U.S. Economy in a Snapshot
Research & Statistics Group
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The *U.S. Economy in a Snapshot* compiles observations of staff members of the Federal Reserve Bank of New York’s Research and Statistics Group. The views, model results, and analysis presented are solely those of the individual contributors and do not necessarily reflect the position of the Federal Reserve Bank of New York or the Federal Reserve System. The analysis presented herein is based on data released through February 8, 2017.
- Real consumer spending increased at a faster rate in December than in November, with overall growth in Q4 showing a solid pace.
  - Consumer spending growth in Q3 and Q4 was accompanied by a declining personal saving rate.
- December data suggested some continued near-term momentum for business equipment spending, but investment in nonresidential structures declined in Q4.
- Manufacturing activity picked up in December. Housing sector data for Q4 was reasonably strong, and real residential investment increased in Q4 after two consecutive quarterly declines.
- Payroll growth remained solid in January. The unemployment rate, labor force participation rate, and employment-population ratio all rose in the month.
  - Overall, the data indicate wage growth remains modest.
- Headline and core inflation continued to run below the FOMC’s longer-term objective; headline inflation has firmed over the past several months, while core inflation has been fairly stable.
- U.S. equity indexes and nominal long-term Treasury yields were little changed on net. Oil prices and longer-term inflation compensation were also relatively stable.

**Output is modestly below its potential level**
- The gap between real GDP and the Congressional Budget Office’s (CBO) measure of real potential GDP was about 0.9% in 2016Q4.
  - In its January economic outlook, the CBO slightly reduced its estimates of real potential GDP for recent years as well as its projections of potential GDP for the next few years.
  - The January unemployment rate of 4.8% is near many estimates of its natural rate, including that of the CBO (4.74%).
  - Compared to these alternative unemployment gap estimates, the CBO output gap still indicates more resource slack.
- Historically, inflation has tended to be restrained when the economy is operating below real potential GDP.
**OVERVIEW**

**Labor Market Indicators**

- The unemployment rate edged up to 4.8\% in January.
  - An alternative measure of unemployment, U6, which includes marginally-attached workers as well as workers who hold part-time jobs but prefer full-time jobs, rose from 9.2\% to 9.4\%.

- The labor force participation rate rose from 62.7\% in December to 62.9\% in January and the employment-to-population ratio rose from 59.7\% to 59.9\%.

- The unemployment rate, labor force participation rate, and employment-to-population ratio have changed little in the last twelve months.

**PCE Deflator**

- The total PCE deflator rose 0.2\% in December, following a 0.1\% increase in November. The core PCE deflator (which excludes food and energy prices) rose 0.1\% in December, after being unchanged in the previous month.
  - Energy prices rose 1.7\% in December, and they are up 5.7\% from a year ago.
  - Food prices declined 0.1\% in December, and they are down 1.6\% from a year ago.

- The 12-month change in the total PCE deflator was 1.6\% in December, while the 12-month change in the core PCE deflator was 1.7\%.
  - Headline inflation has steadily increased since mid-2016 as earlier declines in energy prices and the prices of non-energy imports continue to fade.
ECONOMIC ACTIVITY

GDP Growth

% Change – Annual Rate

Source: Bureau of Economic Analysis via Haver Analytics

Pace of GDP growth slows in Q4

- According to the advance release, real GDP expanded at a 1.9% annual rate in 2016Q4.
  - In the third quarter, GDP increased 3.5%.

- Consumer spending, business fixed investment, residential investment, and inventory investment together contributed a little under 3.5 percentage points to growth.
  - There was, however, a sizeable drag of 1.7 percentage points on growth from net exports.

- During 2016 (measured from 2015Q4 to 2016Q4), real GDP grew 1.9%, the same rate as during 2015.
  - Real GDP growth in 2016 is in line with the 2.1% average since the recession ended in the middle of 2009.

Manufacturing and ISM Manufacturing Index

12 Month % Change

Source: Institute for Supply Management, Federal Reserve Board via Haver Analytics

Note: Shading shows NBER recessions.

Improving outlook for manufacturing sector

- Manufacturing activity rose 0.2% in December, offsetting the 0.1% decline in November.

- The ISM manufacturing index rose to 56 in January from 54.5 in December and registered its highest reading since November 2014.
  - January marked the 5th consecutive month in which the index was above 50 – the threshold that divides expansion from contraction in the manufacturing sector.
  - January’s increase was driven largely by increases in the employment and production subcomponents.

