

2015: Countdown to Lift Off & The Return Of Inflation

U.S. Economics Team

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March 2015



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Outlook Highlights

The US has reasserted itself as the dominant global economy.

While this cycle is becoming somewhat extended, there is nothing on the radar to suggest that the expansion will end any time soon.

The housing sector continues to be a mixed picture, but single family housing activity should improve in 2015 due to the continued strength of the labor market, the decline in the rate of home ownership to a sustainable level, the easing of mortgage credit standards, attractive housing affordability and some early signs of a resurgence in the rate of household formation.

The household sector continues to overcome roadblocks and will benefit from job growth and lower energy prices.

CAPEX spending remains disappointing and will suffer from reduced CAPEX spending in the energy sector. The aged state of the capital stock should provide a catalyst to CAPEX spending once US corporations begin to shift focus from the short-term to the longer-term.

The robust job growth and decline in the unemployment rate are indications that the labor market continues to chug along the path toward a return to normalcy.

The strength in the labor market is good news and what the Fed has been hoping to achieve since the labor market hit the skids in 2008. The labor market should be firing on all cylinders by the end of this year.

The missing piece of the full employment picture continues to be any evidence of sustained wage growth.

US inflation has been suppressed by the weakness in commodity-based goods prices, but there has also been a deceleration in service related inflation. Core inflation has also been decelerating; the lagged effects of lower energy prices has been a factor.

With the Fed back to a neutral balance sheet, the timing of the rate liftoff is the next important step in the normalization of monetary policy.

The Fed focus has shifted to inflation and wage growth as necessary conditions for the beginning of the rate normalization process later this year. Policymakers expect to implement liftoff when “reasonably confident” that inflation will begin to return toward the 2% inflation target.

Janet Yellen indicated that the Fed will not take a “mechanical” approach to making policy decisions but look at a “wide array of data.” Stanley Fischer’s three-point checklist is a useful guide, however.

The Fed continues to tinker with the details of the tools that it will utilize in the normalization process and will continue to do so over the next several months.. Policy implementation and communication challenges remain significant.

Business Cycle: Where We Are in the Cycle

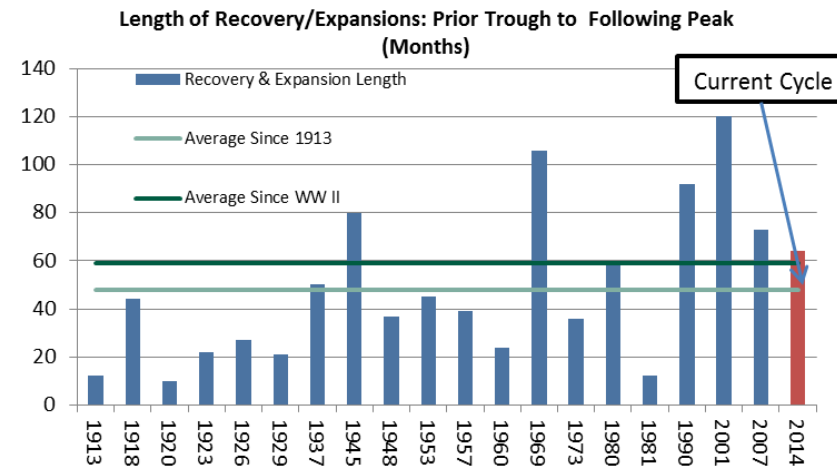
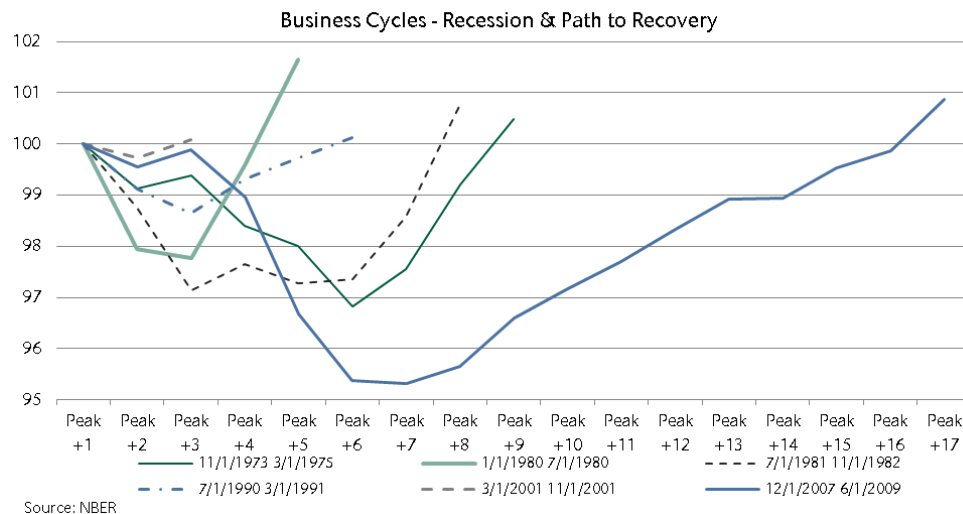
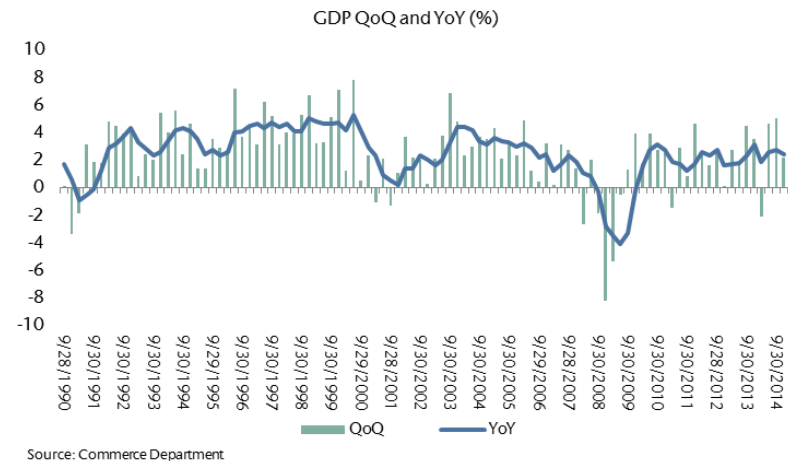
The economy commenced the 6th consecutive year of growth at the outset of Q3 2014. Since 1913, the recovery and expansion phase of the cycle has lasted an average of 4 years. Since WWII, the recovery and expansion phase of the cycle has averaged almost 5 years.

While this cycle is becoming somewhat extended, there is nothing on the radar to suggest that the expansion will end any time soon.

The labor market entered the expansion phase of the cycle in Q1 2014 and continues to improve. The expansion of the labor market, far-reaching effects of the expansion of the energy sector and pick-up in manufacturing activity are important for the continuation of the economic expansion. The late-cycle housing recovery also poses upside risks that have yet to materialize.

Increased CAPEX spending to replace aged capital stock provides a potential upside risk that has yet to materialize to a significant degree.

CAPEX spending in the energy sector has already suffered from the decline in energy prices and will continue to do so.



Business Cycle: Sources of Growth...

The economy has grown at an average of a bit more than 2.3% per quarter during the current cycle. Private sector growth has averaged almost 2.6%.

Consumer spending and fixed investment have made the largest contributions to growth, with investment spending being the second biggest contributor. The contribution from housing has been minimal.

Government spending has provided a drag of 0.2% per quarter on GDP growth during this cycle. State and local governments have turned a fiscal corner and will continue to make modest contributions to growth going forward. The federal government will continue to be a drag on growth.

The contribution to growth from the housing sector will improve now that the rate of home ownership has reverted back toward a sustainable rate.

Anatomy of the Recovery & Expansion Contribution to GDP Growth by Sector													
	Q1 2012	Q2 2012	Q3 2012	Q4 2012	Q1 2013	Q2 2013	Q3 2013	Q4 2013	Q1 2014	Q2 2014	Q3 2014	2nd Est Q4 2014	Recovery Average
Real GDP	2.30%	1.60%	2.50%	0.10%	2.70%	1.80%	4.50%	3.50%	-2.10%	4.60%	5.00%	2.20%	2.34%
PCE	1.87%	0.86%	1.32%	1.32%	2.45%	1.23%	1.39%	2.51%	0.83%	1.75%	2.21%	2.83%	1.58%
Durable goods	0.75%	0.16%	0.57%	0.64%	0.61%	0.33%	0.36%	0.42%	0.23%	0.99%	0.67%	0.44%	0.50%
Nondurable goods	0.31%	0.13%	0.17%	0.02%	0.74%	-0.03%	0.43%	0.41%	0.00%	0.34%	0.39%	0.57%	0.28%
Services	0.81%	0.57%	0.58%	0.65%	1.11%	0.93%	0.59%	1.69%	0.60%	0.42%	1.15%	1.82%	0.80%
Fixed Investment	1.24%	0.61%	0.45%	0.96%	0.42%	0.74%	1.01%	0.95%	0.03%	1.45%	1.21%	0.71%	0.77%
Nonresidential	0.66%	0.50%	0.09%	0.44%	0.20%	0.21%	0.67%	1.23%	0.20%	1.18%	1.10%	0.61%	0.62%
Structures	0.46%	0.27%	-0.04%	-0.19%	-0.33%	0.19%	0.29%	0.34%	0.08%	0.35%	0.14%	0.14%	0.01%
Equipment	0.17%	0.03%	0.03%	0.44%	0.28%	0.09%	0.27%	0.76%	-0.06%	0.63%	0.63%	0.05%	0.46%
Intellectual Prop	0.03%	0.19%	0.10%	0.19%	0.24%	-0.31%	0.11%	0.14%	0.18%	0.21%	0.34%	0.41%	0.16%
Residential	0.59%	0.11%	0.37%	0.52%	0.22%	0.53%	0.34%	-0.28%	-0.17%	0.27%	0.10%	0.11%	0.15%
Chg Inventories	-0.20%	0.27%	-0.19%	-1.80%	0.70%	0.30%	1.49%	-0.34%	-1.16%	1.42%	-0.03%	0.12%	0.38%
Net Exports	-0.10%	-0.04%	0.38%	0.78%	-0.08%	-0.54%	0.14%	0.99%	-1.53%	-0.34%	0.78%	-1.15%	-0.15%
+Exports	0.19%	0.64%	0.28%	0.19%	-0.12%	0.82%	0.67%	1.30%	-1.30%	1.43%	0.61%	0.42%	0.73%
-Imports	-0.29%	-0.68%	0.10%	0.59%	0.04%	-1.36%	-0.09%	-0.22%	-0.36%	-1.77%	0.16%	-1.58%	-0.88%
Government	-0.56%	-0.08%	0.52%	-1.20%	-0.75%	0.04%	0.04%	-0.71%	-0.15%	0.31%	0.80%	-0.32%	-0.24%
Federal	-0.25%	-0.08%	0.59%	-1.10%	-0.79%	-0.26%	-0.08%	-0.79%	-0.01%	-0.06%	0.68%	-0.54%	-0.11%
State and local	-0.31%	0.00%	-0.17%	-0.10%	0.04%	0.31%	0.13%	0.07%	-0.14%	0.38%	0.13%	0.22%	-0.13%

Source: Commerce Dept & Jefferies

Business Cycle: Consumer Picture Is Gradually Improving

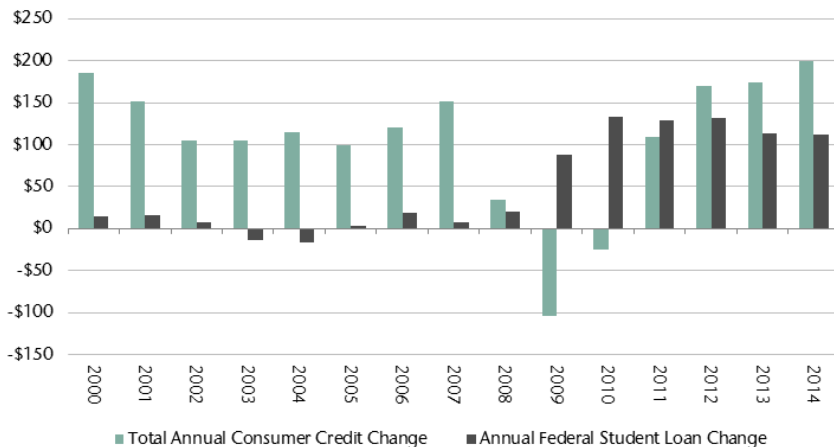
Overall, consumer behavior provides evidence that the Fed's QE has not had a widespread impact on consumer spending.

Real PCE growth has been remarkably steady and tempered for an extended period. Spending has been constrained by moderate wage & income growth, while confidence has been slow to recover. The 2013 tax hike was an impediment to faster spending growth.

The prospects for consumer spending will continue to gradually improve as the labor market continues to generate job growth, wage growth finally accelerates and confidence continues to rise. Lower energy prices will also provide a lift to spending.

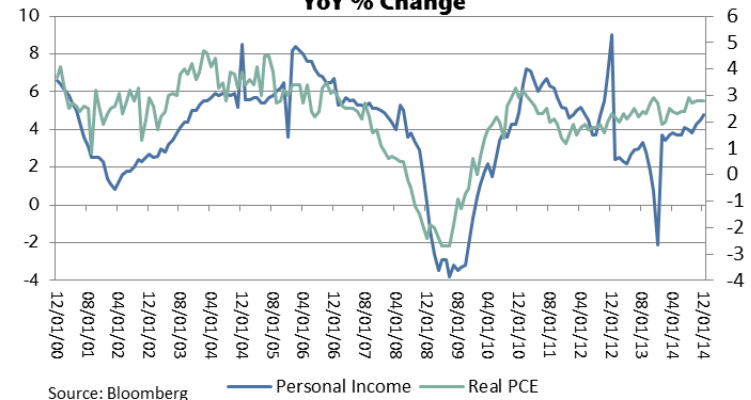
Student loan growth has dominated the increase in consumer credit since the crisis, but has been slowing. Auto loans came to life in 2011 along with vehicle sales. Revolving credit growth has recently begun to perk-up.

Total Consumer Credit versus Student Loans (blns)



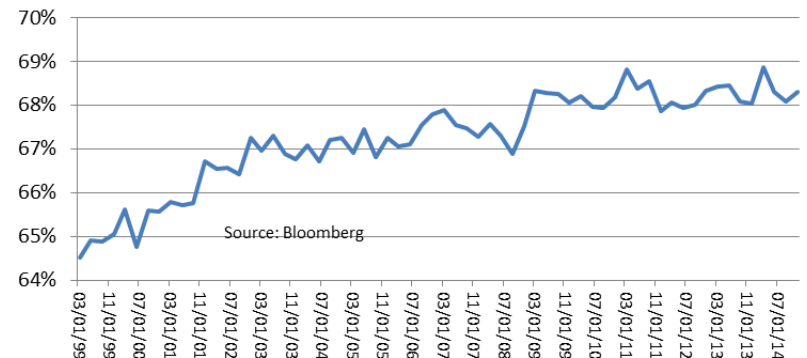
Source: Federal Reserve

**Personal Income (LHS) & Real PCE (RHS)
YoY % Change**



Source: Bloomberg

Real PCE Share of Real GDP



Source: Bloomberg

Business Cycle: Consumers Overcome Roadblocks

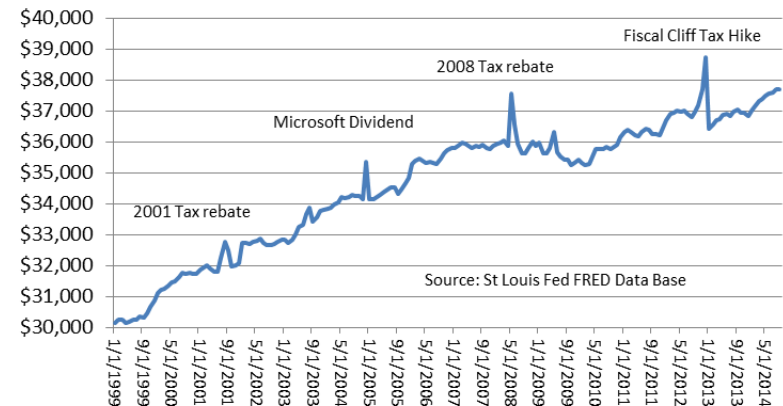
Household disposable income was distorted and suppressed by the 2013 tax hike. The tax hike also caused disposable income to downshift to a slower growth trajectory.

