATE SUPPLY, THE LABOR MARKET, AND INFLATION

Potential GDP and the NAIRU

We have made no changes in this projection to our estimates of aggregate supply. We continue to assume that potential GDP will increase roughly 2 percent in both 2012 and 2013, and we have retained our assumption that the NAIRU will remain at 6 percent through 2013.[6]

Productivity and the Labor Market

With output growth coming in a little weaker than we had expected even as the labor market has improved by more than we had anticipated, we have marked down our estimates of the increase in productivity in the near term. These revisions have brought the level of productivity down to our estimate of its trend level more quickly than we had anticipated in the December Tealbook. Over the remainder of the medium-term projection period, we expect firms to increase their labor input about in step with the modest gains anticipated in output; thus, we look for productivity to rise at a pace similar to its trend rate.

With little acceleration in economic activity projected over the medium term, we expect the pace of private employment growth to hold fairly steady, with monthly job gains averaging 160,000 in 2012 and 170,000 in 2013. Meanwhile, we expect state and local employment to continue to decline this year, though by less than in recent years, and to rise modestly next year, as budget pressures diminish somewhat. With these tepid employment gains, the unemployment rate edges down to 8¼ percent by the end of 2013,

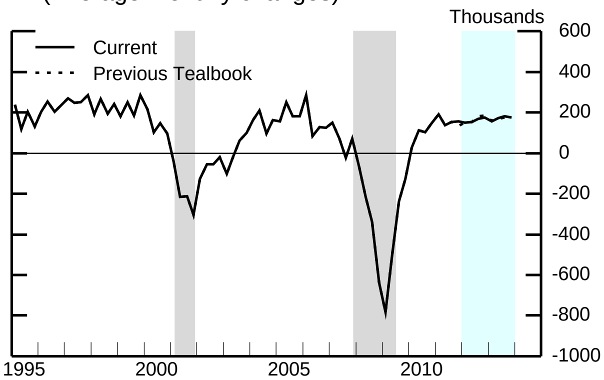
[6] Our estimate of the short-run "effective" NAIRU (which includes the influence of extended and emergency unemployment benefits) is also unrevised in this projection. It remains at 6.4 percent through the end of 2012 and then declines toward the long-run NAIRU, nearly closing the gap between the two measures by the end of 2013 when the extended unemployment benefits are almost fully wound down.

The Outlook for the Labor Market and Resource Utilization
(Percent change from final quarter of preceding period)

Measure	2010	2011 H1	2011 H2	2012	2013
Output per hour, nonfarm business	2.5	-.4	1.4	1.4	1.4
Previous Tealbook	2.5	-.4	2.1	1.3	1.2
Nonfarm private employment[1]	98	165	155	163	171
Previous Tealbook	98	165	145	168	173
Labor force participation rate[2]	64.4	64.1	64.0	64.0	63.9
Previous Tealbook	64.5	64.1	64.1	64.1	64.0
Civilian unemployment rate[2]	9.6	9.1	8.7	8.6	8.2
Previous Tealbook	9.6	9.1	8.8	8.6	8.2
Memo:					
GDP gap[3]	-5.4	-5.8	-5.5	-5.4	-5.2
Previous Tealbook	-5.4	-5.8	-5.5	-5.2	-4.8

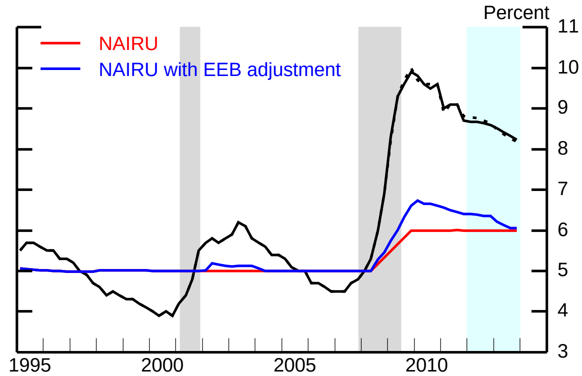
1. Thousands, average monthly changes.
2. Percent, average for the final quarter in the period.
3. Percent difference between actual and potential GDP in the final quarter of the period indicated. A negative number indicates that the economy is operating below potential.
Source: U.S. Department of Labor, BLS; staff assumptions.

Nonfarm Private Employment
(Average monthly changes)



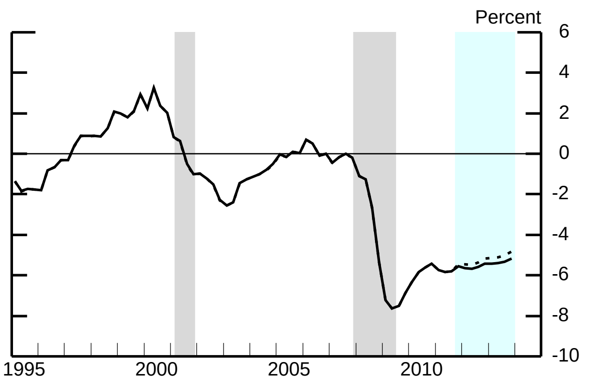
Source: U.S. Dept. of Labor, BLS.

Unemployment Rate



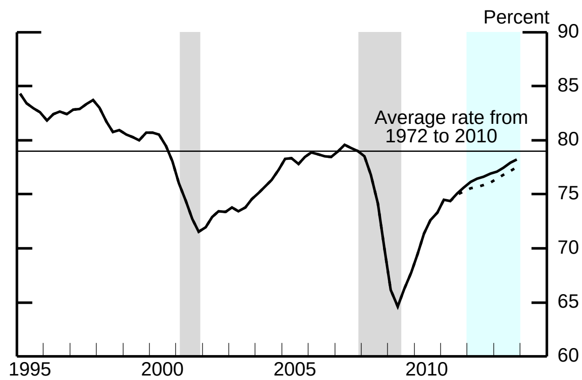
Note: The EEB adjustment is the staff estimate of the effect of extended and emergency unemployment compensation programs on the NAIRU.
Source: U.S. Dept. of Labor, BLS; staff assumptions.

GDP Gap



Note: The GDP gap is the percent difference between actual and potential GDP; a negative number indicates that the economy is operating below potential.
Source: U.S. Dept. of Commerce, BEA; staff assumptions.

Manufacturing Capacity Utilization Rate



Source: Federal Reserve Board, G.17 Statistical Release, "Industrial Production and Capacity Utilization."

Note: The gray shaded bars indicate a period of business recession as defined by the National Bureau of Economic Research.

the same as in the December Tealbook; most of this decline reflects downward pressure on labor force participation from the expected phase-out of EUC benefits.

Resource Utilization

By our estimates, economic slack remains considerable, and we expect no material progress to be made in whittling it down over the projection period. For example, the unemployment rate in the fourth quarter of 2011 was 2¼ percentage points above our estimate of the effective NAIRU, and we expect this gap to persist through 2013. Similarly, the output gap is projected to remain wide throughout the medium-term projection. The extended period of labor market slack is likely to be associated with a continuation of other adverse labor market conditions, including below-trend labor force participation and an unusually large concentration of workers experiencing long-term unemployment spells.

Unlike the staff's measure of potential GDP, which directly reflects trends in the labor force, our concept of capacity for the industrial sector focuses on the capability of plants to produce with the equipment that is in place and ready to operate, and not on the potential workforce. As a result, with manufacturing output rising moderately over the projection period and with manufacturing capacity expanding only modestly (after having contracted outright during the recession), excess capacity in this sector is taken up relatively quickly. Indeed, the factory operating rate rises 2¾ percentage points over the course of the next two years, to 78¼ percent, just a bit below its long-run average.

Prices and Compensation

We expect that the wide margin of labor market slack, along with low rates of price inflation, will continue to restrain labor costs over the forecast period. Both the Productivity and Cost measure of nonfarm hourly compensation and the employment cost index are projected to rise about 2¼ percent per year in 2012 and 2013, unchanged from the December Tealbook. Combined with the moderate gains in productivity that we project, these increases in compensation imply only a small rise in unit labor costs this year and next.

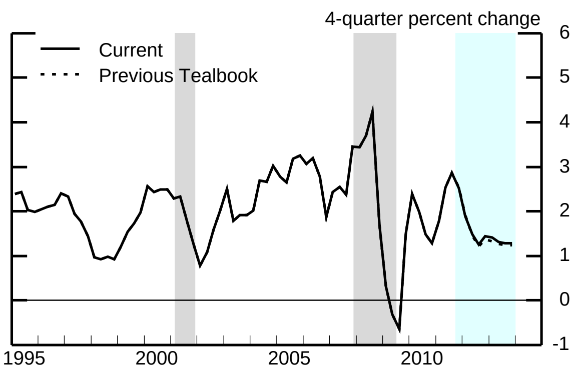
After falling at an estimated annual rate of ¾ percent in the final quarter of 2011, prices for core imported goods are expected to decline at a 1¼ percent rate in the current quarter; this decrease is slightly larger than projected in the December Tealbook because of the recent appreciation of the dollar. These price declines stand in sharp contrast to the

Inflation Projections
(Percent change at annual rate from final quarter of preceding period)

Measure	2010	2011 H1	2011 H2	2012	2013
PCE chain-weighted price index	1.3	3.6	1.4	1.4	1.3
Previous Tealbook	1.3	3.6	1.4	1.4	1.2
Food and beverages	1.3	6.4	3.7	1.1	1.2
Previous Tealbook	1.3	6.4	3.7	1.2	1.2
Energy	6.2	27.2	-1.9	1.4	-.8
Previous Tealbook	6.2	27.2	-1.9	-.3	-1.6
Excluding food and energy	1.0	1.9	1.5	1.5	1.4
Previous Tealbook	1.0	1.9	1.5	1.5	1.4
Prices of core goods imports[1]	2.6	7.7	.8	.2	1.5
Previous Tealbook	2.6	7.7	.8	.2	1.5

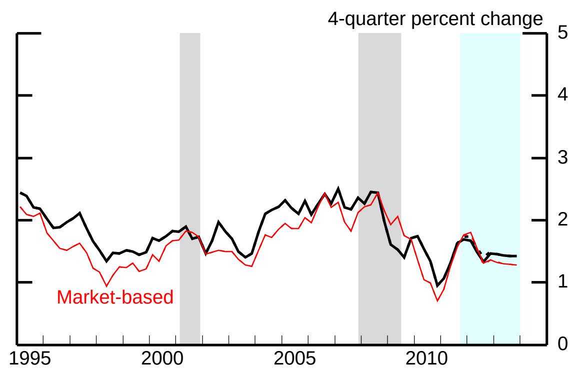
1. Core goods imports exclude computers, semiconductors, oil, and natural gas.
Source: U.S. Dept. of Commerce, Bureau of Economic Analysis.

Total PCE Prices



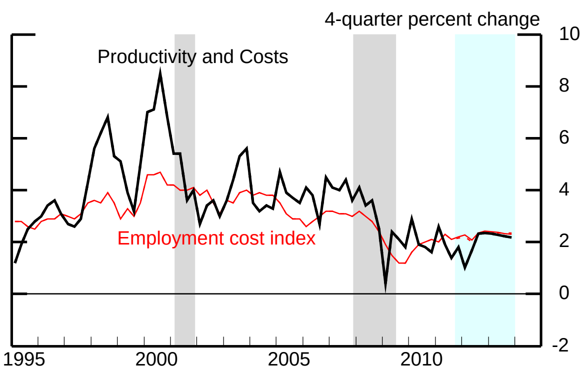
Source: U.S. Dept. of Commerce, Bureau of Economic Analysis.

PCE Prices ex. Food and Energy



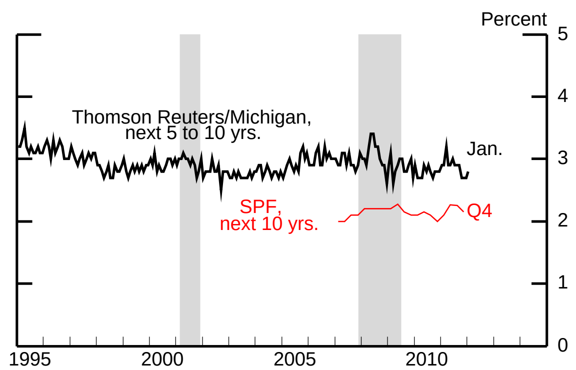
Source: U.S. Dept. of Commerce, Bureau of Economic Analysis.

Compensation per Hour



Source: U.S. Dept. of Labor, Bureau of Labor Statistics.

Long-Term Inflation Expectations



Note: The Survey of Professional Forecasters (SPF) projection is for the PCE price index.
Source: Thomson Reuters/University of Michigan Surveys of Consumers; Federal Reserve Bank of Philadelphia.

Note: The gray shaded bars indicate a period of business recession as defined by the National Bureau of Economic Research.

sizable increases observed in the first half of 2011; both the earlier increase and the recent declines were driven largely by fluctuations in commodity prices. Core import prices are expected to accelerate gradually to about a 1½ percent rate of increase in 2013, as commodity prices flatten out and the dollar begins to depreciate.

Inflation expectations have been little changed since the time of the December Tealbook. Median expectations from the Michigan survey ticked up 0.1 percentage point in January at both the 1-year and 5-to-10-year horizons but are still down somewhat from the middle of last year; the 5-to-10-year expectations stand near the lower edge of the narrow range they have moved in for most of the past 10 years. Inflation compensation 5 to 10 years ahead derived from TIPS spreads has changed little, on net, in recent weeks.

As in previous Tealbooks, we anticipate that subdued labor costs and low levels of resource utilization will continue to restrain core PCE inflation over the projection period but that stable inflation expectations will head off any actual disinflation. We continue to project that core PCE inflation will be about 1½ percent in both 2012 and 2013, the same as in the December Tealbook. Given our forecast of relatively small changes in food and energy prices, headline inflation is expected to run just a bit below core in both 2012 and 2013.

THE LONG-TERM OUTLOOK

We have extended the staff forecast to 2016 using the FRB/US model and staff assumptions regarding long-run supply-side conditions, fiscal policy, and other factors. The contour of the long-run outlook depends on the following key assumptions:

- Monetary policy aims to stabilize PCE inflation at 2 percent in the long run, consistent with the majority of longer-term inflation projections provided by FOMC participants at the November meeting.

- The Federal Reserve's holdings of securities follow the baseline portfolio projections reported in Book B. The projected longer-run decline in the System's holdings is forecast to contribute about 30 basis points to the rise in the 10-year Treasury yield from 2013 to 2016.

- Risk premiums on corporate equities and bonds decline gradually to normal levels, and banks ease their lending standards somewhat further.

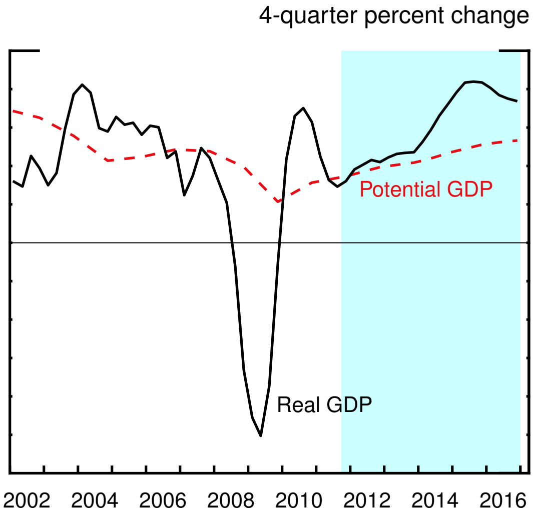
The Long-Term Outlook

(Percent change, Q4 to Q4, except as noted)

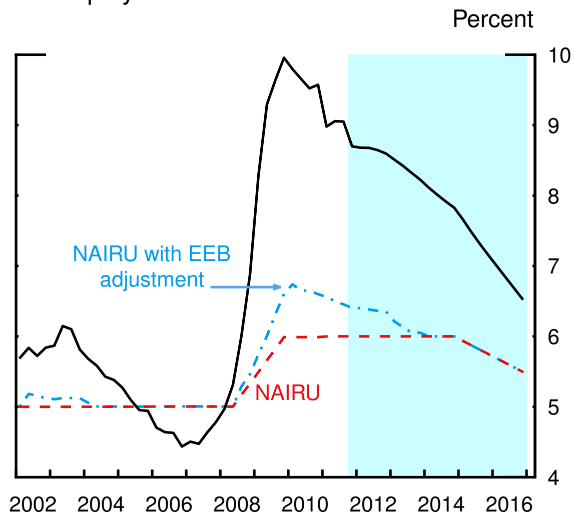
Item	2011	2012	2013	2014	2015	2016
Real GDP	1.6	2.1	2.4	3.6	4.2	3.7
Civilian unemployment rate[1]	8.7	8.6	8.2	7.8	7.2	6.5
PCE prices, total	2.5	1.4	1.3	1.5	1.5	1.6
Core PCE prices	1.7	1.5	1.4	1.4	1.4	1.5
Federal funds rate[1]	.1	.1	.1	.3	1.5	2.5
10-year Treasury yield[1]	2.1	2.7	3.5	3.7	3.9	4.1

1. Percent, average for the final quarter of the period.

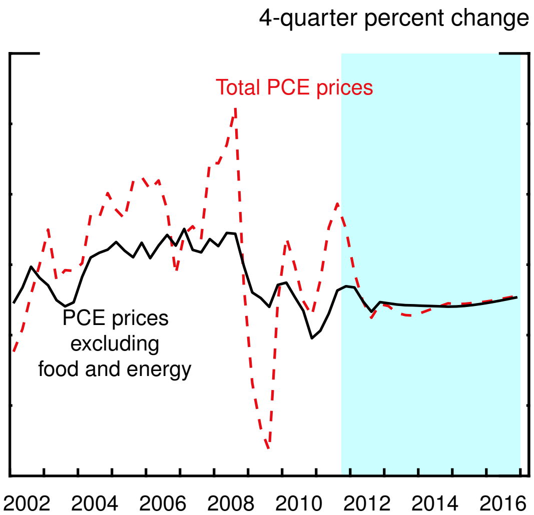
Real GDP



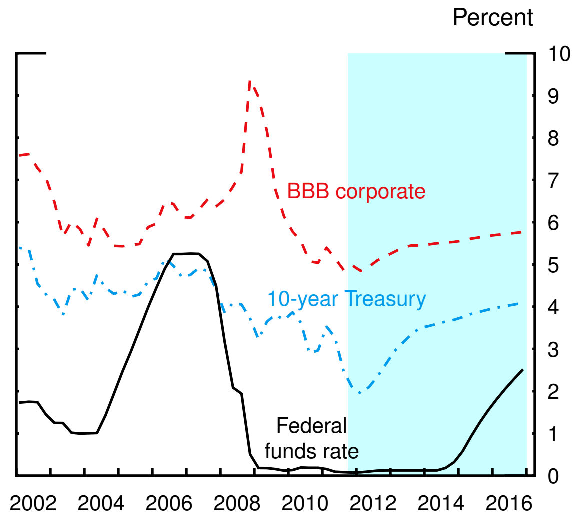
Unemployment Rate



PCE Prices



Interest Rates



Note: In each panel, shading represents the projection period.

- The federal government budget deficit (NIPA basis) narrows from 5¼ percent of GDP in 2013 to 4 percent of GDP in 2016. This narrowing reflects both the effects of the economic recovery on tax receipts and budgetary restraint consistent with the Budget Control Act.

- The foreign exchange value of the dollar is assumed to depreciate 2¼ percent per year in real terms from 2014 to 2016. The price of crude oil is roughly flat beyond 2013. Foreign real GDP expands, on average, 3½ percent per year from 2014 through 2016, slightly above its trend rate.

- The NAIRU declines from 6 percent in late 2013 to 5½ percent in late 2016 as the functioning of the labor market gradually improves, and settles in at 5¼ percent in the long run. Potential GDP expands 2½ percent per year on average from 2014 to 2016.

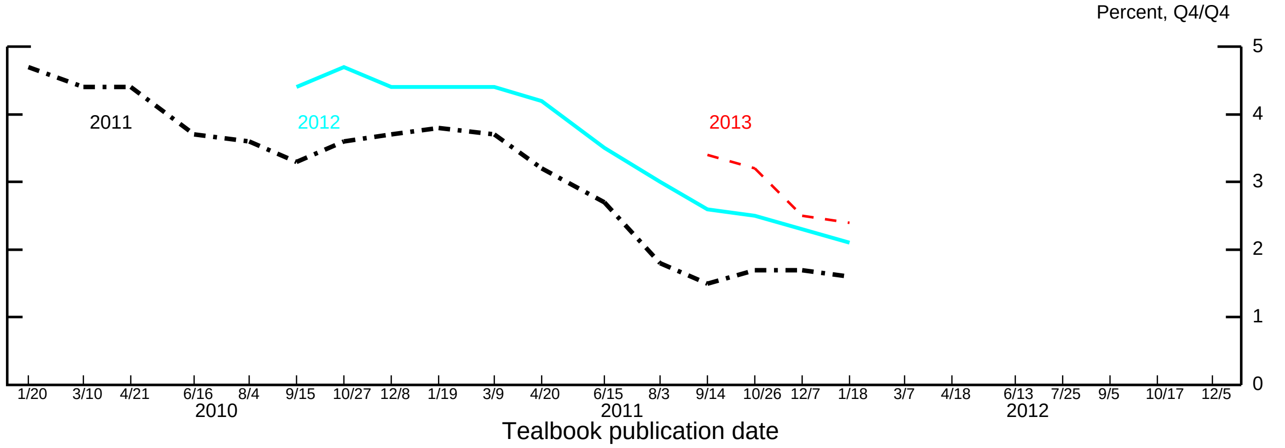
The economy enters 2014 with output still considerably below its potential, the unemployment rate well above the projected NAIRU, and inflation below the assumed objective. In the long-run forecast, improving confidence, diminishing uncertainty, and supportive financial conditions enable real GDP to rise at an average annual rate of 3¾ percent from 2014 to 2016. With actual output expanding significantly faster than potential, labor market conditions improve markedly. Nevertheless, the unemployment rate is 6½ percent at the end of 2016, still 1 percentage point above the assumed NAIRU. With slack-related downward pressures gradually abating, inflation edges up slightly but is still around 1½ percent in 2016.

Relative to the November projection—the last time that Committee participants submitted economic projections as part of the SEP process—the staff forecast for unemployment at the end of 2014, at 7.8 percent, is revised up ½ percentage point. Half of this revision reflects a change in our assumption about the pace at which labor market functioning will improve over the next several years. (We still have the long-term NAIRU heading ultimately to 5¼ percent, but getting there more slowly; as a result, the NAIRU in 2014 is ¼ percentage point higher now than it was in the November projection. This revision was introduced between the November and December Tealbooks.) The other half of the upward revision to the unemployment rate in the fourth quarter of 2014 reflects our expectation that the economic recovery will proceed at a slower pace than we anticipated in November. The inflation projection for both core and topline PCE inflation in 2014 is largely unrevised relative to the November Tealbook.

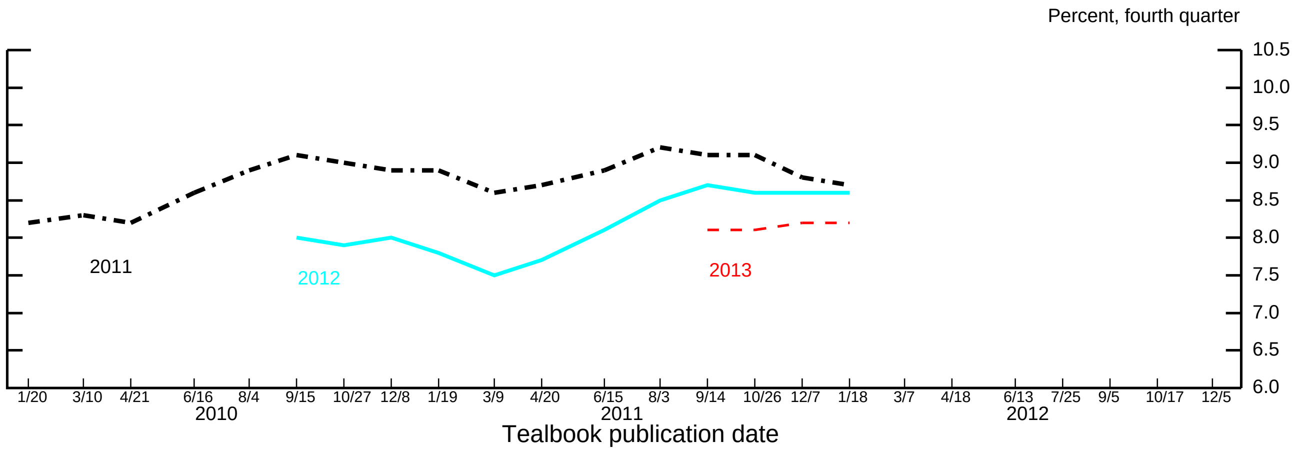
Domestic Econ Devel & Outlook

Evolution of the Staff Forecast

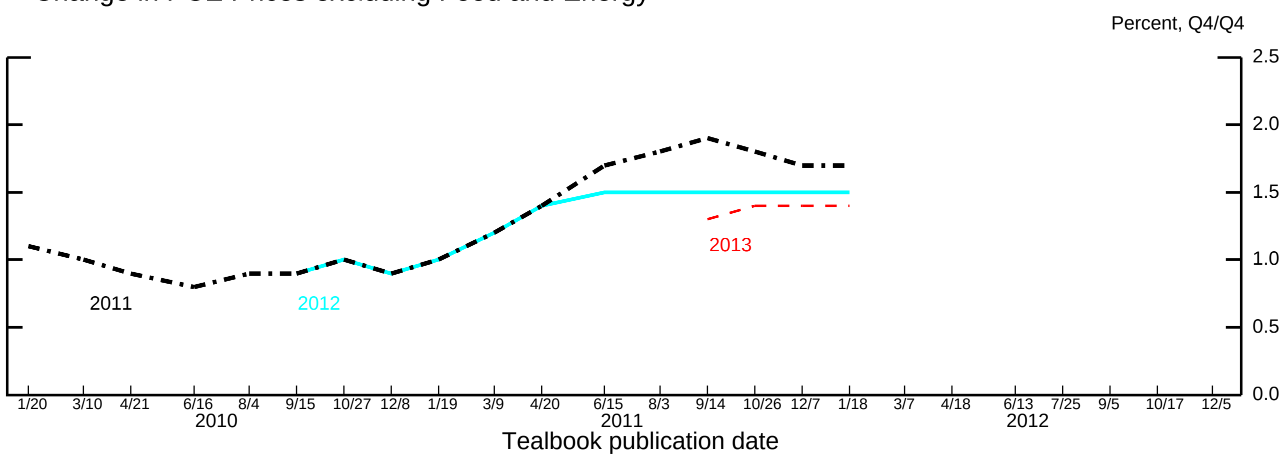
Change in Real GDP



Unemployment Rate



Change in PCE Prices excluding Food and Energy



International Economic Developments and Outlook

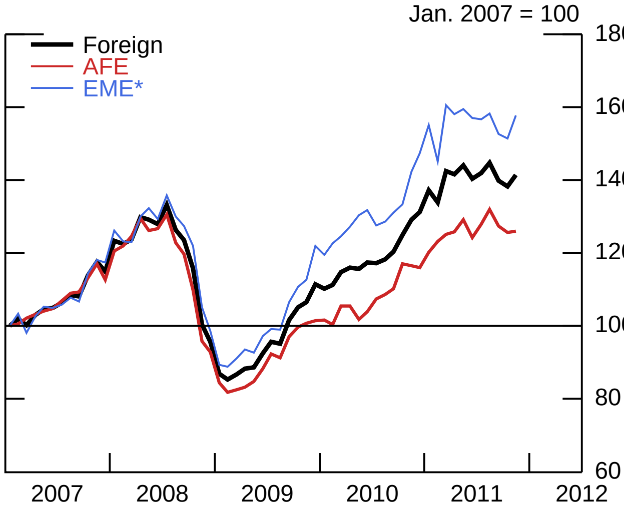
Incoming data point to a substantial deceleration of foreign economic activity during the last quarter. We now estimate that economic growth abroad stepped down from an annual pace of 3½ percent in the third quarter to 2 percent in the fourth, a bit lower than projected in the December Tealbook. This slowdown reflects a number of factors. First, economic growth in several of our key trading partners—Canada, China, Japan, and Mexico—had been running unusually fast in the third quarter and some slowing was anticipated. Second, financial stresses and fiscal consolidation appear to be pushing the euro area into recession. Third, the weakness in the euro area has spilled over to the United Kingdom and contributed to lower external demand in a number of other economies. Finally, the floods in Thailand led to an even deeper plunge in activity in that country than we anticipated and also restrained activity in some other Asian economies through supply chain linkages.

Our outlook for foreign activity over the next two years is little changed, with aggregate growth abroad projected to be only 2½ percent this year—a pace well below trend—and then 3 percent in 2013. The contour of our outlook represents a combination of rather different trajectories across different regions of the world. In emerging Asia, Chinese growth remains at about 8 percent and growth in the rest of the region returns to a near-trend pace as the adverse effects of the floods in Thailand abate. Economic growth in Latin America should also stay reasonably solid this year and next. Conversely, in the euro area, we continue to believe that substantial obstacles remain to a quick resolution of the crisis, and we see output contracting through the end of the year, with only a meager recovery in train next year.

To be sure, the tone of European financial conditions appears to have improved somewhat since the time of the December Tealbook, with short-term funding pressures having eased and sovereign bond spreads for peripheral economies having declined, at least for shorter maturities. Even S&P's sovereign debt downgrades for several euro-area economies, announced a few days ago, had little adverse effect, suggesting that these downgrades had largely been priced in. Nevertheless, European financial markets remain stressed, and the cumulative effect of the crisis on credit extension and confidence will undoubtedly continue to weigh on economic activity in the region. Moreover, although the provision of ample liquidity by the ECB has helped stabilize the situation, little other

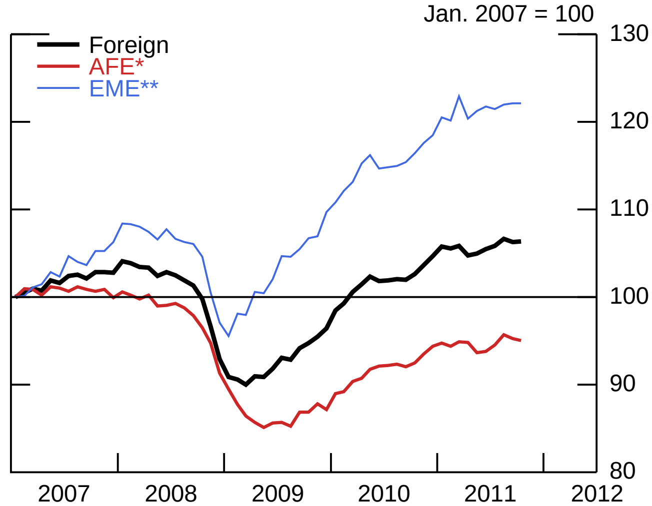
Recent Foreign Indicators

Nominal Exports



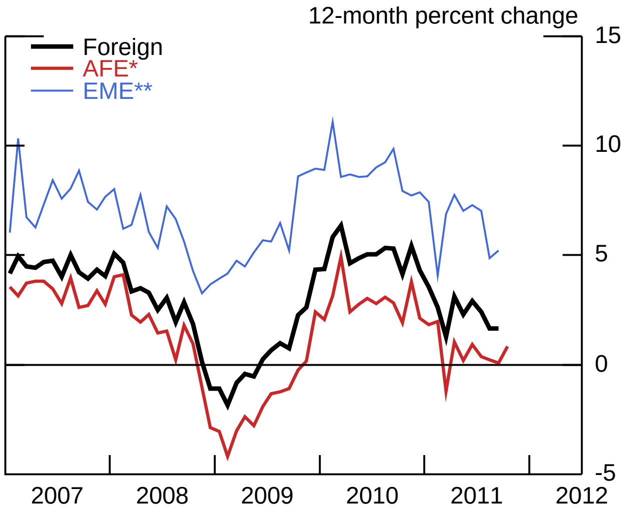
* Excludes Venezuela.

