



## Our Perspectives:

Commentary on the economy & regulatory policies affecting financial companies

**Barnett  
Sivon &  
Natter** P.C.  
ATTORNEYS at LAW  
WASHINGTON, DC

# The Longbrake Letter

## Part I — Assessment of 2017 Forecasts

### Outlook for 2018\*

Bill Longbrake  
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In this month's letter, I include a final assessment of observations I made a year ago about how the U.S. and global economies might fare in 2017. You will find that I got some things right and many things wrong—there is a lot of red ink on the summary. The U.S. and global economies are dynamic and ever changing. Some trends are foreseeable. But, governmental policy intervention, whether it be political or economic, can alter outcomes and set in motion feedbacks that significantly affect economic developments. In this respect, 2017 was no different from any previous year.

Such will also be the case in 2018. Nonetheless, I once again attempt to summarize key U.S. and global economic developments that seem possible, perhaps likely, in 2018. I also list risks to the 2018 outlook.

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\*The information contained in this newsletter does not constitute legal advice. This newsletter is intended for educational and informational purposes only.

## Assessment of Outlook—2017 and Beyond—Forecast Summary for the U.S. and the Rest of the World, Highlights of Key Issues, and Identification of Risks

This is the final assessment of forecasts made at the beginning of 2017. Forecasts which were borne out by events are denoted by “+”; observations not on track are denoted by “-”; indeterminate observations are denoted by “?” and general observations are denoted by “✓”.

1. **U.S.—End-of-the-Year Assessment:** Strong consumer, business, and investor optimism influenced economic activity favorably during 2017 and to a greater extent than originally expected; early in 2017 survey data were much stronger than hard economic data reports, but better hard economic data followed later in the year; late in the year pending congressional enactment of tax reform contributed to business and market optimism, which fueled an acceleration in economic activity and growth in late 2017
  - ✓ Congress enacted tax reform and President Trump signed it into law just before Christmas; tax reform is expected to add 0.2% to 0.3% to GDP growth in both 2018 and 2019
  - ✓ The surge in confidence that followed Trump’s election in 2016 was followed by higher stock prices, strong employment growth, and an acceleration in global growth
  - ✓ The Chicago Federal Reserve’s National Activity Index decreased from 0.76 in October, which was the highest level since December 2006, to 0.15 in November, still indicating that economic activity is expanding at a greater rate than the historical average, but at a somewhat slower pace
  - **2017 real GDP Y/Y** growth projections range from 2.0% to 2.4%. The FOMC’s central tendency Q4/Q4 projections range from 1.9% to 2.3%. (Q4/Q4 projections are highly dependent upon potential anomalies in Q4 data; therefore, Y/Y estimates, which average all four quarters, usually are more stable estimates.) Risks are tilted to the upside because of fiscal policy activism to cut taxes and increase infrastructure spending.
    - ✓ *GS’s U.S. Current Activity Indicator (CAI) has been well above the long-term potential level of 1.5% throughout 2017: it was 4.0% in December compared to 4.2% in November and 4.0% in October; the CAI is a proxy for real GDP growth; in early 2017 CAI was high because of strong survey data; the more recent rise in the index has been driven by stronger hard data;*
    - + *B of A’s 2017 forecast is 2.25% and GS’s is 2.27%; my “BASE” scenario forecast is 2.25% and my “Strong Growth” scenario is 2.25%*
    - + *FOMC boosted its 2017 Q4/Q4 central tendency range in December to 2.4-2.5%; if year-over-year real GDP growth is 2.25%, Q4/Q4 will be 2.5%; although this is above the beginning-of-the-year FOMC projection range, it would be within the original projection range, if BEA had not revised 2016 Q4 real GDP*
  - **Real GDP output gap** will remain high, but will narrow considerably during 2017 from about -1.2% to -0.5% to -0.8%. (The exact size of the output gap will be revised by CBO, probably in February 2017 and again in August 2017; a negative output gap means that potential exceeds actual).