Households were in the process of restructuring damaged balance sheets prior to the ill-timed tax hike. With less income at their disposal, households were forced to dig into savings to finance the tax hike and attempt to sustain a standard of living.

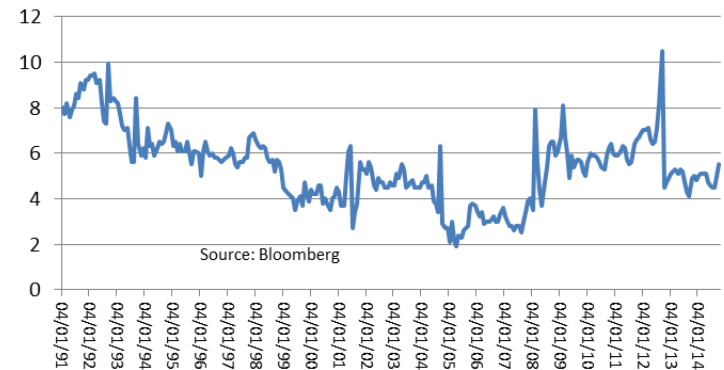
Growth in real PCE lost momentum as a consequence.

The good news is that real disposable income has recovered and the savings rate has returned back to 5%. This suggests that consumers are in a more comfortable financial position, which paves the way for faster spending.

Real Disposable Personal Income per Capita



US Savings Rate



Business Cycle: The Role of Gasoline & Autos for Consumers

Lower gasoline prices tend to contribute to improving consumer attitudes.

Lower gasoline prices also increase the potential for discretionary spending to accelerate, especially in the lower half of the income strata.

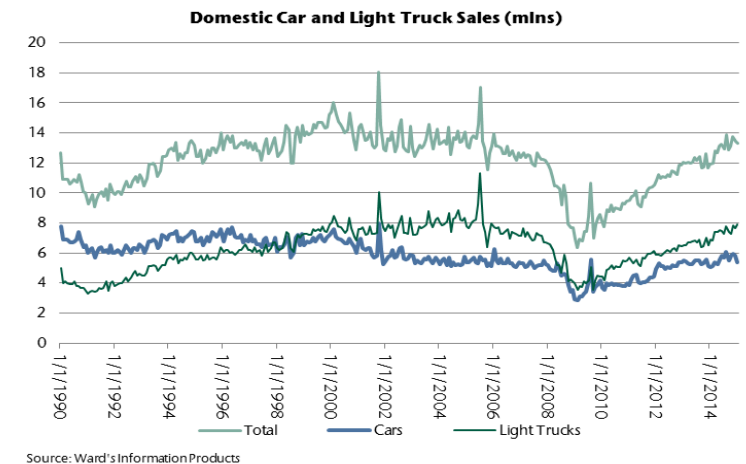
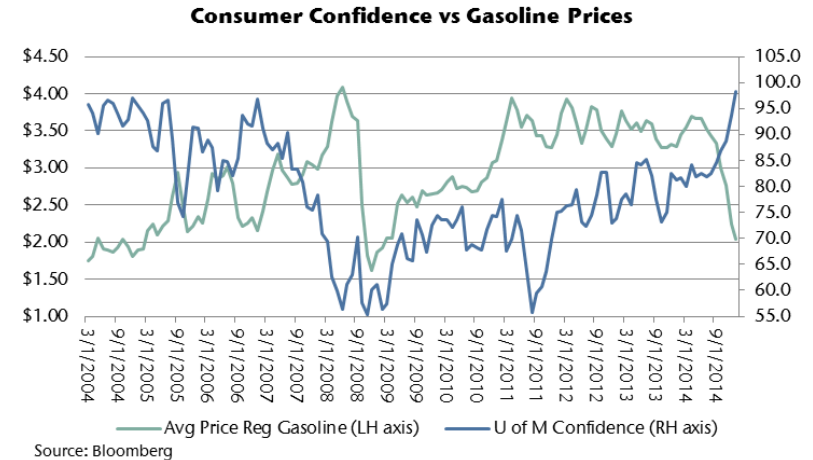
Real PCE surged 4.2% in Q4 of 2014, but this rapid pace has not been sustained.

Rising auto sales have been driven at least in part by replacement sales of an aged fleet.

The average age of all cars and trucks reached 11.4 years in 2013 and remains elevated.

The behavior of auto sales suggests that there also may also be pent up demand for other consumer durables that have an extended average age.

Lower gas prices have been positive for light truck sales.



Business Cycle: Still Mixed Picture in the Housing Sector

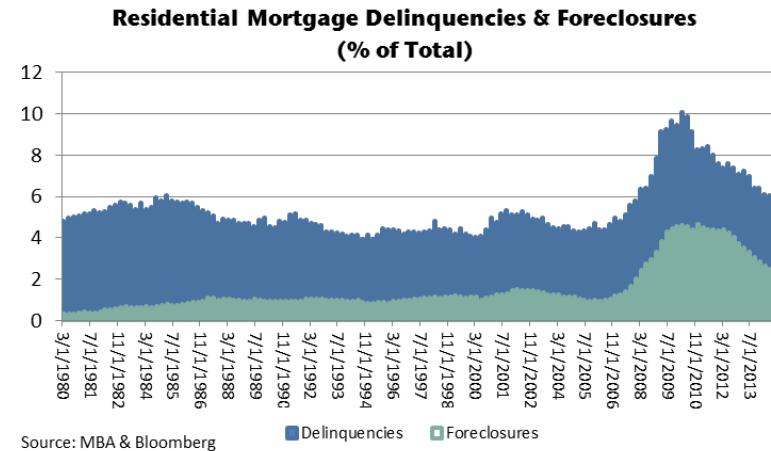
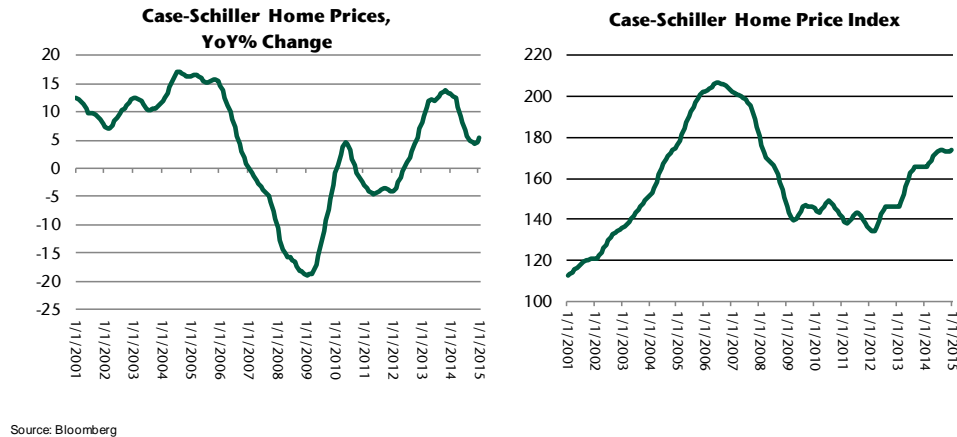
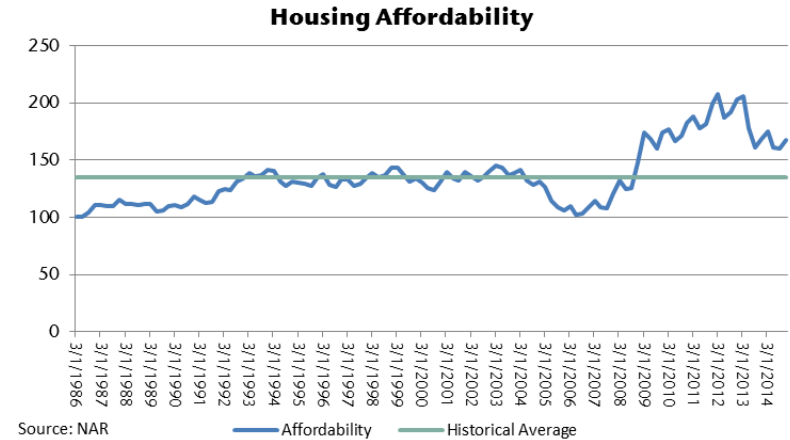
The housing sector remains a mixed picture.

Housing affordability remains attractive.

After consecutive years of sharp increases, the rate of increase in home prices has moderated and appears to be stabilizing.

Home prices remain well below the inflated prices reached during the housing bubble.

Both delinquency and foreclosure rates continue to decline but remain somewhat elevated by historical standards.



Business Cycle: Not the Typical Housing Recovery Part I

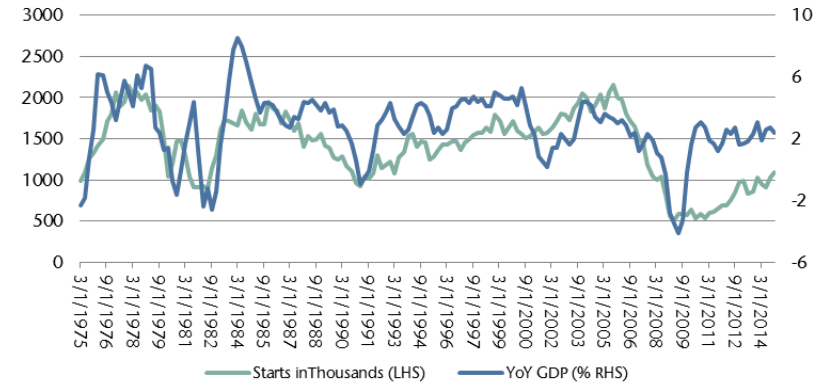
Some type of housing boom had led every prior recovery and expansion since WWII. The housing recovery in this cycle has lagged the overall improvement in the economy to-date.

The improvement in the housing sector has been led by multi-family housing activity. Single family housing activity has been a significant laggard.

Prospects have improved with the decline in the rate of home ownership back toward a sustainable level.

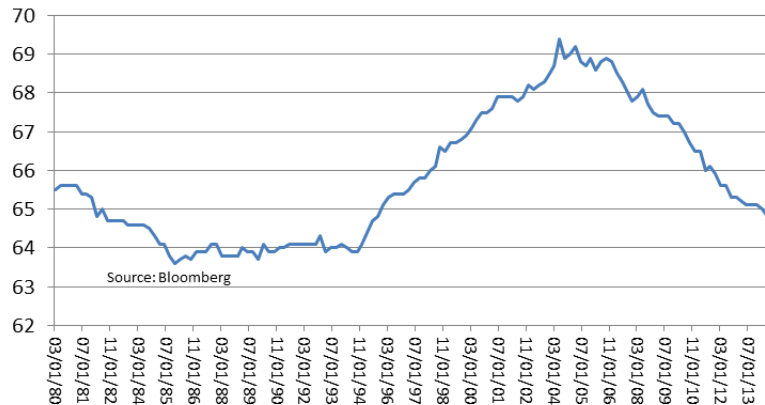
The surge in Q4 2014 household formation, continued solid job growth and low interest rates are also supportive.

Housing Starts (Thousands) vs YoY GDP Growth (%)



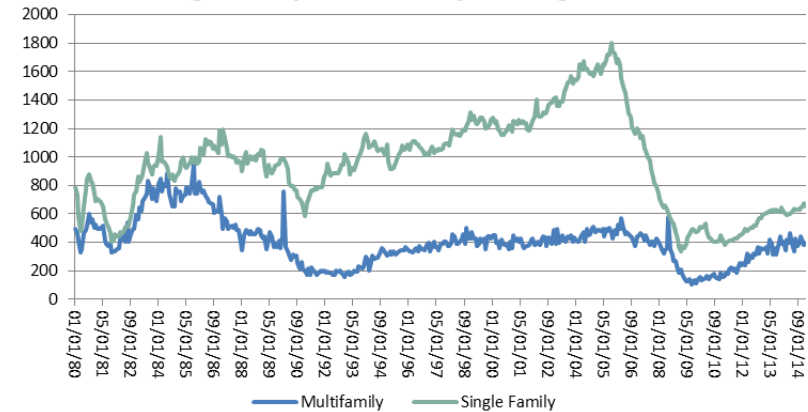
Source: Commerce Department & BEA

Rate of Home Ownership (%)



Source: Bloomberg

Single Family & Multifamily Housing Starts



Source: Commerce Dept

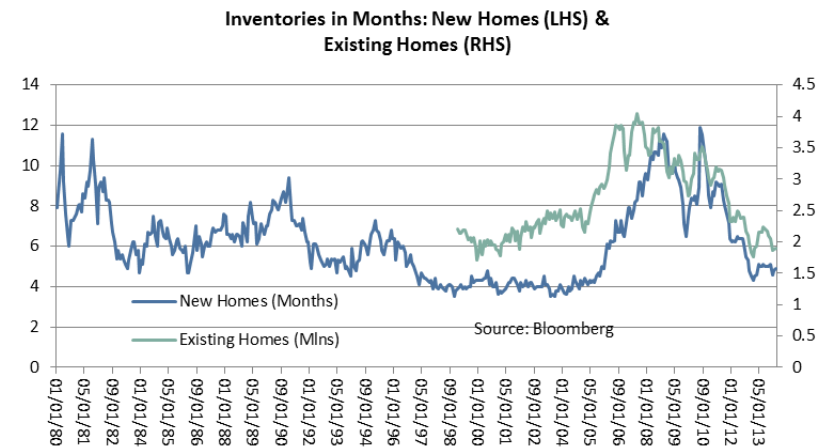
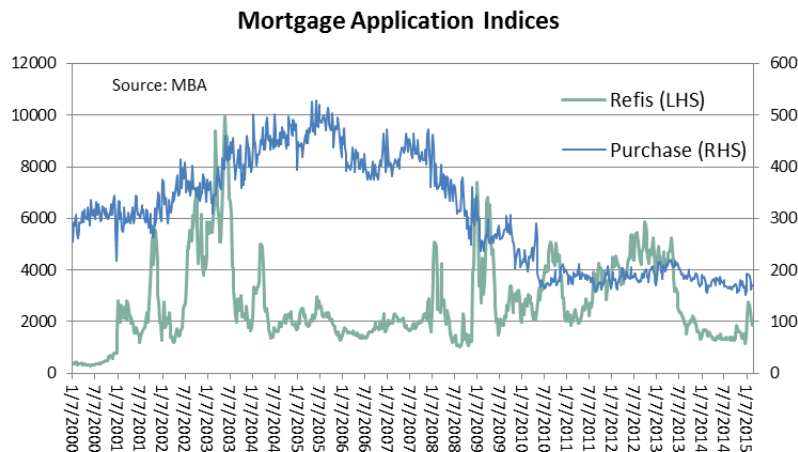
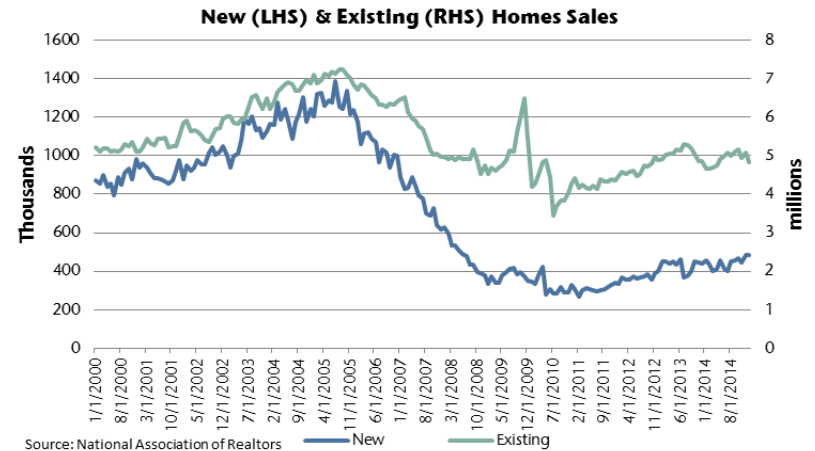
Business Cycle: Not the Typical Housing Recovery Part II

Both new home sales and existing home sales have improved since the beginning of the recovery. Sales have also remained erratic and lost momentum.