Industrial Production



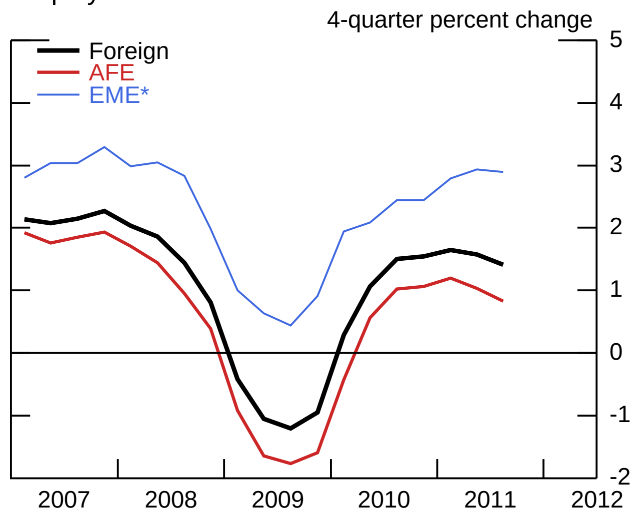
* Excludes Australia and Switzerland.
** Excludes Colombia, Hong Kong, Philippines, and Venezuela.

Retail Sales



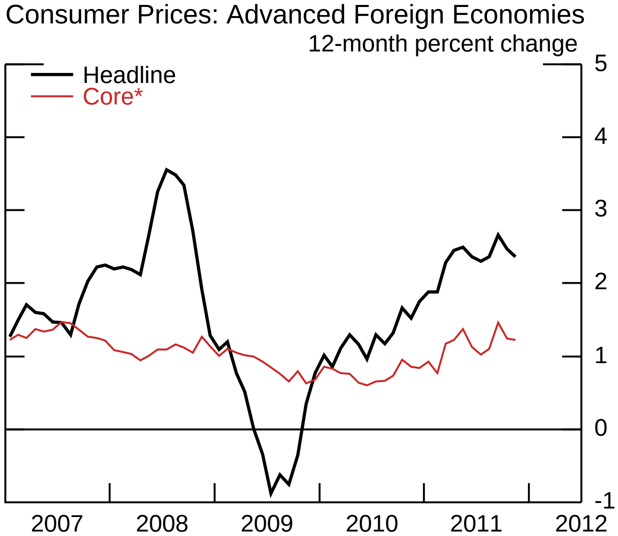
* Excludes Australia and Switzerland.
** Includes Brazil, China, Israel, Korea, Singapore, and Taiwan.

Employment



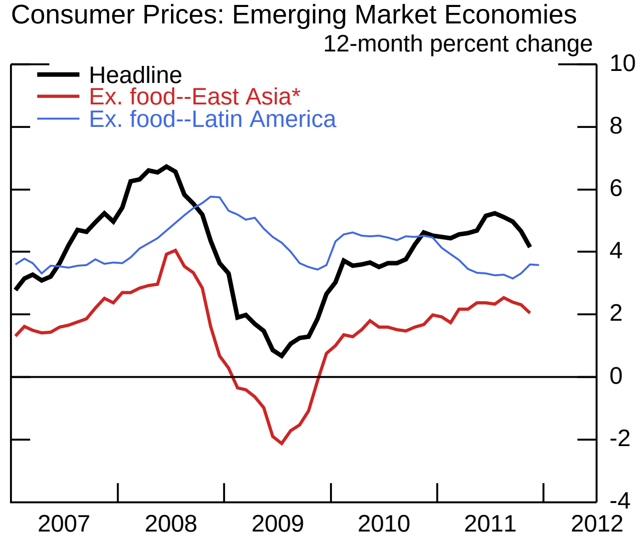
* Excludes Argentina and Mexico.

Consumer Prices: Advanced Foreign Economies



Note: Excludes Australia, Sweden, and Switzerland.
* Excludes all food and energy; staff calculation.
Source: Haver Analytics and CEIC.

Consumer Prices: Emerging Market Economies



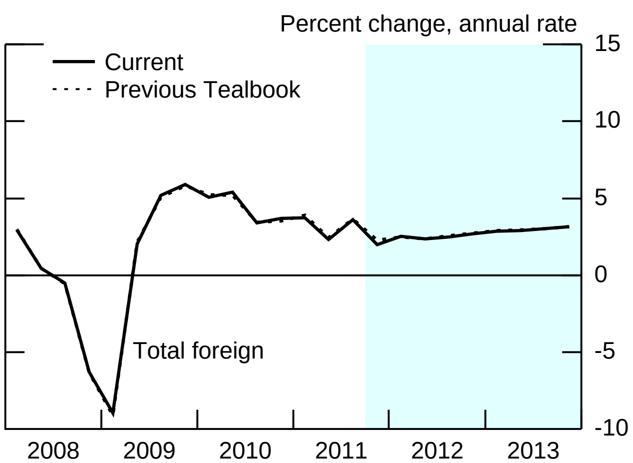
The Foreign Outlook

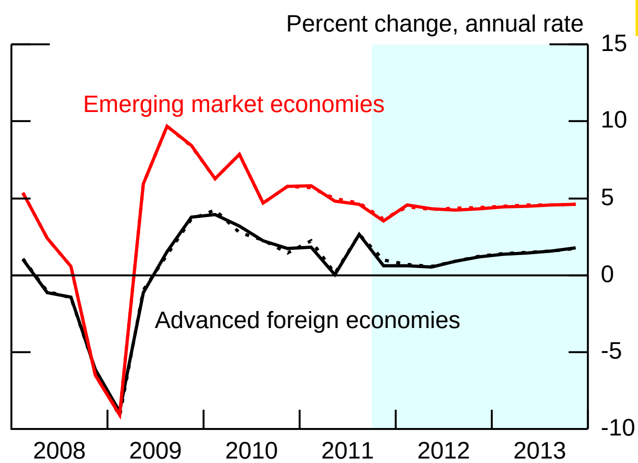
(Percent change, annual rate)

	2011			2012			
	H1	Q3	Q4	Q1	Q2	H2	2013
Real GDP							
Total foreign	3.0	3.6	2.0	2.5	2.3	2.6	3.0
Previous Tealbook	3.2	3.6	2.3	2.5	2.4	2.7	3.0
Advanced foreign economies	.9	2.7	.6	.6	.5	1.1	1.5
Previous Tealbook	1.2	2.7	1.0	.7	.6	1.1	1.6
Emerging market economies	5.3	4.6	3.5	4.6	4.3	4.3	4.5
Previous Tealbook	5.3	4.7	3.7	4.4	4.3	4.4	4.6
Consumer Prices							
Total foreign	3.7	3.1	3.1	2.3	2.4	2.3	2.3
Previous Tealbook	3.7	3.1	3.5	2.6	2.3	2.2	2.3
Advanced foreign economies	2.7	1.0	2.8	1.6	1.2	1.3	1.1
Previous Tealbook	2.7	1.1	2.9	1.4	1.1	1.1	1.1
Emerging market economies	4.6	4.6	3.3	3.0	3.3	3.1	3.2
Previous Tealbook	4.6	4.6	3.9	3.6	3.2	3.1	3.2

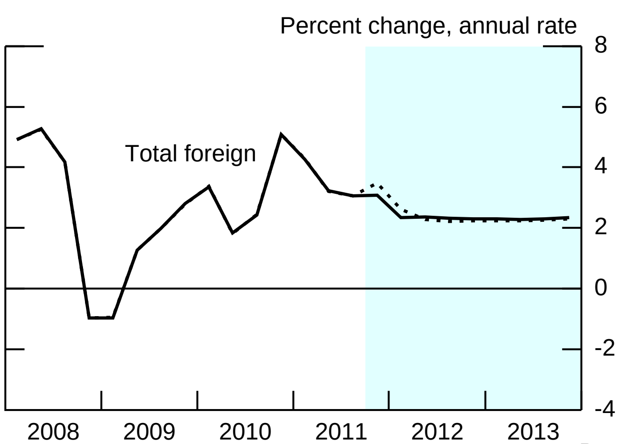
Note: Annualized percent change from final quarter of preceding period to final quarter of indicated.

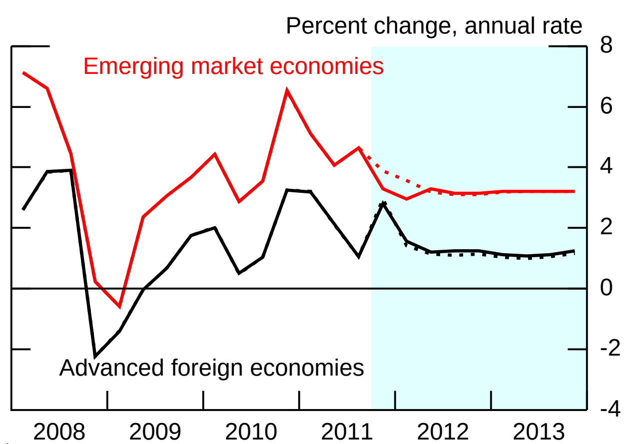
Real GDP





Consumer Prices





progress has been made to strengthen the firewalls needed to protect embattled European governments from a renewed run on their debt. Thus, a further deterioration of financial conditions in the region remains likely, not least because talks on Greek debt restructuring have so far failed to reach agreement, and we still do not see investor confidence starting to return until later this year after policymakers are forced to take stronger actions. Moreover, there remains some chance that financial conditions could deteriorate much more severely than we anticipate in our baseline projection. (See the “European Crisis with Severe Spillovers” scenario in the Risks and Uncertainty section.)

Inflation abroad held steady at an annual rate of a little more than 3 percent in the fourth quarter. This estimate is a bit lower than projected in the December Tealbook, largely reflecting a faster abatement of food price pressures in emerging market economies (EMEs), particularly in China. We expect foreign inflation to moderate further this year and next, to about 2¼ percent, as resource slack persists and as price pressures from previous increases in commodity prices continue to diminish. Since the time of the December Tealbook, most central banks left policy rates unchanged while the ECB and the Central Bank of Chile loosened monetary policy. In several foreign economies, further policy easing is expected.

Advanced Foreign Economies

We now estimate that real GDP in the advanced foreign economies (AFEs) rose at an annual pace of only about ½ percent in the fourth quarter, nearly ½ percentage point less than projected in the December Tealbook. In Japan and the United Kingdom, activity surprised on the downside; Japanese exports continued to fall and U.K. consumer and business confidence dipped to levels not seen since 2009. In the euro area, incoming data support our view that the region has entered a moderate recession. But the Canadian economy seems to be holding up better. Going forward, we continue to expect AFE growth to remain a lackluster ½ percent in the first half of 2012, held down by the euro-area recession, before picking up to a 1¾ percent pace by the end of 2013.

Headline inflation in the AFEs is estimated to have risen to an annual rate of 2¾ percent in the fourth quarter from a rate of 1 percent in the third. The acceleration in prices, which we had anticipated in the December forecast, largely reflected a series of temporary factors, which started unwinding toward the end of last year. Accordingly, we project that inflation will slow to 1½ percent in the first quarter and, reflecting persistent and substantial output gaps, average about 1¼ percent over the remainder of the forecast period. This forecast is a touch higher than projected in the previous Tealbook, reflecting a somewhat more elevated path for energy prices. Amid weak growth prospects and moderating inflation, we expect that the major foreign central banks will take additional measures to ease monetary policy conditions.

Euro Area

Recent indicators lead us to estimate that euro-area real GDP contracted at an annual rate of 1¼ percent in the fourth quarter, a bit more than expected in the December Tealbook. Preliminary indications are that German GDP contracted at nearly a 1 percent pace. More broadly, euro-area retail trade and industrial production fell further in November, and the unemployment rate, at 10.3 percent, remains at its highest level since June 1998. In December, economic sentiment edged down and the composite PMI stayed in contractionary territory, although the latter improved relative to previous months. However, we slightly reduced the magnitude of the projected contraction in 2012, as the recent depreciation of the euro is expected to boost euro-area exports. We now expect GDP to fall 1¼ percent in 2012, about ¼ percentage point less than previously anticipated, before increasing at a still-weak ½ percent pace in 2013.

Euro-area headline inflation spiked to an annual rate of about 4 percent in the fourth quarter from just 1¼ percent in the third, with the largest increases in categories most affected by a recent change in seasonal adjustment procedures. However, inflation in other categories remained subdued. Amid sizable resource slack, we expect inflation to come in just over 1½ percent this year and fall a bit further, to 1¼ percent, in 2013. At its December 8 meeting, the ECB cut its benchmark policy rate to 1 percent, lowered the required reserve ratio from 2 percent to 1 percent, eased collateral requirements for refinancing operations, and announced three-year longer-term refinancing operations for December 21 and February 29. At its January 12 meeting, the ECB left policy rates unchanged. We continue to expect that the ECB will keep its benchmark policy rate at 1 percent over the forecast period and provide significant liquidity support to banks, resulting in very low short-term market interest rates.

The ECB's actions in December contributed to the relative calm seen in European financial markets over the past month (see further details in the Financial Developments section). However, beyond the ECB's actions, EU leaders so far have done little to flesh out the policy measures announced in early December, which included strengthening fiscal rules and coordination, augmenting IMF resources, and introducing the permanent backstop facility, the European Stability Mechanism (ESM), in mid-2012, about a year earlier than originally planned.[1] Euro-area finance ministers have committed €150 billion in new bilateral loans to augment IMF resources, but it is unclear what other countries will contribute and how the IMF will handle the new resources. The ESM appears on track for introduction by midyear, but that will do little to expand EU financial backstops given the €500 billion combined ceiling on the European Financial Stability Facility (EFSF) and the ESM; so far, German officials have resisted raising that ceiling. In response to concerns about policy weaknesses, in mid-January S&P downgraded the sovereign debt ratings of Austria, France, several other European countries, and the EFSF, further weakening the firewall intended to contain financial contagion.

We assume that, in the absence of an effective firewall, any number of adverse shocks will cause financial conditions in the euro area to start deteriorating again. One near-term source of risk is the contentious negotiations between the Greek government and its creditors over the "voluntary" write-down of Greek debt; should these talks fail to result in an agreement, additional EU–IMF funding could be jeopardized, raising the likelihood of a disorderly default. We anticipate that a further steep deterioration in market conditions would force policymakers to eventually overcome domestic political constraints and take more aggressive actions to stabilize the situation, but that investor confidence would be restored only gradually thereafter.

Japan

Real GDP growth in Japan is estimated to have declined sharply from an annual rate of 5½ percent in the third quarter to just ½ percent in the fourth. Much of this slowdown was anticipated in the December Tealbook, reflecting the waning of the rebound from the March earthquake and tsunami, the effects on parts supplies of the floods in Thailand, and the appreciation of the yen. However, incoming data on household spending and exports point to a sharper slowdown than we had anticipated, in part because of a bigger effect from the floods than we had previously built in. As a result, we lowered our fourth-quarter growth estimate by 1½ percentage points. We project that real GDP growth will rebound to 2¾ percent in the current quarter, somewhat

[1] The ESM, which was originally intended to replace the European Financial Stability Facility on its expiration in 2013, is designed to channel liquidity to euro-area governments whose access to market financing is impaired.

higher than in the December Tealbook. Beyond the first quarter, growth should average roughly 1½ percent through the end of 2013.

As expected, prices resumed their decline in November, supporting our estimate that inflation was negative ½ percent in the fourth quarter. We project deflation to persist amid sizable output gaps. Given the weak outlook for both output and inflation, we anticipate that the Bank of Japan will further expand the size of its asset purchase program. With the budget deficit projected to rise to nearly 9 percent of GDP this year, the Noda administration is pushing for a hike in the value-added tax (VAT) to begin restoring fiscal sustainability, although we do not assume such a hike over the forecast period.

United Kingdom

In the United Kingdom, recent data on activity have been markedly weak, prompting us to lower our estimate for fourth-quarter real GDP growth by ¾ percentage point to negative ¼ percent. In November, industrial production continued to decline and retail sales edged down. In addition, indicators of consumer and business confidence fell further. However, both the manufacturing and services PMIs moved up in December, suggesting that conditions improved toward year-end, and as a result, we carried forward only part of the fourth-quarter weakness. Even so, we now project that U.K. real GDP will rise only ½ percent in 2012, ¼ percentage point less than projected in the December Tealbook. In 2013, economic growth is projected to strengthen to a 1¾ percent pace, as financial conditions in Europe improve.

Higher utility prices pushed fourth-quarter inflation up to an annual rate of 4½ percent, a bit more than previously anticipated. However, with energy price inflation projected to moderate and core inflation already trending down, inflation should step down to 2 percent in the current quarter. Ample resource slack, along with our assumption of no further increases in the VAT, should keep inflation at an average of about 2 percent over the remainder of the forecast period. We continue to expect that the Bank of England, faced with a bleak outlook and adverse financial spillovers from the euro area, will increase the target for its asset purchase program from £275 billion to £400 billion during the first half of 2012.

Canada

We estimate that real GDP growth in Canada stepped down to an annual rate of 2 percent in the fourth quarter after a temporary surge in exports helped boost third-quarter GDP growth to 3½ percent. Monthly real GDP for October was unchanged from the previous month, but the manufacturing PMI edged up in December and points to positive, albeit moderate, growth. We expect GDP growth to hover around 2 percent over the forecast period, a bit lower than in the previous Tealbook, reflecting the downward revision to the path of U.S. activity.

We estimate that headline inflation moved up temporarily to an annual rate of 3½ percent in the fourth quarter from only 1 percent in the previous quarter, largely reflecting the removal of car price discounts announced last summer. Inflation should average 2 percent in 2012 and 1¾ percent in 2013, a touch more than in the December Tealbook given the higher path for oil prices. In view of sizable output gaps and moderating inflation, we continue to expect that the Bank of Canada will keep its main policy rate at 1 percent through the end of 2013.

EMERGING MARKET ECONOMIES

We estimate that real GDP growth in the EMEs stepped down to an annual rate of 3½ percent in the fourth quarter from a 4½ percent pace in the third. This deceleration reflected a slowdown in both China and Mexico to a more sustainable pace, a weakening of export demand in Asia, and flooding and related supply chain disruptions in Thailand and its trading partners. We continue to project an acceleration of EME activity in the current quarter, to a pace of 4½ percent, partly reflecting recovery from the effect of the floods in Thailand. Growth is then projected to remain near that rate over the remainder of the forecast period, with some strengthening in 2013 as the recovery in the advanced economies gains traction.

Incoming data suggest that headline inflation moderated to an annual rate of 3¼ percent in the fourth quarter; this decline was somewhat more than anticipated at the time of the December Tealbook and was concentrated in China, where food prices retreated faster than expected. We continue to project that EME inflation will move down a bit more as the effects of earlier increases in food prices dissipate further. With concerns about slowing global growth balanced by worries about currency depreciation, many EME central banks have kept monetary policy on hold since the December Tealbook; a notable exception was the Central Bank of Chile, which, despite 12-month inflation moving above its target range in December, loosened policy in response to concerns about domestic economic growth.

China

Chinese real GDP growth declined from 9½ percent in the third quarter to 8¼ percent in the fourth, in line with our forecast in the December Tealbook. Domestic demand remained robust, with retail sales and fixed-asset investment continuing to grow at close to their third-quarter pace, but the trade surplus fell sharply as imports rose more than exports. For the year as a whole, the trade surplus was $155 billion, down from $182 billion in 2010. Consumption and gross capital formation each contributed about half of China's economic growth of 9 percent in 2011, with net exports exerting a slight drag. Looking forward, we project that Chinese real GDP will continue to grow at about an 8 percent pace this year and next—somewhat below our estimate of potential—with domestic demand remaining solid but external demand relatively weak. This outlook is little changed from the December projection; we continue to believe that Chinese authorities have sufficient scope for policy action to avoid a hard landing should demand slow by more than we currently anticipate.

Chinese headline consumer price inflation stepped down to 1¾ percent at an annual rate in the fourth quarter from 6¼ percent in the third, reflecting a decline in food prices following large increases earlier in the year. As food prices bottom out, inflation is expected to hover around 3 percent over the next two years. With inflation beginning to moderate, Chinese authorities loosened monetary policy in late November by cutting bank reserve requirements, and bank lending accelerated in December.

Other Emerging Asia

Elsewhere in emerging Asia, we estimate that growth slowed to an annual rate of only 1¼ percent in the fourth quarter, about 1 percentage point lower than we had projected in the December Tealbook. The slowdown in growth can be primarily attributed to temporary disruptions to regional supply chains resulting from the October floods in Thailand, which caused domestic output to plunge even more than we had projected. In addition, output in Singapore contracted surprisingly sharply because of a decline in the production of high-tech goods, and external demand was weaker throughout the region. As output in the region recovers from the floods, growth this year should pick up to about 4 percent, a bit lower than previously projected owing to weaker exports, and increase to 4½ percent next year as demand from Europe starts to recover.

Inflation in the region remained at about 3½ percent in the fourth quarter, and we expect it to edge down to about 3¼ percent for the remainder of the forecast period. Since the December Tealbook, mounting concerns over the growth outlook have prompted the Reserve Bank of India to refrain from further tightening of monetary policy despite persistently high 12-month inflation of about 9 percent.

Latin America

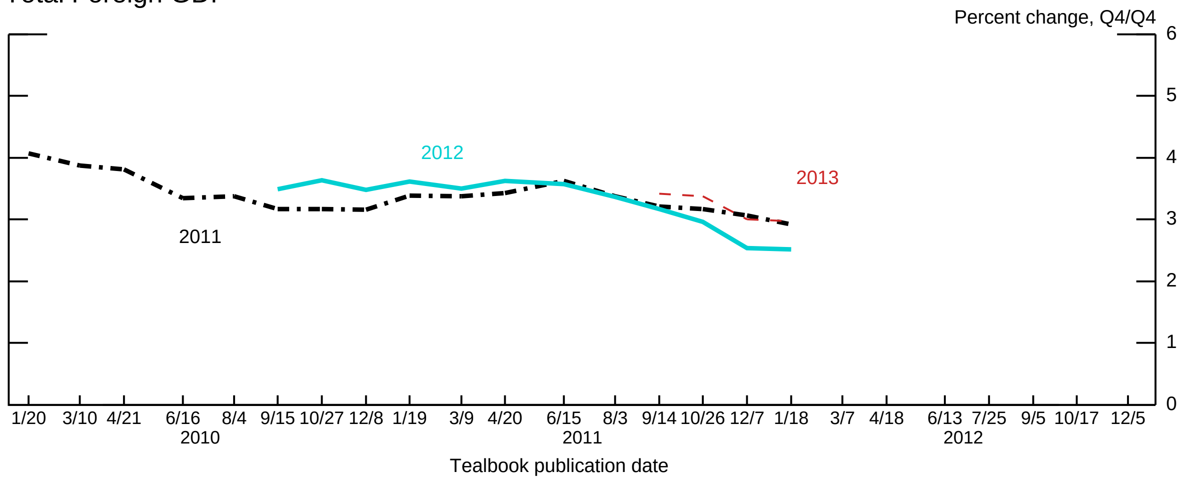
We estimate that Mexican real GDP grew at a 3½ percent annual rate in the fourth quarter, a large step-down from the previous quarter but ½ percentage point higher than projected in the December Tealbook. Our upward revision reflects better-than-expected U.S. industrial production data. Looking forward, the revised contour of U.S. industrial production has led us to increase growth in Mexico in the near term and mark it down further out, but these revisions have left average Mexican growth for this year and next about unchanged from the December Tealbook at about 3 percent.

On balance, growth in South America is estimated to have remained steady at an annual rate of 2¾ percent in the fourth quarter. Incoming data suggest that Brazil's economy, which stalled in the third quarter, perked up a bit in the fourth, in line with our expectations. However, this improvement has been offset by a deceleration of activity elsewhere in South America. Our outlook for the region is little changed from the December Tealbook, with growth rising to about 3½ percent by next year, as monetary policy easing supports Brazil's recovery and the global economy strengthens.

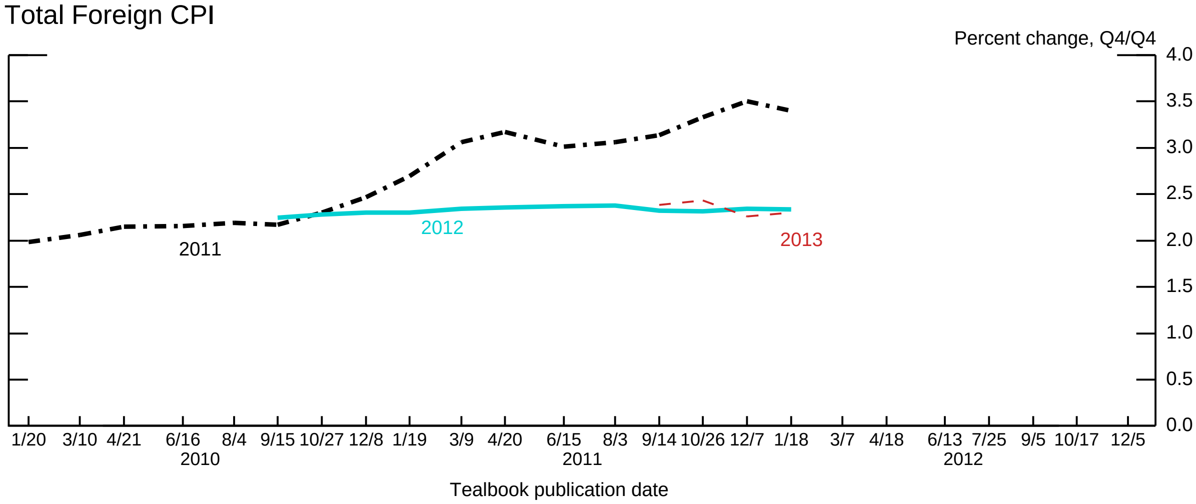
Recent data suggest that headline inflation in Latin America increased to an annual rate of 5½ percent in the fourth quarter from 3½ percent in the third, in part because of a weather-related rise in food prices and the removal of an electricity subsidy in Mexico. We expect these effects to dissipate going forward, which should bring inflation for the region back down to about 3¾ percent by midyear. Of note, Brazilian inflation has fallen to the upper bound of 6½ percent of the central bank's target range, giving authorities some scope to loosen monetary policy further.

Evolution of Staff's International Forecast

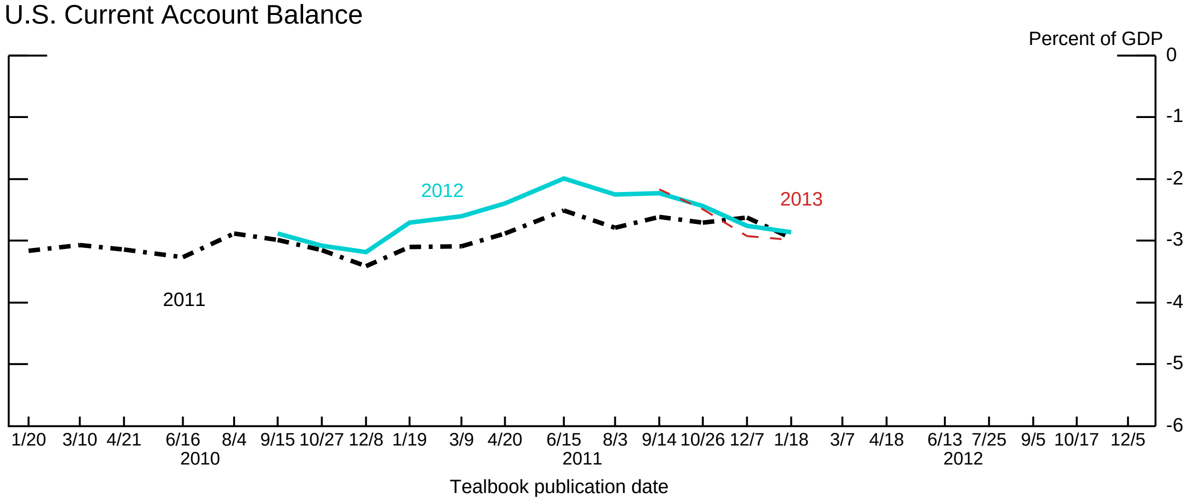
Total Foreign GDP



Total Foreign CPI



U.S. Current Account Balance



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Financial Developments

Conditions in financial markets improved somewhat over the intermeeting period, with stock prices higher, risk spreads in several markets narrower, and measures of actual and implied volatility generally down. Nonetheless, with doubts persisting about the prospects for a durable solution to the European fiscal and banking problems, the European situation continued to be a central concern for investors. Term Libor–OIS spreads remained elevated, with dollar funding pressures especially notable for European banks.

On balance over the period, policy expectations edged down, longer-dated Treasury yields declined, and inflation compensation was relatively little changed. Meanwhile, financing conditions for large nonfinancial businesses generally remained favorable, as net debt financing was strong and C&I lending continued to expand in December. Credit conditions for households were mixed. Consumer credit increased robustly in November, but mortgage refinancing activity remained subdued amid tight lending conditions despite mortgage rates that hovered near record-low levels. Portfolio-weighted responses to the January Senior Loan Officer Opinion Survey on Bank Lending Practices (SLOOS) indicated that, in the aggregate, loan demand strengthened slightly and lending standards eased a bit further in the fourth quarter (see appendix).

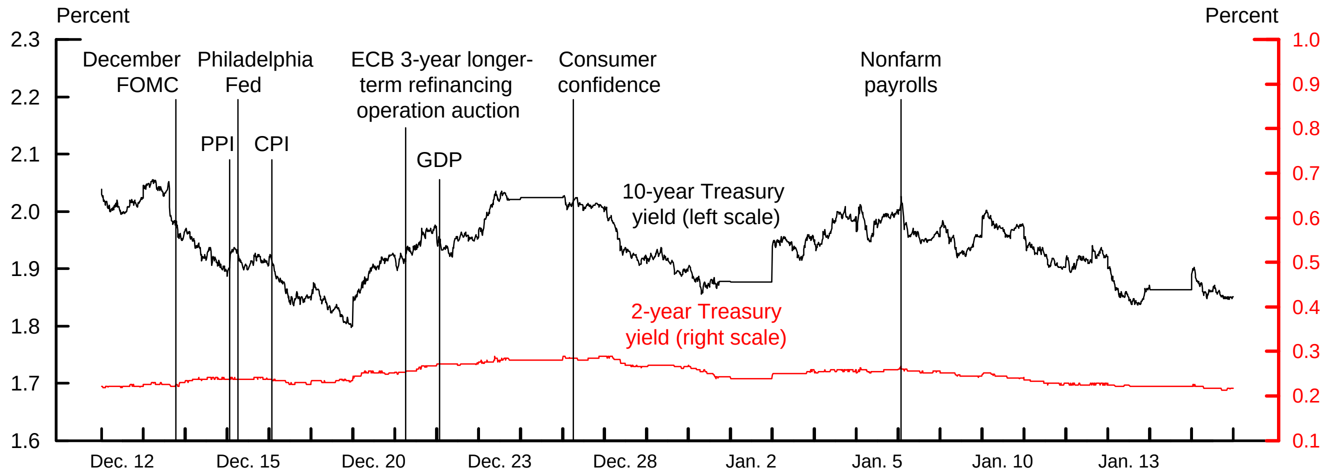
Policy Expectations and Treasury Yields

FOMC communications during the period were largely in line with market expectations and had limited effects on financial markets. That said, investors were somewhat surprised by the announcement that the Summary of Economic Projections to be published with the minutes of the January FOMC meeting will include FOMC participants’ projections of the path of the federal funds rate as well as their qualitative expectations for the Federal Reserve’s balance sheet.

Over the intermeeting period, the date at which the expected federal funds rate implied by OIS rates first rises above its current 0 to ¼ percent target range moved out one quarter to the first quarter of 2014, and the mean path of the policy rate for 2014 and

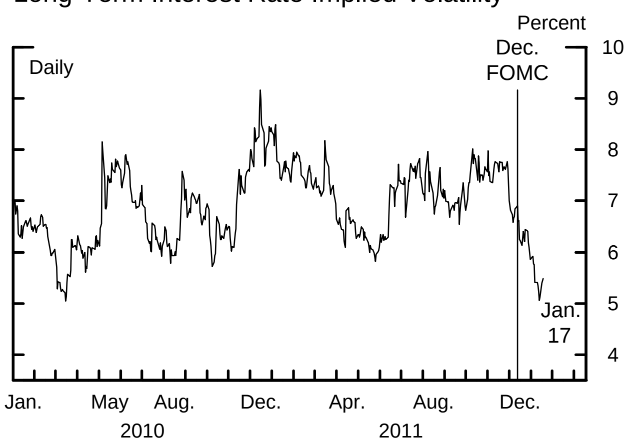
Policy Expectations and Treasury Yields

Selected Interest Rates



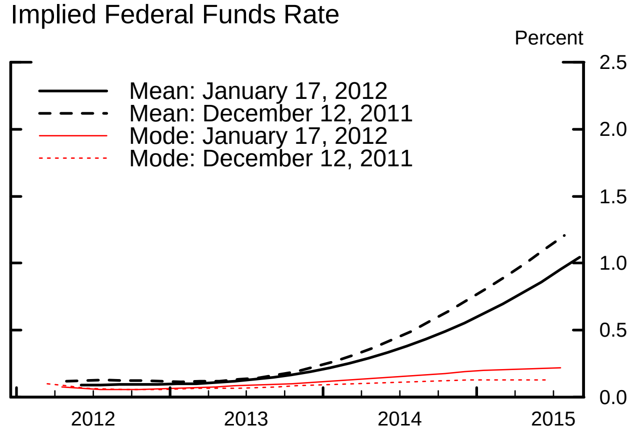
Note: 5-minute intervals. 8:00 a.m. to 4:00 p.m. No adjustments for term premiums.
Source: Bloomberg.