- All Federal Reserve manufacturing surveys improved in January.
**Disposable Income and Consumption**

- Real disposable income increased 0.1% in December after being flat in November.
  - Employee compensation increased 0.4% in December and grew at a 3.7% annual rate in Q4.

- Real personal consumption expenditures increased 0.3% in December, driven primarily by durable goods spending.
  - Real PCE increased at a 2.5% annual rate in Q4.

- The personal saving rate was 5.4% in December and 5.6% in the fourth quarter.
  - On a quarterly basis, the personal saving rate has been declining since 2015Q4.

**Services, Durables, and Nondurable Goods**

- Expenditures on goods grew 0.5% in December and rose 1.3% for the fourth quarter.

- Durable goods spending increased at a solid 1.4% rate in December, while nondurable goods consumption was flat.
  - On a 12-month change basis, spending on durable goods has been trending upward since March 2016.

- Spending on services increased 0.3% in December, in line with the increase in November.
  - On a 12-month change basis, spending on services has fluctuated in a 2%-2.5% range since late 2015.
**Investment in new equipment increases in Q4**

- Real business equipment spending rose 3.1% (annual rate) in 2016Q4, the first increase in five quarters; the four-quarter change, however, was -3.6%.
  - In 2016Q4, investment in industrial equipment rose solidly, while investment in information equipment, transportation equipment, and “other” equipment rose modestly.

- A key reason for weak equipment investment recently is the low level of the manufacturing capacity utilization rate.
  - This rate was 74.8% in December, well below its longer-term average of 78.5%.
  - The utilization rate has been fairly flat since the beginning of 2015, even with slow growth in capacity.

**Structures investment rebounding in oil & gas sector**

- Real business investment in new nonresidential structures fell by 5% (annual rate) in 2016Q4 following a robust 12% increase in the third quarter.
  - For the entire second half of 2016, such spending was up at a 3% annual rate after a year and a half of declines.

- The weakness in this type of business investment over 2015 and the first half of 2016 was concentrated in the oil and gas exploration and extraction sector.
  - Excluding that sector, real business investment in nonresidential structures was up a healthy 6% over the four quarters ending in 2016Q4.
  - While structures investment in the oil and gas sector was 26% of total nonresidential business investment over the period from 2011 through 2014, that share was down to 10% by 2016.
**Housing Sector**

**Housing Starts**

- Total housing starts rose 11.3% in December, following a 16.5% decrease in November.
  - Multifamily starts have been very volatile lately, rising by 57% (monthly rate) in December after falling by almost 40% in October.
  - Single-family starts fell 4% in December, a second moderate decline after sizeable increases in the previous two months.

- The three-month moving average of single-family starts suggests a very gradual uptrend, while multifamily starts may have peaked.
  - An ongoing issue is the durability of the uptrend in single-family starts given recent increases in mortgage interest rates.

**Single Family Housing Market**

- The CoreLogic single family national home price index rose 7.2% in December 2016 from a year ago.
  - The 12-month growth rate in the index has been positive for 59 consecutive months, with the index now only 3.9% below its April 2006 peak.

- The inventory of single family homes was 1.46 million units in December, equivalent to a 3.6 month supply and lower than the 3.9 month supply in November.
  - Since late 2015, the inventory of single family homes for sale has remained below the low end of the normal range of 5-7 months.
  - Despite low inventory conditions, existing home sales in 2016 were helped by improving labor market conditions and low mortgage rates.
**Government Sector**

**Real Government Consumption and Gross Investment**

- On a year-over-year basis, real government consumption and gross investment was up 0.5% as of 2016Q4.
- At the federal level, real consumption and gross investment was down 0.2% over the four quarters ending in 2016Q4, compared to an increase of 1.7% as of 2015Q4.
  - Nondefense spending (about 40% of the total) rose 2.5% as of 2016Q4, while defense spending was down 2%.
  - Real defense spending has declined for six consecutive years.
- At the state and local government level, which represents about 60% of total government spending (excluding entitlement spending), real consumption and gross investment was up 0.8% over the four quarters ending in 2016Q4.