Inventories in both markets remain low, which has been part of the problem with existing home sales

Inventories also remain low in the new home market because the rise in new home sales and, consequently, new home construction have been slow and erratic.

The trend in mortgage lending has not been encouraging and has reflected tighter lending standards to a significant degree. The late 2014 agreement by the Fed, SEC and HUD to loosen mortgage lending standards should help to provide a lift to lending and the single family home sector.



Secular Imbalance: Service-Dominated Economy, Inflection Point

One of the most significant underlying imbalances in the US economy is a consequence of a steady expansion of the service sector of the economy relative to the goods-producing sector.

Over the past fifty years, the share of the US labor force employed in the service sector of the economy has increased and the share of workers employed in the goods-producing sector has declined as the industrial base has gradually eroded.

Currently, roughly 85% of the US labor force is employed in service-providing activities, with only 15% employed in goods-producing activity such as manufacturing, mining and construction.

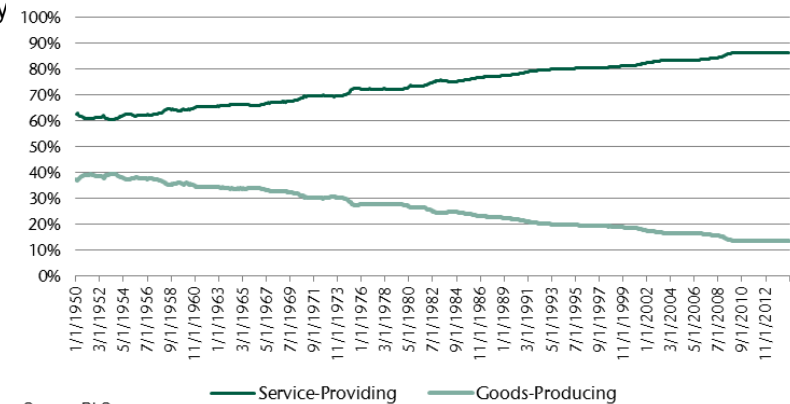
One way of looking at this imbalance is it takes 85% of the US labor force to generate a monthly service sector trade surplus of roughly \$20 bln. That is a serious imbalance!

The decline in goods-producing activities has been fundamental to the sizable monthly trade deficits in goods that have been a drag on the economy and growth for the past thirty years.

This trend appears to be reaching an inflection point due to ongoing changes in the manufacturing and energy sectors.

Domestic energy production and manufacturing activity are coming back to life on both a cyclical and secular basis, which has helped to reverse the trend toward larger trade deficits.

Composition of US Labor Force



Source: BLS

Goods Deficit & Services Surplus (blns)



Source: Census Bureau & Jefferies

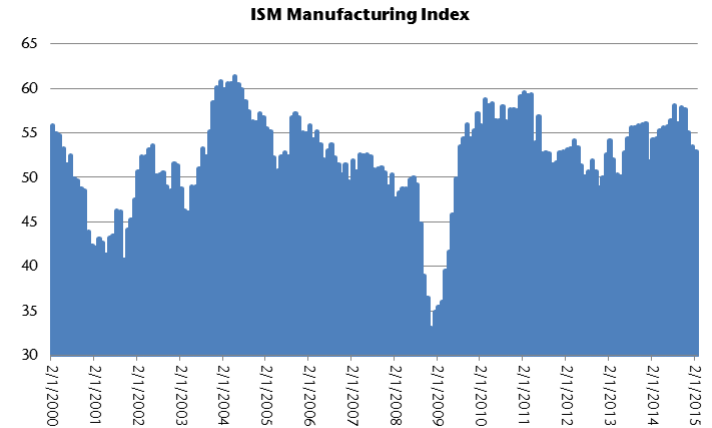
Secular Imbalance: Manufacturing Activity Is Back on Track

Manufacturing activity has been gradually accelerating, and manufacturing payrolls have been rising

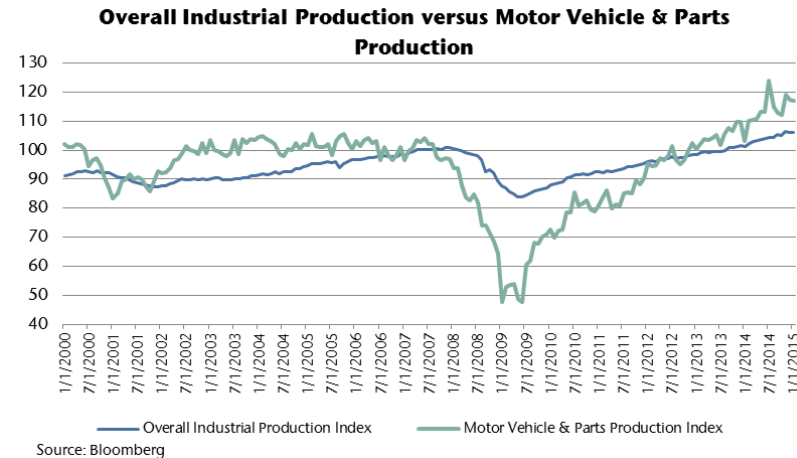
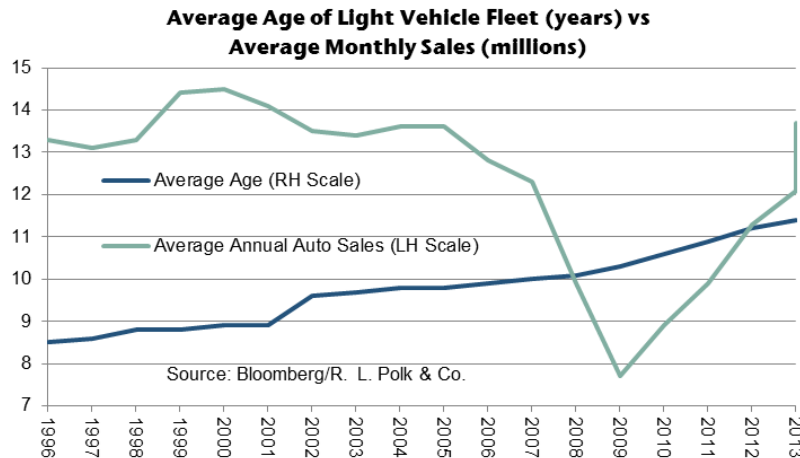
Rising aircraft orders and solid auto sales have helped to revive manufacturing.

Auto production will continue to rise due to demand that will be supported by the improved labor market and the effect of the aged fleet on rising auto sales. Low fuel prices will continue to help to boost light truck sales.

Strong Boeing orders have created a significant order backlog that will keep the aeronautics sector busy for quarters to come.



Source: Institute for Supply Management



Source: Bloomberg

Secular Imbalance: Improved Manufacturing Outlook & CAPEX

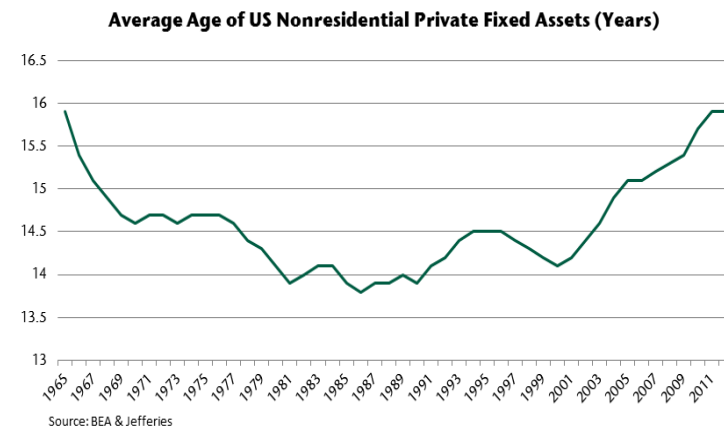
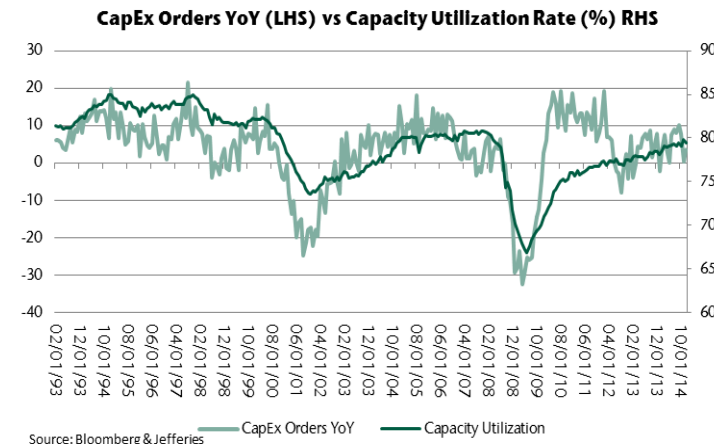
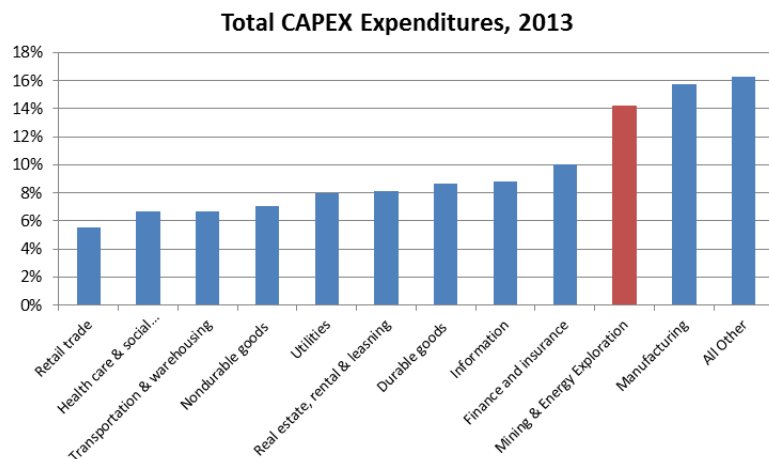
US manufacturing has become more cost competitive due to the combination of sluggish US wage growth and lower US energy prices.

The South has become the epicenter of the manufacturing renaissance primarily because labor costs tend to be lower in the South than in other regions of the country. Also, a disproportionate share of low tax states are in the South.

CAPEX spending has failed to generate sustained momentum in part because capacity rates are not yet sufficiently elevated. Businesses have also placed a higher priority on using cash on balance sheets for stock buybacks rather than longer-term investment.

Lower energy prices will also take a bite out of CAPEX spending in the energy sector.

Nonetheless, we expect a pent up demand for capital goods to emerge at some point as the US economy continues to grow. The age of the outstanding stock of capital goods is the oldest in decades and will also provide a catalyst to investment spending.



Secular Imbalance: Revived Energy Sector Is Part of Improving Manufacturing Story

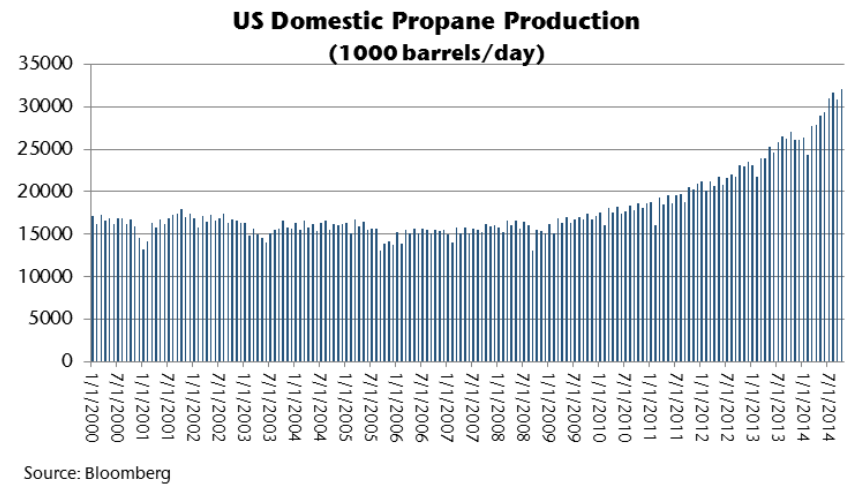
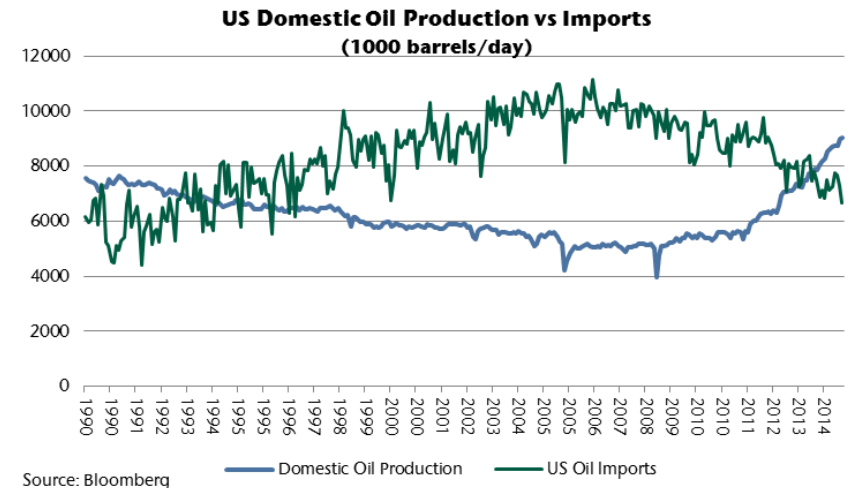
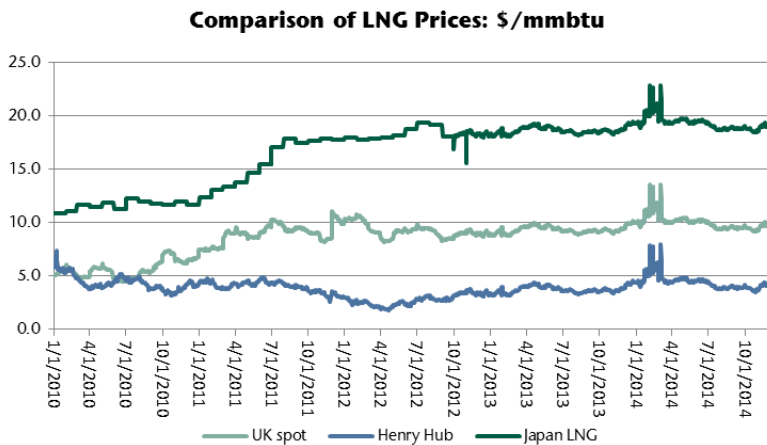
The US energy sector kicked into a higher gear in recent years.

The US now produces more crude oil than it imports for the first time in decades and US propane production has increased substantially.

The US also has the potential to become a major exporter of oil and natural gas if the government can muster a coherent energy policy.

That is unlikely to happen for the foreseeable future.

The US is also a low cost producer of natural gas, which has beneficial effects on the US consumer and business sectors, especially manufacturing and transportation.