Long-Term Interest Rate Implied Volatility



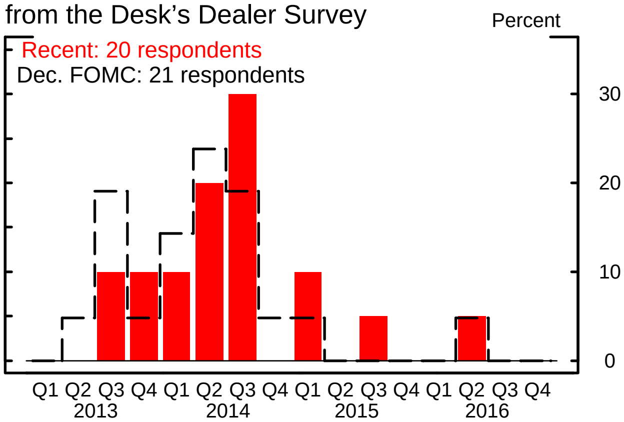
Note: Derived from options on 10-year Treasury note futures.
Source: Bloomberg.

Implied Federal Funds Rate



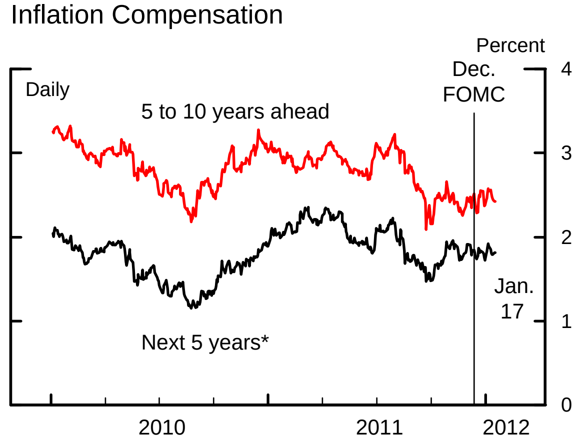
Note: Mean is estimated using overnight index swap quotes. Mode is estimated from the distribution of federal funds rate implied by interest rate caps. Both include a term premium of zero basis points per month.
Source: Bloomberg and CME Group.

Distribution of Modal Timing of First Rate Increase from the Desk's Dealer Survey



Source: Desk's Dealer Survey from January 17, 2011.

Inflation Compensation



Note: Estimates based on smoothed nominal and inflation-indexed Treasury yield curves.
*Adjusted for the indexation-lag (carry) effect.
Source: Barclays PLC and staff estimates.

beyond decreased 6 to 26 basis points.[1] The modal path of expected policy rates derived from quotes on interest rate caps remained within the current target range through the end of 2015.

Results from the Open Market Desk's latest survey of primary dealers also suggested that the respondents had pushed back slightly the expected timing of tightening. Respondents viewed the third quarter of 2014 as the most likely time for liftoff of the federal funds rate, one quarter later than indicated in the December survey. In response to questions about possible options for easing, dealers assigned a 70 percent probability to the Committee making changes to its forward guidance regarding the federal funds rate at the January meeting and a 40 percent probability to the Committee providing guidance on the size of the SOMA portfolio. Many dealers indicated that they expected the "mid-2013" reference in the FOMC's statement to be updated or removed given the publication of FOMC meeting participants' federal funds rate projections in the Summary of Economic Projections. Dealers modestly revised down, from 60 percent to 55 percent, the likelihood assigned to an expansion of the SOMA portfolio through securities purchases within one year.

The decline in the expected path for the federal funds rate was reflected in Treasury yields, which fell over the intermeeting period, particularly at intermediate and longer maturities. Staff term-structure models suggest that a narrowing in term premiums also contributed to the move in Treasury yields, consistent with the reduction in long-term interest rate implied volatilities over the period. TIPS- and swaps-based measures of inflation compensation were relatively little changed, on net, despite an appreciable rise in energy prices.

The Desk's outright purchases and sales of Treasury securities under the maturity extension program continued to be generally well received and did not appear to have any adverse effect on Treasury market functioning.[2] Trading volumes were thin in December, as is typical at that time of the year, but other measures of Treasury market liquidity remained stable.

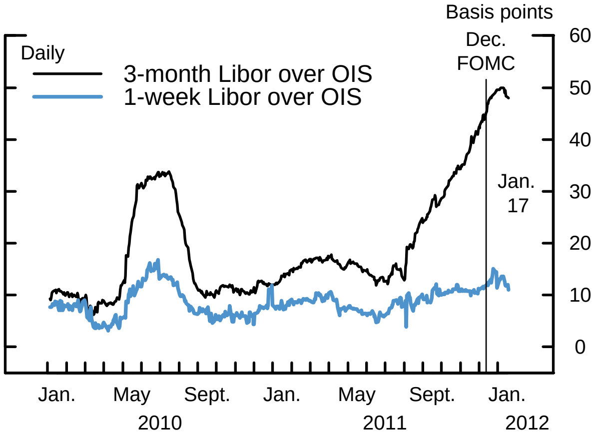
[1] The effective federal funds rate averaged 7 basis points over the intermeeting period, with the intraday standard deviation averaging 5¼ basis points.

[2] As of January 17, 2012, the Desk had sold $162 billion of short-term Treasury securities and purchased $149 billion of long-term securities under the maturity extension program.

Short-Term Funding Markets and Financial Institutions

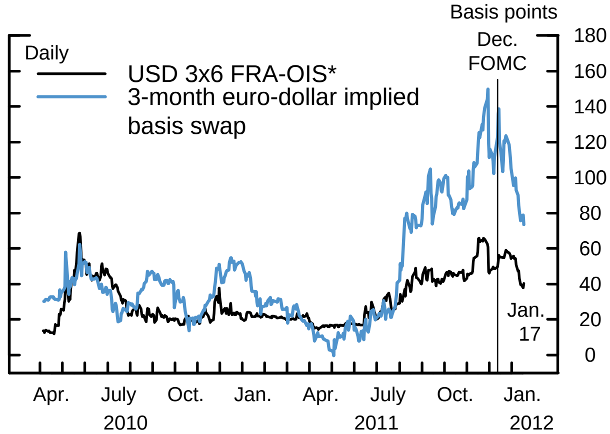
Financial Developments

Selected Interest Rate Spreads



Source: Bloomberg.

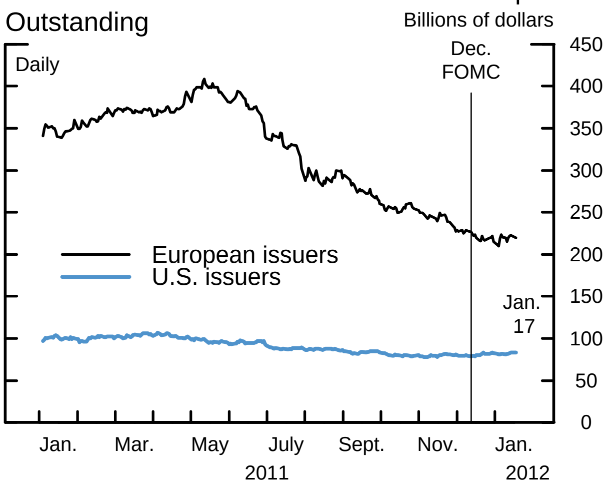
Dollar Funding Spreads



*Spread is calculated from a Libor forward rate agreement (FRA) 3 to 6 months in the future and the implied forward overnight index swap (OIS) rate for the same period.

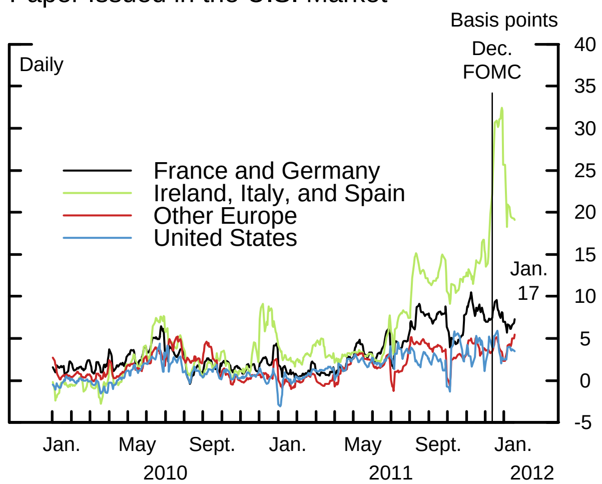
Source: Bloomberg; staff estimates.

Unsecured Dollar Financial Commercial Paper Outstanding



Source: Depository Trust & Clearing Corporation.

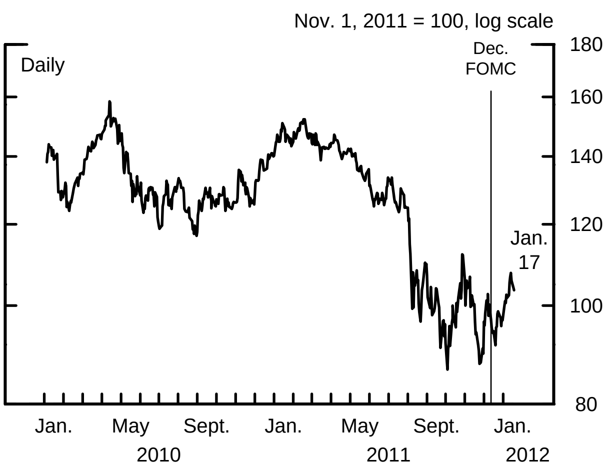
Spreads on Unsecured Financial Commercial Paper Issued in the U.S. Market



Note: 5-day moving average. Spreads computed over the AA nonfinancial unsecured rate.

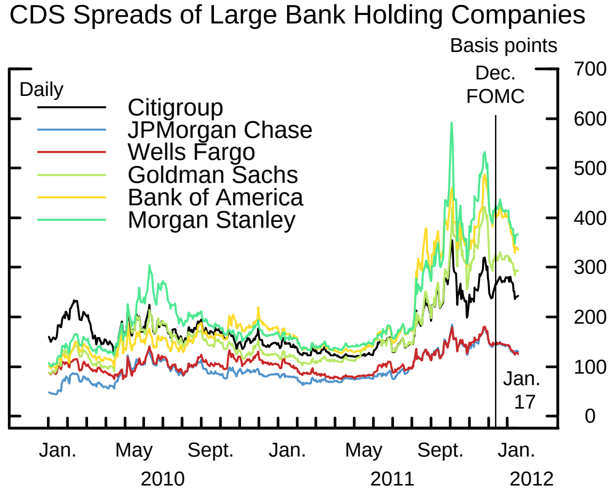
Source: Depository Trust & Clearing Corporation.

S&P 500 Diversified Financials Stock Price Index



Source: Bloomberg.

CDS Spreads of Large Bank Holding Companies



Source: Markit.

SHORT-TERM DOLLAR FUNDING MARKETS AND FINANCIAL INSTITUTIONS

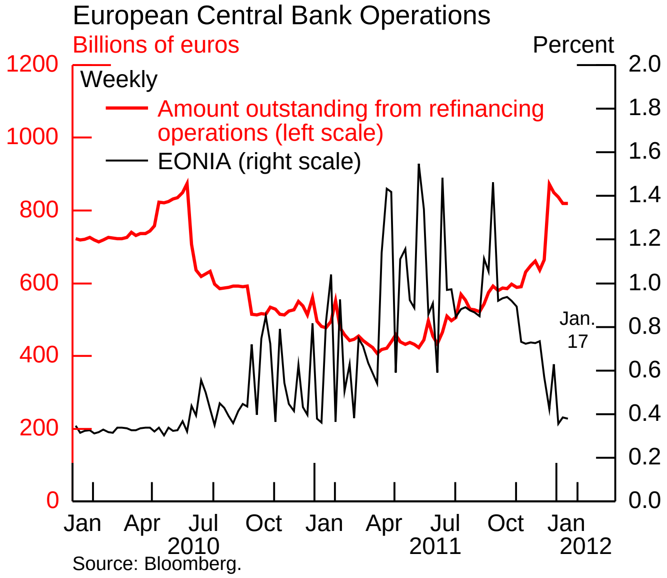
U.S. financial institutions reportedly maintained ready access to short-term funding markets, and there were few signs of dislocations in funding markets over year-end. European banks continued to face dollar funding pressures, and spreads between Libor and OIS rates remained elevated; on net over the period, the three-month Libor–OIS spread widened a touch further while spreads at shorter maturities were little changed. The spread between the forward rate agreement three to six months ahead and the corresponding forward OIS rate remained at a relatively high level but narrowed somewhat, a change that perhaps reflected an expectation for some moderation of these pressures.

U.S. financial institutions generally continued to issue commercial paper (CP) and negotiable certificates of deposit on terms typical of noncrisis periods. Outstanding unsecured CP issued in the United States by entities with European parents declined somewhat further, but the fraction of issuance by European entities occurring beyond very short-term maturities moved up a bit. Overnight spreads for unsecured CP issued by entities with French parents declined substantially following the reduction in the cost of dollar liquidity provided through central bank swap lines with the Federal Reserve, the implementation of the ECB's three-year longer-term refinancing operation (LTRO), and the passage of year-end. Meanwhile, spreads for issuers with parents from elsewhere in Europe or the United States remained comparatively low.

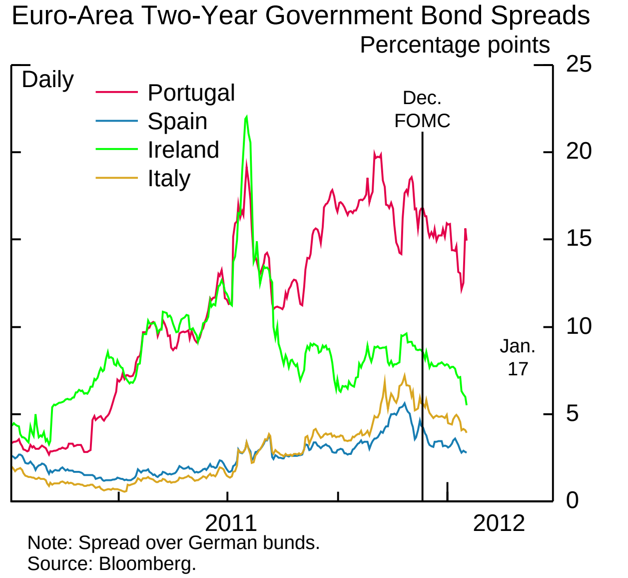
The general collateral repo market has continued to function normally, with no reports of unusual year-end pressures, and haircuts across collateral types appeared to be largely unchanged. Volume in the triparty repo market declined somewhat around year-end but revived in the first two weeks of 2012, buoyed by a pickup in the financing of Treasury securities. Spreads on overnight asset-backed commercial paper (ABCP) issued by entities with French parents stabilized at a high level, while spreads on overnight ABCP issued by firms with parents from elsewhere in Europe or the United States were stable at a low level.

Other indicators provided mixed evidence of strains in the financial system. Equity prices of most large domestic financial institutions outperformed the broader market, on net, over the intermeeting period. The initial wave of fourth-quarter earnings reports for large bank holding companies were mixed relative to market expectations, with poor capital market revenues weighing on the profits of institutions with significant

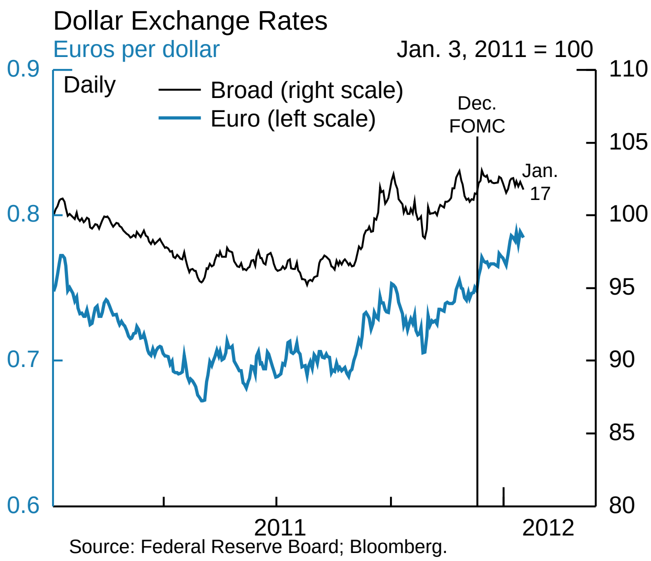
Foreign Developments



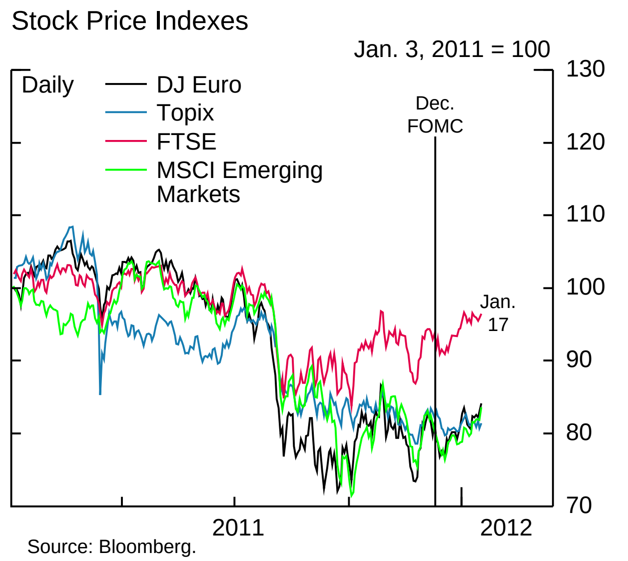
Source: Bloomberg.



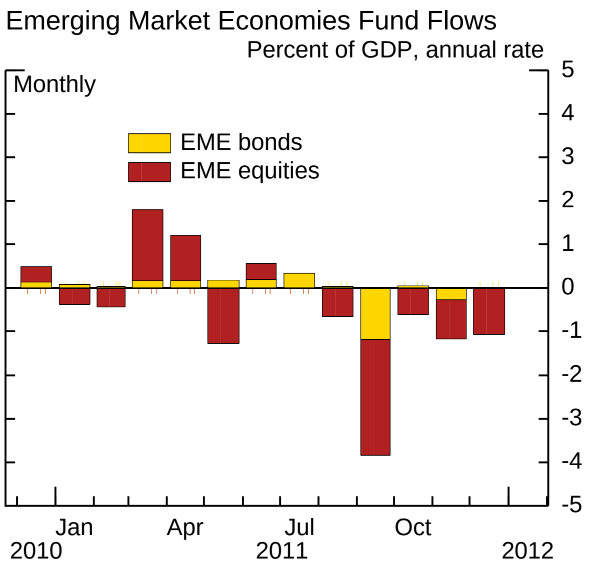
Note: Spread over German bunds.
Source: Bloomberg.



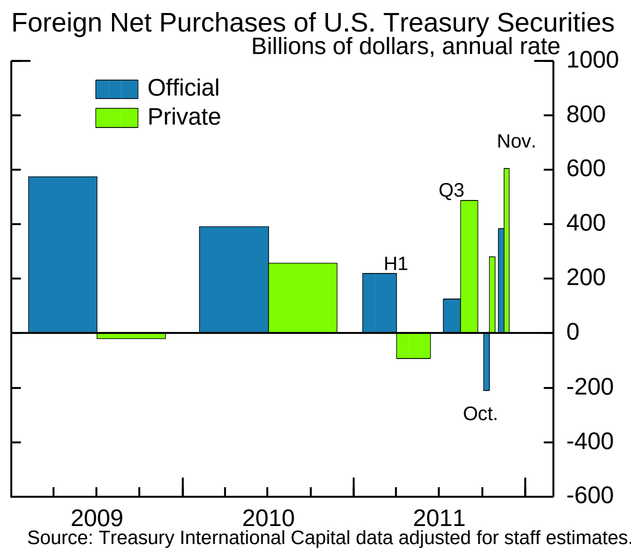
Source: Federal Reserve Board; Bloomberg.



Source: Bloomberg.



Source: EPFR Global.



Source: Treasury International Capital data adjusted for staff estimates.

Financial Developments

trading operations. The CDS spreads of most domestic large bank holding companies moved notably lower, although they remained at an elevated level. (See the box “Recent Developments in Counterparty Risk Management.”) Hedge fund valuations declined again during the intermeeting period. Overall for 2011, the HFRX Global Hedge Fund Index underperformed the S&P 500 stock index by about 8½ percent, though, on average, there were no signs of significant outflows from hedge funds.

Foreign Developments

During the intermeeting period, international financial markets were calmer than in previous months, as the financial pressures faced by most European sovereigns and financial institutions declined somewhat in the wake of ECB policy actions and in the absence of negative policy news coming out of Europe. However, doubts remained about the prospects for a durable solution to the European situation. Indeed, late in the period, difficulties resurfaced in the negotiations over Greek restructuring, and S&P downgraded the sovereign credit ratings of several euro-area nations.

The ECB’s three-year LTRO, announced a few days before the December FOMC meeting and implemented in mid-December, contributed to an easing of euro funding pressures, and overnight interbank euro interest rates declined from about 70 basis points to about 40 basis points following the LTRO. Euro-area institutions drew almost €500 billion in three-year funds while reducing their demand for ECB funding at shorter maturities. On net, the total provision of liquidity by the ECB increased about €200 billion. On January 4, the ECB allocated $26 billion in its second offering of three-month dollar funding since the reduction in the cost of dollar liquidity from central bank swap lines announced in late November. As of January 17, the ECB was providing dollar liquidity amounting to a bit more than $80 billion, up from almost $55 billion at the time of the December FOMC meeting. One gauge of dollar funding pressures in the euro area, the three-month euro–dollar implied basis spread, dropped about 50 basis points over the period; it is now 75 basis points lower than its level prior to the late November swap line announcement, but it remains elevated.

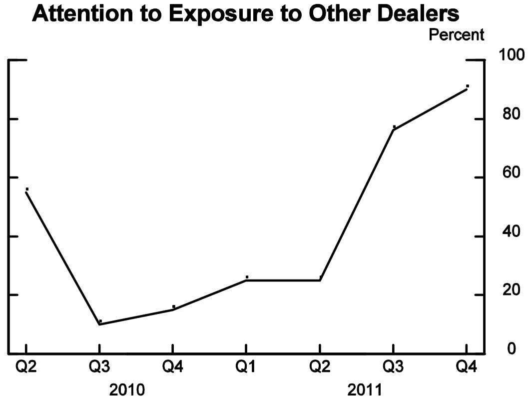
Spreads of yields on 10-year Italian government debt over those on German bunds were little changed over the intermeeting period, and spreads on Spanish debt declined 40 basis points. Spreads on 2-year Italian and Spanish debt declined roughly 150 basis points, and both Italy and Spain held successful debt auctions. Although the reasons for

Recent Developments in Counterparty Risk Management

During the past several months, market participants have become more concerned about the counterparty credit risks posed by financial institutions. For instance, in the two most recent Senior Credit Officer Opinion Surveys on Dealer Financing Terms (SCOOS), dealers indicated that they had increased the resources and attention devoted to management of concentrated exposures to dealers and other financial intermediaries over the previous three months (see lower-left figure below). Additionally, in the December SCOOS, most credit officers reported that their institutions had decreased counterparty credit limits for specific institutions; they generally pointed to a deterioration in the current or expected financial strength of other institutions and to increased strains in global financial markets as the most important reasons for having done so.

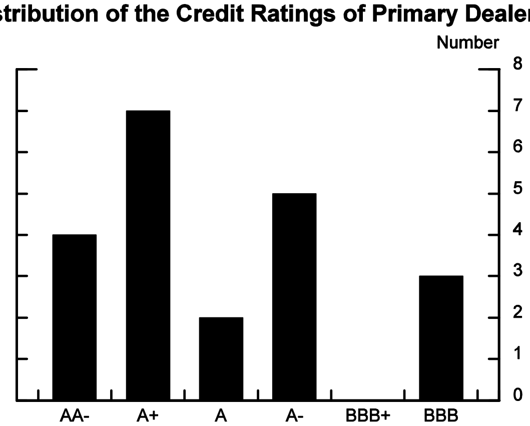
Conversations with market participants have provided additional information on the specific practices used to monitor exposures to financial institutions. Participants report monitoring indicators of counterparty risk across a range of distinct business areas—such as OTC derivatives markets, secured funding markets, and prime brokerage activities—but the procedures employed to evaluate the overall counterparty risk of other firms vary considerably. Most market participants report paying close attention to CDS spreads of their counterparties. Some institutions indicated that spreads of 500 to 600 basis points are triggers for more active management of exposures, for example through heightened scrutiny of new trades and more frequent valuation of positions. Market participants also report gauging the counterparty credit risk posed by a financial institution based on equity prices or measures of implied volatility in the equity options market. Industry contacts also suggest that perceptions of counterparty credit risk are quite sensitive to reports that other firms are not willing to accept novation of OTC trades from the institution in question or that others are seeking to novate trades away from that institution.

Net Fraction of Dealers Reporting Increased Attention to Exposure to Other Dealers



Source: Federal Reserve Board.

Distribution of the Credit Ratings of Primary Dealers



Source: Standard & Poor's.

In addition to carefully tracking the counterparty credit exposures they themselves face, major financial intermediaries—keenly aware of the speed with which confidence can diminish—have also reportedly stepped up their monitoring of requests from their own counterparties to close out positions, transfer margin collateral to third parties, and other indicators that would suggest heightened concerns regarding their own financial condition.

When implementing monetary policy, the Federal Reserve trades Treasury and agency securities with designated primary dealers, a group of broker–dealers that includes but is not limited to affiliates of major banks and securities firms and involves institutions with a range of credit ratings (see lower-right figure on the facing page). In recent months, the Federal Reserve has instituted new procedures to limit counterparty credit risk in its trading with primary dealers. In particular, the Federal Reserve established margin agreements with primary dealers on agency MBS forward transactions. These transactions typically settle one or more months forward, and thus fluctuations over that period in the market value of the securities purchased could impose costs on the Federal Reserve if a transaction needed to be replaced following the failure of a counterparty. In an effort to protect against these price fluctuations, the Federal Reserve now requires dealers to post an initial margin of 2.5 percent on agency MBS forward transactions; additional margins are required to be posted or margin is returned based on daily changes in market values. The margin requirements are one-sided—that is, the Federal Reserve is not required to provide collateral in the event that market prices move in the dealers' favor by more than the initial margin. Margins were set to cover potential price movements over a three-day expected replacement period with a very high degree of confidence. Margin requirements were initially imposed on MF Global as that firm's financial health worsened but were subsequently extended to all primary dealers.[1]

[1] Market values had moved so that the cost to the Federal Reserve to replace the transactions outstanding with MF Global when it defaulted was higher than the original price of the transactions. However, the margin posted by MF Global was sufficient to cover this cost difference.

the declines in spreads are not entirely clear, some market participants attributed them to the possible use of LTRO funds by banks to purchase shorter-term peripheral debt.

On January 13, S&P lowered the long-term ratings of nine euro-area countries. France and Austria were downgraded one notch to AA+, and Italy and Spain each received a two-notch downgrade. Following the sovereign actions, S&P downgraded the European Financial Stability Facility rating one notch to AA+. Overall market reaction to the ratings announcements was muted. Similarly, markets shrugged off news that negotiations over the terms of a voluntary private-sector debt exchange for Greece were temporarily suspended.

The broad index of the foreign exchange value of the dollar changed little, on net, over the intermeeting period. However, while the dollar depreciated some against most other currencies, it appreciated 3½ percent against the euro, likely owing in part to the deteriorating macroeconomic environment in the euro area and consequent market expectations for further easing of monetary policy by the ECB.

Foreign stock markets generally ended the period higher. European headline equity indexes rose 6½ percent, on net, and euro-area banking-sector share prices were little changed overall. However, shares of Italian bank UniCredit were down by about 40 percent over the period. This somewhat surprising decline followed the release of the terms of a previously announced rights offering and prompted concerns that other euro-area banks may be discouraged from seeking to raise further capital in the equity market.

Emerging market equity and bond funds continued to experience outflows, although the pace of such flows slowed in January. Rating agencies cut Hungary's sovereign debt rating to junk status, and Hungarian asset prices came under pressure.

Foreign private-investor demand for U.S. Treasury securities picked up notably in November, consistent with the general decrease in risk appetite at that time. Official inflows were also sizable, as foreign exchange intervention activity boosted official purchases of Treasury securities. Partial and confidential data on custody accounts at the Federal Reserve Bank of New York show a sharp decline in official holdings in December. Although some of this decline seems to reflect actual sales, it also appears that some official investors are shifting Treasury holdings to foreign custodians, and those holdings are not captured in either the TIC or the FRBNY data.

DOMESTIC ASSET MARKET DEVELOPMENTS

Broad equity price indexes increased more than 4½ percent, on net, over the intermeeting period, reflecting in part somewhat better-than-expected U.S. economic data releases and some easing in concerns about Europe. Option-implied volatility on the S&P 500 index declined to its lowest levels since July but remained well above its range in the first half of 2011. The staff's estimate of the spread between the expected real equity return for the S&P 500 index and the real 10-year Treasury yield—a gauge of the equity premium—remained extraordinarily wide.

Operating earnings per share for S&P 500 firms increased 8 percent in the third quarter, reflecting in part transitory gains for financial firms. Over the intermeeting period, bottom-up Wall Street forecasts for earnings in the fourth quarter fell a bit and now point to a small decline from third-quarter levels. An index of revisions to analysts' forecasts of year-ahead earnings for S&P 500 firms, which registered notable negative values starting last August, eased some for the four-week period ending in mid-December.

Yields on investment-grade corporate bonds declined a bit more than those on comparable-maturity Treasury securities. Yields on speculative-grade corporate bonds and their spreads to yields on Treasury securities decreased noticeably. Conditions in the secondary leveraged loan market were stable, with median bid prices about unchanged. On net, spreads of yields on A2/P2-rated unsecured CP issued by nonfinancial firms over yields on A1/P1-rated issues were about flat.

BUSINESS FINANCE

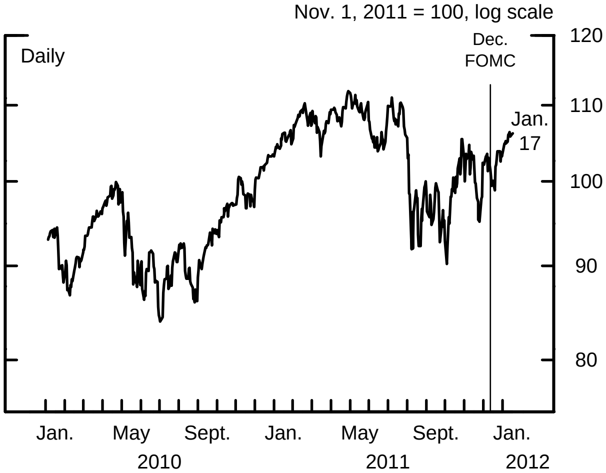
Net debt financing by nonfinancial corporations was solid overall in December. Bond issuance by investment-grade nonfinancial corporations was strong, though below its outsized November pace, while that by lower-rated firms slowed, likely owing in part to seasonal factors. Nonfinancial CP outstanding contracted somewhat amid moderate year-end pressures, and C&I loans posted solid growth. Issuance of leveraged loans was relatively modest in the fourth quarter compared with its robust pace earlier in the year.