✓ When CBO revised its economic assumptions during 2017, its estimate of the output gap in the fourth quarter of 2016 decreased from -1.30 percent to -0.45 percent. This improvement was comprised of two components—BEA’s revisions to real GDP reduced the gap by 23 basis points; CBO’s downward revisions in January and June of estimated potential real GDP reduced the gap by 62 basis points; the revised end of 2017 output gap should be close to zero

+ The third quarter output gap was -0.23%, which means that the economy was operating at slightly below full capacity; if Y/Y real GDP growth is 2.25%, the output gap at the end of the year should be close to zero

- **Potential structural rate of real GDP growth** has declined significantly in recent years. I expect potential growth to be about 1.3% to 1.4% in 2017. Long-term potential real GDP growth will edge up in coming years to between 1.75% and 2.0%.

- Based on updated CBO data, I now expect potential GDP growth in 2017 to be approximately 1.55%

+ Long-term potential real GDP growth was adjusted modestly to a range of 1.75% to 1.96%

- **Productivity** should rise during 2017 from near zero in 2016 but is still likely to be less than 1.0%, as growth improves and investment increases; it will fall well short of the historical 2.1% average.

- 2016 productivity was 0.00% Y/Y and .84% Q4/Q4; Y/Y productivity is expected to rise in the fourth quarter to an estimated 1.21% and to an estimated 1.00% Q4/Q4

- **Employment** growth should slow considerably during 2017; now that full employment has been reached actual employment growth should closely track growth in the labor force; payroll growth should average 125,000 to 150,000 per month.

- Payroll employment growth averaged 171,250 in 2017 (this estimate will be revised in January 2018 when benchmark revisions are reported)

+ Household employment growth averaged 148,917 in 2017 (this is a final number and will not be revised)

✓ Labor force growth averaged 71,750 during 2017; when household employment growth exceeds labor force growth, the unemployment rate declines and the labor market gets tighter; eventually payroll and household employment growth will decline and converge to labor force growth

+ Evercore ISI temporary and permanent employment surveys remained strong during 2017, but drifted lower from an average of 60.1 in December 2016 to 55.3 in December 2017 (a value above 50 is favorable)

- The Conference Board’s labor market differential increased to +20.2 in November (the highest level since July 2001) compared to +18.1 in August, +16.1 in July, +13.6 in June, +11.7 in May, +10.9 in April, +12.8 in March, +7.3 in February and +6.0 in January, indicative of a very strong employment market

- **Employment participation** will resume a gradual decline during 2017 due to demographically-embedded retirements of baby boomers.

- Participation rose modestly from 62.67% in December 2016 to 62.71% in December 2017

- **Unemployment rate** should edge down slightly to between 4.3% and 4.5%.