**Real State and Local Consumption and Gross Investment**

- After declining in the second and third quarters, real state and local government gross investment rose 1.2% over the four quarters ending in 2016Q4.
  - The large swings in this category have been concentrated in construction spending, which now represents about 75% of state and local investment spending.
- Real consumption expenditures, which represent 82% of total state and local government spending, grew 0.8% over the four quarters ending in 2016Q4.
  - Over 75% of real consumption expenditures represents compensation of employees.
  - After rising to 1.1% in September of 2016, the 12-month growth rate of state and local employment has slowed dramatically in recent months.
INTERNATIONAL DEVELOPMENTS

Net Exports: Contribution to GDP Growth

Net exports exert strong drag on GDP growth in Q4
- Net exports subtracted 1.7 percentage points from GDP growth in Q4.
  - This is a marked decrease from the net export growth contribution of 0.85 percentage point in Q3.
- Real exports subtracted 0.5 percentage point from growth in Q4, reflecting a reversal of a one-off spike of soybean exports in Q3.
- Real imports increased in all major categories, except services, and subtracted 1.2 percentage points from growth in Q4.

Net Financial Outflows from China

Private outflows from China remain substantial
- Almost $200 billion in private-sector capital, on net, flowed out of China in Q4.
  - Outflows reached $660 billion in 2016, near the 2015 pace.
- The central bank sold $150 billion of its foreign assets in Q4.
  - Sales for the year were close to $450 billion, up from around $350 billion in 2015.
- The sum of private and central bank capital outflows was around $40 billion in Q4.
  - Total net outflows in 2016 fell to $210 billion, down from $330 billion in 2015.

Source: Bureau of Economic Analysis via Haver Analytics

Source: State Administration of Foreign Exchange via Haver Analytics
Note: Public outflow measured by central bank FX reserves. Private outflow = current account – reserves.
**LABOR MARKET**

**Payroll Employment and Aggregate Hours**

- Payroll employment growth remained solid
  - January nonfarm payroll employment rose by 227,000, well above the revised gains of 157,000 in December.
    - The payroll gain in January was above the average for the fourth quarter of 2016 but in line with the pace of payroll gains in the third quarter.
  - Aggregate hours increased 0.2% in January, following a 0.4% increase in December.
    - The 12-month change was 1.1%, below the 12-month change of 2.4% recorded a year ago.
    - Average weekly hours were unchanged at 34.3.
  - Payroll gains were broad-based, with the one-month diffusion index at 58.8%, which is above its 2016 average of 57.3%.

**Changes in LFPR differ by age and gender**

- The labor force participation rate (LFPR) rose from 62.7% in January 2016 to 62.9% in January 2017.
  - This overall net change masks changes in the LFPR of specific age and gender groups.
    - Men aged 16 to 24 increased their participation rate by 1.4 percentage points, while women aged 16 to 24 decreased their participation rate by 0.1 percentage point.
    - Prime-age (ages 25-54) men and women both increased their participation rate by 0.4 percentage point.
    - The participation rate of men aged 55+ increased by 0.2 percentage point, while the participation rate of similarly aged women was unchanged.
**Job-Finding Rates by Duration of Unemployment**

- **Job-finding rate continues to improve**
  - The job-finding rate continued to improve in 2016, with the 12-month moving average increasing from 24.2% in January 2016 to 24.6% in January 2017.
  - The job-finding rate in 2016 worsened slightly for those unemployed less than 15 weeks, but improved for those unemployed for a longer duration.
  - The percentage of long-term unemployed workers (those unemployed for 27 weeks or more) averaged 25.8% in 2016, well below its average of 27.9% in 2015.
    - The current percentage of long-term unemployed workers is 24.4%.

**Compensation growth remains modest**

- Average hourly earnings rose 0.12% in January and increased 2.48% over the past 12 months.
  - While wage growth was generally weaker in January than December for most sectors, it was particularly weak in financial activities where average hourly earnings declined 1.04% relative to December.

- Average weekly earnings increased 0.12% from $893.37 to $894.40.

- The employment cost index rose 2.24% for the 12 months ending December 2016.
INFLATION

CPI Inflation: Core Goods and Core Services

- The core CPI rose 2.2% in December from a year ago, up from 2.1% in November.
- Core CPI services prices rose 0.3% in December, driven by the ongoing strength in shelter prices.
  - The 12-month change in core CPI services prices was 3.1% in December, up from 3.0% in November.
  - On a 12-month change basis, the shelter component of the CPI rose 3.6%.
- Core CPI goods prices were flat in December, but are still down on a 12-month change basis.
  - The 12-month change in core CPI goods prices was -0.6% in December.

Source: Bureau of Labor Statistics via Haver Analytics
Note: Shading shows NBER recessions.