Gross public equity issuance by nonfinancial firms continued to rebound in December from a slow third-quarter pace, boosted by previously withdrawn IPOs that were brought to market. Share repurchases and cash-financed mergers by nonfinancial

Domestic Asset Market Developments

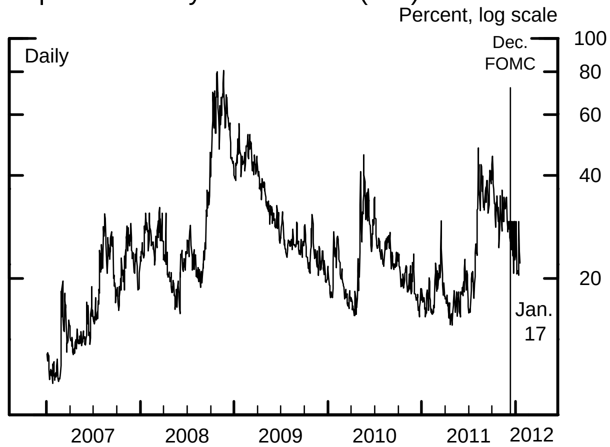
Financial Developments

S&P 500 Stock Price Index



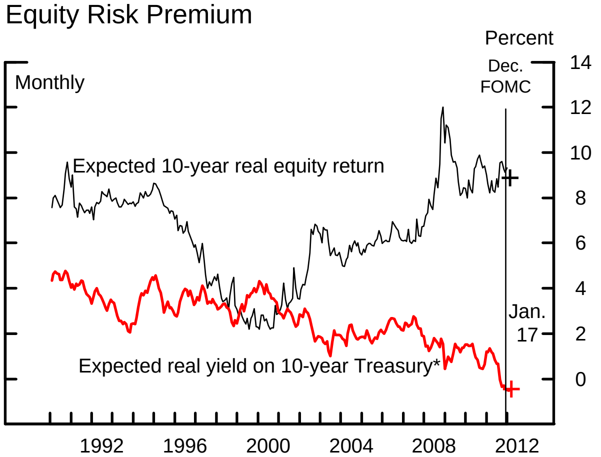
Source: Bloomberg.

Implied Volatility on S&P 500 (VIX)



Source: Chicago Board Options Exchange.

Equity Risk Premium

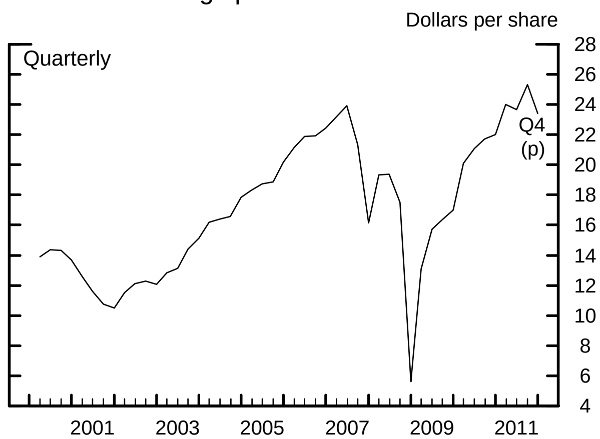


* Off-the-run 10-year Treasury yield less Philadelphia Fed 10-year expected inflation.

\+ Denotes the latest observation using daily interest rates and stock prices and latest earnings data.

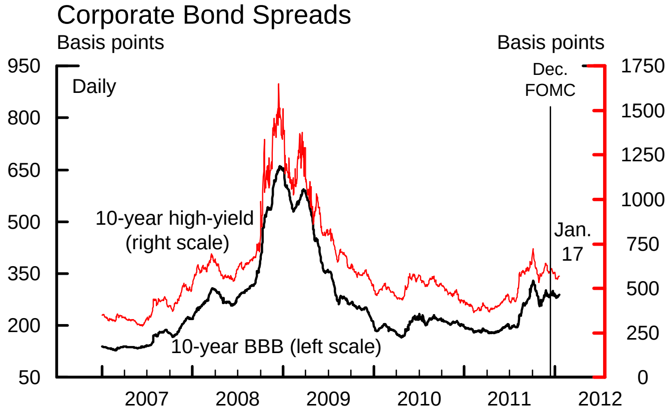
Source: Thomson Financial.

S&P 500 Earnings per Share



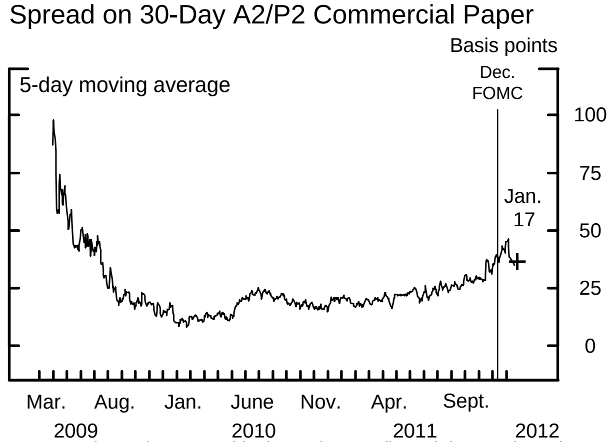
Note: Data are seasonally adjusted by staff.
p Preliminary.
Source: Thomson Financial.

Corporate Bond Spreads



Note: Measured relative to a smoothed nominal off-the-run Treasury yield curve.
Source: Merrill Lynch and staff estimates.

Spread on 30-Day A2/P2 Commercial Paper



Note: The A2/P2 spread is the A2/P2 nonfinancial rate minus the AA nonfinancial rate.

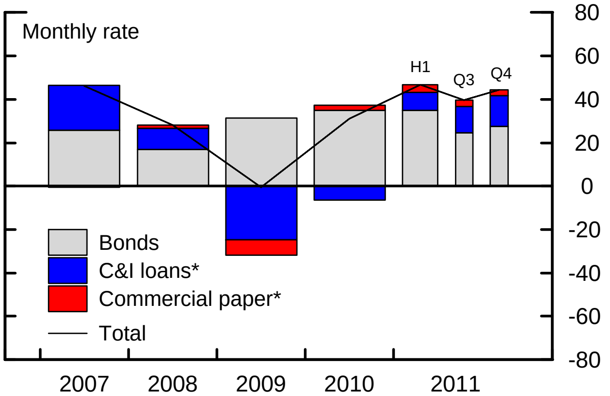
\+ Denotes the latest available single-day observation.

Source: Depository Trust & Clearing Corporation.

Business Finance

Selected Components of Net Debt Financing, Nonfinancial Firms

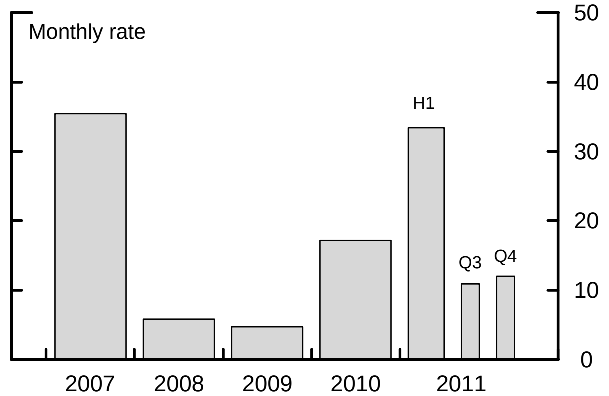
Billions of dollars



* Period-end basis, seasonally adjusted.
Source: Depository Trust & Clearing Corporation; Thomson Financial; Federal Reserve Board.

Gross Issuance of Institutional Leveraged Loans

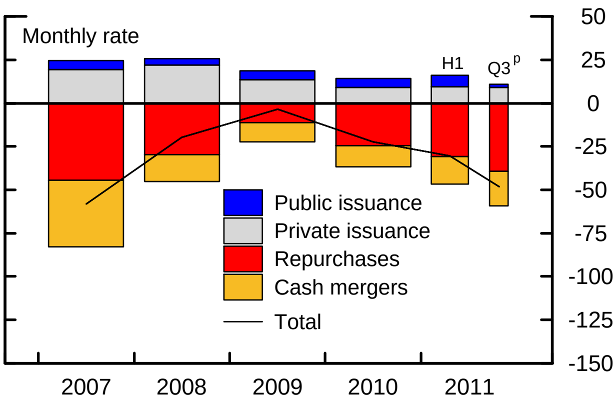
Billions of dollars



Source: Reuters Loan Pricing Corporation.

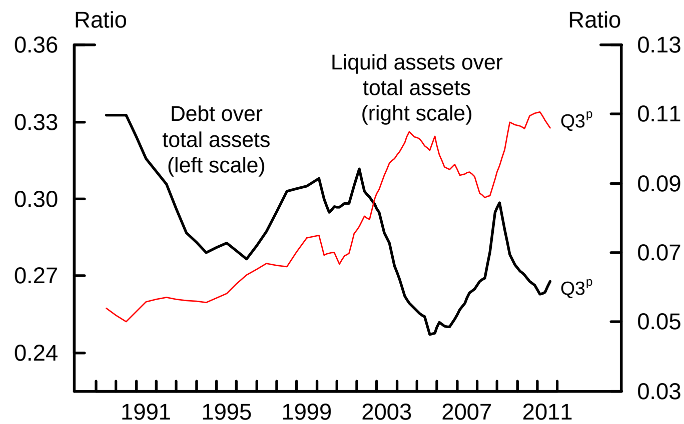
Selected Components of Net Equity Issuance, Nonfinancial Firms

Billions of dollars



p Preliminary.
Source: Thomson Financial, Investment Benchmark Report; Money Tree Report by PricewaterhouseCoopers, National Venture Capital Association, and Venture Economics.

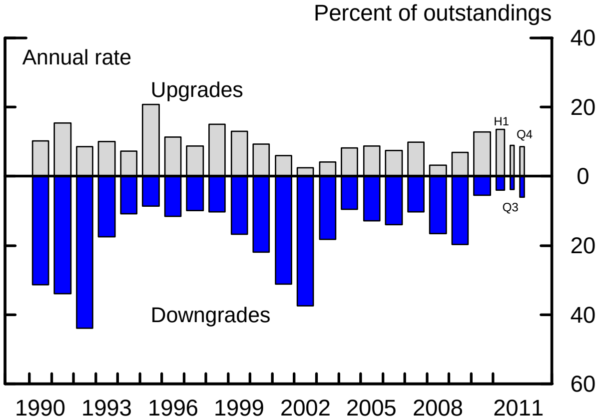
Financial Ratios for Nonfinancial Corporations



Note: Data are annual through 1999 and quarterly thereafter.
p Preliminary.
Source: Compustat.

Bond Ratings Changes of Nonfinancial Firms

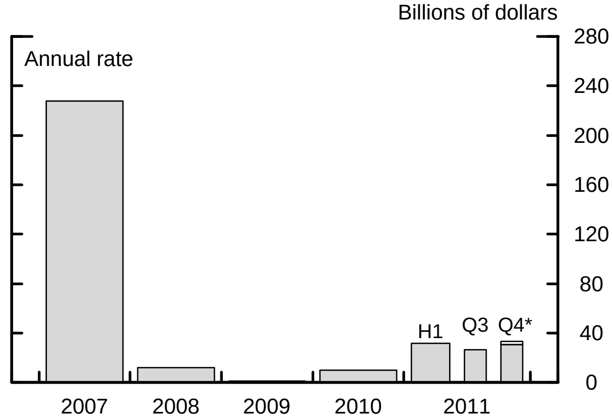
Percent of outstandings



Source: Calculated using data from Moody's Investors Service.

CMBS Issuance

Billions of dollars

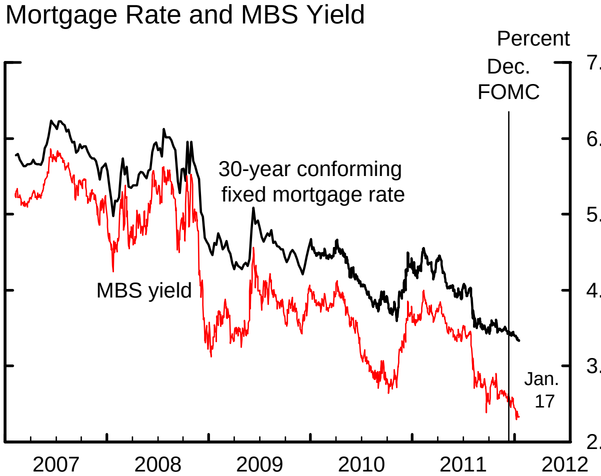


* Hollow bar indicates issuance in the pipeline.
Source: Commercial Mortgage Alert.

Financial Developments

Household Finance

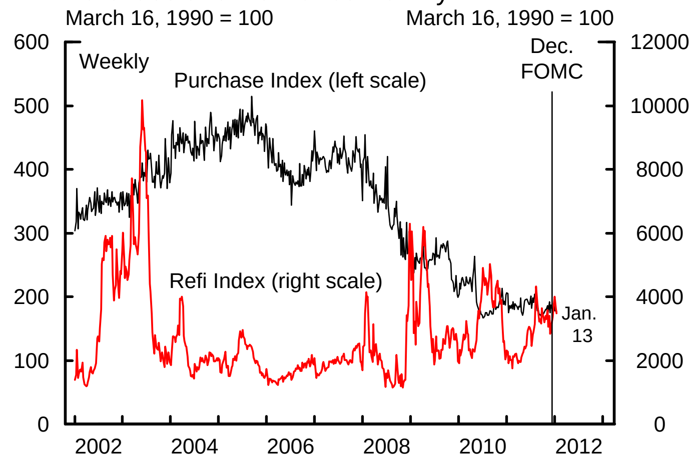
Mortgage Rate and MBS Yield



Note: For mortgage-backed securities (MBS) yield, the data are daily and consist of the Fannie Mae 30-year current-coupon rate; for mortgage rate, the data are weekly before 2010 and daily thereafter.

Source: For MBS yield, Barclays; for mortgage rate, Freddie Mac (before 2010) and Loansifter (after 2010).

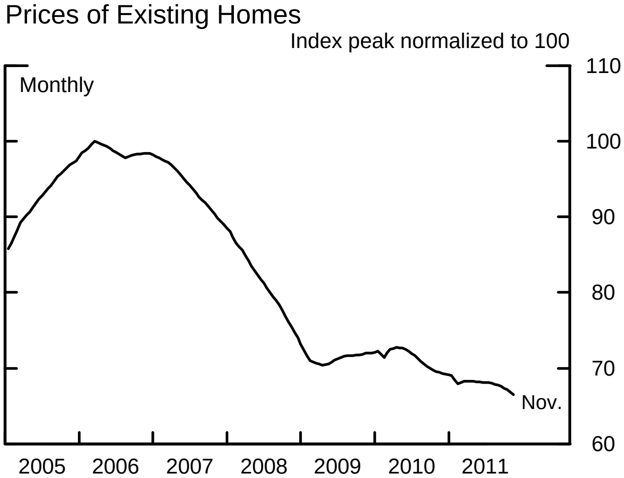
Purchase and Refinance Activity



Note: Seasonally adjusted by FRB staff.

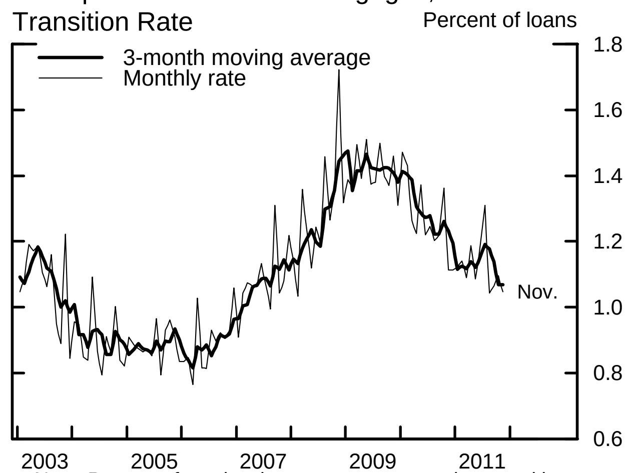
Source: Mortgage Bankers Association.

Prices of Existing Homes



Source: CoreLogic.

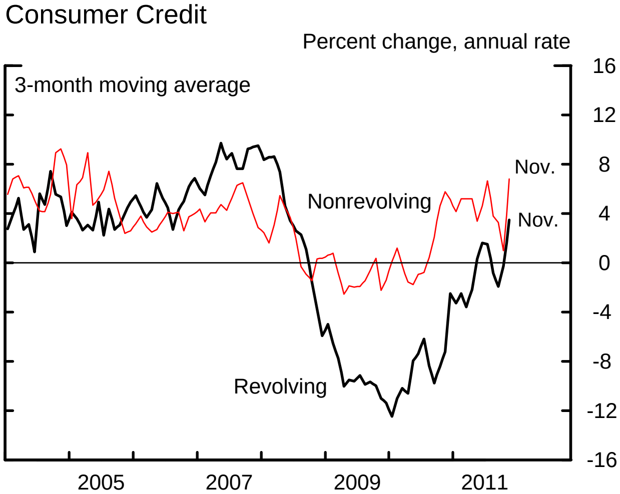
Delinquencies on Prime Mortgages, Transition Rate



Note: Percent of previously current mortgages that transition to being at least 30 days delinquent each month.

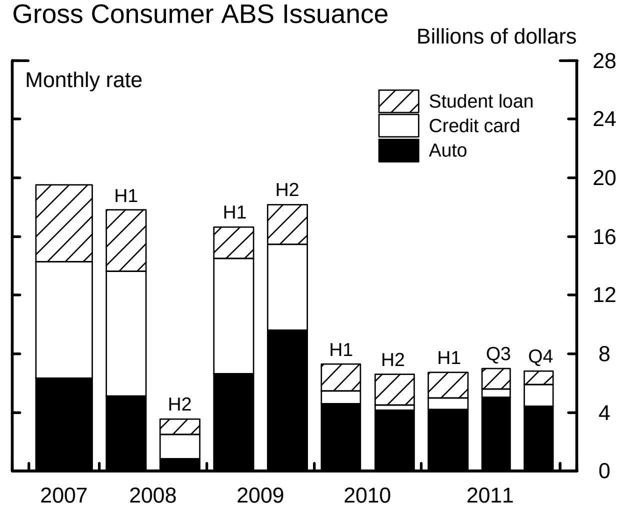
Source: LPS Applied Analytics.

Consumer Credit



Source: Federal Reserve Board.

Gross Consumer ABS Issuance



Source: Inside MBS & ABS; Merrill Lynch; Bloomberg; Federal Reserve Board.

Financial Developments

firms maintained their recent strength in the third quarter, leaving net equity issuance deeply negative. Preliminary data on merger activity and announcements of new share repurchase programs suggest that net equity issuance likely remained quite negative in the fourth quarter.

Indicators of the credit quality of nonfinancial corporations continued to be solid. The aggregate ratio of debt to assets remained low in the third quarter, and the liquid asset ratio was near its highest level in more than 20 years. The volume of corporate bonds of nonfinancial companies upgraded by Moody's Investor Service in the fourth quarter continued to substantially outpace the volume of those downgraded. American Airlines filed for bankruptcy in November, which pushed up a bit the six-month trailing bond default rate for nonfinancial firms; nonetheless, the rate remained fairly low overall. The expected year-ahead default rate for nonfinancial firms from the Moody's KMV model ticked down in December, reflecting lower stock price volatility and higher asset valuations.

Financing conditions for commercial real estate remained tight. Issuance of commercial mortgage-backed securities (CMBS) remained subdued in the fourth quarter, a pace expected to persist in 2012. CMBS spreads over swaps declined over the intermeeting period, in line with the decreases seen for other higher-risk fixed-income securities. Responses to the January SLOOS indicate that bank CRE lending standards remain extraordinarily tight, but compared with one year ago, some banks reported having reduced the spreads of loan rates over their cost of funds for the first time since 2007. Delinquency rates on commercial mortgages stayed elevated, and commercial real estate price indexes continued to fluctuate around levels substantially lower than their 2007 peaks.

Household Finance

Conditions in mortgage markets remained extremely tight. Although mortgage interest rates and yields on current-coupon agency MBS edged down further to near their historical lows, mortgage refinancing activity stayed subdued, as tight underwriting and low levels of home equity continued to limit the access of many households to the mortgage market. Moreover, mortgage delinquency rates, while improving gradually, remained elevated relative to pre-crisis norms.

House prices continued to move lower. The November reading of the CoreLogic repeat-sales house price index was more than 4 percent below its year-ago level. Although the decreases in home prices have been larger in recent months than during the summer, some of the declines likely reflect a seasonal increase in the share of distressed sales.

The price of subprime residential mortgage-backed securities (RMBS), as measured by the ABX index, rose over the intermeeting period, in line with the changes for other higher-risk fixed-income securities. The market remains somewhat illiquid, as demonstrated by a temporary drop in the ABX index after rumors surfaced about the possible sale of the subprime RMBS in the Maiden Lane II portfolio. The new-issue market for subprime RMBS remains closed, and non-agency issuance is limited to the occasional securitization of small portfolios of high-quality jumbo mortgages.

On the whole, conditions in consumer credit markets showed signs of improvement. Consumer credit increased robustly in November, while delinquency rates on credit card loans in securitized pools held steady in November at the lowest levels seen in the 20-year history of the series. Lending standards on consumer loans continued to ease modestly, as evidenced both from Mintel data on credit card offers and from responses to the January SLOOS. Issuance of consumer ABS in the fourth quarter held steady at the moderate levels observed throughout 2011.

Government Finance

During the intermeeting period, the Treasury Department auctioned about $199 billion of nominal coupon securities across the maturity spectrum and $12 billion of five-year TIPS. The auctions were generally well received. On January 4, 2012, the Treasury began using its currently available accounting tools to avoid breaching the $15.194 trillion debt subject to limit. The staff estimates that these tools will allow the Treasury to remain under the debt ceiling while the President and the Congress complete the procedural steps required to raise the borrowing limit.[3]

Financing conditions for state and local governments were again mixed. Gross long-term issuance of municipal bonds remained robust in December, with continued

[3] The President formally requested an increase of $1.2 trillion in the statutory debt limit in mid-January, and the request is expected to be approved based on the budget agreements reached last August.

strength in new capital issuances. CDS spreads for states inched down further over the intermeeting period. Yields on long-term general obligation municipal bonds fell notably, leaving the yield ratio at about 1.3. However, downgrades of municipal bonds continued to substantially outpace upgrades in the third quarter, and higher-frequency data on ratings changes suggest that this pattern may have been even more pronounced in the fourth quarter.

Commercial Banking and Money

In the fourth quarter, bank credit continued to increase, as banks accumulated agency MBS and the growth of total loans picked up. Core loans—the sum of C&I loans, real estate loans, and consumer loans—expanded modestly. Growth of C&I loans at domestic banks was robust but was partly offset by weakness at European institutions. Despite their steady growth in 2011, C&I loans have so far offset only about 30 percent of the steep declines posted between late 2008 and mid-2010. Home equity loans fell further in the fourth quarter, and commercial real estate loans contracted for the 12th consecutive quarter, though the pace of contraction appeared to slow somewhat in November and December. Noncore loans—a category that includes lending to nonbank financial institutions—rose sharply, on net, in the fourth quarter, reflecting in part a surge in such loans at U.S. branches and agencies of European banks.

Portfolio-weighted responses to the January SLOOS indicated that, in the aggregate, loan demand strengthened slightly and lending standards eased a bit further in the fourth quarter. In particular, notable fractions of domestic banks reported stronger demand for C&I loans from firms of all sizes, and the net fraction of banks reporting increased demand from small firms rose to its highest level since 2005. Domestic banks reported unchanged standards on C&I loans over the fourth quarter, but significant net fractions continued to report reduced pricing on these loans on net. Branches and agencies of foreign banks reported having tightened both standards and terms on C&I loans. Moderate fractions of both domestic and foreign banks again reported having tightened standards on loans to nonfinancial firms with significant exposure to Europe. (See the box "Dollar Funding Strains and Credit Provision of U.S. Branches and Agencies of European Banks.") Many domestic banks also reported an increase in business as a result of a decrease in competition from European banks. Moreover, SLOOS responses indicated that large fractions of domestic banks expected that over the next 12 months, credit quality in most major loan categories would improve.

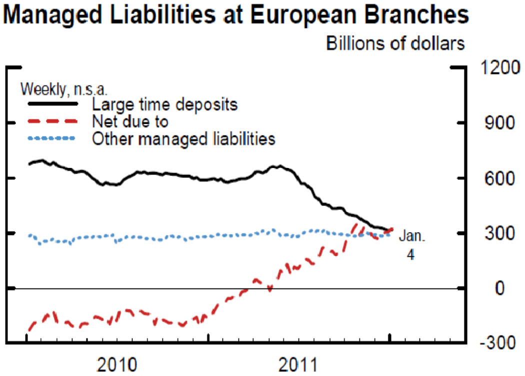
Dollar Funding Strains and Credit Provision of U.S. Branches and Agencies of European Banks

The U.S. branches and agencies of European banks (hereafter, European branches) currently account for about 10 percent of total commercial bank assets in the United States.[1] Thus, pressures on such firms caused by the ongoing fiscal and banking problems in Europe could have noticeable effects on lending in the United States. Indeed, the composition of the balance sheets of European branches has changed markedly since the strains in short-term unsecured dollar funding markets intensified in mid-2011.

Since mid-2011, European branches have changed the structure of their funding—their holdings of large-denomination time deposits have dropped steadily, and they have shifted from being a net supplier of dollars to their related offices to being net receivers of such funds (see lower-left figure). Other funding sources have also become less available to European branches; for example, respondents to the Senior Loan Officer Opinion Survey on Bank Lending Practices (SLOOS) reported widespread tightening of standards on loans to European banks or their affiliates and subsidiaries over the second half of the year (see appendix). Moreover, some European branches have run down their cash assets significantly. These recent patterns have primarily reflected developments at the U.S. branches of French banks, which reportedly have faced substantial funding pressures since mid-2011.[2]

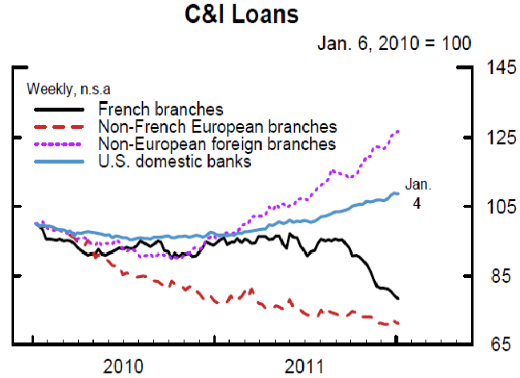
The funding strains also appear to have resulted in some reduction in the provision of credit to U.S. firms by most European branches.[3] C&I loans held by these branches have declined noticeably since the middle of last year even as the overall demand for such loans, as reported in the SLOOS, has reportedly increased (see lower-right figure).

Managed Liabilities at European Branches



Note: Other managed liabilities include nonbank borrowing and nonderivative trading liabilities. Currently, European branches account for about 30 percent of banks' total managed liabilities.
Source: FR 2644.

C&I Loans



Note: Currently, European branches account for about 8 percent of banks' total C&I loans; French branches account for 3 percent of banks' total C&I loans.
Source: FR 2644.

[1] The nearly 40 European branches on the Federal Reserve's weekly reporting panel account for more than 90 percent of such branches' assets.

[2] The U.S. branches of Spanish and Italian banks generally have been shrinking since early 2010, but these institutions are quite small relative to the French and the non-French European branches.

[3] U.S. branches and agencies of foreign banks generally do not provide credit to U.S. households.

In addition, a significant fraction of European branches reportedly tightened standards and terms on C&I loans during the second half of last year, whereas domestic banks generally eased some of their lending policies on such loans on net. Moreover, because a tightening of standards and terms tends to be reflected with a lag in the stock of loans outstanding, the SLOOS results suggest that a further contraction in the C&I loans of European branches may be likely.

In contrast, lending by European branches to nonbank financial institutions has surged over the second half of the year. However, the increase is due entirely to reverse repurchase agreements by a couple of French branches that have reportedly provided substantial funding to their affiliated U.S. broker–dealers. Indeed, such loans at the non-French European branches have declined over the same period.

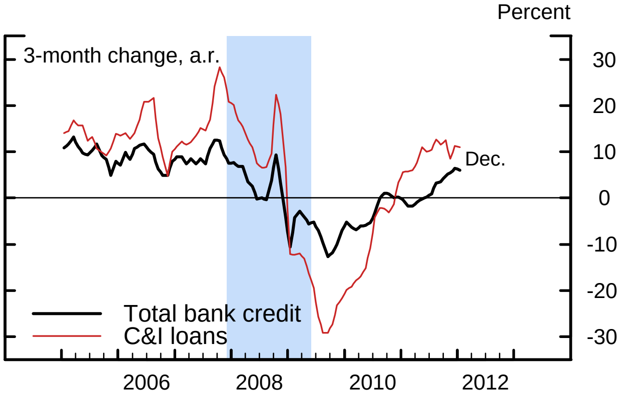
On the whole, it appears that the changes in credit flows to the U.S. economy from European branches have not yet begun to restrain the provision of credit to U.S. firms; to the contrary, the available data indicate that other institutions have stepped in to provide credit directly to U.S. businesses. After expanding at an 8 percent average annual rate over the first half of last year, total C&I loans grew 11 percent over the second half of the year, as a pickup in C&I lending by domestic institutions and non-European branches more than offset the declines at the European branches. Indeed, many domestic respondents to the latest SLOOS reported an "increase in business" over the past six months as a result of reduced competition from European banks.

Going forward, however, the European parent institutions have strong incentives to shrink their balance sheets and other credit exposures. In addition to ongoing funding strains, they face enhanced capital and liquidity requirements and pressure from domestic supervisors to pull back from foreign markets.[4] According to press reports and the edit explanations received with our weekly bank balance sheet data, some European banks have sold securities and other U.S. assets, including loans, but the quantities do not appear to have been substantial, at least thus far. In addition, available data on off-balance-sheet exposures indicate that European branches had about $110 billion of outstanding standby letters of credit to U.S. addressees and about $360 billion of unused commitments to fund loans at the end of the third quarter, quantities that already stand well below their pre-crisis levels. Furthermore, some European financial institutions have large securities and trading operations in the United States; as marketmakers and providers of liquidity, these institutions are instrumental to intermediation activities, and their withdrawal from these activities could have important consequences for various forms of credit extension and financial market liquidity.

[4] European parent institutions reportedly face pressure regarding early implementation of Basel III requirements, and the European Banking Authority (EBA) announced that 71 large European banks must meet a temporary 9 percent core Tier 1 capital ratio requirement by the end of June 2012. By itself, the EBA's estimated capital shortfall for core European banks—about €31 billion—is deemed to be manageable.

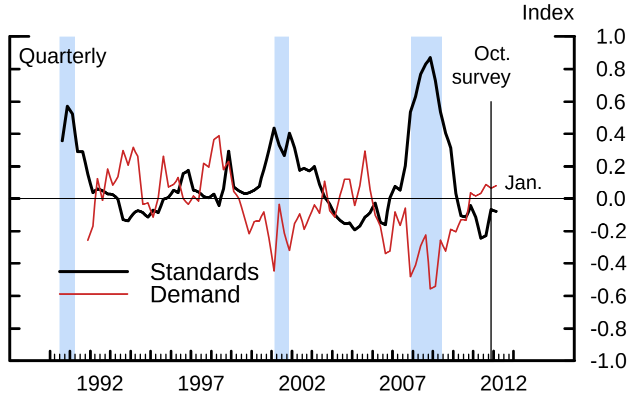
Commercial Banking and Money

Changes in Bank Credit



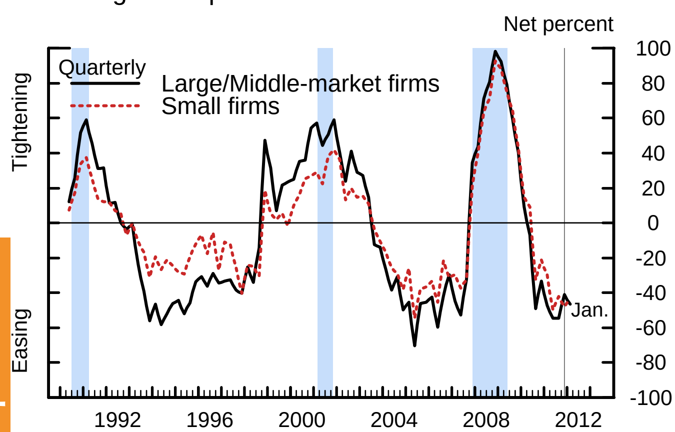
Source: Federal Reserve Board.

Changes in Standards and Demand for Bank Loans



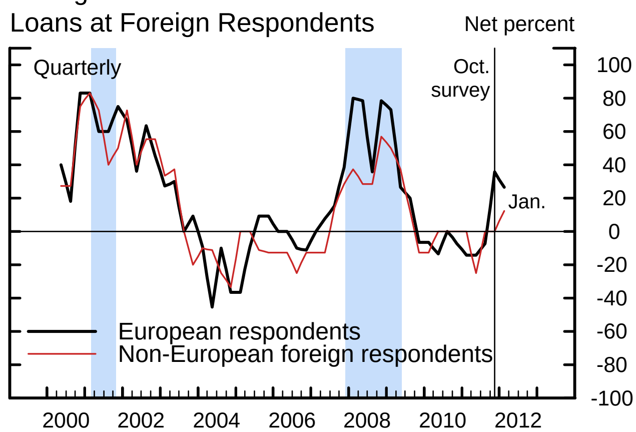
Note: A composite index that represents the net percentage of loans on respondents' balance sheets that were in categories for which banks reported tighter lending standards or stronger loan demand over the past 3 months.
Source: Federal Reserve Board, Senior Loan Officer Opinion Survey on Bank Lending Practices.