Inflation: Deflation, Disinflation & Inflation Expectations

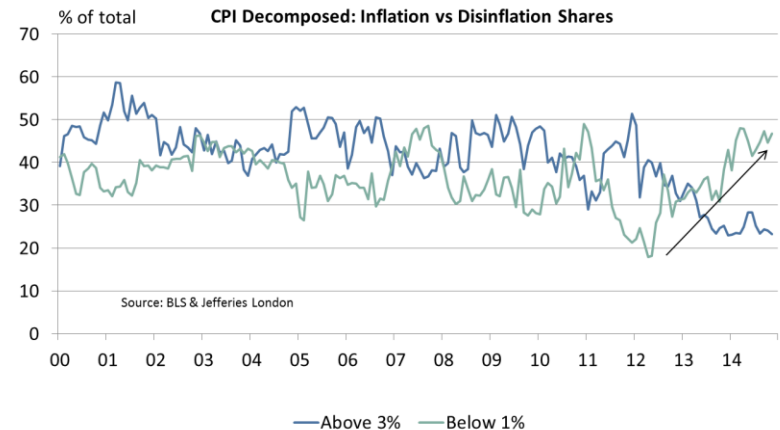
The Fed has not achieved the 2% PCE inflation target since April 2012.

Since that time, the share of CPI prices that are rising at a pace of less than 1% yoy has increased significantly.

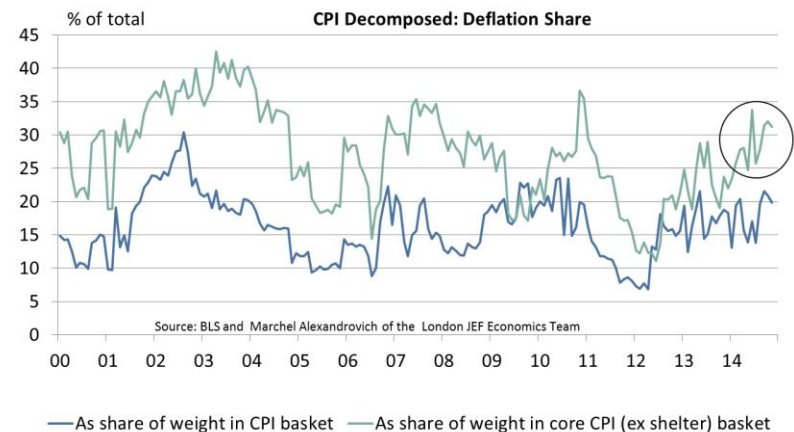
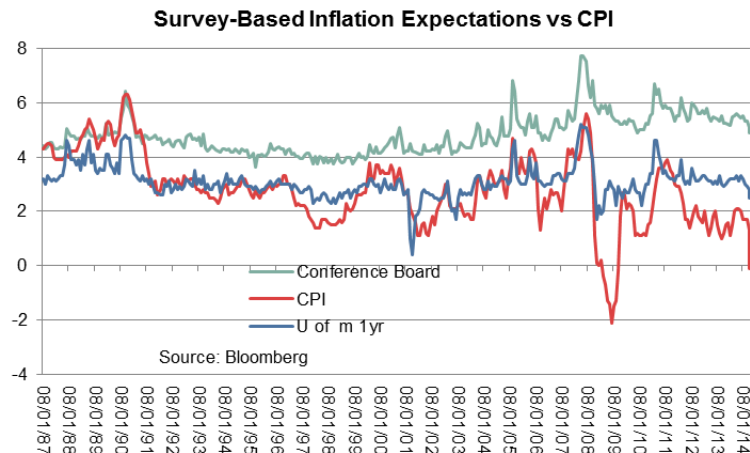
The share of CPI prices that are rising at 3% yoy or faster has also declined.

The share of items in the CPI basket in deflation has also increased.

The soft tone of inflation has not been reflected to a significant degree in consumer expectations.



Source: BLS and Marchel Alexandrovich of the London JEF Economics Team



Inflation: Service & Goods Prices Diverge, Commodity Price Volatility

Commodity-based goods inflation has been flirting with disinflation or in outright deflation for the past two years.

The US imports about \$200 bln in goods on a monthly basis, and changes in the prices of these goods are determined in global markets that tend to be volatile.

Consequently, changes in the commodity components of the CPI have been the primary source of volatility in the headline CPI.

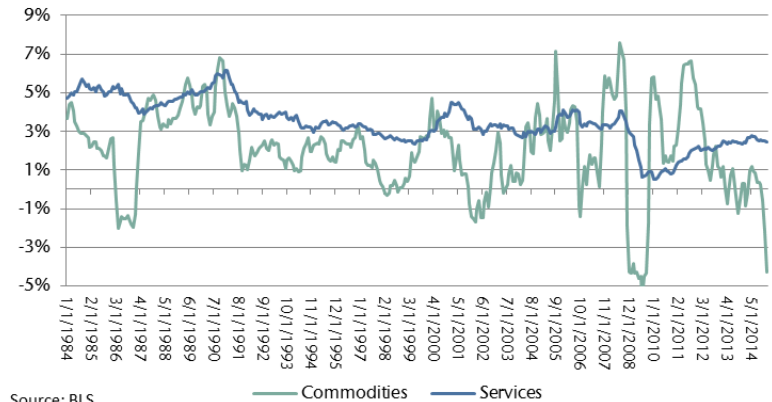
Service-based inflation has run as high as 2.8% yoy, but has decelerated.

Service inflation will probably continue to decelerate in the months ahead due to a lagged reaction to lower energy prices.

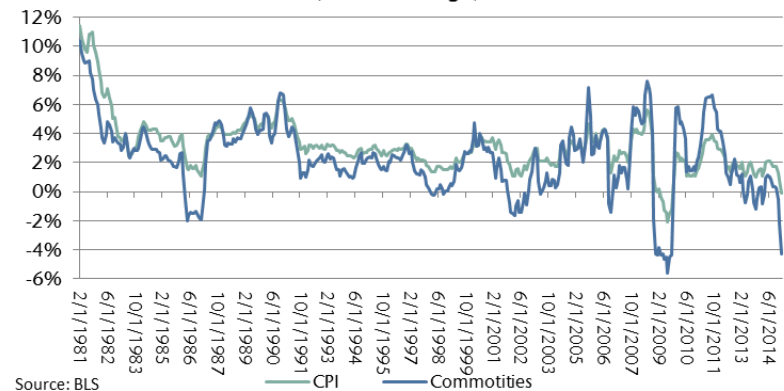
The key to headline inflation going forward will continue to be the global commodity markets.

Positive base effects are unlikely to be significant until late in 2015.

CPI: Commodity-Based Goods vs Service Components



Headline CPI & Commodity-Based Goods Components (YoY % Change)



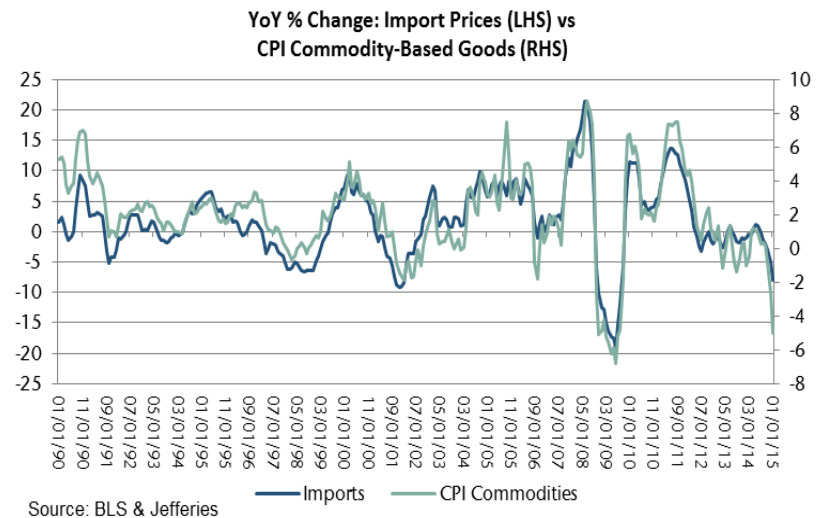
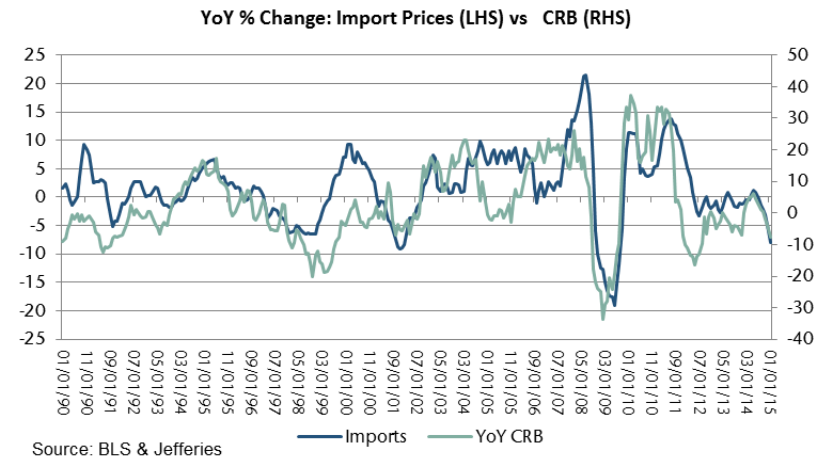
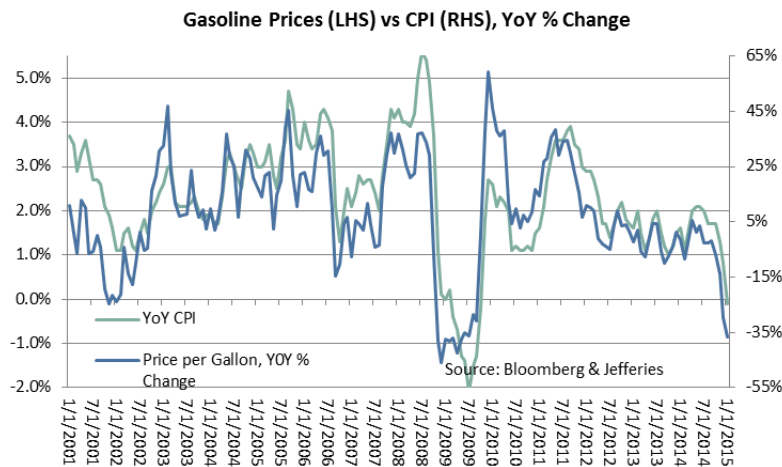
Inflation: Commodity & Import Prices, the Gasoline Effect

The disinflation trend of the past few years has been driven by commodity price movement.

Since commodity prices tend to be set on global commodity markets, changes in global commodity prices are transmitted with a short lag to the US through import prices.

Changes in import prices filter through to changes in the commodity-based goods component of the CPI.

Historically, gasoline prices have had an outsized impact on the inflation measures when movement has been more extreme than historical seasonal patterns.



Inflation: Rents, OER & Service Inflation

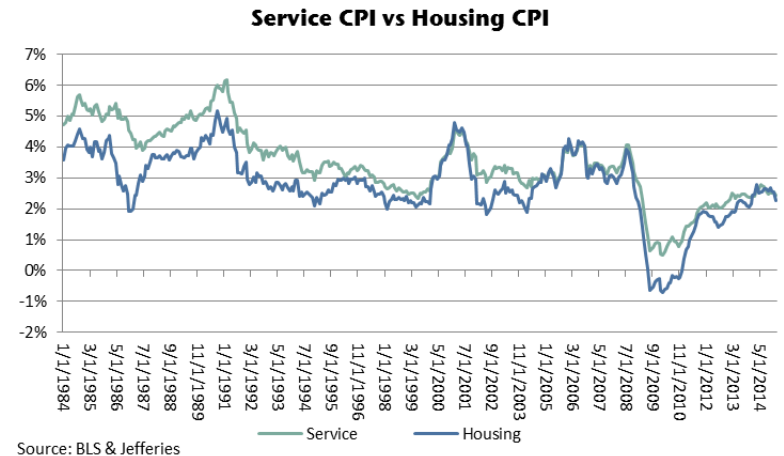
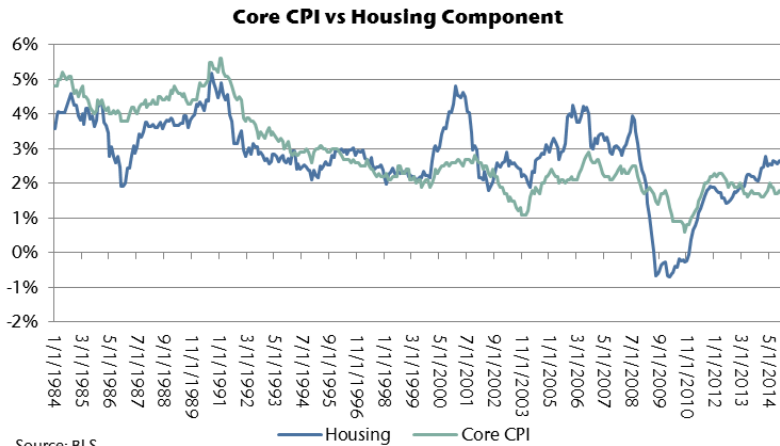
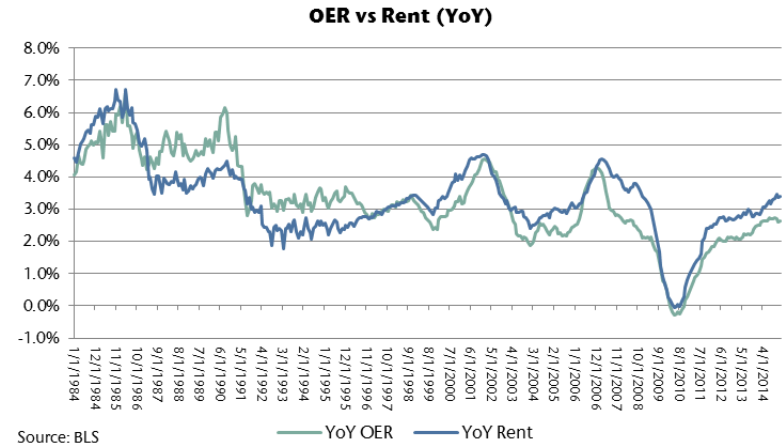
Rent and, consequently, the OER have been rising after collapsing during the recession and crisis. The rise in both have been significant drivers behind the acceleration in the service component of the CPI, although the YoY increase in each to-date has been moderate by historical standards.

The decline in the rate of home ownership has been a driving force in the housing sector and has also indirectly affected inflation measures.

Specifically, rents have continued to rise because of the increased demand for rental properties as primary residence.

The OER has been accelerating because rents have been rising.

The housing component has been the primary contributor to the core CPI and service inflation to-date in this cycle.



Inflation: Detailed CPI Breakdown

As of January, the headline CPI was down 0.2% yoy, while the core CPI was up 1.2% yoy.

By comparison, the PCE deflator was up 0.2% and the core PCE deflator was up 1.3%.

The rise in service prices was running at a 2.4% yoy pace, while commodity-based (goods) prices were in deflation. with a 5% decline.

The divergence in service-related and commodity-based prices is not reflected in the medical component. Medical commodity prices are up 3.9% yoy, while service prices are up 1.7%.

After decelerating from 4.5% in December 2011 to 1.1% in December 2013, food prices have re-accelerated and are up 3.2%.