Michigan Inflation Expectations 5 to 10 Years

- According to the University of Michigan Survey, median long-term (5-10 years ahead) inflation expectations rose to 2.6% in January.
  - This is up from the historical low of 2.3% in December 2016.
- Median near-term inflation expectations also rose to 2.6% in January, reversing the decline seen since July 2016.
- These reported values are near the upper end of the narrow ranges which have prevailed over the last year.

Source: University of Michigan
Note: Shading shows NBER recessions.
**US Equity Market Index and Volatility**

- U.S. equity markets rallied to new highs in early 2017.
  - The S&P 500 index is up 2.6% in 2017 (through February 3) after gaining 9.5% in 2016.
  - Option-implied stock market volatility, as measured by the CBOE Volatility Index (VIX Index), decreased in early 2017.
    - The VIX Index decreased from 14.0 on December 31 to 11.0 on February 3, and is at the lower end of its historical range.

**US Bank Equities Performance**

- US bank stocks performed similarly to the market.
  - After outperforming broader equities in the fourth quarter of 2016, U.S. bank equities have performed in line with broader equities in early 2017.
    - As measured by the KBW Nasdaq bank index, bank equities have increased 1.5% since December 31, somewhat less than the 2.6% increase in the S&P 500 index.
    - In contrast, the KBW index increased 29.6% in the fourth quarter of 2016 compared to the 3.2% rise for the S&P 500 index.
    - The XLF financial sector ETF increased 2.0% since December 31, after increasing 20.5% in the fourth quarter.
US Dollar Exchange Rates

The dollar weakened modestly in early 2017.
- The dollar depreciated 2.9% against a basket of global currencies between the end of 2016 and February 3, after rising 2.8% in 2016.
- The dollar weakened 2.5% against the euro in early 2017, 3.7% against the yen, and 1.8% against the Mexican peso.

Expected Federal Funds Rate

Implied path for federal funds rate little changed
- The expected path for the federal funds rate implied by rates on overnight indexed swaps (OIS) changed little in early 2017.
  - The path implies about 50 basis points of tightening over the next year and roughly 100 basis points over the next two years.
- The current market-implied path remains somewhat below the median path from the FOMC’s December 2016 Summary of Economic Projections and the December 2016 NY Fed Primary Dealer Survey.
**FINANCIAL MARKETS**

**10-Year Treasury and Term Premium**
- Percent

![Graph showing 10-Year Treasury and Term Premium](image)

**Longer-term Treasury yields declined**
  - The 10-year Treasury yield was 2.55% on February 3, down 6 basis points since the end of December.
- Estimates of the Adrian-Crump-Moench term structure model attribute the decrease to a slightly lower term premium and a slightly lower expected path for the short-term rate.
  - Since December 31, the term premium decreased 3 basis points and the expected path of the short-term rate decreased 3 basis points.

**5-10 Year Forward Decomposition**
- Percent

![Graph showing 5-10 Year Forward Decomposition](image)

**Breakeven inflation moved up**
  - The five-to-ten year breakeven inflation rate was 2.02% as of February 3, up 15 basis points since December 31.
- According to the Abrahams-Adrian-Crump-Moench model, variation in the breakeven inflation rate was largely driven by changes in the inflation risk premium, while expected inflation has remained stable.
  - The estimated five-to-ten year inflation risk premium increased about 10 basis points in early 2017.
SPECIAL TOPIC: UNCERTAINTY IN THE U.S. AND THE U.K.

Some evidence of heightened U.S. policy uncertainty

- Uncertainty relates to the confidence an individual attaches to a forecast or the outlook of an event.
  - Delayed spending by consumers and firms is one example of how increased uncertainty can affect the economy.

- The U.S. daily policy index is constructed from:
  - A quantitative measure of newspaper articles that include policy-related economic uncertainty terms
  - Number of tax code provisions set for future expiration
  - Extent of disagreement among economic forecasters

- Economic policy uncertainty has, on average, been higher since the election than in the months prior.
  - The higher reading likely reflects issues pertaining to immigration, trade policy, and the fiscal outlook.

Retreat in U.K. policy uncertainty from recent highs

- The U.K. policy uncertainty index is constructed in a similar manner to the U.S. index.

- The U.K. index reached a record level of 1142 in July 2016 following the Brexit referendum vote.
  - While there were large increases in the index in June and July, the index had been steadily rising since the beginning of 2016.

- While the index displayed another notable rise from September through November, it has now retraced most of its increase during 2016.
  - The latest January 2017 reading is similar to that observed in March of last year.
  - Recent values of the index may be subject to revisions.