Changes in Spreads on C&I Loans



Note: Net percent of respondents that increased spreads of loan rates over cost of funds over the past 3 months.
Source: Federal Reserve Board, Senior Loan Officer Opinion Survey on Bank Lending Practices.

Changes in Standards on C&I Loans at Foreign Respondents



Note: Net percent of respondents that tightened lending standards over the past 3 months.
Source: Federal Reserve Board, Senior Loan Officer Opinion Survey on Bank Lending Practices.

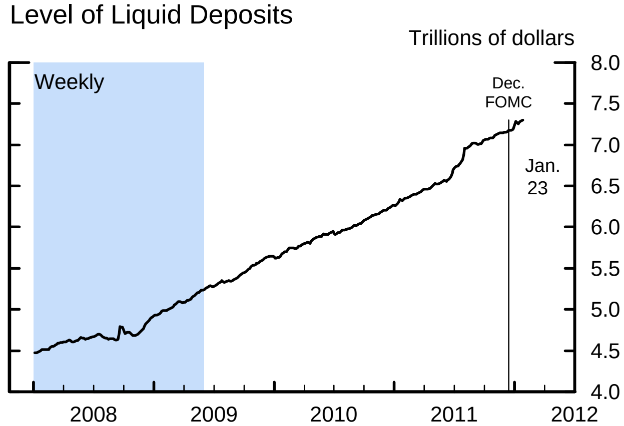
Growth of M2 and Its Components

Percent, s.a.a.r.

	M2	Liquid deposits	Small time deposits	Retail MMMFs	Curr.
2010	3.1	10.9	-21.4	-15.7	5.9
2011:H1	6.7	11.9	-19.3	-6.8	9.3
2011:H2	11.9	18.0	-20.6	0.5	7.8
Oct.	5.9	9.3	-21.5	4.9	5.5
Nov.	5.8	10.2	-21.5	-11.6	8.5
Dec.	5.3	8.4	-17.2	-5.1	8.1

Note: Retail MMMFs are retail money market mutual funds.
Source: Federal Reserve Board.

Level of Liquid Deposits



Note: Seasonally adjusted.
Source: Federal Reserve Board.

Note: The shaded bars indicate periods of business recession as defined by the National Bureau of Economic Research.

M2 increased at an annual rate of 5¼ percent in December.[4] The level of M2 remained elevated relative to the staff's assessment of fundamentals, likely reflecting investors' desire to hold safe and liquid assets in the face of the European crisis. In addition, demand deposits surged around year-end, reportedly as lenders in repo and other short-term funding markets chose to leave substantial balances with banks over the turn of the year. The monetary base—reserve balances and currency—increased in December along with currency. Reserve balances were roughly unchanged over the period; a decline in reserve balances resulting from an increase in balances in the Treasury's general account offset the boost to reserve levels associated with the increased drawings of foreign central banks on the dollar liquidity swap lines. (See the box "Balance Sheet Developments over the Intermeeting Period.")

[4] The staff recently revised measures of the money stock and its components to incorporate updated seasonal factors and a new quarterly benchmark. The revisions increased the growth rate of M2 by about 1 percentage point in the first half of 2011 and lowered the growth rate by 1¾ percentage point in the second half.

Balance Sheet Developments over the Intermeeting Period

Over the intermeeting period, total assets of the Federal Reserve increased $19 billion to $2,924 billion (see the table on the facing page).

Since the December FOMC meeting, the Open Market Desk conducted 19 operations as part of the maturity extension program: the Desk purchased $40 billion in Treasury securities with remaining maturities of 6 to 30 years and sold $62 billion in Treasury securities with maturities of 3 years or less.[1] In addition, the Desk purchased $33 billion in agency MBS securities as part of the policy of reinvesting principal payments from agency debt and agency MBS. Because of agency MBS market conventions, settlements of these transactions can occur well after trade execution.

Foreign central bank liquidity swaps increased $49 billion to $103 billion, primarily reflecting large 84-day draws by the European Central Bank and the Bank of Japan. The net portfolio holdings of Maiden Lane LLC declined $3 billion largely reflecting ongoing asset sales, while holdings of the Maiden Lane II and Maiden Lane III LLCs were nearly unchanged. Loans outstanding under the Term Asset-Backed Securities Loan Facility declined about $1 billion to $9 billion.

On the liability side of the Federal Reserve's balance sheet, the Treasury's General Account increased $33 billion, and Federal Reserve notes in circulation increased $4 billion. Reserve balances of depository institutions increased $8 billion over the period while other deposits decreased $17 billion, reflecting a decline of relatively high GSE balances that had been accumulated prior to the payment of principal and interest on agency MBS last month. Term deposits held by depository institutions declined by $2 billion as a $5 billion small-value operation of the Term Deposit Facility matured on December 15, 2011, and a smaller $3 billion operation was conducted on January 9, 2012. The auction size for these small-value operations was reduced in light of relatively low bid-to-cover ratios in the prior few auctions. Reverse repurchase transactions with foreign official and international accounts decreased $1 billion.

Financial Developments

[1] Purchases of $5 billion conducted on January 13, 2012, and $3 billion conducted on January 17, 2012, are not reflected in the table, as settlement occurred after January 13, 2012. A purchase of $1 billion conducted before the December FOMC meeting settled on December 13, 2011, and is reflected in the table but not in the text above.

Federal Reserve Balance Sheet
Billions of dollars

	Change since last FOMC	Current (01/13/12)
Total assets	**19**	**2,924**
Selected assets:		
Liquidity programs for financial firms	49	103
Primary, secondary, and seasonal credit	-0	+0
Foreign central bank liquidity swaps	49	103
Term Asset-Backed Securities Loan Facility (TALF)	-1	9
Net portfolio holdings of Maiden Lane LLCs	-4	34
Maiden Lane	-3	7
Maiden Lane II	-0	9
Maiden Lane III	-0	18
Securities held outright*	-33	2,602
U.S. Treasury securities	-28	1,644
Agency debt securities	-4	102
Agency mortgage-backed securities	-2	855
Total liabilities	**19**	**2,870**
Selected liabilities:		
Federal Reserve notes in circulation	4	1,026
Reverse repurchase agreements	-1	82
Foreign official and international accounts	-1	82
Others	0	0
Reserve balances of depository institutions**	8	1,604
Term deposits held by depository institutions	-2	3
U.S. Treasury, General Account	33	65
U.S. Treasury, Supplementary Financing Account	0	0
Other deposits	-17	71
Total capital	**-0**	**54**

Note: +0 (-0) denotes positive (negative) value rounded to zero.
* Par value.
** Includes required clearing balances and overdrafts. Excludes as-of adjustments.

Financial Developments

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Financial Developments

Appendix

Senior Loan Officer Opinion Survey on Bank Lending Practices

Overall, in the January Senior Loan Officer Opinion Survey on Bank Lending Practices, modest net fractions of domestic banks reportedly eased their lending standards and experienced stronger demand over the past three months.[1] However, econometric analysis shows that the amount of easing reported in the January survey was more than would have been expected once a number of bank-specific factors and the evolution of several key macroeconomic variables over the survey period are taken into account. Meanwhile, foreign respondents, which mainly lend to businesses, reported a net tightening of their lending standards.[2]

Regarding business loans, domestic banks reported, on balance, little change in standards on commercial and industrial (C&I) loans but a continued easing of pricing terms on those loans during the fourth quarter. Consistent with strong growth in C&I loans in recent months, domestic banks reportedly experienced stronger demand for C&I loans from firms of all sizes on net. The net fraction of banks reporting increased demand from small firms rose to its highest level since 2005.[3] Many domestic banks also reported an increase in business as a result of reduced competition from European banks (or their branches and subsidiaries). Indeed, foreign respondents reported having tightened both standards and terms on C&I loans, on net, and they noted that loan demand had been about unchanged over the past three months. Domestic banks continued to report little change in their standards for commercial real estate (CRE) loans, but modest net fractions had eased some loan terms over the past year. As has been the case recently, moderate net fractions of domestic banks reported that demand for CRE loans had strengthened.

In response to a set of special questions that were also asked in the October 2011 survey, large fractions of both domestic and foreign respondents again reportedly tightened standards on loans to European banks or their branches and subsidiaries during the fourth quarter. In addition, moderate fractions of banks indicated that they tightened standards and terms on loans to nonfinancial firms with significant exposure to Europe.

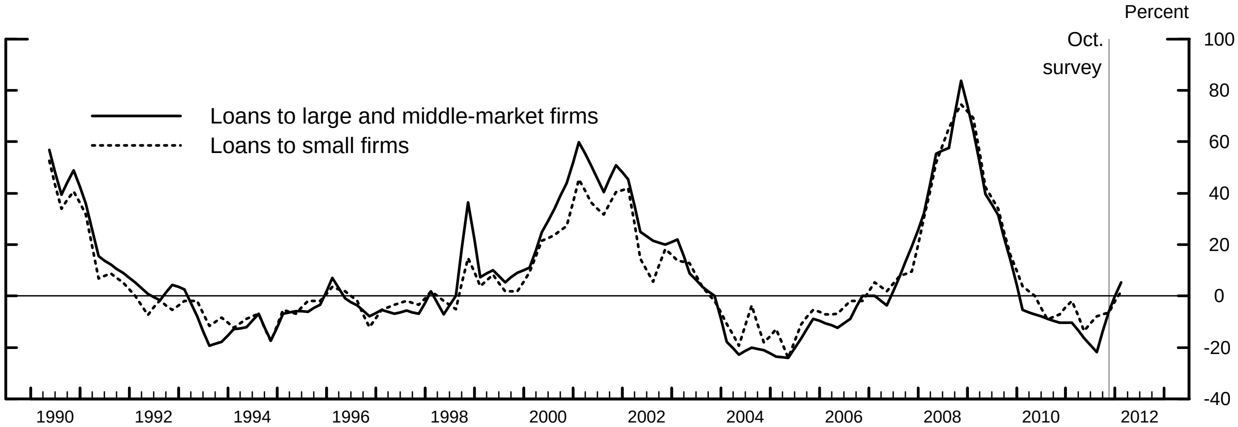
[1] The January 2012 survey addressed changes in the supply of, and demand for, loans to businesses and households over the past three months. This appendix is based on responses from 56 domestic banks and 23 U.S. branches and agencies of foreign banks. Respondent banks received the survey on or after December 21, 2011, and responses were due by January 10, 2012.

[2] For questions that ask about lending standards or terms, reported net fractions equal the fraction of banks that reported having tightened standards minus the fraction of banks that reported having eased standards. For questions that ask about demand, reported net fractions equal the fractions of banks that reported stronger demand minus the fraction of banks that reported weaker demand.

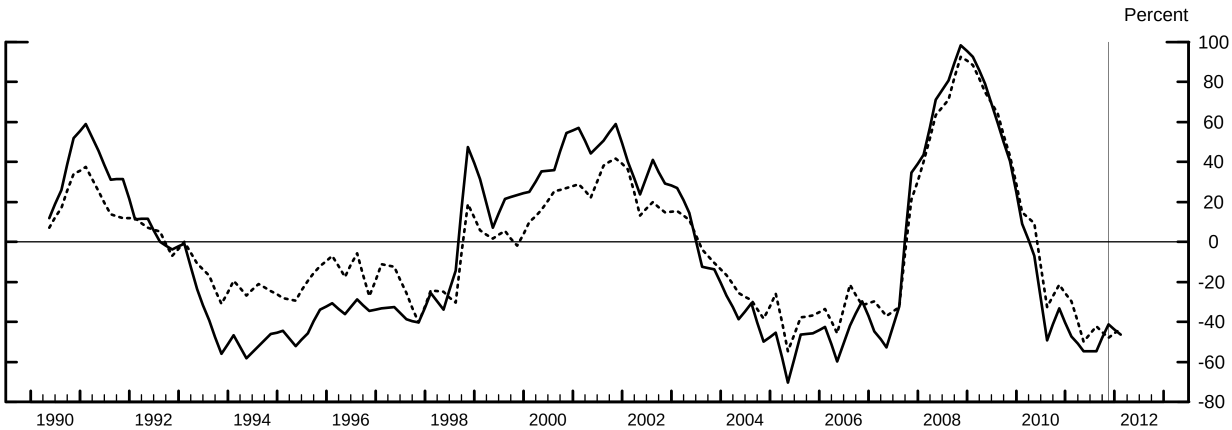
[3] *Large and middle-market firms* are generally defined as firms with annual sales of $50 million or more and *small firms* as those with annual sales of less than $50 million.

Measures of Supply and Demand for Commercial and Industrial Loans, by Size of Firm Seeking Loan

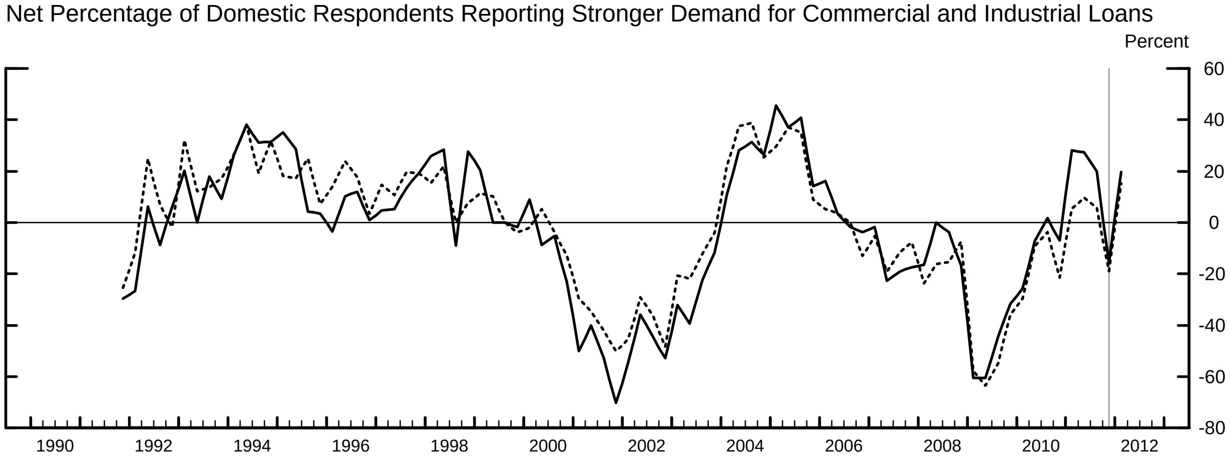
Net Percentage of Domestic Respondents Tightening Standards for Commercial and Industrial Loans



Net Percentage of Domestic Respondents Increasing Spreads of Loan Rates over Banks' Cost of Funds



Net Percentage of Domestic Respondents Reporting Stronger Demand for Commercial and Industrial Loans



Financial Developments

On the household side, lending standards and demand for loans to purchase residential real estate were reportedly little changed over the fourth quarter on net. Standards on home equity lines of credit (HELOCs) were about unchanged, while demand for such loans continued to weaken on net. On a loan-weighted basis, however, standards on both purchase loans and HELOCs have eased modestly in each of the past several surveys.[4] Moderate net fractions of banks reported that they had eased standards on all types of consumer loans over the past three months, and some banks also eased terms on auto loans. Demand for credit card and auto loans reportedly increased somewhat, while demand for other types of consumer loans was about unchanged.

In response to a set of special questions regarding respondents' outlook for asset quality in 2012, moderate net fractions of domestic banks reportedly expect that ongoing improvements in credit quality will continue this year in most major loan categories.

LENDING TO BUSINESSES

Questions on Commercial and Industrial Lending

Domestic banks reported that their credit standards on C&I loans to firms of all sizes were little changed over the fourth quarter on net. However, U.S. branches and agencies of foreign banks reportedly tightened their standards on C&I loans for the second consecutive quarter, on balance. The tightening by foreign survey respondents was again primarily limited to U.S. branches and agencies of European banks.

A large net fraction of domestic banks eased many terms on C&I loans to firms of all sizes. Spreads and costs of credit lines for large firms were trimmed by a somewhat larger fraction of banks than in the previous survey. A moderate net fraction of banks also indicated a reduction in their use of interest rate floors. In addition, several large banks eased loan covenants to large and middle-market firms, a change that is consistent with reports of more-accommodative lending conditions in the syndicated loan market in recent months.

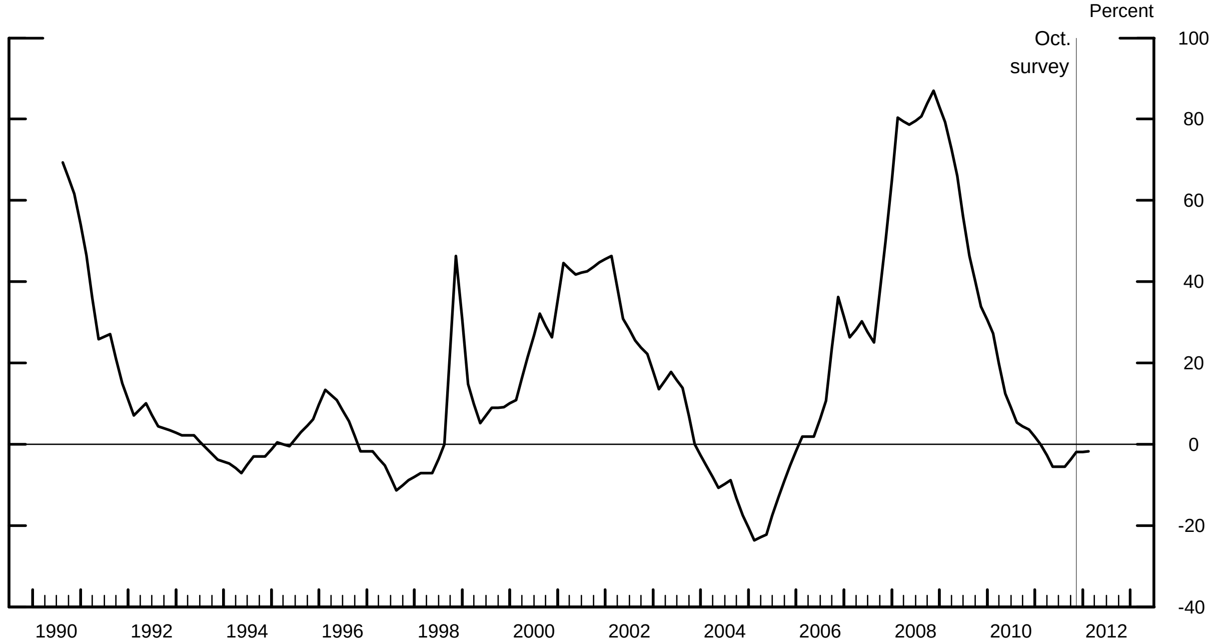
Domestic banks that reported having eased terms on C&I loans unanimously cited increased competition from other banks and nonbank lenders as a reason for having done so, with only about a quarter of those banks attributing the change to an improved or less uncertain economic outlook. The handful of banks that reported having tightened at least one C&I loan term primarily cited a less favorable or more uncertain economic outlook and increased concerns about legislative, supervisory, or accounting policies.

Meanwhile, foreign survey respondents continued to tighten terms on C&I loans, on net, primarily reflecting actions taken by those with European parents. Almost half of the European respondents and only a quarter of the non-European foreign respondents reduced the maximum size of credit lines. European respondents were also more likely than other branches and agencies

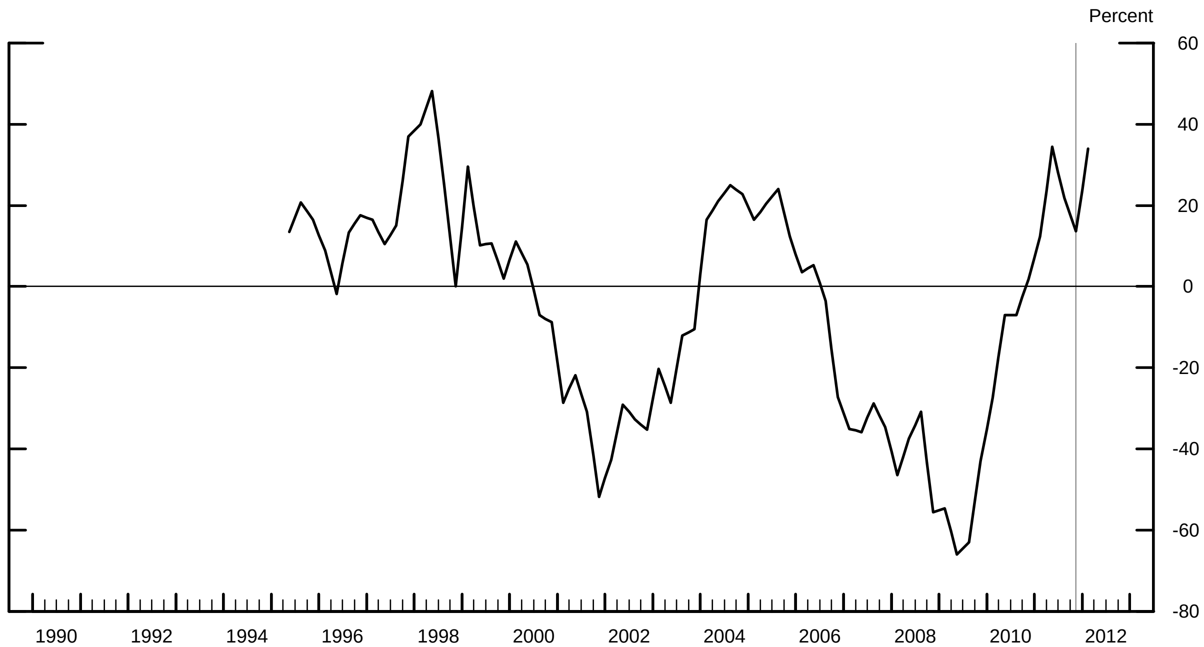
[4] Responses are weighted by survey respondents' holdings of the relevant loan type, as reported in the September 30, 2011, Call Report.

Measures of Supply and Demand for Commercial Real Estate Loans

Net Percentage of Domestic Respondents Tightening Standards for Commercial Real Estate Loans



Net Percentage of Domestic Respondents Reporting Stronger Demand for Commercial Real Estate Loans



Financial Developments

in the survey to have reduced the maximum maturity of C&I loans and to have increased the cost of such credit lines. Foreign respondents that reported having tightened their standards or terms on C&I loans unanimously cited a less favorable or more uncertain economic outlook. Notably, about one-third of the European respondents that had tightened at least one term over the past three months cited concerns about their capital position while none of the non-European foreign respondents that had tightened cited this reason. Liquidity concerns were cited as a reason for tightening standards or terms on C&I loans by about one-third of both the European and non-European foreign respondents.

Reports from domestic banks of stronger demand for C&I loans outnumbered reports of weaker demand, in contrast to the net weakening of demand reported in the previous survey. Moreover, about 15 percent of domestic banks, on net, reported increased demand from small firms, the largest net percentage that has been reported since 2005. Similarly, domestic banks reported a net increase in the number of inquiries from potential business borrowers regarding new or increased credit lines. Domestic banks that saw weaker demand and those that saw stronger demand both cited changes in customers' funding needs related to inventories, accounts receivable, and mergers and acquisitions as important factors underlying the change in demand. Of domestic banks reporting weaker demand, about 85 percent cited reduced funding needs for capital investment. Foreign respondents experienced little change, on net, in demand for C&I loans.

Special Questions on Lending to Firms with European Exposures

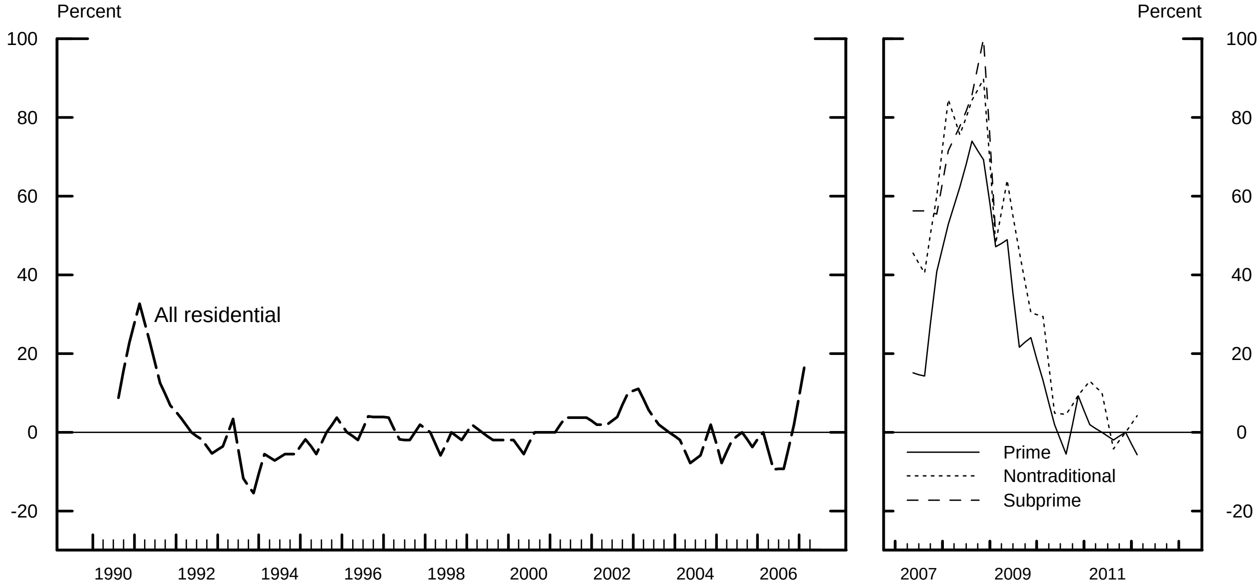
A set of special questions in the January survey asked respondents about lending to banks headquartered in Europe and their affiliates and subsidiaries (regardless of the location of the affiliates and subsidiaries) as well as to nonfinancial firms that have operations in the United States and significant exposures to European economies (regardless of the location of the firms). These questions were also asked in the previous survey, conducted in October 2011.

Large fractions of domestic and foreign respondents again reported having tightened standards on loans to European banks, and one respondent volunteered that they had also tightened standards on loans to nonbank financial firms headquartered in Europe. There was also more widespread tightening of standards than in the previous survey on loans to nonfinancial firms that have operations in the United States and significant exposure to European economies. No domestic or foreign respondent reported that it had eased standards to either type of firm. Demand for credit was reportedly little changed, on net, from European banks (or their affiliates and subsidiaries) and from nonfinancial firms with significant European exposure.

A new special question asked if domestic respondents had experienced an increase in business over the past six months as a result of decreased competition from European banks (or their affiliates and subsidiaries). About half of the respondents who reported competing with European banks for business noted such an increase in business. One large domestic bank specifically reported that business increased slightly in the syndicated loan market because some European banks have withdrawn from such lending activity to conserve capital.

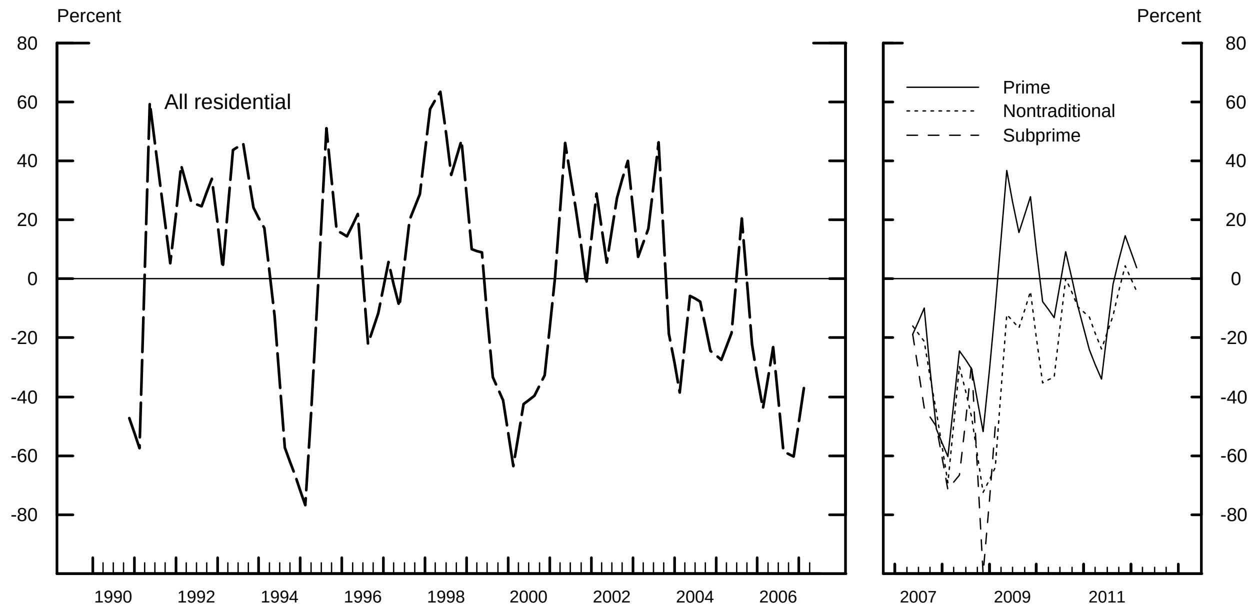
Measures of Supply and Demand for Residential Mortgage Loans

Net Percentage of Domestic Respondents Tightening Standards for Residential Mortgage Loans



Note: For data starting in 2007:Q2, changes in standards for prime, nontraditional, and subprime mortgage loans are reported separately. Series are not reported when the number of respondents is three or fewer.

Net Percentage of Domestic Respondents Reporting Stronger Demand for Residential Mortgage Loans



Note: For data starting in 2007:Q2, changes in demand for prime, nontraditional, and subprime mortgage loans are reported separately. Series are not reported when the number of respondents is three or fewer.

Financial Developments

Questions on Commercial Real Estate Lending

Domestic banks continued to report little change in their standards on CRE loans, which were widely described in a special question in the July survey (two quarters ago) as being at or near their tightest levels since 2005. A moderate net fraction of foreign survey respondents reportedly tightened their standards on such loans.

As has been the case recently, moderate fractions of domestic banks reported that demand for CRE loans had strengthened, on net, over the past three months. In contrast, the foreign respondents reported that demand for CRE loans had remained little changed over that period. Overall, this net strengthening in demand is roughly consistent with an apparent slowing in the pace of runoff of CRE loans at banks during November and December, although most other indicators of activity in markets to finance CRE remain depressed.

Annual Question on Commercial Real Estate Loan Terms

The January survey also included a question regarding changes in terms on CRE loans over the past year (repeated annually since 2001). During the past 12 months, on net, some domestic banks reportedly eased maximum CRE loan sizes and many domestic banks eased loan spreads. Furthermore, a few large domestic banks, on balance, reported that they had lengthened maximum loan maturities. Other terms for CRE loans were reportedly little changed. Overall, the results for this special question show the first time since January 2007 that domestic banks had eased any of the CRE loan terms covered in the survey.

Foreign respondents reported having tightened some terms and eased others on CRE loans. On net, about 15 percent of foreign respondents reported that they had tightened debt service coverage ratios, but about 15 percent reported that they had increased maximum loan sizes. Other terms for CRE loans were reportedly little changed on balance.

LENDING TO HOUSEHOLDS

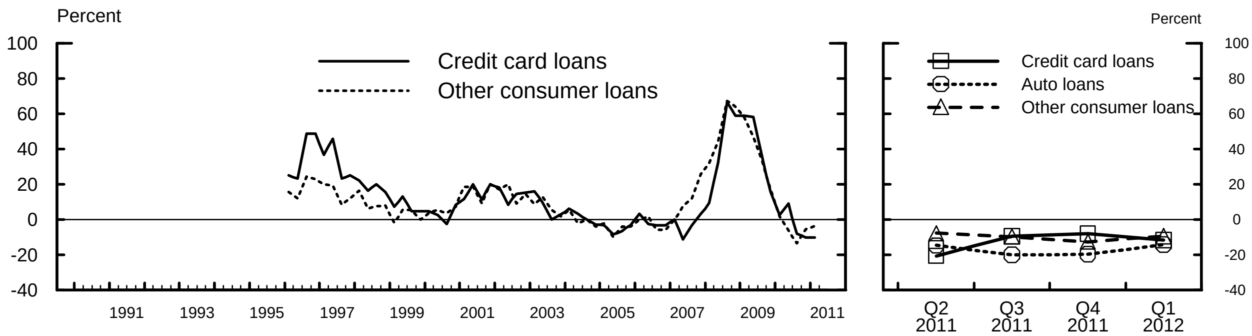
Questions on Residential Real Estate Lending

Most banks reported that lending standards for, and demand from, prime borrowers for residential real estate loans to purchase homes were little changed over the past three months. However, when the responses are weighted by outstanding closed-end mortgages held on banks' books, demand for such loans had weakened, on net, and modest net fractions of banks had eased standards. Weighted responses, which may better account for overall activity in mortgage lending given that it is highly concentrated among the largest banks, have shown weaker demand and an easing of standards in recent quarters. Nonetheless, standards likely remain tighter than their average level since 2005, as reported in a special question in the July survey.