January 2015		NSA	NSA	NSA	SA	SA	SA
Major Categories	Weighting	% Chng	Contribution	YoY	% Chng	Contribution	YoY
Total CPI	100.000	-0.5%	-0.5%	-0.1%	-0.7%	-0.68%	-0.2%
Core CPI	77.426	0.1%	0.1%	1.6%	0.2%	0.14%	1.6%
Food & Beverages	15.143	0.2%	0.0%	3.1%	-0.1%	-0.01%	3.1%
Housing	41.873	0.4%	0.1%	2.3%	0.1%	0.06%	2.3%
Apparel	3.461	-1.1%	0.0%	-1.4%	0.3%	0.01%	-1.4%
Transportation	15.473	-4.5%	-0.7%	-10.6%	-5.0%	-0.77%	-11.0%
Medical care	7.650	0.3%	0.0%	2.6%	0.0%	0.00%	2.6%
Recreation	5.725	0.4%	0.0%	0.0%	0.2%	0.01%	0.0%
Education & communication	7.037	0.1%	0.0%	0.4%	0.2%	0.01%	0.4%
Other goods & services	3.368	0.5%	0.0%	1.8%	0.4%	0.01%	1.8%
Food & Beverages	15.143	0.2%	0.0%	3.1%	-0.1%	-0.01%	3.1%
Food	14.131	-0.2%	0.0%	3.3%	0.0%	-0.01%	3.2%
Food at home	8.348	0.3%	0.0%	3.3%	0.3%	0.02%	3.3%
Food away from home	5.783	0.2%	0.0%	3.1%	0.2%	0.01%	3.1%
Alcoholic beverages	1.012	-0.1%	0.0%	1.0%	-0.3%	0.00%	1.0%
Housing	41.873	0.4%	0.1%	2.3%	0.1%	0.06%	2.3%
Shelter	32.482	0.4%	0.1%	2.9%	0.3%	0.09%	2.9%
OER	24.163	0.2%	0.1%	2.6%	0.2%	0.06%	2.6%
Rent (primary)	7.099	0.2%	0.0%	3.4%	0.2%	0.02%	3.4%
Fuels & utilities	5.209	0.5%	0.0%	1.0%	-0.4%	-0.02%	1.0%
Furnishings & operations	4.181	0.1%	0.0%	-1.1%	0.0%	0.00%	-1.1%
Transportation	15.473	-4.5%	-0.7%	-10.6%	-5.0%	-0.77%	-11.0%
Private	14.584	-4.7%	-0.7%	-11.2%	-5.4%	-0.78%	-11.7%
New cars & trucks	3.529	0.0%	0.0%	0.5%	-0.1%	0.00%	0.5%
Used cars & trucks	1.606	-0.3%	0.0%	-4.0%	-0.1%	0.00%	-4.0%
Motor fuel	4.444	-17.1%	-0.8%	-35.2%	-18.7%	-0.83%	-35.4%
-Gasoline	4.364	-17.1%	-0.7%	-35.4%	-18.7%	-0.82%	-35.4%
Vehicle parts/maintenance	0.430	0.2%	0.0%	-0.4%	0.2%	0.00%	-0.4%
Public	1.159	-1.2%	0.0%	-1.8%	-0.1%	0.00%	-1.8%
Medical Care	7.650	0.3%	0.0%	2.6%	0.0%	0.00%	2.6%
Commodities	1.751	0.1%	0.0%	3.9%	-0.3%	0.00%	3.9%
Professional Services	3.011	0.2%	0.0%	1.7%	0.0%	0.00%	1.7%
Recreation	5.725	0.4%	0.0%	0.0%	0.2%	0.01%	0.0%
Video & audio	0.291	0.4%	0.0%	-0.3%	-0.4%	0.00%	-0.2%
Education & communication	7.037	0.1%	0.0%	0.4%	0.2%	0.01%	0.4%
Education	3.306	0.3%	0.0%	3.7%	0.5%	0.02%	3.7%
Communication	3.731	0.0%	0.0%	-2.3%	-0.1%	0.00%	-2.3%
Other	3.368	0.5%	0.0%	1.8%	0.4%	0.01%	1.8%
Tobacco	0.708	0.1%	0.0%	2.4%	0.1%	0.00%	2.4%
Personal care	2.660	0.6%	0.0%	1.7%	0.6%	0.02%	1.7%
Commodities	38.294	-2.2%	-0.8%	-5.0%	-2.2%	-0.84%	-4.3%
Services	61.706	0.4%	0.2%	2.4%	0.2%	0.15%	2.4%

Source: BLS & Jefferies

Labor Market: Expansion Makes More Headway

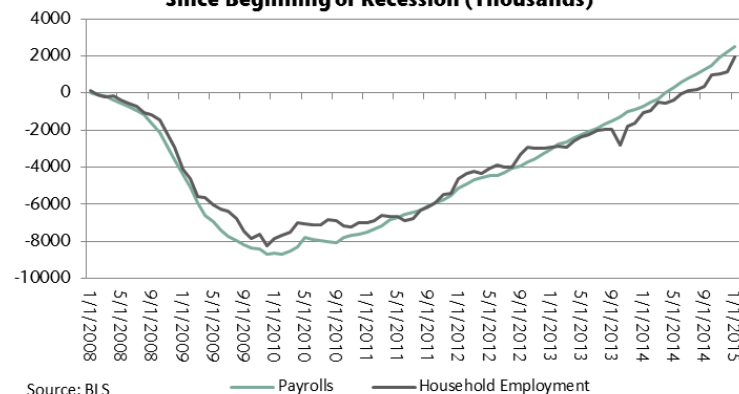
Private nonfarm payrolls have risen every month since March 2010, with average increases of 200k per month.

The labor market entered the expansion phase of the cycle as of Q1 2014.

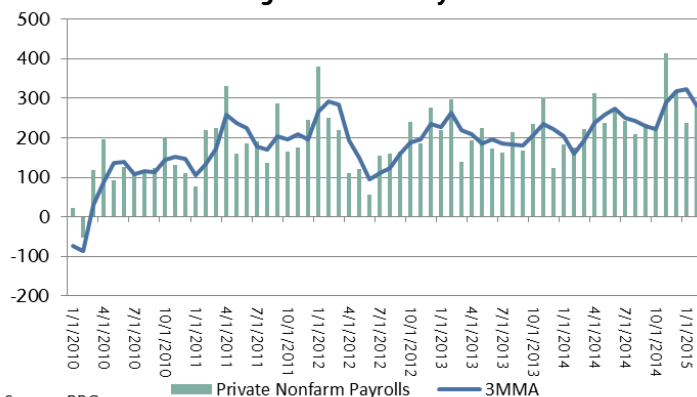
Payrolls have experienced a series of mini-cycles of alternating accelerating and decelerating growth.

Labor market conditions will continue to become more conducive to an acceleration of earnings growth as the labor market expansion continues.

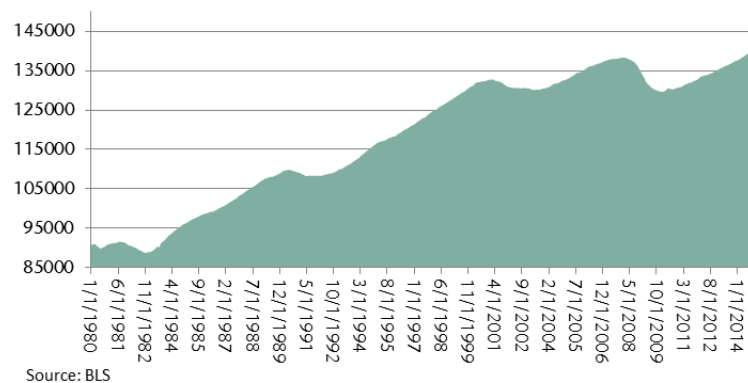
Cumulative Payrolls & Household Employment Since Beginning of Recession (Thousands)



Change in Private Payrolls



Total Payrolls (Thousands)



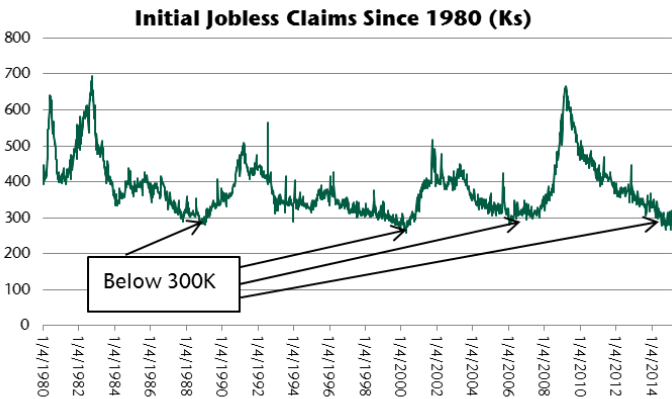
Labor Market: Frictional Jobless Claims & Payroll Growth

Since September 2014, the weekly jobless claims have fallen to a frictional level of claims near 300k.

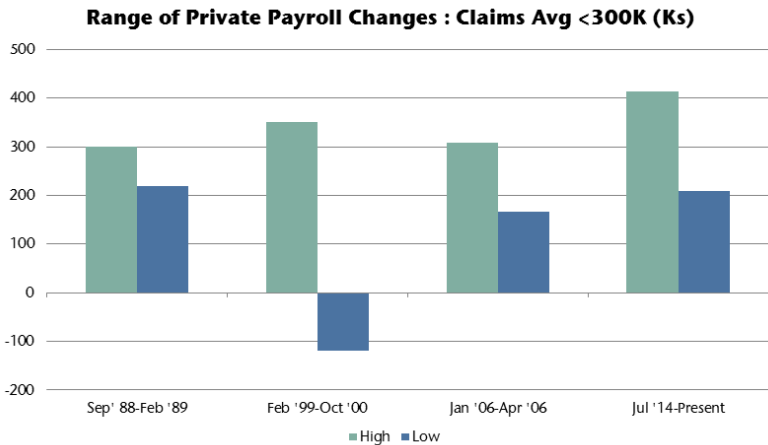
Since 1980, there have been the prior periods of a frictional level of claims; September 1988 to February 1989, February 1999 to October 2000, and January 2006 to April 2006.

These periods of frictional claims levels represented periods of time when the labor market was strong, but there was considerable variation both in month-month changes in payrolls and the level of the unemployment rate.

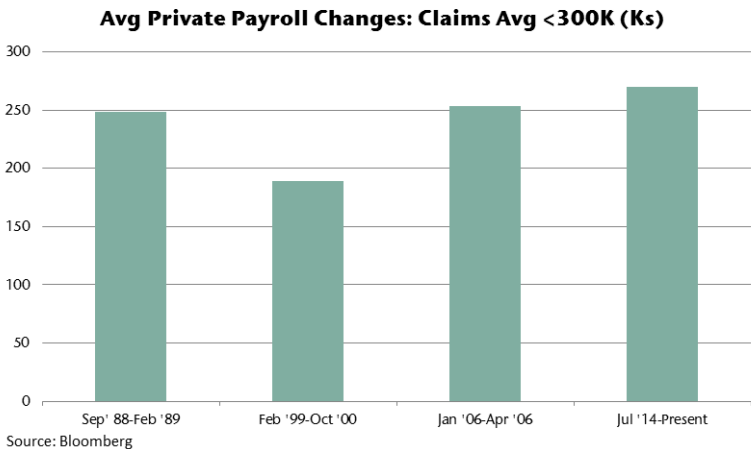
Payroll increases in the current cycle began to measure up to the prior periods of frictional jobless claims in Q4 2014.



Source: Bloomberg



Source: Bloomberg



Source: Bloomberg

Labor Market: Sources of Payroll Growth

Private sector job growth continues to be dominated by the service sector, but payroll growth in the goods-producing sector has been accelerating.

Business service payrolls continue to be the largest source of payroll growth.

Based on history, the recent declines in temporary help payrolls may point to a deceleration in business service hiring because temporary help hiring has tended to be a leading indicator.

Given that the recent soft temporary hiring has been accompanied by strong business service hiring, it could reflect a change in business confidence and a willingness to hire on a permanent basis without a probationary period.

There have also been significant increases in the leisure & hospitality sector payrolls, most of which have been in food services.

Retail, transportation payroll and health service payroll growth have been solid.

There have been modest declines in oil and gas exploration payrolls.

Construction and manufacturing payroll growth has finally come to life.

Federal government hiring continues to provide a drag on overall payroll growth, but state and local payrolls have turned the corner.

	Composition of US Payroll Growth									12-month Cumulative
	(Thousands)									
	Feb	Jan	Dec	Nov	Oct	Sep	3MMA	6MMA	12MMA	
Nonfarm employment	295	239	329	423	221	250	288	293	275	3296
Total private	288	237	319	414	218	235	281	285	267	3209
Goods-producing	29	64	64	76	34	38	52	51	46	551
Construction	29	49	44	30	10	22	41	31	27	321
Manufacturing	8	21	19	45	23	9	16	21	17	208
Mining	-8	-6	1	1	1	7	-4	-1	2	22
Service Providing	259	173	255	338	184	197	229	234	222	2658
Trade, transport, utility	62	44	54	98	50	40	53	58	53	634
Wholesale trade	12	14	14	8	9	5	13	10	10	114
Retail trade	32	28	0	61	26	32	20	30	27	321
Transport	19	1	38	26	15	6	19	18	16	193
Utility	0	1	2	3	0	-2	1	1	1	10
Information	7	5	6	7	-3	4	6	4	5	59
Financial	10	22	7	28	7	10	13	14	13	150
Business services	51	10	72	96	40	51	44	53	55	660
Temporary help	-8	-14	21	31	9	14	0	9	12	139
Education, health	54	46	54	51	28	46	51	47	45	539
Leisure, hospitality	66	39	56	42	55	49	54	51	44	527
Other	9	7	6	16	7	-3	7	7	7	89
Government	7	2	10	9	3	15	6	8	7	87
Federal Government	0	-2	3	9	-5	-2	0	1	0	0
Ex Postal	-3	4	1	2	-1	-2	1	0	0	-3
Postal	4	-6	3	7	-4	1	0	1	1	6
State	3	1	7	5	5	20	4	7	2	22
Education	4	4	7	9	3	20	5	8	3	31
Ex Education	-2	-3	1	-5	3	0	-1	-1	-1	-8
Local	4	3	0	-5	3	-3	2	0	5	65
Education	1	2	-1	-2	-8	3	1	-1	3	35
Ex Education	3	1	0	-3	11	-6	1	1	3	30

Source: BLS

Labor Market: Signs of Life in AHE?

There have been periodic signs of life in average hourly earnings (AHE), but there has yet to be a sustained cyclical upturn.

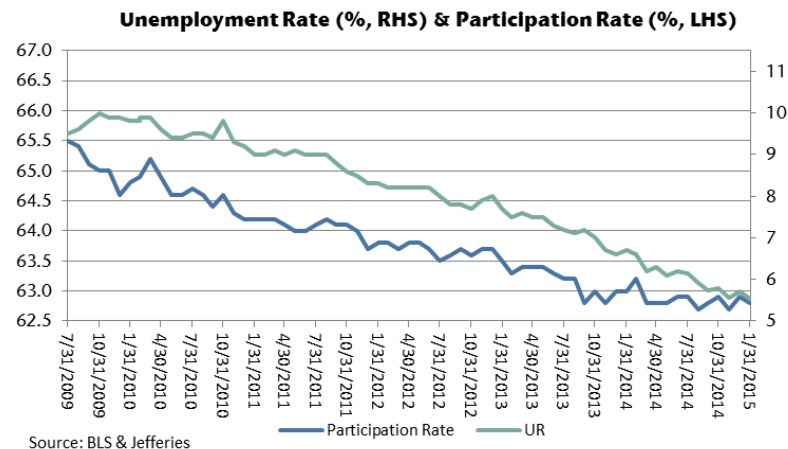
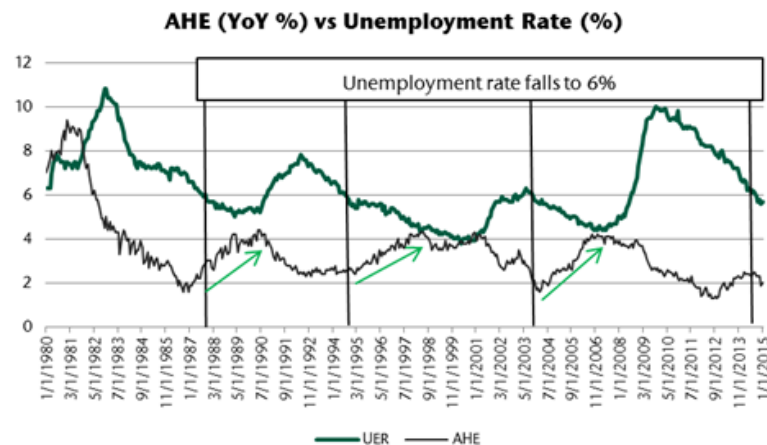
It has been a year since the labor market crossed the threshold from labor market recovery into labor market expansion, so it should be just a matter of time before AHE begins to accelerate on a cyclical basis.