Most banks continued to report little change in their lending standards for HELOCs, a pattern seen since the beginning of 2011. When responses are weighted by the amount of outstanding home equity loans, however, about 20 percent of banks, on net, reported having eased

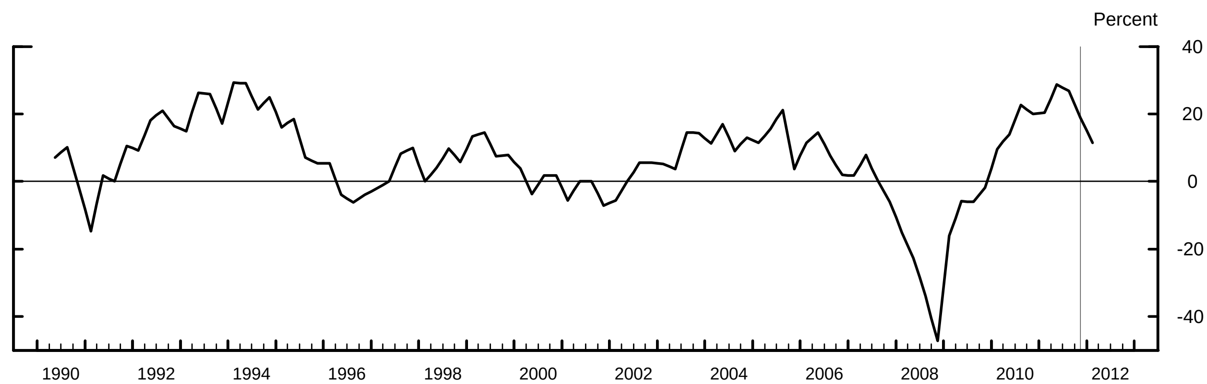
Measures of Supply and Demand for Consumer Loans

Net Percentage of Domestic Respondents Tightening Standards for Consumer Loans

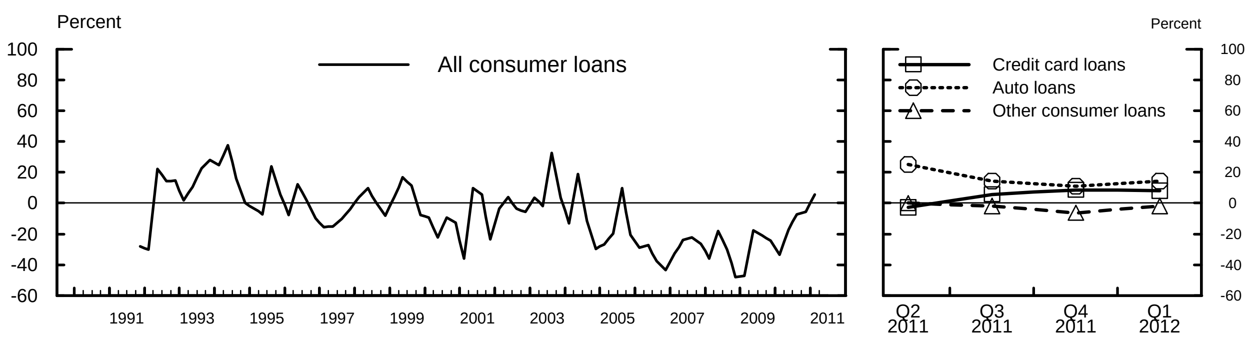


Note: For data starting in 2011:Q2, changes in standards for auto loans and consumer loans excluding credit card and auto loans are reported separately. In 2011:Q2 only, new and used auto loans are reported separately and equally weighted to calculate the auto loans series.

Net Percentage of Domestic Respondents Reporting Increased Willingness to Make Consumer Installment Loans



Net Percentage of Domestic Respondents Reporting Stronger Demand for Consumer Loans



Note: For data starting in 2011:Q2, changes in demand for credit card loans, auto loans, and consumer loans excluding credit card and auto loans are reported separately.

Financial Developments

standards on HELOCs in each of the past five surveys. Meanwhile, the demand for such loans continued to weaken, on net, regardless of whether the responses are weighted.

Questions on Consumer Lending

As in the previous three surveys, small fractions of domestic banks reported having eased standards on credit card, auto, and other consumer loans. In addition, modest net fractions of banks continued to report having narrowed spreads and lengthened maximum maturities on auto loans. However, other terms across the categories of consumer loans were little changed on net.

A few banks, on balance, reported stronger demand for auto loans, with such reports coming primarily from large banks.[5] A few small banks reported stronger demand for credit card loans. Demand for other consumer loans was reportedly about unchanged.

Annual Questions on Asset Quality Expectations

The survey contained a set of special questions on respondents' expectations for loan quality in 2012. Overall, between 15 and 60 percent of domestic banks, on net, expected improvements in delinquency and charge-off rates during 2012 in the major loan categories included in the survey, assuming that economic activity progresses in line with consensus forecasts. These questions have been asked once each year for the past five years. Expectations for improvement in 2012 were reportedly less widespread than when asked a year ago, but last year's expectations were the broadest in the history of the question. Furthermore, loan quality did improve noticeably over the past year.

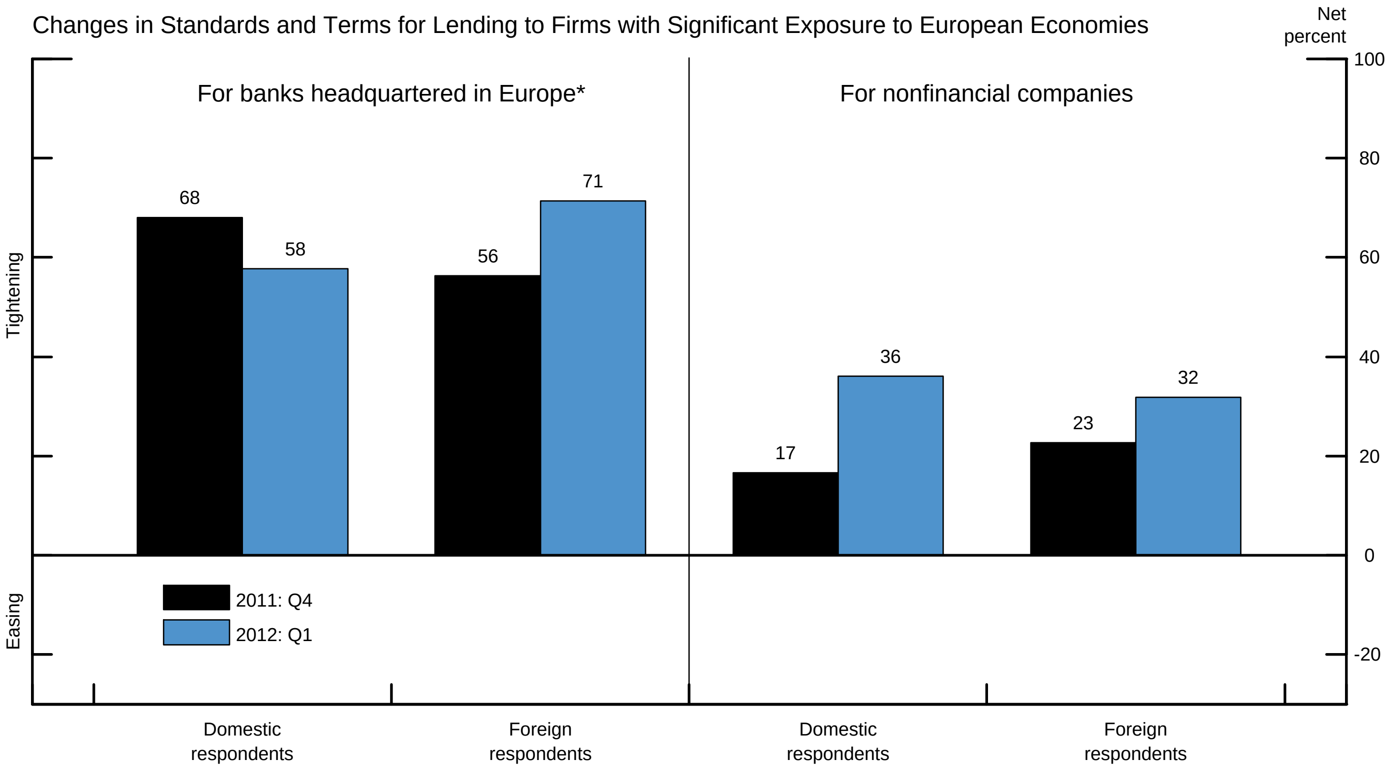
Banks were least likely to forecast improvement in the quality of consumer loans in 2012. Only about 20 percent of banks, on net, expected improvement in credit card loans, and a similar fraction projected improvement in other consumer loans. However, the current credit quality of these types of loans appears to be high. According to Call Report data available through the third quarter of 2011, the aggregate rate of credit card delinquency is at its lowest level since 2006, and delinquency rates on other consumer loans are near lows not seen since early 2008. Charge-off rates for these types of loans are also low relative to the past four years.

Significantly more survey respondents reportedly expect the asset quality of nontraditional residential real estate loans to improve in 2012 than did last year. Indeed, about 55 percent of banks, on net, anticipate that delinquency and charge-off rates on such nontraditional loans will decline this year compared with about 20 percent of the respondents to last year's survey. Expectations for improvements this year in the asset quality of prime residential real estate loans and for HELOCs stayed roughly the same as last year, with a bit more than one-third of the respondents anticipating an improvement in the quality of such loans.

[5] *Large banks* are defined as banks with assets greater than or equal to $20 billion as of September 30, 2011, and *other banks* as those with assets of less than $20 billion.

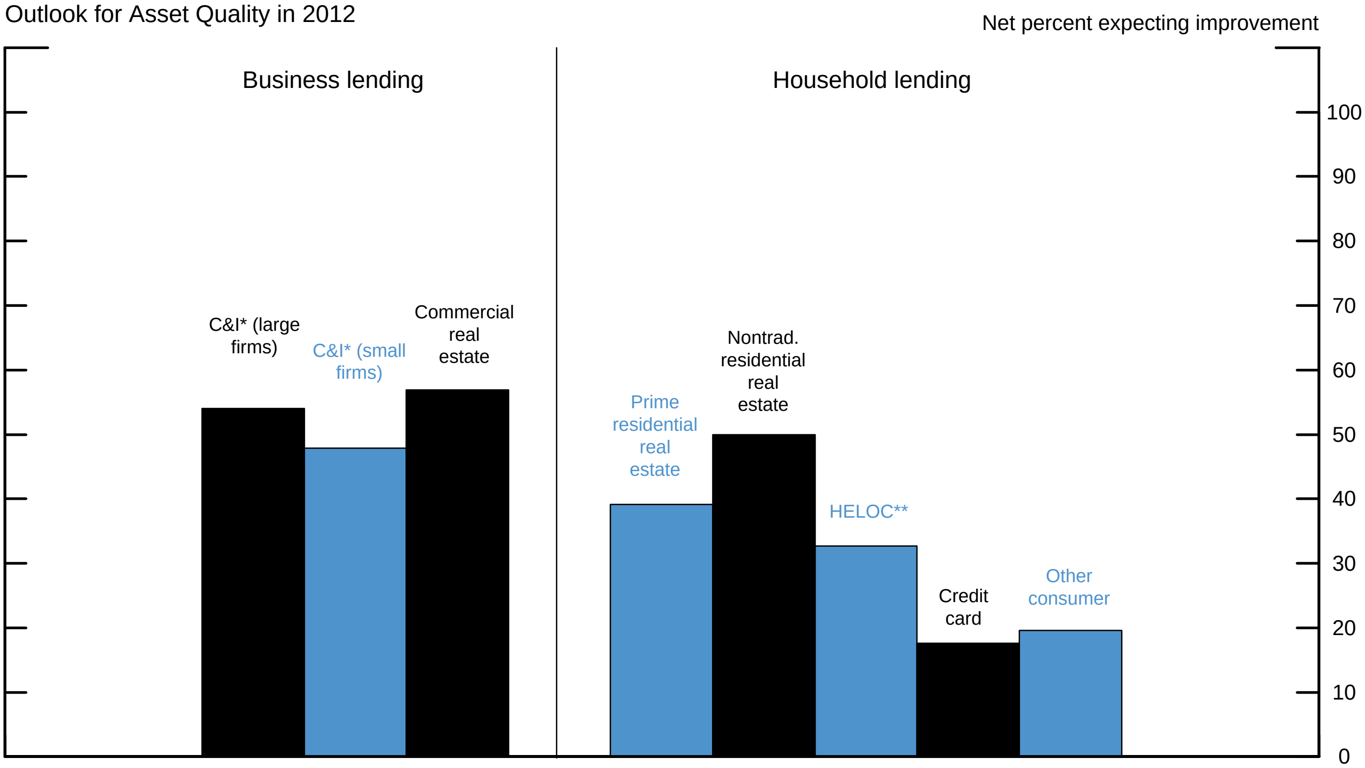
Special Questions

Changes in Standards and Terms for Lending to Firms with Significant Exposure to European Economies



* Includes affiliates and subsidiaries.

Outlook for Asset Quality in 2012



* Commercial and industrial.
** Home equity lines of credit.

Financial Developments

Regarding the outlook for the quality of business loans, about 50 percent of domestic banks, on net, reportedly expect delinquency and charge-off rates to decline in 2012 on their C&I loans both to large and middle-market firms and to small firms. Smaller domestic respondents were more likely to expect improvements in C&I loan quality this year than their larger counterparts. About 60 percent of domestic banks indicated that they expect improvement in the quality of CRE loans this year. In contrast, foreign respondents, on net, reportedly anticipate no improvement in the quality of C&I loans this year, and only about 25 percent of these respondents forecast improvement in the quality of CRE loans.

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Risks and Uncertainty

ASSESSMENT OF FORECAST UNCERTAINTY

We continue to see the risks around our projection for economic activity as elevated relative to the average experience of the past 20 years (the benchmark used by the FOMC).[1] The considerable risks surrounding the European sovereign debt crisis contribute importantly to this assessment. In addition, we still see the aftereffects of the financial crisis and subsequent recession as implying unusual uncertainty regarding the level of economic slack and the likely pace of the recovery going forward. Moreover, uncertainty about the capacity of either fiscal or monetary policy to counteract any further weakening in economic activity is high, and in the case of fiscal policy, is magnified by the unsustainability of current policies over the longer run. These factors, most especially risks from Europe, also lead us to continue to see the risks to real activity as skewed to the downside.

With regard to inflation, we see the risks surrounding our baseline forecast as balanced. On the one hand, low levels of resource utilization, small increases in unit labor costs, and the disproportionate possibility that economic conditions could be less favorable than in baseline could cause inflation to drift down over time. On the other hand, concerns related to the size of the Federal Reserve's balance sheet and the ability to execute a timely exit from the current stance of policy could cause inflation to move up, as might renewed increases in commodity prices or a sharper depreciation of the exchange value of the dollar. With regard to the overall degree of uncertainty, we take some reassurance from the relative stability of inflation expectations. In addition, the behavior of inflation over the past several years has accorded reasonably well with our assessment of how stable inflation expectations, shifts in the prices of imports and energy, and economic slack influence the evolution of consumer prices. As a result, while we see considerable risks around our inflation projection, we do not view these risks as unusually high.

[1] This assessment of heightened uncertainty holds despite marked increases over the past few years in the benchmark estimates of uncertainty about real activity. In particular, as the fixed 20-year window used to assess the typical size of forecast errors has rolled forward to include the pronounced volatility of the past few years, the estimated standard error for out-year projections of the unemployment rate has almost doubled. Thus, the benchmark estimates of uncertainty about real activity are no longer dominated by the experience of the Great Moderation period. (In contrast, benchmark estimates of uncertainty about inflation are essentially unchanged.)

Alternative Scenarios

(Percent change, annual rate, from end of preceding period except as noted)

Measure and scenario	2011 H2	2012	2013	2014	2015-16
Real GDP					
Extended Tealbook baseline	2.4	2.1	2.4	3.6	3.9
Faster snapback	2.4	2.9	3.4	3.7	3.0
Lost decade	2.4	1.9	1.9	2.0	2.4
Greater supply-side damage	2.4	1.7	1.7	2.5	2.9
Disinflation	2.4	2.0	2.0	2.9	3.9
European crisis with severe spillovers	2.4	-2.9	-1.6	3.5	5.1
Higher oil prices	2.4	1.2	1.9	3.5	4.2
Unemployment rate[1]					
Extended Tealbook baseline	8.7	8.6	8.2	7.8	6.5
Faster snapback	8.7	8.3	7.3	6.7	6.2
Lost decade	8.7	8.7	8.7	8.7	8.5
Greater supply-side damage	8.7	8.5	8.1	8.0	7.7
Disinflation	8.7	8.6	8.4	8.3	7.1
European crisis with severe spillovers	8.7	10.2	11.6	11.4	8.9
Higher oil prices	8.7	8.9	8.8	8.4	6.9
Total PCE prices					
Extended Tealbook baseline	1.4	1.4	1.3	1.5	1.5
Faster snapback	1.4	1.4	1.4	1.8	2.0
Lost decade	1.4	1.4	1.3	1.4	1.2
Greater supply-side damage	1.4	1.6	1.9	2.3	2.3
Disinflation	1.4	.7	.3	.3	.0
European crisis with severe spillovers	1.4	-.7	-.3	1.2	2.2
Higher oil prices	1.4	3.4	1.2	1.5	1.8
Core PCE prices					
Extended Tealbook baseline	1.5	1.5	1.4	1.4	1.5
Faster snapback	1.5	1.5	1.5	1.7	2.0
Lost decade	1.5	1.5	1.4	1.3	1.2
Greater supply-side damage	1.5	1.7	2.0	2.2	2.3
Disinflation	1.5	.8	.4	.2	.0
European crisis with severe spillovers	1.5	.4	.2	.9	1.9
Higher oil prices	1.5	1.7	1.8	1.7	1.7
Federal funds rate[1]					
Extended Tealbook baseline	.1	.1	.1	.3	2.5
Faster snapback	.1	.1	.4	1.6	2.8
Lost decade	.1	.1	.1	.1	.1
Greater supply-side damage	.1	.1	.6	1.9	3.4
Disinflation	.1	.1	.1	.1	.1
European crisis with severe spillovers	.1	.1	.1	.1	.4
Higher oil prices	.1	.1	.1	.3	2.0

1. Percent, average for the final quarter of the period.

ALTERNATIVE SCENARIOS

To illustrate some of the risks to the outlook, we constructed several alternatives to the baseline projection using simulations of staff models. In the first scenario, we assume that we have underestimated the extent of the balance sheet repair and improvement in credit availability that has occurred to date, implying a faster recovery of aggregate spending and production than in the baseline. In contrast, the second scenario examines a downside risk to activity—namely, that household and financial institution deleveraging and weak confidence will restrain the pace of economic recovery markedly for many years, resulting in a "lost decade." The next two scenarios turn to opposing risks to the outlook for inflation. The first inflation scenario assumes that the margin of slack is currently narrower than assumed in the baseline and than policymakers estimate, resulting in more upward pressure on both actual and expected inflation. Conversely, the second inflation scenario considers the possibility that inflation will decline by more than we anticipate because the persistently elevated level of slack in labor and product markets leads to self-reinforcing downward pressure on inflation expectations, along the lines of the predictions of accelerationist Phillips curves. Finally, we examine two risks to the outlook coming from abroad—a severe financial crisis in Europe that spills over to the United States and the rest of the world, and a sharp rise in oil prices driven by supply disruptions.

We generated the first four scenarios using the FRB/US model and an estimated policy rule for the federal funds rate that responds to core PCE inflation and a measure of economic slack based on the staff's estimate of potential output. In contrast, the last two scenarios were generated using the multicountry SIGMA model and a different policy rule that employs an alternative concept of resource utilization.[2] In all of the scenarios, the size and composition of the SOMA portfolio are assumed to follow their baseline paths.

Faster Snapback

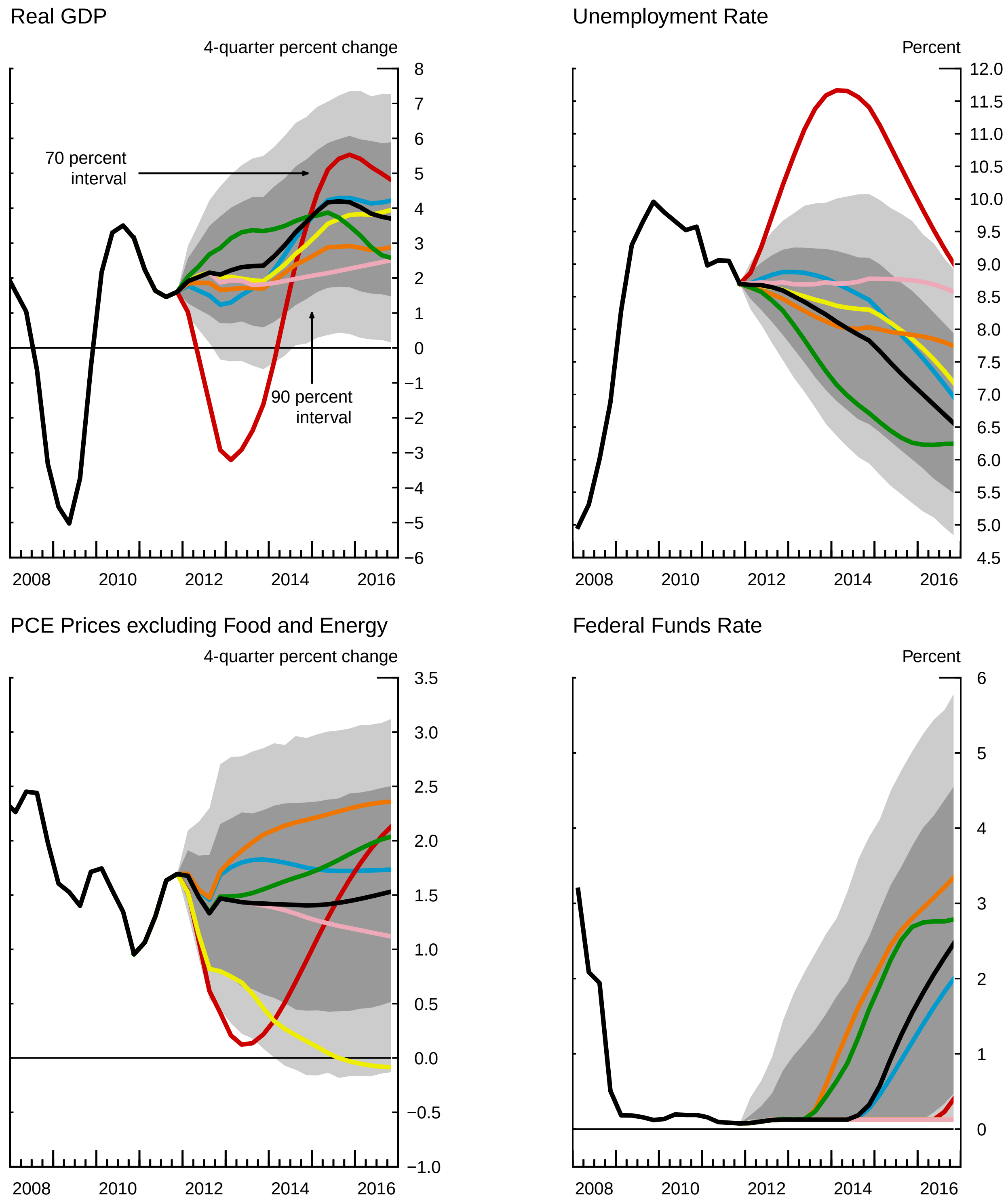
The economy may be further along in the financial recovery process than we have assumed: Household debt service burdens have declined appreciably, while corporate

[2] In the simulations using the FRB/US model, the federal funds rate follows the outcome-based rule described in the appendix on policy rules in Book B. In the simulations using SIGMA, the policy rule is broadly similar, but uses a measure of slack equal to the difference between actual output and the model's estimate of the level of output that would occur in the absence of a slow adjustment in wages and prices.

Forecast Confidence Intervals and Alternative Scenarios

Confidence Intervals Based on FRB/US Stochastic Simulations

- Extended Tealbook baseline
- Faster snapback
- Lost decade
- Greater supply−side damage
- Disinflation
- European crisis with severe spillovers
- Higher oil prices



bond issuance and C&I lending have been solid. Moreover, the apparent improvement in recent labor market and production indicators may signal that a sustained economic recovery is getting under way, and a greater release of pent-up demand for durable goods represents an upside risk to our outlook; for example, the average age of motor vehicles on the road is still rising and the level of the E&S capital stock is well below its trend. In this scenario, easier credit conditions, more-rapidly falling risk premiums, and pent-up demand lead to a stronger pace of consumption and investment outlays. Real GDP rises a bit more than 3 percent, on average, in 2012 and 2013, bringing the unemployment rate down to 7¼ percent by the end of 2013, almost 1 percentage point below baseline. Initially, the stronger pace of recovery has little effect on inflation, in part because greater capital investment increases labor productivity, thereby holding down unit labor costs; anchored long-run inflation expectations also contribute to the muted response of inflation. Over time, however, tighter labor and product markets cause inflation to move above baseline. Largely in response to the stronger pace of real activity, the federal funds rate begins to rise at the end of next year.

Lost Decade

Our baseline forecast depends importantly on steady improvements in credit availability, consumer and business confidence, the balance sheet positions of households and financial institutions, and the willingness of firms to hire. In this scenario, these improvements are slower to materialize than in the baseline and cause the pace of the recovery to remain sluggish. Moreover, the persistently slow growth in spending and output has a corrosive effect on the supply side of the economy because, with unemployment remaining very high for many years, the skills and labor force attachment of unemployed workers erode more than in the baseline. In particular, the downward trend in labor force participation steepens relative to baseline while the NAIRU edges up to 6¼ percent by 2014 and thereafter declines only slowly, leaving it, on average, ¼ percentage point above its baseline path over the simulation period. In all, potential GDP expands about ½ percentage point less per year through 2016. Under these conditions, real GDP expands at only a 2 percent annual rate, on average, through the middle of the decade. With the expansion in aggregate demand only matching that of potential output, the unemployment rate remains near recent levels through 2016. As a consequence, inflation eventually falls below 1¼ percent despite the damage inflicted on the functioning of the labor market. With real activity so weak and inflation so low, the federal funds rate remains at its effective lower bound beyond 2016.

Greater Supply-Side Damage

Although the staff estimates that potential GDP growth has been relatively weak since the financial crisis, the supply side of the economy may already have suffered more damage than we judge. In this scenario, the current output gap is assumed to be only about half as large as in the baseline, reflecting smaller structural productivity gains over the past few years, a larger decline in trend labor force participation, and a higher NAIRU. Less slack and lower productivity in turn imply higher unit labor costs and greater upward pressure on prices than in the baseline. Moreover, these inflationary forces are amplified by the assumption that policymakers only gradually recognize the less-favorable supply-side conditions, which leads the public to expect somewhat higher inflation over the long run. Under these assumptions, real GDP expands about ¾ percentage point less rapidly per year, on average, through 2016 than in the baseline, partly because households and businesses recognize the weaker trajectory for trend income and earnings. Meanwhile, core PCE inflation gradually moves up to around 2½ percent. In response to higher inflation, the federal funds rate begins to rise about a year earlier than in the baseline.

Disinflation

The stability of various measures of expected inflation to date may be misleading us about the potential for further disinflation, particularly in the context of a baseline outlook in which the economy is persistently weak. In this scenario, both expected and actual inflation drift down steadily over time, with inflation reaching zero by 2015; such a decline in inflation would be in line with the predictions of some accelerationist Phillips curves. As disinflationary pressures mount, investors become increasingly concerned about the economy becoming mired in persistent deflation; as a result, bond premiums rise, thereby modestly damping spending and boosting unemployment relative to baseline. In response to lower inflation and greater economic slack, the federal funds rate remains at its effective lower bound through 2016.

European Crisis with Severe Spillovers

In this scenario, Europe's fiscal and financial difficulties intensify in coming months to a markedly greater degree than assumed in our baseline. This outcome could result from a disorderly sovereign default, a failure of a large European financial institution, or because the public loses confidence in the ability of European governments to resolve the crisis. Specifically, European sovereign and private borrowing costs soar, as corporate bond spreads rise 400 basis points above baseline, and household and business confidence plummets. European real GDP declines almost 10 percent relative to baseline by the end of 2013, notwithstanding a 20 percent real effective depreciation of the euro. Given substantial cross-border financial and macroeconomic linkages, as well as the still-fragile state of the U.S. economy, Europe's difficulties are assumed to have important spillovers to the United States and throughout the world. U.S. domestic demand contracts sharply in response to higher borrowing costs (corporate bond spreads widen by more than 300 basis points relative to the baseline), a much weaker stock market, reduced access to credit, and decreases in household and business confidence. In addition, weaker foreign activity and the stronger dollar depress U.S. net exports. All told, U.S. real GDP contracts 3 percent this year and the unemployment rate rises to over 11½ percent by late 2013, nearly 3½ percentage points above baseline. With substantially greater resource slack and lower import prices, overall consumer prices in the United States decline in 2012 and 2013.[3] Under these conditions, the federal funds rate remains near zero until late 2016.

Higher Oil Prices

Although we project that oil prices will change little over the forecast period, there is a high degree of uncertainty around this projection. The recent tensions with Iran over its nuclear program, with Iranian authorities threatening to block the Strait of Hormuz and disrupt global oil supplies, is just one example of the risks threatening the outlook for oil prices. This scenario assumes that geopolitical disturbances drive oil prices $50 per barrel above baseline in the first half of this year before these prices gradually recede. Although a supply-driven increase in oil prices might normally be expected to cause the dollar to depreciate, we assume here instead that the heightened geopolitical tensions increase the demand for dollar-denominated assets and cause the dollar to appreciate slightly. U.S. domestic demand falls relative to baseline because higher oil prices reduce permanent income and lower the return on investment, and real

[3] The rebound in consumer price inflation after 2013 in the simulation reflects the forward-looking nature of inflation determination in SIGMA. Thus, long-run inflation expectations remain firmly anchored at 2 percent, producer marginal costs are expected to rise as the economy recovers, and productivity is weaker (reflecting reduced capital spending). In addition, import price inflation runs significantly higher than in the baseline as the dollar's initial appreciation is gradually reversed. Under alternative specifications of SIGMA that, for instance, would allow for more structural persistence in the inflation process or a less firm anchoring of inflation expectations, inflation would remain low for a longer period.

Selected Tealbook Projections and 70 Percent Confidence Intervals Derived from Historical Tealbook Forecast Errors and FRB/US Simulations

Measure	2011	2012	2013	2014	2015	2016
Real GDP						
(percent change, Q4 to Q4)						
Projection	1.6	2.1	2.4	3.6	4.2	3.7
Confidence interval						
Tealbook forecast errors	1.4–1.8	.5–3.7	.6–4.1	. . .	. . .	. . .
FRB/US stochastic simulations	1.4–1.8	.7–3.8	.6–4.3	1.4–5.4	1.7–6.1	1.5–5.9
Civilian unemployment rate						
(percent, Q4)						
Projection	8.7	8.6	8.2	7.8	7.2	6.5
Confidence interval						
Tealbook forecast errors	8.7–8.7	8.0–9.2	7.2–9.2	. . .	. . .	. . .
FRB/US stochastic simulations	8.6–8.8	7.9–9.2	7.1–9.2	6.5–9.1	6.0–8.6	5.5–7.9
PCE prices, total						
(percent change, Q4 to Q4)						
Projection	2.5	1.4	1.3	1.5	1.5	1.6
Confidence interval						
Tealbook forecast errors	2.4–2.6	.5–2.4	.1–2.4	. . .	. . .	. . .
FRB/US stochastic simulations	2.4–2.6	.5–2.6	.0–2.5	.1–2.7	.1–2.8	.2–2.9
PCE prices excluding						
food and energy						
(percent change, Q4 to Q4)						
Projection	1.7	1.5	1.4	1.4	1.4	1.5
Confidence interval						
Tealbook forecast errors	1.6–1.8	.9–2.0	.6–2.2	. . .	. . .	. . .
FRB/US stochastic simulations	1.6–1.8	.8–2.2	.6–2.3	.4–2.4	.4–2.4	.5–2.5
Federal funds rate						
(percent, Q4)						
Projection	.1	.1	.1	.3	1.5	2.5
Confidence interval						
FRB/US stochastic simulations	.1–.1	.1–.8	.1–1.5	.1–2.6	.1–3.8	.5–4.6

Note: Shocks underlying FRB/US stochastic simulations are randomly drawn from the 1969–2009 set of model equation residuals.

Intervals derived from Tealbook forecast errors are based on projections made from 1979–2009, except for PCE prices excluding food and energy, where the sample is 1981–2009.

. . . Not applicable. The Tealbook forecast horizon has typically extended about 2 years.

Risks & Uncertainty

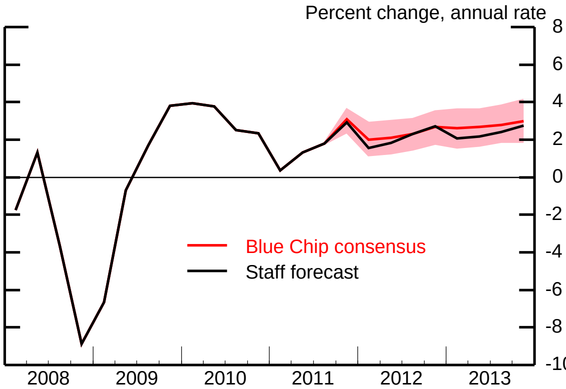
exports also decline relative to baseline due to weaker foreign activity. All told, U.S. real GDP rises only 1½ percent, on average, this year and next, and the unemployment rate hovers just below 9 percent in 2013. Reflecting the jump in energy costs, overall PCE inflation jumps to nearly 3½ percent this year but then moderates substantially as oil prices begin their slow decline. Core PCE inflation increases to about 1¾ percent in 2012 and 2013 as firms pass on higher production costs to households. Although the liftoff of the federal funds rate is unchanged from baseline, the removal of monetary accommodation thereafter proceeds a bit more gradually.

Outside Forecasts

In the January 10 release (based on responses gathered on January 4 and 5, before the release of the most recent labor market report), the Blue Chip consensus projection showed real GDP rising 2.3 percent over the four quarters of 2012, ¼ percentage point above the staff forecast; for 2013, the Blue Chip outlook of 2.8 percent is almost ½ percentage point above that of the staff. The Blue Chip forecast for the unemployment rate at the end of 2013 was 8.0 percent, somewhat below the staff projection of 8.2 percent. Regarding inflation, the Blue Chip panelists anticipated that the overall CPI will increase 2 percent in 2012 and 2.2 percent in 2013, ½ percentage point higher than the staff projection next year and 1 percentage point higher in 2013.

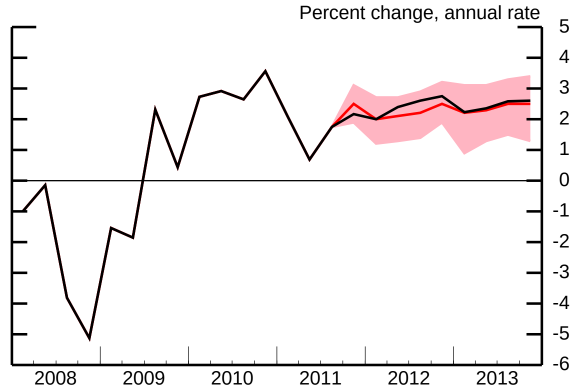
Tealbook Forecast Compared with Blue Chip
(Blue Chip survey released January 10, 2012)

Real GDP

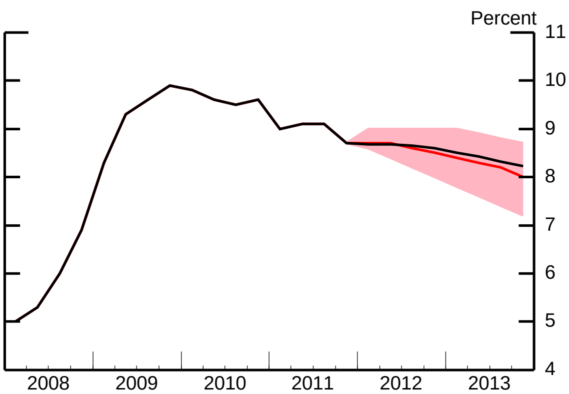


Note: The shaded area represents the area between the Blue Chip top 10 and bottom 10 averages.

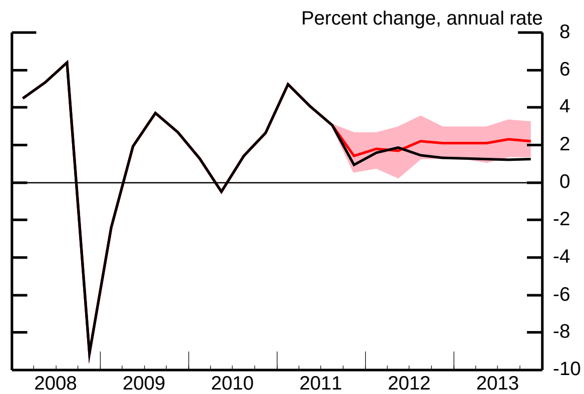
Real PCE



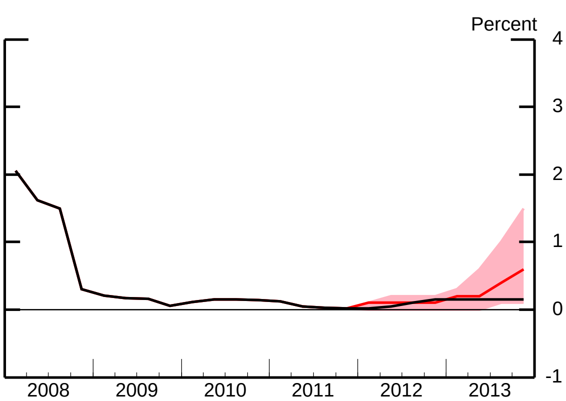
Unemployment Rate



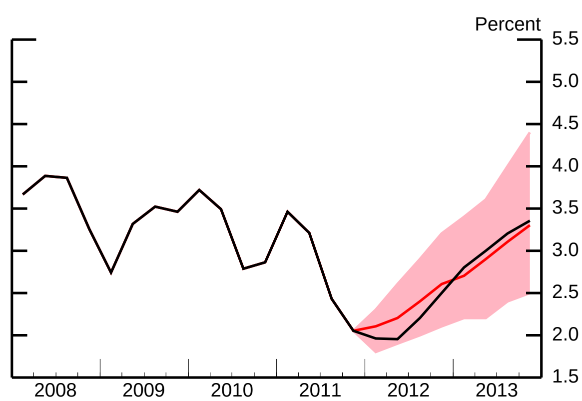
Consumer Price Index



Treasury Bill Rate



10-Year Treasury Yield



Note: The yield is for on-the-run Treasury securities. Over the forecast period, the staff's projected yield is assumed to be 15 basis points below the off-the-run yield.

Changes in GDP, Prices, and Unemployment
(Percent, annual rate except as noted)

Interval	Nominal GDP		Real GDP		PCE price index		Core PCE price index		Unemployment rate[1]	
	12/07/11	01/18/12	12/07/11	01/18/12	12/07/11	01/18/12	12/07/11	01/18/12	12/07/11	01/18/12
Quarterly										
2011:Q1	3.1	3.1	.4	.4	3.9	3.9	1.6	1.6	8.9	9.0
Q2	4.0	4.0	1.3	1.3	3.3	3.3	2.3	2.3	9.1	9.1
Q3	4.5	4.4	1.9	1.8	2.3	2.3	2.0	2.1	9.1	9.1
Q4	4.3	3.8	3.2	2.9	.7	.5	1.1	.9	8.8	8.7
2012:Q1	3.8	3.3	2.1	1.6	1.4	1.4	1.6	1.5	8.8	8.7
Q2	3.5	3.6	1.9	1.8	1.5	1.7	1.5	1.5	8.8	8.7
Q3	4.1	3.8	2.5	2.3	1.3	1.4	1.5	1.5	8.7	8.6
Q4	4.4	4.1	2.9	2.7	1.3	1.3	1.4	1.4	8.6	8.6
2013:Q1	3.7	3.5	2.2	2.1	1.3	1.3	1.4	1.4	8.5	8.5
Q2	3.7	3.6	2.3	2.2	1.2	1.3	1.4	1.4	8.4	8.4
Q3	3.9	3.8	2.5	2.4	1.2	1.3	1.4	1.4	8.3	8.3
Q4	4.4	4.2	2.9	2.8	1.2	1.3	1.4	1.4	8.2	8.2
Two-quarter[2]										
2011:Q2	3.5	3.5	.8	.8	3.6	3.6	1.9	1.9	-.5	-.5
Q4	4.4	4.1	2.6	2.4	1.5	1.4	1.6	1.5	-.3	-.4
2012:Q2	3.6	3.4	2.0	1.7	1.4	1.5	1.5	1.5	.0	.0
Q4	4.2	4.0	2.7	2.5	1.3	1.3	1.4	1.4	-.2	-.1
2013:Q2	3.7	3.6	2.2	2.1	1.2	1.3	1.4	1.4	-.2	-.2
Q4	4.2	4.0	2.7	2.6	1.2	1.3	1.4	1.4	-.2	-.2
Four-quarter[3]										
2010:Q4	4.7	4.7	3.1	3.1	1.3	1.3	1.0	1.0	-.4	-.3
2011:Q4	4.0	3.8	1.7	1.6	2.5	2.5	1.7	1.7	-.8	-.9
2012:Q4	3.9	3.7	2.3	2.1	1.4	1.4	1.5	1.5	-.2	-.1
2013:Q4	3.9	3.8	2.5	2.4	1.2	1.3	1.4	1.4	-.4	-.4
Annual										
2010	4.2	4.2	3.0	3.0	1.8	1.8	1.4	1.4	9.6	9.6
2011	3.9	3.9	1.8	1.7	2.4	2.4	1.4	1.4	9.0	8.9
2012	4.0	3.7	2.3	2.0	1.5	1.5	1.5	1.5	8.7	8.6
2013	3.9	3.8	2.4	2.3	1.3	1.3	1.4	1.4	8.3	8.4

1. Level, except for two-quarter and four-quarter intervals.
2. Percent change from two quarters earlier; for unemployment rate, change is in percentage points.
3. Percent change from four quarters earlier; for unemployment rate, change is in percentage points.

Greensheets

Changes in Real Gross Domestic Product and Related Items
(Percent, annual rate except as noted)

Item	2011 Q1	2011 Q2	2011 Q3	2011 Q4	2012 Q1	2012 Q2	2012 Q3	2012 Q4	2013 Q1	2013 Q2	2013 Q3	2013 Q4	2011[1]	2012[1]	2013[1]
Real GDP	.4	1.3	1.8	2.9	1.6	1.8	2.3	2.7	2.1	2.2	2.4	2.8	1.6	2.1	2.4
Previous Tealbook	.4	1.3	1.9	3.2	2.1	1.9	2.5	2.9	2.2	2.3	2.5	2.9	1.7	2.3	2.5
Final sales	.0	1.6	3.2	1.3	1.7	2.0	1.9	2.3	1.8	2.1	2.5	2.3	1.5	2.0	2.2
Previous Tealbook	.0	1.6	3.5	1.9	1.9	2.0	1.9	2.5	2.1	2.1	2.2	2.2	1.8	2.1	2.2
Priv. dom. final purch.	2.0	1.9	3.3	2.4	1.9	2.4	2.8	3.0	2.6	2.8	3.1	3.0	2.4	2.5	2.9
Previous Tealbook	2.0	1.9	3.6	2.6	1.9	2.3	2.6	3.0	2.5	2.6	2.8	3.2	2.5	2.5	2.8
Personal cons. expend.	2.1	.7	1.7	2.2	2.0	2.4	2.6	2.8	2.2	2.4	2.6	2.6	1.7	2.4	2.4
Previous Tealbook	2.1	.7	2.1	2.4	2.3	2.2	2.4	2.8	2.1	2.1	2.3	2.7	1.8	2.4	2.3
Durables	11.7	-5.3	5.7	15.1	3.9	7.2	6.4	7.2	6.2	6.1	7.2	5.3	6.5	6.2	6.2
Nondurables	1.6	.2	-.5	.6	1.9	2.1	2.1	2.3	1.7	2.0	2.2	2.4	.5	2.1	2.1
Services	.8	1.9	1.9	.7	1.7	1.7	2.2	2.2	1.8	1.9	2.0	2.2	1.3	1.9	2.0
Residential investment	-2.4	4.2	1.3	9.7	8.5	4.0	6.9	7.0	7.0	7.1	7.5	7.5	3.1	6.6	7.3
Previous Tealbook	-2.4	4.2	1.7	3.1	3.6	6.3	6.5	6.9	7.2	7.6	8.1	8.5	1.6	5.8	7.9
Business fixed invest.	2.1	10.3	15.7	2.6	-.1	2.1	3.2	3.6	3.8	4.8	6.1	5.0	7.5	2.2	4.9
Previous Tealbook	2.1	10.3	15.8	3.7	-1.2	1.8	3.3	4.1	4.4	4.8	5.4	5.1	7.8	2.0	4.9
Equipment & software	8.7	6.2	16.2	3.0	2.2	3.4	4.8	5.0	4.9	6.1	7.9	6.6	8.4	3.8	6.4
Previous Tealbook	8.7	6.2	16.2	3.0	.6	2.5	4.5	5.2	5.9	6.1	7.1	6.7	8.4	3.2	6.4
Nonres. structures	-14.3	22.6	14.4	1.7	-6.0	-1.5	-1.0	.1	.7	1.5	1.1	1.0	5.1	-2.1	1.1
Previous Tealbook	-14.3	22.6	14.7	5.8	-5.6	.0	.0	1.2	.6	1.4	1.0	.8	6.2	-1.1	.9
Net exports[2]	-424	-416	-403	-396	-394	-389	-395	-395	-396	-395	-392	-391	-410	-393	-394
Previous Tealbook[2]	-424	-416	-401	-394	-391	-384	-388	-386	-386	-383	-378	-377	-409	-387	-381
Exports	7.9	3.6	4.7	5.1	5.5	4.5	4.5	4.7	5.1	5.1	5.1	5.3	5.3	4.8	5.2
Imports	8.3	1.4	1.2	3.0	4.0	2.8	4.8	3.8	4.5	4.0	3.6	4.3	3.4	3.9	4.1
Gov't. cons. & invest.	-5.9	-.9	-.1	-4.5	.0	-.8	-.9	-.9	-1.2	-1.1	-1.4	-1.4	-2.9	-.7	-1.3
Previous Tealbook	-5.9	-.9	-.2	-1.9	1.1	-.5	-.4	-.4	.0	-.8	-1.3	-2.5	-2.2	-.1	-1.2
Federal	-9.4	1.9	2.1	-9.6	1.4	-1.2	-1.9	-2.1	-3.4	-3.6	-4.6	-4.8	-3.9	-1.0	-4.1
Defense	-12.6	7.0	5.0	-15.4	2.7	-.7	-1.6	-2.0	-3.8	-4.1	-5.6	-5.9	-4.5	-.4	-4.8
Nondefense	-2.7	-7.6	-3.8	3.5	-1.1	-2.2	-2.5	-2.5	-2.5	-2.6	-2.6	-2.6	-2.7	-2.1	-2.6
State & local	-3.4	-2.8	-1.6	-.8	-.9	-.6	-.3	-.1	.3	.6	.8	.9	-2.1	-.5	.7
Change in bus. inventories[2]	49	39	-2	51	48	43	56	69	76	77	75	91	34	54	80
Previous Tealbook[2]	49	39	-5	32	37	34	53	66	68	73	82	106	29	47	82
Nonfarm[2]	60	51	6	54	49	43	55	68	75	76	74	90	42	54	79
Farm[2]	-8	-9	-6	-3	-1	0	1	1	1	1	1	1	-6	0	1

1. Change from fourth quarter of previous year to fourth quarter of year indicated.
2. Billions of chained (2005) dollars.

Changes in Real Gross Domestic Product and Related Items
(Change from fourth quarter of previous year to fourth quarter of year indicated, unless otherwise noted)

Item	2005	2006	2007	2008	2009	2010	2011	2012	2013
Real GDP	2.8	2.4	2.2	-3.3	-.5	3.1	1.6	2.1	2.4
Previous Tealbook	2.8	2.4	2.2	-3.3	-.5	3.1	1.7	2.3	2.5
Final sales	2.7	2.8	2.4	-2.6	-.8	2.4	1.5	2.0	2.2
Previous Tealbook	2.7	2.8	2.4	-2.6	-.8	2.4	1.8	2.1	2.2
Priv. dom. final purch.	3.2	2.4	1.2	-4.5	-2.5	3.6	2.4	2.5	2.9
Previous Tealbook	3.2	2.4	1.2	-4.5	-2.5	3.6	2.5	2.5	2.8
Personal cons. expend.	2.8	3.2	1.7	-2.5	-.2	3.0	1.7	2.4	2.4
Previous Tealbook	2.8	3.2	1.7	-2.5	-.2	3.0	1.8	2.4	2.3
Durables	2.8	7.0	4.6	-13.0	3.0	10.9	6.5	6.2	6.2
Nondurables	3.1	2.9	.8	-3.1	.6	3.5	.5	2.1	2.1
Services	2.7	2.6	1.4	-.5	-.9	1.6	1.3	1.9	2.0
Residential investment	5.3	-15.7	-20.7	-24.4	-12.9	-6.3	3.1	6.6	7.3
Previous Tealbook	5.3	-15.7	-20.7	-24.4	-12.9	-6.3	1.6	5.8	7.9
Business fixed invest.	4.5	7.8	7.9	-9.4	-14.4	11.1	7.5	2.2	4.9
Previous Tealbook	4.5	7.8	7.9	-9.4	-14.4	11.1	7.8	2.0	4.9
Equipment & software	6.2	6.0	3.9	-13.6	-5.8	16.6	8.4	3.8	6.4
Previous Tealbook	6.2	6.0	3.9	-13.6	-5.8	16.6	8.4	3.2	6.4
Nonres. structures	-.1	13.0	17.3	-1.2	-29.3	-1.8	5.1	-2.1	1.1
Previous Tealbook	-.1	13.0	17.3	-1.2	-29.3	-1.8	6.2	-1.1	.9
Net exports[1]	-723	-729	-649	-495	-359	-422	-410	-393	-394
Previous Tealbook[1]	-723	-729	-649	-495	-359	-422	-409	-387	-381
Exports	6.7	10.2	10.1	-2.5	-.1	8.8	5.3	4.8	5.2
Imports	5.2	4.1	.8	-5.9	-6.5	10.7	3.4	3.9	4.1
Gov't. cons. & invest.	.7	1.5	1.9	2.7	1.1	.1	-2.9	-.7	-1.3
Previous Tealbook	.7	1.5	1.9	2.7	1.1	.1	-2.2	-.1	-1.2
Federal	1.2	2.2	3.1	8.8	4.6	2.9	-3.9	-1.0	-4.1
Defense	.4	4.4	2.6	9.8	3.5	1.5	-4.5	-.4	-4.8
Nondefense	2.6	-2.3	4.2	6.8	6.9	5.7	-2.7	-2.1	-2.6
State & local	.4	1.2	1.2	-.9	-1.1	-1.7	-2.1	-.5	.7
Change in bus. inventories[1]	50	59	28	-36	-145	59	34	54	80
Previous Tealbook[1]	50	59	28	-36	-145	59	29	47	82
Nonfarm[1]	50	63	29	-38	-144	61	42	54	79
Farm[1]	0	-4	-1	1	-1	-1	-6	0	1

1. Billions of chained (2005) dollars.

Greensheets

Greensheets

Contributions to Changes in Real Gross Domestic Product
(Percentage points, annual rate except as noted)

Item	2011 Q1	2011 Q2	2011 Q3	2011 Q4	2012 Q1	2012 Q2	2012 Q3	2012 Q4	2013 Q1	2013 Q2	2013 Q3	2013 Q4	2011[1]	2012[1]	2013[1]
Real GDP	.4	1.3	1.8	2.9	1.6	1.8	2.3	2.7	2.1	2.2	2.4	2.8	1.6	2.1	2.4
Previous Tealbook	.4	1.3	1.9	3.2	2.1	1.9	2.5	2.9	2.2	2.3	2.5	2.9	1.7	2.3	2.5
Final sales	.0	1.6	3.2	1.3	1.7	2.0	1.9	2.3	1.8	2.1	2.5	2.3	1.5	2.0	2.2
Previous Tealbook	.0	1.6	3.5	2.0	1.9	2.0	1.9	2.5	2.1	2.1	2.2	2.2	1.8	2.1	2.1
Priv. dom. final purch.	1.6	1.6	2.8	2.0	1.6	2.0	2.3	2.5	2.1	2.3	2.6	2.6	2.0	2.1	2.4
Previous Tealbook	1.6	1.6	3.0	2.2	1.6	1.9	2.2	2.5	2.1	2.2	2.3	2.7	2.1	2.1	2.3
Personal cons. expend.	1.5	.5	1.2	1.5	1.4	1.7	1.8	2.0	1.6	1.7	1.8	1.8	1.2	1.7	1.7
Previous Tealbook	1.5	.5	1.5	1.7	1.6	1.6	1.7	2.0	1.5	1.5	1.6	1.9	1.3	1.7	1.6
Durables	.9	-.4	.4	1.1	.3	.5	.5	.6	.5	.5	.6	.4	.5	.5	.5
Nondurables	.3	.0	-.1	.1	.3	.3	.3	.4	.3	.3	.4	.4	.1	.3	.3
Services	.4	.9	.9	.3	.8	.8	1.0	1.0	.8	.9	.9	1.0	.6	.9	.9
Residential investment	-.1	.1	.0	.2	.2	.1	.2	.2	.2	.2	.2	.2	.1	.1	.2
Previous Tealbook	-.1	.1	.0	.1	.1	.1	.1	.2	.2	.2	.2	.2	.0	.1	.2
Business fixed invest.	.2	1.0	1.5	.3	.0	.2	.3	.4	.4	.5	.6	.5	.7	.2	.5
Previous Tealbook	.2	1.0	1.5	.4	-.1	.2	.3	.4	.4	.5	.6	.5	.8	.2	.5
Equipment & software	.6	.4	1.1	.2	.2	.3	.4	.4	.4	.5	.6	.5	.6	.3	.5
Previous Tealbook	.6	.4	1.1	.2	.0	.2	.3	.4	.4	.4	.5	.5	.6	.2	.5
Nonres. structures	-.4	.5	.4	.0	-.2	.0	.0	.0	.0	.0	.0	.0	.1	-.1	.0
Previous Tealbook	-.4	.5	.4	.2	-.2	.0	.0	.0	.0	.0	.0	.0	.2	.0	.0
Net exports	-.3	.2	.4	.2	.1	.1	-.2	.0	-.1	.0	.1	.0	.1	.0	.0
Previous Tealbook	-.3	.2	.5	.2	.1	.2	-.1	.1	.0	.1	.1	.0	.1	.0	.0
Exports	1.0	.5	.6	.7	.8	.6	.6	.7	.7	.7	.7	.7	.7	.7	.7
Imports	-1.4	-.2	-.2	-.5	-.7	-.5	-.8	-.7	-.8	-.7	-.6	-.8	-.6	-.7	-.7
Gov't. cons. & invest.	-1.2	-.2	.0	-.9	.0	-.2	-.2	-.2	-.2	-.2	-.3	-.3	-.6	-.1	-.2
Previous Tealbook	-1.2	-.2	.0	-.4	.2	-.1	-.1	-.1	.0	-.1	-.2	-.5	-.5	.0	-.2
Federal	-.8	.2	.2	-.8	.1	-.1	-.1	-.2	-.3	-.3	-.4	-.4	-.3	-.1	-.3
Defense	-.7	.4	.3	-.9	.1	.0	-.1	-.1	-.2	-.2	-.3	-.3	-.3	.0	-.3
Nondefense	-.1	-.2	-.1	.1	.0	-.1	-.1	-.1	-.1	-.1	-.1	-.1	-.1	-.1	-.1
State & local	-.4	-.3	-.2	-.1	-.1	-.1	.0	.0	.0	.1	.1	.1	-.3	-.1	.1
Change in bus. inventories	.3	-.3	-1.4	1.6	-.1	-.1	.4	.4	.2	.0	.0	.5	.1	.1	.2
Previous Tealbook	.3	-.3	-1.5	1.2	.1	-.1	.6	.4	.1	.2	.3	.7	-.1	.3	.3
Nonfarm	.4	-.3	-1.5	1.6	-.2	-.2	.4	.4	.2	.0	-.1	.5	.1	.1	.2
Farm	-.1	.0	.1	.1	.1	.0	.0	.0	.0	.0	.0	.0	.0	.0	.0

1. Change from fourth quarter of previous year to fourth quarter of year indicated.

Changes in Prices and Costs
(Percent, annual rate except as noted)

Item	2011 Q1	2011 Q2	2011 Q3	2011 Q4	2012 Q1	2012 Q2	2012 Q3	2012 Q4	2013 Q1	2013 Q2	2013 Q3	2013 Q4	2011[1]	2012[1]	2013[1]
GDP chain-wt. price index	2.5	2.5	2.6	.9	1.7	1.7	1.5	1.4	1.5	1.4	1.4	1.4	2.1	1.6	1.4
Previous Tealbook	2.5	2.5	2.5	1.0	1.7	1.6	1.6	1.4	1.5	1.4	1.4	1.4	2.1	1.6	1.4
PCE chain-wt. price index	3.9	3.3	2.3	.5	1.4	1.7	1.4	1.3	1.3	1.3	1.3	1.3	2.5	1.4	1.3
Previous Tealbook	3.9	3.3	2.3	.7	1.4	1.5	1.3	1.3	1.3	1.2	1.2	1.2	2.5	1.4	1.2
Energy	40.7	15.0	3.3	-6.8	.7	4.9	.7	-.5	-.6	-.9	-1.0	-.8	11.7	1.4	-.8
Previous Tealbook	40.7	15.0	3.3	-8.2	-.9	1.3	-.4	-1.2	-1.2	-1.7	-1.7	-1.6	11.3	-.3	-1.6
Food	6.5	6.4	4.7	2.6	.9	1.1	1.2	1.2	1.2	1.2	1.2	1.2	5.0	1.1	1.2
Previous Tealbook	6.5	6.4	4.7	3.5	1.3	1.1	1.2	1.2	1.2	1.2	1.2	1.2	5.2	1.2	1.2
Ex. food & energy	1.6	2.3	2.1	.9	1.5	1.5	1.5	1.4	1.4	1.4	1.4	1.4	1.7	1.5	1.4
Previous Tealbook	1.6	2.3	2.0	1.1	1.6	1.5	1.5	1.4	1.4	1.4	1.4	1.4	1.7	1.5	1.4
Ex. food & energy, market based	1.3	2.4	2.3	1.1	1.5	1.4	1.3	1.3	1.3	1.3	1.3	1.3	1.8	1.4	1.3
Previous Tealbook	1.3	2.4	2.3	1.0	1.4	1.4	1.3	1.3	1.3	1.3	1.3	1.3	1.7	1.4	1.3
CPI	5.2	4.1	3.1	.9	1.6	1.9	1.5	1.3	1.3	1.2	1.2	1.2	3.3	1.6	1.3
Previous Tealbook	5.2	4.1	3.1	.9	1.5	1.5	1.4	1.2	1.2	1.2	1.2	1.2	3.3	1.4	1.2
Ex. food & energy	1.7	2.5	2.7	1.7	1.7	1.5	1.5	1.5	1.5	1.5	1.5	1.5	2.2	1.6	1.5
Previous Tealbook	1.7	2.5	2.7	1.7	1.8	1.6	1.5	1.5	1.5	1.5	1.5	1.5	2.2	1.6	1.5
ECI, hourly compensation[2]	2.1	3.2	1.4	2.0	2.5	2.5	2.4	2.4	2.3	2.3	2.3	2.3	2.2	2.4	2.3
Previous Tealbook[2]	2.1	3.2	1.4	1.9	2.3	2.4	2.4	2.4	2.3	2.3	2.3	2.3	2.2	2.4	2.3
Nonfarm business sector															
Output per hour	-.6	-.1	1.9	.8	.3	1.3	1.7	2.2	1.1	1.3	1.5	1.8	.5	1.4	1.4
Previous Tealbook	-.6	-.1	2.2	2.1	.7	.9	1.5	1.9	1.0	1.1	1.2	1.6	.9	1.3	1.2
Compensation per hour	5.6	-.3	-.2	2.3	2.3	2.4	2.3	2.3	2.2	2.2	2.1	2.1	1.8	2.3	2.2
Previous Tealbook	5.6	-.3	-.2	2.2	2.3	2.3	2.3	2.2	2.2	2.2	2.2	2.1	1.8	2.3	2.2
Unit labor costs	6.2	-.2	-2.1	1.5	2.0	1.1	.6	.1	1.1	.9	.6	.3	1.3	1.0	.7
Previous Tealbook	6.2	-.2	-2.4	.1	1.5	1.3	.8	.3	1.2	1.1	1.0	.5	.9	1.0	.9
Core goods imports chain-wt. price index[3]	8.3	7.2	2.4	-.8	-1.2	.0	.7	1.4	1.5	1.6	1.6	1.5	4.2	.2	1.5
Previous Tealbook[3]	8.3	7.2	2.3	-.7	-.9	.4	.7	1.2	1.4	1.4	1.4	1.4	4.2	.4	1.4

1. Change from fourth quarter of previous year to fourth quarter of year indicated.
2. Private-industry workers.
3. Core goods imports exclude computers, semiconductors, oil, and natural gas.