It is not clear how long that time period will be, however.

The unemployment rate has declined from 10% in October 2010 to as low as 5.5%, a rate that has been associated with accelerating AHE in prior cycles.

However, the unemployment rate is difficult to interpret because of the decline in the participation rate, so the relationship between the unemployment rate and AHE may be different this cycle.

That creates added uncertainty about the timing of the acceleration in AHE despite the attainment of an unemployment rate that has historically been associated with an acceleration in wage growth.



Labor Market: S-T & L-T Unemployment Tell Inconsistent AHE Story

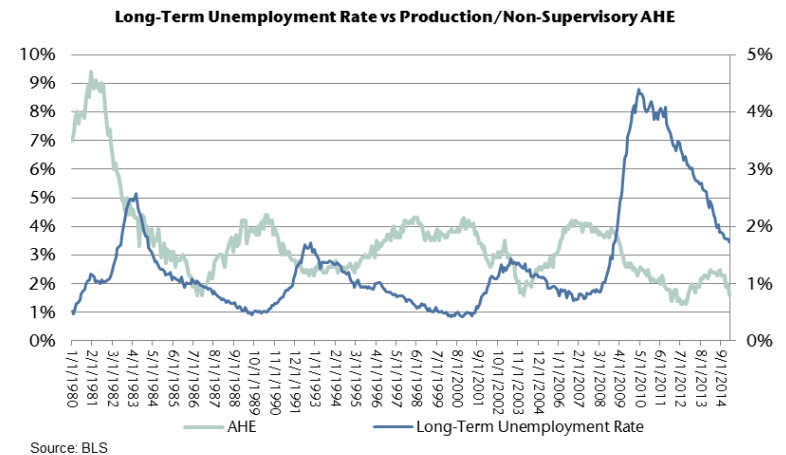
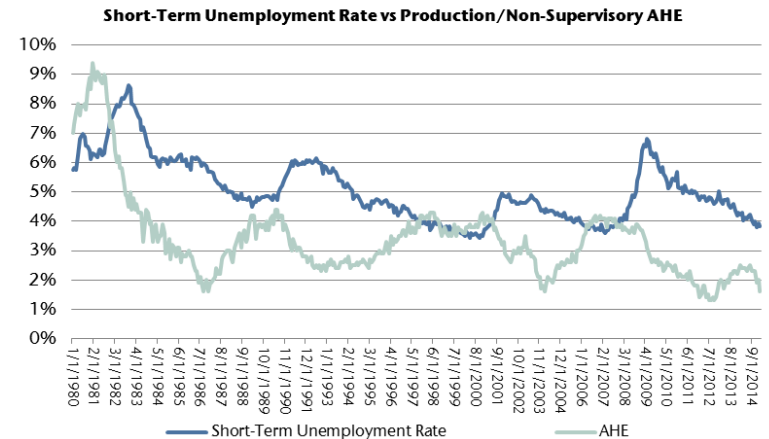
There is also an inconsistency in the implied timeframe for a sustained acceleration in wages between the short-term and the long-term unemployment rates.

The short-term unemployment rate has fallen to a level that historically was associated with a sustained acceleration in AHE that has yet to materialize.

However, the long-term unemployment rate remains elevated by historical standards.

The long-term unemployment rate also remains above levels that have historically been associated with a sustained acceleration in AHE.

Based on history, the long-term unemployment rate would need to continue to fall to support a rise in AHE.



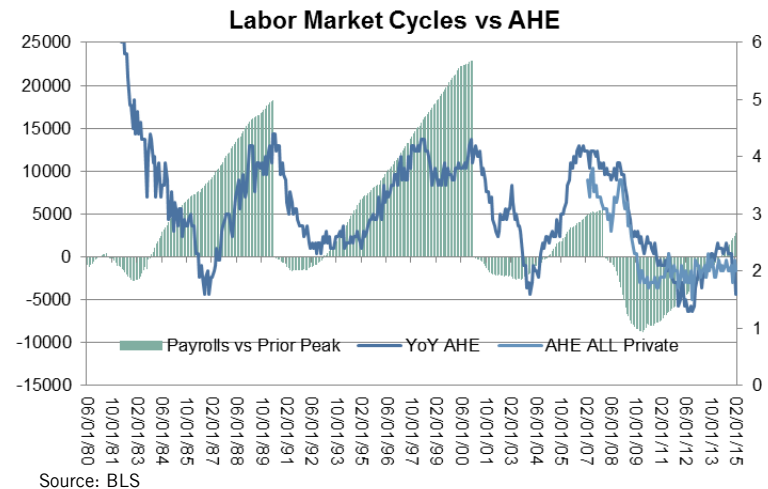
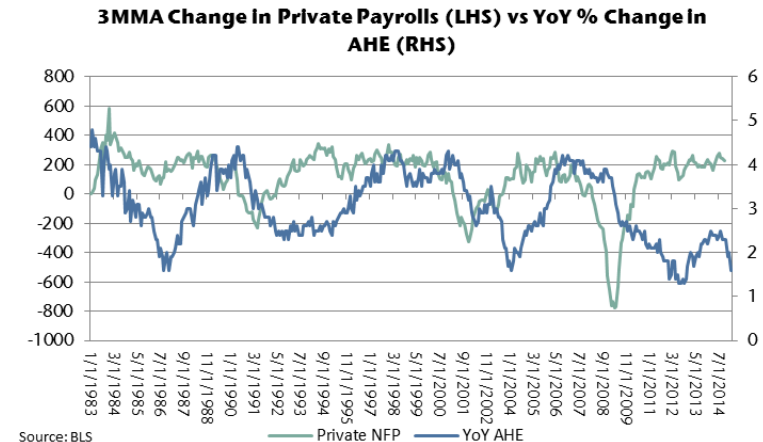
Labor Market: Payrolls & AHE, Each Time Is Different

The relationship between accelerating payroll growth and accelerating AHE is also elusive.

Cyclical accelerations in the yoy change in AHE lag the 3MMA of changes in payrolls, but the length of the lag has varied significantly.

The acceleration in payroll growth since late 2014 points to acceleration of AHE, but the timing is questionable.

The peak in cyclical payrolls has had a reasonably close relationship with the peak in AHE, but the timing of the labor market recovery and an acceleration in AHE has varied significantly across cycles.



Labor Market: Job Openings, Worker Skills & Confidence

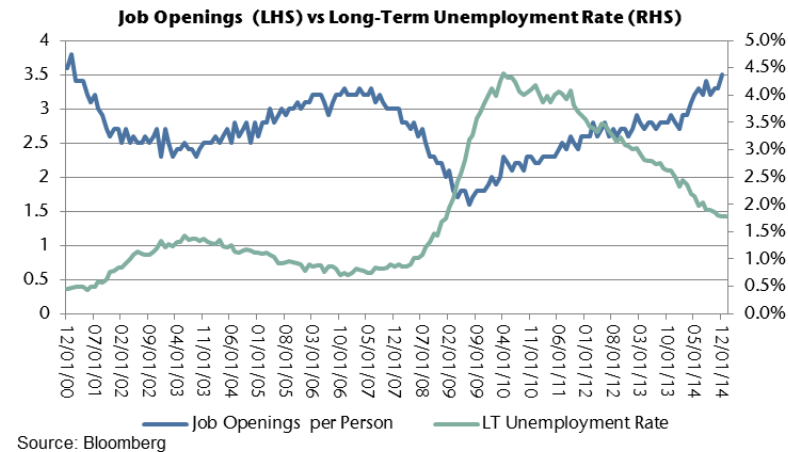
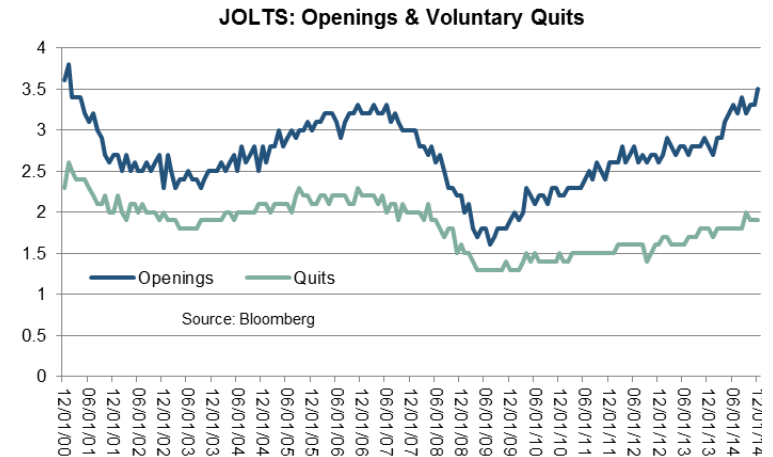
A variety of labor market indicators suggest that some of the labor market slack reflects a combination of structural problems and lack of employee confidence.

The ratio of job openings to payrolls remains high and suggests that job growth should remain robust.

While job openings have been on the rise, the increase in separations has been more modest.

This combination suggests that labor confidence is still lacking, which could be suppressing wage growth.

As job openings have been rising, and the long-term unemployment rate has been falling but remains high by historical standards.



Monetary Policy: It's All About Inflation & Wage Growth

FOMC policymakers have been signaling that the Fed intends to raise rates at a yet-to-be-determined date over the second half of 2015.

Fed officials have been rightfully more optimistic about the economy and the labor market. The labor market generated 3.2 mln private sectors jobs over the past year and the unemployment rate has fallen from 6.6% to as low as 5.5%.

The lack of upward momentum in wage growth has been a disappointment, however.

The inflation picture, of course, remains significantly murkier. The last time the Fed reached the 2% target on the headline PCE inflation target was April 2012, and it is highly improbable that this target can be attained for the foreseeable future.

In her recent Congressional testimony, Yellen signaled that the Fed rules of engagement are changing in very significant ways.

Specifically, the focus of forward guidance is shifting to the outlook for inflation. The FOMC will be inclined to raise the fed funds rate when policymakers are reasonably confident that inflation will trend back toward the 2% PCE deflator target.

According to Stanley Fischer, the FOMC will need to observe three trends in the inflation data.

First, headline inflation needs to stop going down.

Second, core inflation needs to rise closer to 2%.

Third, the Fed will need to see more signs of a sustainable upward trend in wage growth.

Yellen and Fischer also indicated that they expect Fed forward guidance to inject an added dimension of uncertainty about monetary policy by refocusing on data dependence, especially inflation data.

Monetary Policy: Large & Stable Balance Sheet

The size of the Fed's balance sheet asset holdings is a multiple of the pre-crisis size due primarily to securities purchases in QE1, QE2 and QE3.

With QE3 completed, the Fed is again back to a stable balance sheet policy and a relatively stable balance sheet.

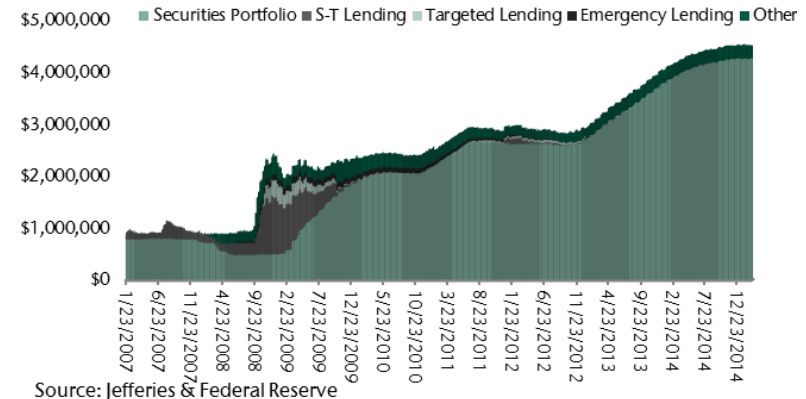
The Fed will continue to reinvest proceeds from MBS holdings into new securities. The Fed will not have significant Treasury securities maturing until 2016.

Fed SOMA holdings of Treasuries are about \$2.5 trln, and MBS holdings are about \$1.7 trln.

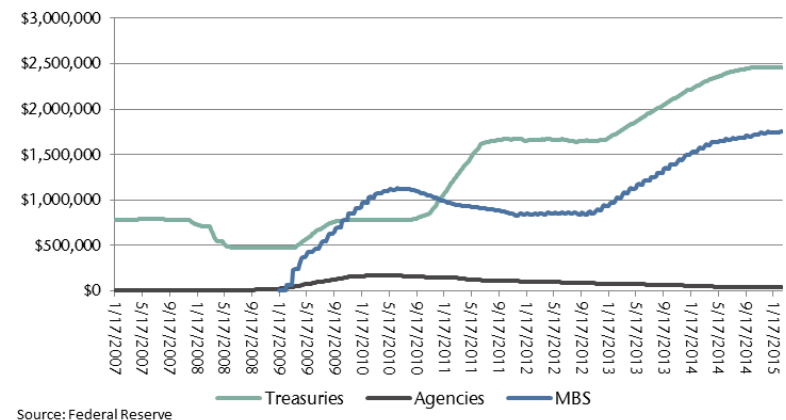
A stable balance sheet should not be confused with a neutral balance sheet, as the stock effects of the QE purchases and the related massive volume of excess reserves will linger.

Bank reserves have the potential to provide significant stimulus to the economy in an environment where banks are more inclined to lend, especially on the household side.

Federal Reserve Balance Sheet Snapshot



Fed Securities Portfolio



Monetary Policy: Excess Reserves... Lingering Effects of QE

QE has bloated excess reserves in the banking system, but bank lending has not measured up to prior cycles and has limited the effectiveness of QE in stimulating economic growth.

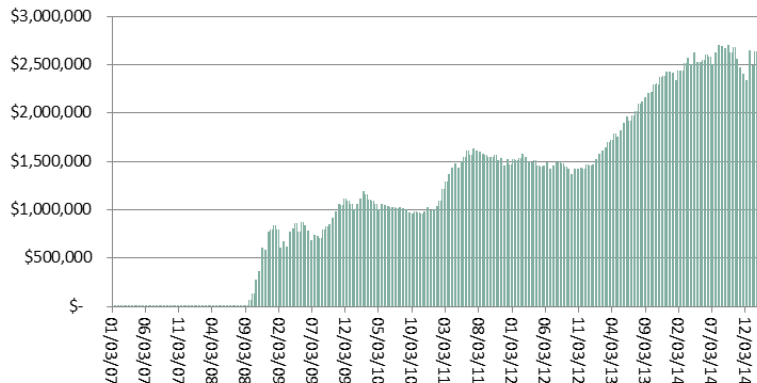
Until early 2011, securities holdings were the only asset class on commercial bank balance sheets that were increasing.

C&I loans have been rising since the outset of 2011, so the commercial sector has benefited from the Fed stimulus via bank lending.

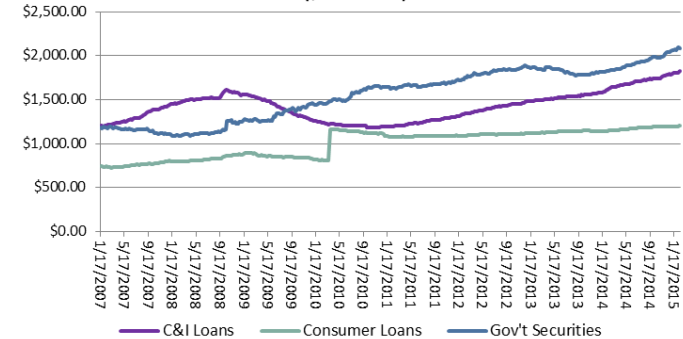
Consumer lending stagnated during the early stages of the recovery before finally beginning to increase slowly in 2012. To-date in this cycle, consumer lending has continued to be limited.