Greensheets

Changes in Prices and Costs

(Change from fourth quarter of previous year to fourth quarter of year indicated, unless otherwise noted)

Item	2005	2006	2007	2008	2009	2010	2011	2012	2013
GDP chain-wt. price index	3.5	2.9	2.6	2.1	.7	1.6	2.1	1.6	1.4
Previous Tealbook	3.5	2.9	2.6	2.1	.7	1.6	2.1	1.6	1.4
PCE chain-wt. price index	3.2	1.9	3.5	1.7	1.5	1.3	2.5	1.4	1.3
Previous Tealbook	3.2	1.9	3.5	1.7	1.5	1.3	2.5	1.4	1.2
Energy	21.5	-3.7	19.3	-8.8	2.6	6.2	11.7	1.4	-.8
Previous Tealbook	21.5	-3.7	19.3	-8.8	2.6	6.2	11.3	-.3	-1.6
Food	1.5	1.7	4.7	7.0	-1.7	1.3	5.0	1.1	1.2
Previous Tealbook	1.5	1.7	4.7	7.0	-1.7	1.3	5.2	1.2	1.2
Ex. food & energy	2.3	2.3	2.4	2.0	1.7	1.0	1.7	1.5	1.4
Previous Tealbook	2.3	2.3	2.4	2.0	1.7	1.0	1.7	1.5	1.4
Ex. food & energy, market based	2.0	2.2	2.1	2.2	1.7	.7	1.8	1.4	1.3
Previous Tealbook	2.0	2.2	2.1	2.2	1.7	.7	1.7	1.4	1.3
CPI	3.7	2.0	4.0	1.6	1.5	1.2	3.3	1.6	1.3
Previous Tealbook	3.7	2.0	4.0	1.6	1.5	1.2	3.3	1.4	1.2
Ex. food & energy	2.1	2.7	2.3	2.0	1.7	.6	2.2	1.6	1.5
Previous Tealbook	2.1	2.7	2.3	2.0	1.7	.6	2.2	1.6	1.5
ECI, hourly compensation[1]	2.9	3.2	3.0	2.4	1.2	2.1	2.2	2.4	2.3
Previous Tealbook[1]	2.9	3.2	3.0	2.4	1.2	2.1	2.2	2.4	2.3
Nonfarm business sector									
Output per hour	1.6	.8	2.5	-1.1	5.3	2.5	.5	1.4	1.4
Previous Tealbook	1.6	.8	2.5	-1.1	5.3	2.5	.9	1.3	1.2
Compensation per hour	3.5	4.5	3.6	2.5	1.8	1.6	1.8	2.3	2.2
Previous Tealbook	3.5	4.5	3.6	2.5	1.8	1.6	1.8	2.3	2.2
Unit labor costs	1.9	3.6	1.1	3.7	-3.3	-.9	1.3	1.0	.7
Previous Tealbook	1.9	3.6	1.1	3.7	-3.3	-.9	.9	1.0	.9
Core goods imports chain-wt. price index[2]	2.2	2.5	2.9	3.7	-1.7	2.6	4.2	.2	1.5
Previous Tealbook[2]	2.2	2.5	2.9	3.7	-1.7	2.6	4.2	.4	1.4

1. Private-industry workers.
2. Core goods imports exclude computers, semiconductors, oil, and natural gas.

Other Macroeconomic Indicators

Item	2011 Q1	2011 Q2	2011 Q3	2011 Q4	2012 Q1	2012 Q2	2012 Q3	2012 Q4	2013 Q1	2013 Q2	2013 Q3	2013 Q4	2011[1]	2012[1]	2013[1]
Employment and production															
Nonfarm payroll employment[2]	.4	.5	.3	.4	.4	.4	.4	.5	.5	.5	.6	.6	1.6	1.7	2.1
Unemployment rate[3]	9.0	9.1	9.1	8.7	8.7	8.7	8.6	8.6	8.5	8.4	8.3	8.2	8.7	8.6	8.2
Previous Tealbook[3]	8.9	9.1	9.1	8.8	8.8	8.8	8.7	8.6	8.5	8.4	8.3	8.2	8.8	8.6	8.2
NAIRU[3]	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0
Previous Tealbook[3]	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0	6.0
GDP gap[4]	-5.7	-5.8	-5.8	-5.5	-5.6	-5.7	-5.6	-5.4	-5.4	-5.4	-5.3	-5.2	-5.5	-5.4	-5.2
Previous Tealbook[4]	-5.8	-5.8	-5.8	-5.5	-5.4	-5.5	-5.4	-5.2	-5.1	-5.1	-5.0	-4.8	-5.5	-5.2	-4.8
Industrial production[5]	4.8	.7	6.3	3.1	3.2	2.9	2.2	2.4	2.7	3.2	3.7	2.9	3.7	2.7	3.1
Previous Tealbook[5]	4.8	.6	5.2	2.6	2.4	2.3	2.3	2.2	3.2	3.2	3.3	3.3	3.3	2.3	3.2
Manufacturing industr. prod.[5]	7.2	.1	5.0	3.9	4.1	2.5	2.1	2.7	2.5	3.3	4.1	2.9	4.0	2.8	3.2
Previous Tealbook[5]	7.2	.0	4.3	2.7	2.7	1.6	2.0	2.5	3.3	3.3	3.5	3.5	3.5	2.2	3.4
Capacity utilization rate - mfg.[3]	74.5	74.4	75.1	75.6	76.2	76.4	76.6	76.9	77.1	77.5	77.9	78.2	75.6	76.9	78.2
Previous Tealbook[3]	74.5	74.4	74.9	75.3	75.6	75.7	75.8	76.1	76.4	76.8	77.1	77.5	75.3	76.1	77.5
Housing starts[6]	.6	.6	.6	.7	.7	.7	.8	.8	.9	.9	1.0	1.0	.6	.7	.9
Light motor vehicle sales[6]	13.0	12.1	12.4	13.4	13.4	13.4	13.5	13.6	13.9	14.1	14.6	14.7	12.7	13.5	14.3
Income and saving															
Nominal GDP[5]	3.1	4.0	4.4	3.8	3.3	3.6	3.8	4.1	3.5	3.6	3.8	4.2	3.8	3.7	3.8
Real disposable pers. income[5]	1.2	-.5	-1.9	2.7	3.4	3.0	3.3	3.5	-1.3	2.3	2.6	3.1	.4	3.3	1.7
Previous Tealbook[5]	1.2	-.5	-2.1	4.3	2.9	3.0	3.3	3.6	-1.3	2.4	2.7	3.2	.7	3.2	1.7
Personal saving rate[3]	5.0	4.8	3.9	4.1	4.4	4.5	4.7	4.9	4.0	4.0	4.0	4.1	4.1	4.9	4.1
Previous Tealbook[3]	5.0	4.8	3.8	4.3	4.4	4.6	4.8	5.0	4.1	4.2	4.3	4.4	4.3	5.0	4.4
Corporate profits[7]	4.2	13.7	6.9	-3.1	-.2	-6.1	-.8	-4.1	.6	.5	1.9	.7	5.2	-2.9	.9
Profit share of GNP[3]	12.4	12.7	12.8	12.5	12.4	12.1	12.0	11.8	11.7	11.6	11.6	11.5	12.5	11.8	11.5
Net federal saving[8]	-1,201	-1,275	-1,172	-1,127	-1,078	-1,069	-1,051	-1,043	-864	-842	-819	-805	-1,194	-1,060	-832
Net state & local saving[8]	-57	-40	-83	-70	-60	-45	-41	-35	-33	-20	-20	-19	-63	-45	-23
Gross national saving rate[3]	12.6	12.4	12.3	12.6	12.8	12.7	12.8	12.7	12.9	13.0	13.1	13.1	12.6	12.7	13.1
Net national saving rate[3]	-.1	-.4	-.5	.0	.3	.2	.2	.2	.3	.5	.5	.6	.0	.2	.6

1. Change from fourth quarter of previous year to fourth quarter of year indicated, unless otherwise indicated.
2. Change, millions.
3. Percent; annual values are for the fourth quarter of the year indicated.
4. Percent difference between actual and potential GDP; a negative number indicates that the economy is operating below potential. Annual values are for the fourth quarter of the year indicated.
5. Percent change, annual rate.
6. Level, millions; annual values are annual averages.
7. Percent change, annual rate, with inventory valuation and capital consumption adjustments.
8. Billions of dollars; annual values are annual averages.

Greensheets

Other Macroeconomic Indicators

(Change from fourth quarter of previous year to fourth quarter of year indicated, unless otherwise noted)

Item	2005	2006	2007	2008	2009	2010	2011	2012	2013
Employment and production									
Nonfarm payroll employment[1]	2.4	2.1	1.2	-2.8	-5.6	.7	1.6	1.7	2.1
Unemployment rate[2]	5.0	4.5	4.8	6.9	9.9	9.6	8.7	8.6	8.2
Previous Tealbook[2]	5.0	4.5	4.8	6.9	10.0	9.6	8.8	8.6	8.2
NAIRU[2]	5.0	5.0	5.0	5.3	6.0	6.0	6.0	6.0	6.0
Previous Tealbook[2]	5.0	5.0	5.0	5.3	6.0	6.0	6.0	6.0	6.0
GDP gap[3]	.0	.0	-.2	-5.4	-6.9	-5.4	-5.5	-5.4	-5.2
Previous Tealbook[3]	.0	.0	-.2	-5.4	-6.9	-5.4	-5.5	-5.2	-4.8
Industrial production[4]	2.3	2.3	2.5	-9.1	-5.5	6.2	3.7	2.7	3.1
Previous Tealbook[4]	2.3	2.3	2.5	-9.1	-5.5	6.2	3.3	2.3	3.2
Manufacturing industr. prod.[4]	3.4	2.0	2.8	-11.8	-6.1	6.1	4.0	2.8	3.2
Previous Tealbook[4]	3.4	2.0	2.8	-11.8	-6.1	6.1	3.5	2.2	3.4
Capacity utilization rate - mfg.[2]	78.5	78.4	79.0	70.1	67.7	73.3	75.6	76.9	78.2
Previous Tealbook[2]	78.5	78.4	79.0	70.1	67.7	73.3	75.3	76.1	77.5
Housing starts[5]	2.1	1.8	1.4	.9	.6	.6	.6	.7	.9
Light motor vehicle sales[5]	16.9	16.5	16.1	13.1	10.3	11.5	12.7	13.5	14.3
Income and saving									
Nominal GDP[4]	6.4	5.3	4.9	-1.2	.0	4.7	3.8	3.7	3.8
Real disposable pers. income[4]	.6	4.6	1.6	1.0	-2.4	3.5	.4	3.3	1.7
Previous Tealbook[4]	.6	4.6	1.6	1.0	-2.4	3.5	.7	3.2	1.7
Personal saving rate[2]	1.6	2.8	2.5	6.2	4.3	5.2	4.1	4.9	4.1
Previous Tealbook[2]	1.6	2.8	2.5	6.2	4.3	5.2	4.3	5.0	4.4
Corporate profits[6]	19.6	3.7	-8.1	-33.5	61.8	18.2	5.2	-2.9	.9
Profit share of GNP[2]	11.8	11.6	10.1	6.8	11.0	12.4	12.5	11.8	11.5
Net federal saving[7]	-283	-204	-245	-613	-1218	-1274	-1194	-1060	-832
Net state & local saving[7]	26	51	12	-72	-78	-25	-63	-45	-23
Gross national saving rate[2]	15.6	16.5	13.9	12.6	11.3	12.3	12.6	12.7	13.1
Net national saving rate[2]	3.6	4.4	1.7	-.6	-1.9	-.4	.0	.2	.6

1. Change, millions.
2. Percent; values are for the fourth quarter of the year indicated.
3. Percent difference between actual and potential GDP; a negative number indicates that the economy is operating below potential. Values are for the fourth quarter of the year indicated.
4. Percent change.
5. Level, millions; values are annual averages.
6. Percent change, with inventory valuation and capital consumption adjustments.
7. Billions of dollars; values are annual averages.

Staff Projections of Federal Sector Accounts and Related Items
(Billions of dollars except as noted)

Item	Fiscal year				2011				2012				2013			
	2010[a]	2011[a]	2012	2013	Q1[a]	Q2[a]	Q3[a]	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
Unified budget					Not seasonally adjusted											
Receipts[1]	2163	2302	2469	2710	488	714	568	555	524	763	626	607	567	836	700	648
Outlays[1]	3456	3599	3576	3563	949	855	895	877	967	893	839	924	917	878	843	927
Surplus/deficit[1]	-1293	-1297	-1107	-853	-460	-141	-326	-322	-443	-130	-213	-317	-350	-43	-143	-280
Previous Tealbook	*-1293*	*-1296*	*-1149*	*-904*	*-460*	*-141*	*-325*	*-348*	*-437*	*-135*	*-228*	*-328*	*-364*	*-53*	*-159*	*-288*
On-budget	-1370	-1364	-1079	-855	-451	-202	-311	-346	-407	-159	-166	-325	-329	-88	-113	-302
Off-budget	77	67	-29	2	-10	61	-15	24	-35	30	-47	8	-21	45	-30	23
Means of financing																
Borrowing	1474	1110	1102	933	260	93	389	326	429	144	203	337	370	63	163	300
Cash decrease	-35	252	8	0	225	-19	79	-28	26	-20	30	0	0	0	0	0
Other[2]	-146	-65	-3	-80	-24	67	-142	23	-12	6	-20	-20	-20	-20	-20	-20
Cash operating balance, end of period	310	58	50	50	118	137	58	86	60	80	50	50	50	50	50	50
NIPA federal sector					Seasonally adjusted annual rates											
Receipts	2379	2531	2688	2934	2528	2554	2572	2599	2687	2716	2749	2778	2955	2985	3018	3050
Expenditures	3648	3765	3769	3826	3729	3829	3744	3726	3766	3785	3800	3821	3818	3827	3837	3855
Consumption expenditures	1042	1070	1076	1074	1059	1078	1085	1067	1079	1080	1079	1078	1078	1073	1066	1058
Defense	697	715	718	719	701	723	733	709	720	722	722	722	722	718	712	706
Nondefense	346	355	358	355	358	354	352	357	359	358	357	356	356	355	353	352
Other spending	2606	2695	2693	2752	2670	2752	2659	2660	2687	2705	2721	2743	2741	2754	2772	2797
Current account surplus	-1269	-1234	-1081	-892	-1201	-1275	-1172	-1127	-1078	-1069	-1051	-1043	-864	-842	-819	-805
Gross investment	165	165	156	153	161	160	164	155	157	157	156	156	154	152	149	146
Gross saving less gross investment[3]	-1305	-1263	-1093	-890	-1227	-1298	-1197	-1141	-1091	-1079	-1059	-1048	-864	-838	-810	-791
Fiscal indicators[4]																
High-employment (HEB) surplus/deficit	-943	-929	-745	-537	-906	-961	-844	-794	-745	-730	-710	-702	-507	-482	-459	-445
Change in HEB, percent of potential GDP	1.1	-.3	-1.3	-1.4	-.7	.3	-.8	-.3	-.3	-.1	-.2	-.1	-1.2	-.2	-.2	-.1
Fiscal impetus (FI), percent of GDP	0.5	-0.4	-0.4	-1.1	-0.6	0.4	-0.1	-1.2	-0.2	-0.5	-0.5	-0.4	-1.8	-0.9	-1.0	-0.7
Previous Tealbook	*0.5*	*-0.3*	*-0.3*	*-1.1*	*-0.6*	*0.4*	*-0.1*	*-0.7*	*-0.0*	*-0.5*	*-0.4*	*-0.3*	*-1.6*	*-0.8*	*-1.0*	*-0.9*

1. Budget receipts, outlays, and surplus/deficit include corresponding social security (OASDI) categories. The OASDI surplus and the Postal Service surplus are excluded from the on-budget surplus and shown separately as off-budget, as classified under current law.
2. Other means of financing are checks issued less checks paid, accrued items, and changes in other financial assets and liabilities.
3. Gross saving is the current account surplus plus consumption of fixed capital of the general government as well as government enterprises.
4. HEB is gross saving less gross investment (NIPA) of the federal government in current dollars, with cyclically sensitive receipts and outlays adjusted to the staff's measure of potential output and the NAIRU. The sign on Change in HEB, as a percent of nominal potential GDP, is reversed. FI is the weighted difference of discretionary changes in federal spending and taxes in chained (2005) dollars, scaled by real GDP. The FI estimates are calendar year contributions to Q4/Q4 real GDP growth. Also, for FI and the change in HEB, positive values indicate aggregate demand stimulus. Quarterly figures for change in HEB and FI are not at annual rates.
a Actual.

Change in Debt of the Domestic Nonfinancial Sectors
(Percent)

Period[1]	Total	Households			Business	State and local governments	Federal government	Memo: Nominal GDP
		Total	Home mortgages	Consumer credit				
Year								
2006	8.7	9.9	11.1	4.1	11.1	3.7	3.9	5.3
2007	8.5	6.7	6.9	5.8	13.6	5.4	4.9	4.9
2008	6.0	.1	-.5	1.5	6.2	.7	24.2	-1.2
2009	3.0	-1.7	-1.4	-4.4	-2.4	3.9	22.7	.0
2010	4.1	-2.1	-2.9	-1.8	.7	2.2	20.2	4.7
2011	3.6	-.9	-2.1	2.9	4.0	-1.9	11.4	3.8
2012	4.2	.6	-.9	4.8	3.4	1.4	10.6	3.7
2013	4.0	1.6	-.0	6.4	3.9	1.2	7.7	3.8
Quarter								
2010:1	3.5	-3.1	-4.8	-3.9	-.1	2.4	20.6	5.5
2	3.9	-2.2	-2.5	-3.3	-1.3	-.5	22.5	5.4
3	3.7	-2.2	-2.5	-2.2	1.8	2.1	16.0	3.9
4	4.9	-.7	-1.8	2.3	2.4	4.8	16.4	4.2
2011:1	2.3	-1.8	-2.6	2.2	4.1	-3.3	7.9	3.1
2	3.1	-.6	-2.4	3.5	4.5	-3.5	8.6	4.0
3	4.3	-1.2	-1.9	1.4	3.4	.0	14.1	4.4
4	4.6	-.0	-1.6	4.6	3.9	-.8	13.1	3.8
2012:1	4.9	-.0	-1.3	3.3	3.4	1.7	13.5	3.3
2	3.9	.5	-1.0	4.8	3.2	1.5	9.5	3.6
3	3.0	.7	-.8	5.1	3.2	1.3	5.8	3.8
4	5.0	1.1	-.5	5.7	3.4	1.2	12.2	4.1
2013:1	4.6	1.4	-.2	6.0	3.7	1.2	10.2	3.5
2	3.5	1.6	.0	6.2	3.8	1.2	6.0	3.6
3	3.0	1.7	.1	6.4	3.9	1.2	4.0	3.8
4	4.8	1.7	.1	6.3	3.9	1.2	10.0	4.2

Note: Quarterly data are at seasonally adjusted annual rates.
1. Data after 2011:Q3 are staff projections. Changes are measured from end of the preceding period to end of period indicated except for annual nominal GDP growth, which is calculated from Q4 to Q4.

Flow of Funds Projections: Highlights
(Billions of dollars at seasonally adjusted annual rates except as noted)

Category	2010	2011	2012	2013	2011		2012				2013			
					Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
Domestic nonfinancial sectors														
Net funds raised														
Total	1167.1	852.3	1211.1	1269.2	1010.4	1241.2	1460.3	1118.0	734.4	1531.6	1517.9	1091.9	860.2	1606.6
Net equity issuance	-278.0	-484.9	-410.0	-340.0	-606.6	-494.8	-400.0	-400.0	-420.0	-420.0	-320.0	-320.0	-360.0	-360.0
Net debt issuance	1445.1	1337.1	1621.1	1609.2	1617.0	1736.0	1860.3	1518.0	1154.4	1951.6	1837.9	1411.9	1220.2	1966.6
Borrowing indicators														
Debt (percent of GDP)[1]	249.1	249.1	249.6	250.5	248.0	248.4	249.3	249.9	249.7	249.6	250.4	250.7	250.4	250.2
Borrowing (percent of GDP)	9.9	8.9	10.4	9.9	10.7	11.3	12.0	9.7	7.3	12.3	11.5	8.7	7.5	11.9
Households														
Net borrowing[2]	-278.4	-122.7	73.7	213.5	-158.8	-4.8	-5.3	63.9	94.1	141.9	182.7	211.1	229.7	230.5
Home mortgages	-298.2	-211.8	-88.2	-0.0	-185.6	-158.0	-127.8	-98.0	-78.2	-48.8	-19.5	0.0	9.7	9.7
Consumer credit	-44.2	71.3	120.0	167.0	33.6	113.4	82.2	120.7	129.9	147.1	157.2	164.9	172.9	172.9
Debt/DPI (percent)[3]	120.3	114.7	110.3	108.0	114.3	113.2	111.9	110.7	109.6	108.5	108.9	108.3	107.7	107.0
Business														
Financing gap[4]	-197.1	-201.9	-93.9	66.7	-257.3	-196.0	-158.9	-121.0	-76.7	-18.8	35.3	51.9	68.9	110.8
Net equity issuance	-278.0	-484.9	-410.0	-340.0	-606.6	-494.8	-400.0	-400.0	-420.0	-420.0	-320.0	-320.0	-360.0	-360.0
Credit market borrowing	77.0	449.3	391.6	462.5	392.2	443.6	399.9	378.1	382.7	405.7	438.1	456.4	473.5	482.0
State and local governments														
Net borrowing	66.2	-57.3	43.0	38.0	1.0	-23.9	50.0	46.0	38.0	38.0	38.0	38.0	38.0	38.0
Current surplus[5]	257.0	214.6	203.1	233.2	212.1	173.8	185.6	202.0	208.8	215.9	220.3	234.9	237.6	239.8
Federal government														
Net borrowing	1580.2	1067.9	1112.9	895.2	1382.6	1321.2	1415.7	1030.1	639.6	1366.0	1179.2	706.4	479.1	1216.2
Net borrowing (n.s.a.)	1580.2	1067.9	1112.9	895.2	389.1	326.0	428.8	143.6	203.3	337.2	369.6	62.7	163.2	299.7
Unified deficit (n.s.a.)	1275.1	1251.4	1102.6	815.2	328.1	321.7	442.7	129.5	213.2	317.2	349.6	42.7	143.2	279.7
Depository institutions														
Funds supplied	-181.1	154.9	339.6	371.6	489.9	432.1	375.5	306.0	327.2	349.7	357.3	356.7	382.1	390.5

Note: Data after 2011:Q3 are staff projections.
1. Average debt levels in the period (computed as the average of period-end debt positions) divided by nominal GDP.
2. Includes change in liabilities not shown in home mortgages and consumer credit.
3. Average debt levels in the period (computed as the average of period-end debt positions) divided by disposable personal income.
4. For corporations, excess of capital expenditures over U.S. internal funds.
5. NIPA state and local government saving plus consumption of fixed capital and net capital transfers.
n.s.a. Not seasonally adjusted.

Greensheets

Foreign Real GDP and Consumer Prices: Selected Countries
(Quarterly percent changes at an annual rate)

			Projected									
	2011				2012				2013			
Measure and country	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
Real GDP [1]												
Total foreign	3.7	2.3	3.6	2.0	2.5	2.3	2.5	2.7	2.8	2.9	3.0	3.1
Previous Tealbook	*3.9*	*2.4*	*3.6*	*2.3*	*2.5*	*2.4*	*2.6*	*2.7*	*2.9*	*3.0*	*3.0*	*3.1*
Advanced foreign economies	1.8	.0	2.7	.6	.6	.5	.9	1.2	1.4	1.4	1.5	1.8
Canada	3.5	-.5	3.5	2.0	1.9	1.7	2.0	2.1	2.0	2.0	2.0	2.2
Japan	-6.6	-2.0	5.6	.4	2.8	1.8	1.6	1.5	1.4	1.3	1.3	1.3
United Kingdom	1.7	-.0	2.3	-.3	.1	.4	.7	1.1	1.5	1.6	1.9	2.1
Euro area	3.1	.6	.5	-1.2	-1.9	-1.7	-1.0	-.3	.2	.5	.7	1.0
Germany	5.5	1.1	2.0	-.9	-.9	-.7	-.1	.3	.7	1.1	1.2	1.7
Emerging market economies	5.8	4.8	4.6	3.5	4.6	4.3	4.2	4.3	4.4	4.5	4.6	4.6
Asia	8.0	5.0	4.7	3.7	5.5	5.3	5.3	5.4	5.6	5.7	5.8	5.8
Korea	5.4	3.6	3.3	3.5	3.4	3.4	3.4	3.4	3.6	3.7	3.9	4.1
China	8.7	9.5	9.5	8.2	8.0	7.9	7.9	7.9	8.0	8.1	8.1	8.1
Latin America	3.5	4.8	4.6	3.3	3.6	3.2	3.0	3.0	3.1	3.1	3.2	3.3
Mexico	2.3	5.2	5.5	3.5	3.7	3.2	2.9	2.9	2.9	2.9	3.1	3.1
Brazil	3.2	2.9	-.2	2.2	3.1	3.1	3.1	3.1	3.5	3.6	3.6	3.8
Consumer prices [2]												
Total foreign	4.3	3.2	3.1	3.1	2.3	2.4	2.3	2.3	2.3	2.3	2.3	2.3
Previous Tealbook	*4.3*	*3.2*	*3.1*	*3.5*	*2.6*	*2.3*	*2.2*	*2.2*	*2.2*	*2.2*	*2.3*	*2.3*
Advanced foreign economies	3.2	2.1	1.0	2.8	1.6	1.2	1.3	1.3	1.1	1.1	1.1	1.2
Canada	3.6	3.1	1.1	3.5	2.4	1.8	1.8	1.7	1.7	1.7	1.7	1.8
Japan	.4	-.8	-.3	-.5	-.4	-.4	-.4	-.4	-.3	-.3	-.3	-.3
United Kingdom	7.0	3.7	3.5	4.6	1.9	1.6	1.6	2.8	1.5	1.3	1.6	2.8
Euro Area	3.6	2.8	1.3	4.1	1.9	1.5	1.5	1.4	1.2	1.2	1.2	1.2
Germany	3.5	2.3	1.8	2.9	2.3	2.3	2.0	1.9	1.6	1.5	1.6	1.6
Emerging market economies	5.1	4.1	4.6	3.3	3.0	3.3	3.1	3.1	3.2	3.2	3.2	3.2
Asia	5.3	4.8	5.3	2.4	2.2	3.2	2.9	2.9	3.0	3.0	3.0	3.0
Korea	6.0	2.8	4.8	2.3	2.7	3.0	3.0	3.0	3.0	3.0	3.0	3.0
China	4.6	5.8	6.2	1.8	1.6	3.0	2.7	2.7	2.9	2.9	2.9	2.9
Latin America	4.3	2.5	3.6	5.5	4.7	3.6	3.8	3.8	3.8	3.7	3.7	3.7
Mexico	3.6	1.8	3.3	5.3	4.4	3.3	3.5	3.5	3.5	3.4	3.4	3.4
Brazil	9.5	7.5	5.6	6.4	6.0	5.3	4.9	4.9	5.3	5.1	4.9	4.9

[1] Foreign GDP aggregates calculated using shares of U.S. exports.
[2] Foreign CPI aggregates calculated using shares of U.S. non-oil imports.

Foreign Real GDP and Consumer Prices: Selected Countries
(Percent change, Q4 to Q4)

Measure and country	2005	2006	2007	2008	2009	2010	2011 (Projected)	2012 (Projected)	2013 (Projected)
Real GDP [1]									
Total foreign	4.0	4.2	4.3	-.9	.9	4.4	2.9	2.5	3.0
Previous Tealbook	*4.1*	*4.1*	*4.4*	*-.9*	*.8*	*4.3*	*3.1*	*2.5*	*3.0*
Advanced foreign economies	2.7	2.6	2.6	-2.0	-1.3	2.8	1.3	.8	1.5
Canada	3.1	1.9	2.5	-.7	-1.4	3.3	2.1	1.9	2.0
Japan	2.1	2.1	1.6	-4.8	-.6	3.3	-.7	1.9	1.3
United Kingdom	2.8	2.1	4.1	-5.4	-.8	1.7	.9	.6	1.8
Euro area	2.2	3.8	2.3	-2.1	-2.1	2.0	.8	-1.2	.6
Germany	1.6	4.9	2.4	-1.9	-2.2	3.8	1.9	-.4	1.2
Emerging market economies	5.8	6.3	6.7	.4	3.5	6.1	4.7	4.4	4.5
Asia	7.6	7.8	8.8	.9	8.0	7.6	5.3	5.4	5.7
Korea	5.2	4.6	5.8	-3.2	6.3	4.7	3.9	3.4	3.8
China	10.3	12.8	13.7	7.7	11.4	9.6	9.0	7.9	8.1
Latin America	3.9	4.8	4.4	-.4	-.8	4.5	4.1	3.2	3.2
Mexico	3.6	4.1	3.5	-1.2	-2.3	4.2	4.1	3.2	3.0
Brazil	2.2	4.8	6.6	.9	5.3	5.4	2.0	3.1	3.6
Consumer prices [2]									
Total foreign	2.3	2.2	3.7	3.3	1.3	3.2	3.4	2.3	2.3
Previous Tealbook	*2.3*	*2.2*	*3.7*	*3.3*	*1.3*	*3.2*	*3.5*	*2.3*	*2.3*
Advanced foreign economies	1.6	1.4	2.2	2.0	.2	1.7	2.3	1.3	1.1
Canada	2.3	1.4	2.5	1.8	.8	2.2	2.8	2.0	1.7
Japan	-.7	.3	.5	1.0	-2.0	-.3	-.3	-.4	-.3
United Kingdom	2.1	2.7	2.1	3.9	2.2	3.4	4.7	2.0	1.8
Euro Area	2.3	1.8	2.9	2.3	.4	2.0	2.9	1.6	1.2
Germany	2.2	1.3	3.1	1.7	.3	1.6	2.6	2.1	1.6
Emerging market economies	3.0	2.9	5.1	4.6	2.1	4.3	4.3	3.1	3.2
Asia	2.5	2.4	5.5	3.6	1.3	4.3	4.4	2.8	3.0
Korea	2.5	2.1	3.4	4.5	2.4	3.2	4.0	2.9	3.0
China	1.4	2.1	6.7	2.5	.6	4.7	4.6	2.5	2.9
Latin America	3.8	4.2	4.2	6.7	3.9	4.4	4.0	4.0	3.7
Mexico	3.1	4.1	3.8	6.2	4.0	4.3	3.5	3.7	3.4
Brazil	6.1	3.2	4.3	6.2	4.2	5.4	7.2	5.3	5.1

[1] Foreign GDP aggregates calculated using shares of U.S. exports.
[2] Foreign CPI aggregates calculated using shares of U.S. non-oil imports.

U.S. Current Account

Quarterly Data

	2011				Projected 2012				Projected 2013			
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
	Billions of dollars, s.a.a.r.											
U.S. current account balance	**-478.4**	**-498.9**	**-441.1**	**-453.4**	**-465.5**	**-422.5**	**-439.2**	**-461.0**	**-497.7**	**-463.5**	**-476.7**	**-497.8**
Previous Tealbook	*-478.4*	*-472.0*	*-390.7*	*-402.7*	*-439.8*	*-396.8*	*-416.6*	*-440.7*	*-477.6*	*-448.4*	*-463.9*	*-485.2*
Current account as percent of GDP	-3.2	-3.3	-2.9	-3.0	-3.0	-2.7	-2.8	-2.9	-3.1	-2.9	-2.9	-3.0
Previous Tealbook	*-3.2*	*-3.1*	*-2.6*	*-2.6*	*-2.8*	*-2.5*	*-2.6*	*-2.8*	*-3.0*	*-2.8*	*-2.8*	*-2.9*
Net goods & services	-559.9	-584.8	-542.3	-548.7	-569.7	-517.9	-528.4	-540.2	-567.3	-526.0	-523.2	-533.6
Investment income, net	219.5	236.6	242.1	236.3	243.7	231.1	228.1	220.1	209.0	198.2	185.5	176.8
Direct, net	315.9	322.1	323.5	293.0	286.7	270.7	268.5	265.2	262.3	260.4	257.0	258.0
Portfolio, net	-96.4	-85.5	-81.4	-56.7	-43.1	-39.6	-40.4	-45.0	-53.3	-62.3	-71.5	-81.2
Other income and transfers, net	-138.0	-150.7	-140.9	-141.0	-139.5	-135.6	-138.9	-141.0	-139.5	-135.6	-138.9	-141.0

Annual Data

	2005	2006	2007	2008	2009	2010	Projected 2011	Projected 2012	Projected 2013
	Billions of dollars								
U.S. current account balance	**-745.8**	**-800.6**	**-710.3**	**-677.1**	**-376.6**	**-470.9**	**-467.9**	**-447.1**	**-483.9**
Previous Tealbook	*-745.8*	*-800.6*	*-710.3*	*-677.1*	*-376.6*	*-470.9*	*-435.9*	*-423.5*	*-468.8*
Current account as percent of GDP	-5.9	-6.0	-5.1	-4.7	-2.7	-3.2	-3.1	-2.9	-3.0
Previous Tealbook	*-5.9*	*-6.0*	*-5.1*	*-4.7*	*-2.7*	*-3.2*	*-2.9*	*-2.7*	*-2.9*
Net goods & services	-708.6	-753.3	-696.7	-698.3	-381.3	-500.0	-558.9	-539.1	-537.5
Investment income, net	78.7	54.7	111.1	157.8	137.1	174.5	233.6	230.7	192.4
Direct, net	173.2	174.0	244.6	284.3	262.2	280.6	313.6	272.8	259.4
Portfolio, net	-94.5	-119.4	-133.5	-126.5	-125.1	-106.2	-80.0	-42.0	-67.1
Other income and transfers, net	-115.9	-102.0	-124.7	-136.6	-132.3	-145.3	-142.6	-138.8	-138.8

Abbreviations

ABCP	asset-backed commercial paper
ABS	asset-backed securities
AFE	advanced foreign economy
BLS	Bureau of Labor Statistics, Department of Labor
CDS	credit default swap
C&I	commercial and industrial
CMBS	commercial mortgage-backed securities
CP	commercial paper
CPI	consumer price index
CRE	commercial real estate
DPI	disposable personal income
ECB	European Central Bank
EDO Model	Estimated Dynamic Optimization-Based Model
EFSF	European Financial Stability Facility
EME	emerging market economy
E&S	equipment and software
ESM	European Stability Mechanism
EU	European Union
EUC	Emergency Unemployment Compensation
FOMC	Federal Open Market Committee; also, the Committee
FRBNY	Federal Reserve Bank of New York
GDP	gross domestic product
GSE	government-sponsored enterprise
HELOC	home equity line of credit
IMF	International Monetary Fund
IP	industrial production
IPO	initial public offering

Libor	London interbank offered rate
LLC	limited liability company
LTRO	longer-term refinancing operation
MBS	mortgage-backed securities
Michigan survey	Thomson Reuters/University of Michigan Surveys of Consumers
NAIRU	non-accelerating inflation rate of unemployment
NIPA	national income and product accounts
OIS	overnight index swap
OTC	over the counter
PCE	personal consumption expenditures
PMI	purchasing managers index
repo	repurchase agreement
RMBS	residential mortgage-backed securities
SEP	simplified employee pension
SLOOS	Senior Loan Officer Opinion Survey on Bank Lending Practices
SOMA	System Open Market Account
S&P	Standard & Poor's
TALF	Term Asset-Backed Securities Loan Facility
TIC	Treasury International Capital
TIPS	Treasury inflation-protected securities
VAT	value-added tax
WTI	West Texas Intermediate