The volume of bank reserves also will pose challenges for the Fed once the rate normalization cycle has begun. It also represents the potential for a surge in bank lending.

Bank Excess Reserves

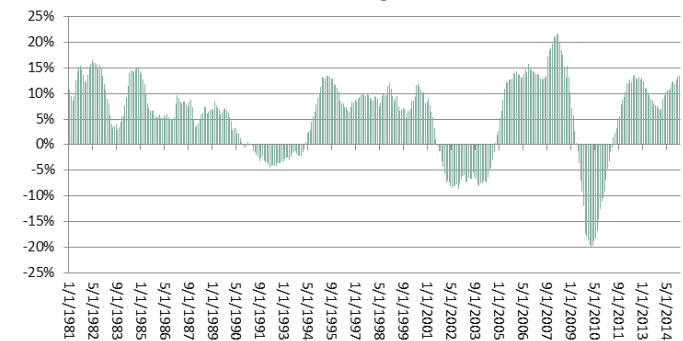


Commercial Bank Asset Snapshot
(\$ Thousands)



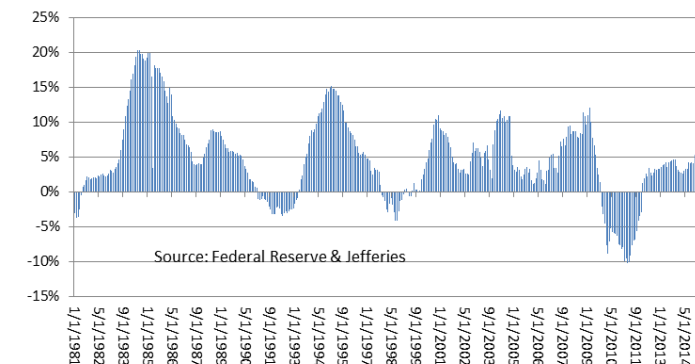
Source: Federal Reserve

Bank Lending: C&I Loan Cycles
(YoY Change)



Source: Federal Reserve

Consumer Loans yoy % Change



Source: Federal Reserve & Jefferies

Monetary Policy: SEP Projections

FOMC projections for growth and the unemployment rate were revised lower again in March. Inflation projections have also belatedly acknowledged reality. The Committee continues to project inflation that is at or below the 2% long-term target through 2017.

FOMC Economic Projections as of March 2015								
Variable	Central Tendencies				Range of Forecasts			
	2015	2016	2017	Longer Run	2015	2016	2017	Longer Run
Change in real GDP	2.3 to 2.7	2.3 to 2.7	2.0 to 2.4	2.0 to 2.3	2.1 to 3.1	2.2 to 3.0	1.8 to 2.5	1.8 to 2.7
December 2014	2.6 to 3.0	2.6 to 3.0	2.3 to 2.5	2.0 to 2.3	2.1 to 3.2	2.1 to 3.0	2.0 to 2.7	1.8 to 2.7
September 2014	2.6 to 3.0	2.6 to 3.0	2.3 to 2.5	2.0 to 2.3	2.1 to 3.2	2.1 to 3.0	2.0 to 2.6	1.8 to 2.6
June 2014	3.0 to 3.2	2.5 to 3.0		2.1 to 2.3	2.2 to 3.6	2.2 to 3.2		1.8 to 2.5
March 2014	3.0 to 3.2	2.5 to 3.0		2.2 to 2.3	2.2 to 3.5	2.2 to 3.4		1.8 to 2.4
Unemployment rate	5.0 to 5.2	4.9 to 5.1	4.8 to 5.1	5.0 to 5.2	4.8 to 5.3	4.5 to 5.2	4.8 to 5.5	4.9 to 5.8
December 2014	5.2 to 5.3	5.0 to 5.2	4.9 to 5.3	5.2 to 5.5	5.0 to 5.5	4.9 to 5.4	4.7 to 5.7	5.0 to 5.8
September 2014	5.4 to 5.6	5.1 to 5.4	4.9 to 5.3	5.2 to 5.5	5.2 to 5.7	4.9 to 5.6	4.7 to 5.8	5.0 to 6.0
June 2014	5.4 to 5.7	5.1 to 5.5		5.2 to 5.5	5.2 to 5.9	5.0 to 5.6		5.0 to 6.0
March 2014	5.6 to 5.9	5.2 to 5.6		5.2 to 5.6	5.4 to 5.9	5.1 to 5.8		5.2 to 6.0
PCE inflation	0.6 to 0.8	1.7 to 1.9	1.9 to 2.0	2	0.6 to 1.5	1.6 to 2.4	1.7 to 2.2	2
December 2014	1.0 to 1.6	1.7 to 2.0	1.8 to 2.0	2	1.0 to 2.2	1.6 to 2.1	1.8 to 2.2	2
September 2014	1.6 to 1.9	1.7 to 2.0	1.9 to 2.0	2	1.5 to 2.4	1.6 to 2.1	1.7 to 2.2	2
June 2014	1.5 to 2.0	1.6 to 2.0		2	1.4 to 2.4	1.5 to 2.0		2
March 2014	1.5 to 2.0	1.7 to 2.0		2	1.5 to 2.4	1.6 to 2.0		2
Core PCE inflation	1.3 to 1.4	1.5 to 1.9	1.8 to 2.0	NA	1.0 to 1.6	1.5 to 2.4	1.7 to 2.2	NA
December 2014	1.5 to 1.8	1.7 to 2.0	1.8 to 2.0	NA	1.5 to 2.2	1.6 to 2.1	1.8 to 2.2	NA
September 2014	1.6 to 1.9	1.8 to 2.0	1.9 to 2.0	NA	1.6 to 2.4	1.7 to 2.2	1.8 to 2.2	NA
June 2014	1.6 to 2.0	1.7 to 2.0		NA	1.5 to 2.4	1.6 to 2.0		NA
March 2014	1.7 to 2.0	1.8 to 2.0		NA	1.5 to 2.4	1.6 to 2.0		NA

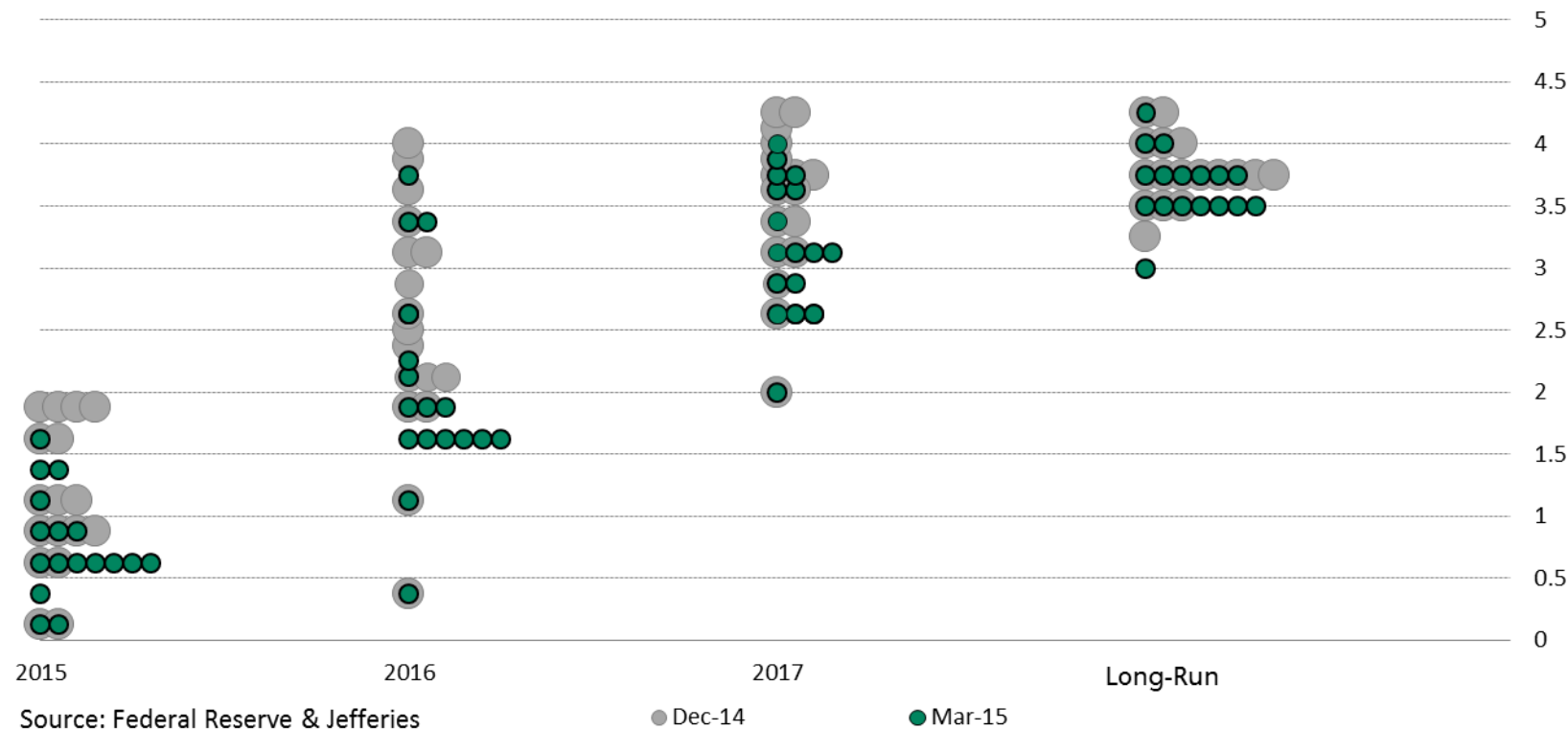
Source: Fed Board of Governors

Monetary Policy: SEP Dot Plot of Fed Funds Rate Projections

The FOMC dot plot projections of the fed funds rate have sent a confused message about the direction of monetary policy since first projecting a higher year-end fed funds rate in 2012.

Nonetheless, the concentration of ten 2015 year-end fed funds rate projections at 5/8% to 7/8% in the SEP Dot Plot reflects a building consensus that has been absent previously. The message that the FOMC is changing its modus operandi and preparing for normalization later in 2015 is much more credible this time around.

Appropriate Path of Policy Tightening - Dec vs Mar



Monetary Policy: Evolution of Fed Rate Projections

The FOMC's forecasts for the "Appropriate path of policy firming" have changed significantly since they were first released at the beginning of 2012.

Throughout 2012 and 2013, expectations for the funds rate were revised down for each year of the forecast horizon.

Expectations for rates at the end of 2015 were revised lower in each SEP release from September 2012 to December 2013 but were revised higher in March, June and September 2014.

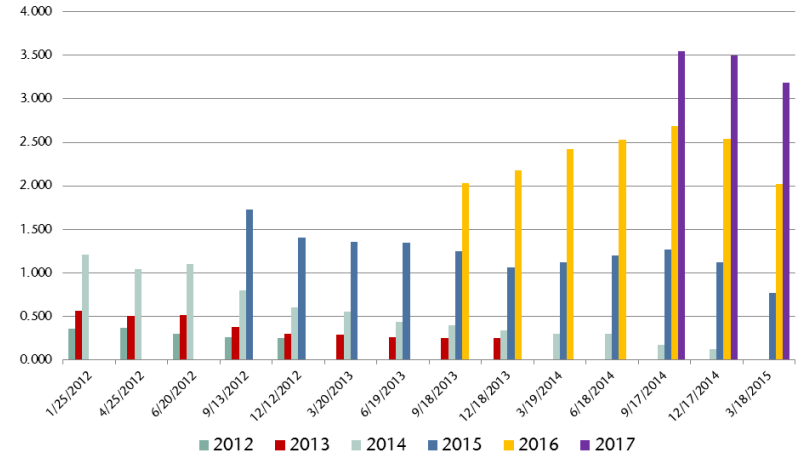
The FOMC revised year-end fed funds rate projections lower in December 2014 and March 2015.

Expectations for rates at the end of 2016 were revised higher in each SEP release from September 2013 to September 2014. However 2016 rate forecasts were revised lower in both December 2014 and March 2015.

Long-run fed funds rate expectations have been revised lower in all SEP releases but one (September 2014) since the first releases in January 2012. Over the past 3 years, the long-run fed funds rate forecast has fallen over 50 bps to 3.66% from 4.21%.

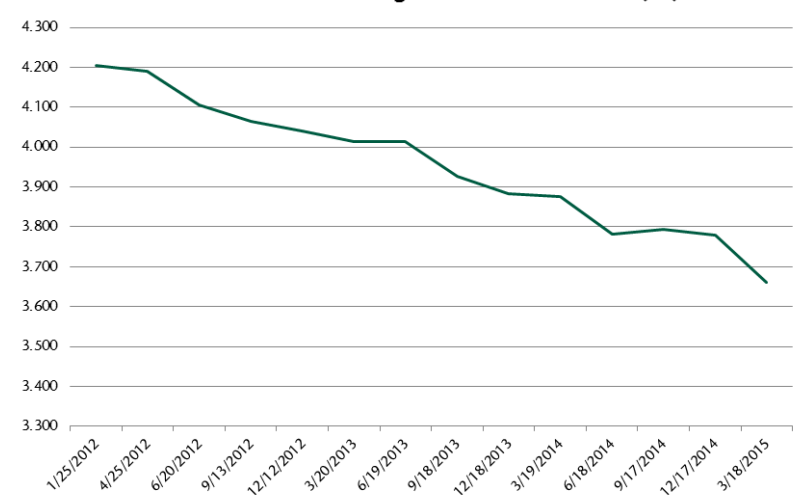
Based on prior behavior, it is logical that the Fed's rate normalization begins later rather than sooner.

History Of FOMC Fed Funds Rate Projections (%)



Source: Federal Reserve & Jefferies

FOMC Forecast for Long-run Fed Funds Rate (%)



Source: Federal Reserve & Jefferies

Monetary Policy: Rate Lift-off & Implementation Challenges

The FOMC is revamping the details of Policy Normalization that was initially detailed in 2011 as the Exit Strategy. The new Normalization Process is a work-in-progress.

With a stable balance sheet, the next major step will be the lift-off of the fed funds rate which policymakers want to keep as the “key” policy rate.

One major logistical issue that policymakers must address is the ability to control the fed funds rate with an expanded balance sheet.

Policymakers expect to use a combination of the IOER and the ON RRP facility to set the upper and lower limits for a fed funds rate trading range. However, policymakers must resolve both philosophical and logistical issues regarding the ON RRP facility.

The current “experiment” --\$300 bln cap, \$30 bln individual limit & competitive bidding-- is intended to the size of the facility while permitting the Fed to put a floor under O/N rates.

The role of a term repo facility and TDF are not clear at this juncture, but continued experimentation suggests that they will be in the mix.

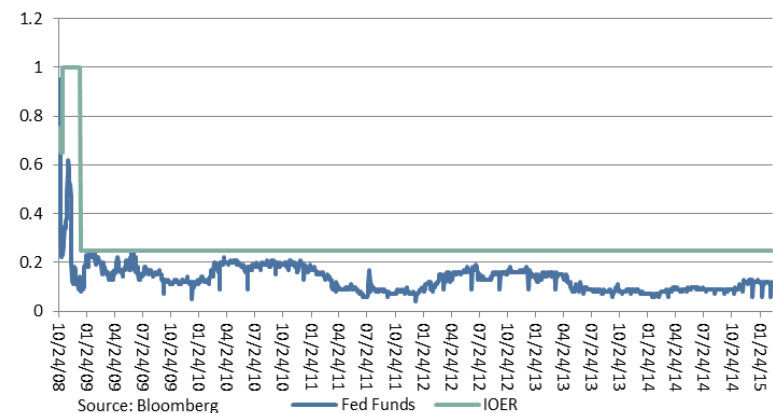
Experiments are continuing and more experiments are likely before the Fed strikes a balance between the size that is needed for operating procedures and the size that limits the moral hazard of the program.

The Fed can also begin to shrink the balance sheet in 2016 by allowing maturing issues to roll-off. The Fed holds almost \$2.5 trln Treasury securities on the balance sheet. Almost \$1.7 trln mature between 2016 and 2022.

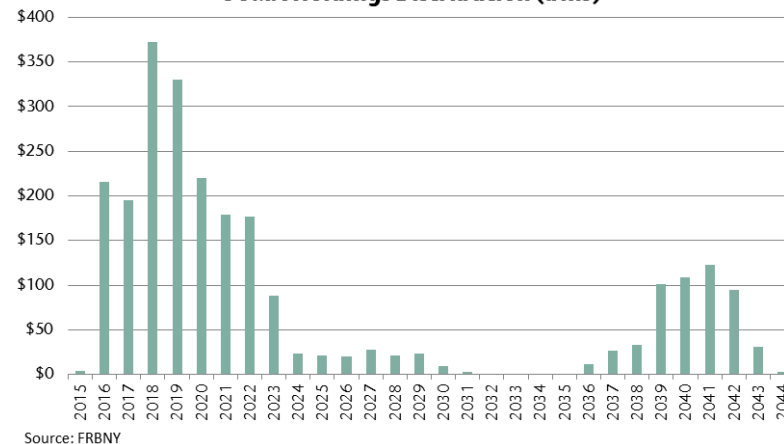
Over 20% of Fed holdings of Treasury securities mature after 2036.

We think it will be years before the Fed completes the process of both normalizing rate levels and shrinking the balance sheet.

Fed Funds Rate vs IOER (%)



SOMA Holdings Distribution (blns)



Monetary Policy: Fed Overnight Reverse Repo Tests

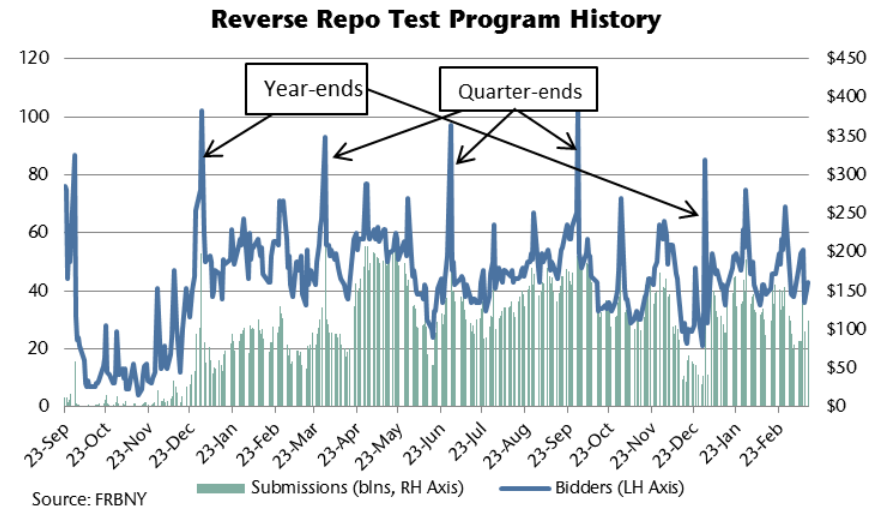
In recent months, the Fed has made some significant changes to the overnight reverse repo (ON RRP) facility tests. The Fed will continue to test this facility until January 29, 2016.

The Fed began testing term RRP operations ahead of year-end, with a series of 4 operations for as much as \$300 bln. Taken as a whole, the term RRP tests were undersubscribed and the overnight RRP on December 31st was also undersubscribed.

After the January 28th FOMC meeting, the NY Fed announced another round of term RRP tests that will bridge the end of Q1. This time, the total offering will be \$200 bln, presumably a response to the fact that the facility was undersubscribed going over year-end. The first \$75 bln of these term tests was met with tepid demand.

The Fed also tested 7-day term RRP tests throughout February and early March. We expect that these types of regular short-term operations will be used in concert with the ON RRP tests during the liftoff. It is also possible that the Fed experiments with other term lengths in the meantime.

The Fed recently announced that it added 7 banks, 6 GSEs, and 12 money market mutual funds to the counterparty list, bringing the total number of counterparties to 165. The expanded list of counterparties will give the Fed more control over front-end rates, but the list is not comprehensive. There are other front-end market participants that will continue to have incentives to invest at rates below the ON RRP offering rate.



The Minutes to the January 27th-28th FOMC meeting indicated that the Fed may experiment with lifting the \$300 bln daily cap at times after liftoff. We find it confusing that they would be talking about potential changes to the program that they would make after liftoff, rather than during the current test phase. This suggests that there may be a lack of confidence in the tool among policymakers.

The FOMC continues to debate the ON RRP program's role in the policy normalization process and the appropriate size and scope. Fed officials are trying to strike a balance between a functional rate floor for operating procedures and minimal intrusion on private funding markets.

Monetary Policy:

The time horizon for expected Fed rate hikes has been swinging around widely so far in 2015.

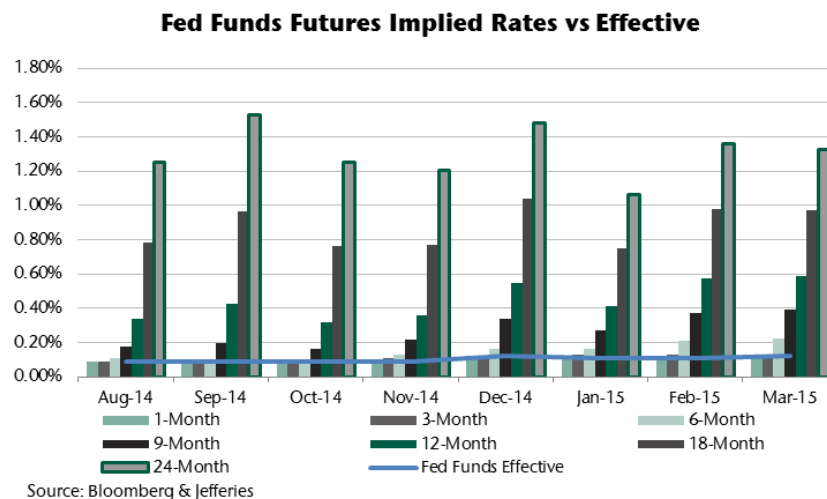
The March 17th-18th FOMC meeting had a big impact on expectations for rates. Early in the month, the probability of a June rate hike had been rising, but the release of the new SEP and Yellen's comments press conference both pushed the expected liftoff date further out and also lowered the anticipated trajectory of the expected fed funds rate in the future.

Yellen's press conference expressed a strong desire to get the fed funds rate off of the zero bound, but the Fed will only act when the data signals that it is appropriate.

The FOMC will not raise interest rates until they have "reasonable" confidence that inflation will rise toward target. We still do not think that they will have a consensus built on evidence of rising inflation and the necessity to hike until Q4 2015.

However, the judgment of "reasonable confidence" is highly subjective. The Fed has created an enormous amount of flexibility in determining the appropriate path of policy.

With more subjective guidance based on inflation and wage growth, volatility in the fed funds futures market will probably increase over the coming months. Inflation and wages data releases will have a big impact on interest rate expectations going forward.



Monetary Policy: Anticipation of Liftoff, Supply Constrains & Front-end Yields

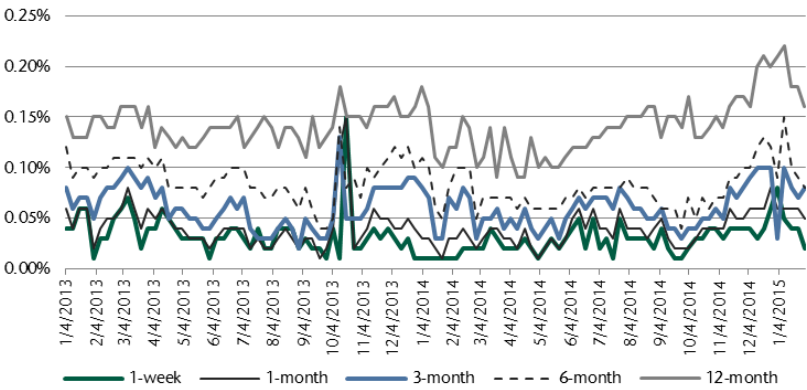
The countdown to Fed liftoff has had little perceptible impact on front-end interest rates.

Whether it be Treasury Bills, Agency Discount Notes, or overnight GC repo, rates are low because of a combination of increased demand fueled by regulation and a lack of supply.

In response to the narrowing of the federal budget deficit since 2009, Treasury has cut the sizes of bill and front-end coupon auctions, resulting in lower yields and a reduction in collateral available for repo.

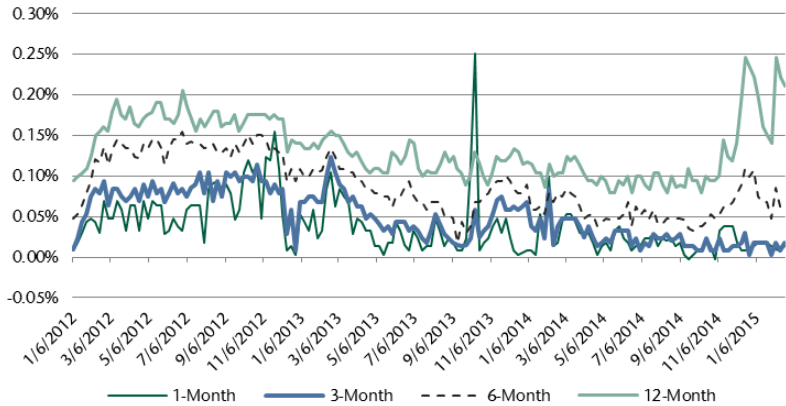
The federally mandated reduction in the size of the GSE portfolios has reduced funding needs for the GSEs and consequently kept their outstanding levels of discount notes low as well.

Agency Discount Note Yields



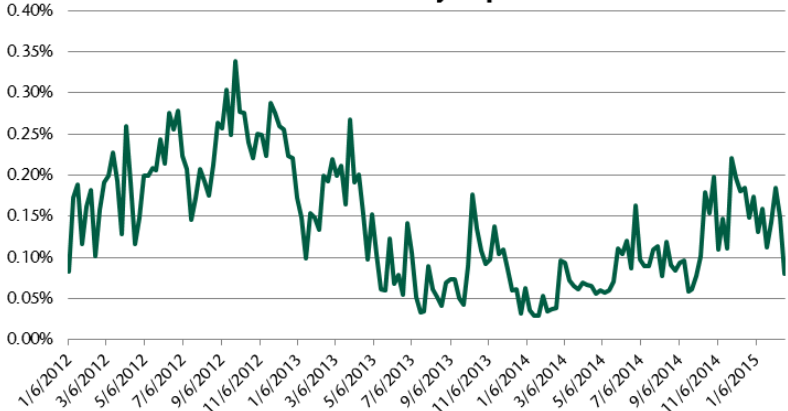
Source: Bloomberg

Treasury Bill Yields



Source: Bloomberg

DTCC GCF Treasury Repo Index



Source: Bloomberg

Fiscal Policy: Smaller Deficits in the Short-term, Larger Deficits In the Long-Term

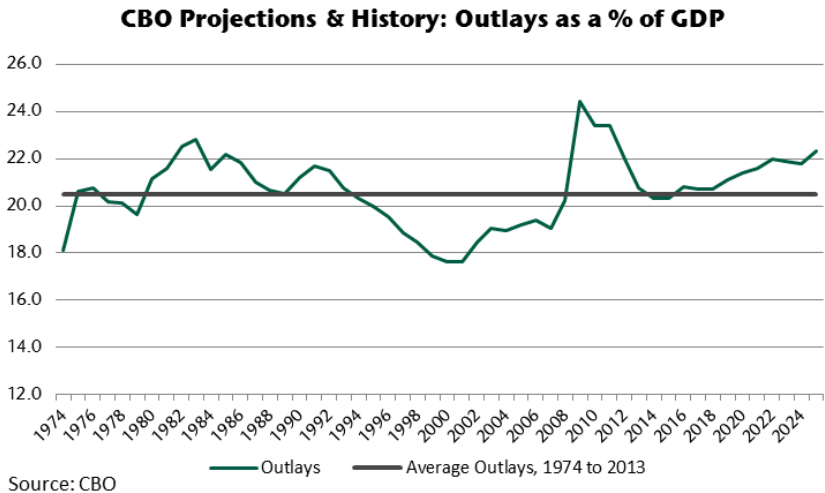
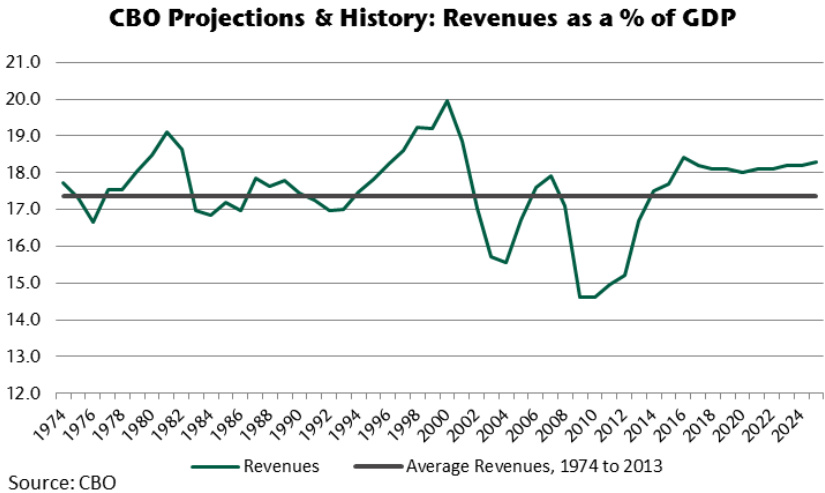
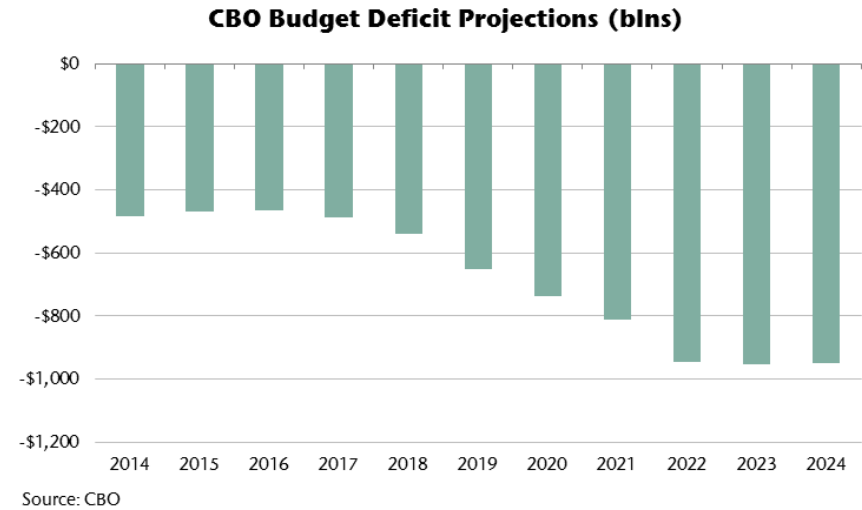
Based on current CBO projections, tax revenue as a percentage of GDP is above the long-term historical average and will continue to rise for the forecast horizon.

Outlays as a percentage of GDP are also above the long-term historical average and will remain so for the forecast horizon.

The size of the budget deficit is projected to shrink to about \$467 bln in 2016 but increase to almost \$1 trln by 2022.

Discretionary spending will fall to about 5.1% of GDP, but mandatory spending will rise to 14.2% of GDP in the absence of entitlement reform.

Net interest expense is expected to increase from 1.3% of GDP in 2015 to 3% in 2024. Interest expense is accelerating and will continue to do so in the absence of a significant change in the deficit trajectory.



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