- U3 unemployment rate in December was 4.09%

- **Hourly wage growth** should edge up slightly during 2017 to a range of 2.7% to 3.1%.
  - *Acceleration in wage rate growth has been slower than expected*
  - *BLS Y/Y hourly wage growth for all employees in December 2017 was 2.57%, which was the same as the 2.57% rate of growth in December 2016; Y/Y hourly wage growth for production and nonsupervisory workers was 2.35% in December 2017, which was down from the 2.48% rate of growth in December 2016*
  - *The employment cost index grew a disappointing annual rate of 2.51% from Q3 2016 to Q3 2017*
  - ✓ *GS's wage tracker was 2.6% in December*
  - + *Consumer and business wage expectations surveys rose during 2017 to 2.8% from 2.6% at the beginning of the year*
  - ? *The Atlanta Fed wage tracker, which is based upon a different methodology, has declined during recent months and was up 2.9% in December compared to 3.9% in October 2016, even though the level is still within the forecast range, the recent downward trend is consistent with other indicators*
  - + *Evercore ISI's composite index of temporary and permanent placement wage pressures was a strong 64.8 in December 2017 compared to 63.7 in December 2016 (a value greater than 50 indicates upward pressure on growth in wages)*
- **Nominal consumer disposable income**, measured on a Y/Y basis should slow as employment growth slows; this will be offset partially by an increase in average hourly wage rates; growth should be in a range of 2.75% to 3.25%.
  - + *As of November nominal consumer disposable income growth over the past 12 months was 2.77%; growth in 2017 appears likely to be in the middle of the forecast range*
- **Nominal consumer spending growth** on the Y/Y basis will rise due in part to upward pressure on inflation in a range of 3.5% to 4.0%.
  - *As of November, nominal consumer spending growth over the past 12 months was 4.50%; growth in 2017 appears likely to be above the top end of the forecast range; this strength is not due to inflation, which has declined, but reflects instead strong employment growth and consumer confidence and a decline in the saving rate*
  - *December 2017 retail sales were 5.4% higher than December 2016*
  - ? *On line store sales have risen 5% over the past year; department store sales have declined 5% over the past year; B of A estimated that 34% of holiday sales were on line compared to 32% in 2016; online sales have increased 12.1% in 2017 compared to a 0.4% increase for brick and mortar establishments*
  - *Auto sales were 17.1 million units in 2017, down 1.9% from 17.5 million in 2016; B of A expects auto sales to continue declining to an annual rate of 13 million units by 2021*
  - *The University of Michigan Survey of Consumers sentiment index after reaching a 13-year high of 100.7 in October, ended the year at 95.9 in December, which was still at a strong level but not much different from monthly readings during most of 2017 and down slightly from 98.2 in December 2016; perhaps somewhat worrisome, the decline in this index over the last two months of 2017 has come mostly from the expectations of future economic activity component*

+ *Conference Board consumer confidence index ended 2017 on a down note of 122.1 in December after rising to a near record high of 129.5 in November; it was still higher in December 2017 compared to 113.3 in December 2016*

+ *Bloomberg's U.S. Consumer Comfort index rose to 53.5 at the end of December 2017, its highest level of the year and the highest level in 16 years*

+ *Evercore ISI's index of company surveys was 53.8 in December 2017 which was a healthy increase from 50.1 registered in December 2016*

? *According to the Federal Reserve Senior Loan Officer Opinion Survey, credit standards for credit cards and auto loans tightened in Q3, but demand remained unchanged*

- *Consumer credit has risen 5.3% from November 2016 through November 2017*

- **Household personal saving rate** will decline slightly as growth in spending exceeds growth in disposable income in a range of 5.0% to 5.5%.

- *The saving rate averaged 3.53% over the first 11 months of 2017 compared to 3.49% over the past 12 months—the large forecast miss was caused by a substantial downward revision in savings by the Bureau of Economic Analysis in its annual bench market revisions of National Income Accounts*

- **Stock prices**, as measured by the S&P 500 average, should be between 5% higher or 10% lower, on the downside reflecting rising wages, slowing growth in profit margins and rising short-term interest rates and on the upside reflecting growth friendly fiscal policy; there is analysis indicating that U.S. stock prices are overvalued as 2017 commences.

- *The S&P 500 stock index was up 19.4% in 2017; the total rate of return, including dividends, was nearly 22%*

- **Manufacturing** will continue to be weak with the PMI index just slightly above or below 50, reflecting the negative consequences of dollar strength.

- *The industrial production index rose to 107.5 in December 2017 from 103.8 in December 2016; manufacturing strength in 2017 reflected in part stronger global growth and a weakening dollar*  
- *94.6% (all-time high in the 20-year history of this survey) of manufacturers were somewhat or very positive about business prospects for their companies in the fourth quarter of 2017 versus 56.6% in the fourth quarter of 2016*

- *The NFIB optimism index ended 2017 with a December reading of 104.9 after a cyclical high of 107.5 in November; monthly values of this index during 2017 were the highest sustained level since 2004*

- *ISM manufacturing index rose to 59.7 in December 2017 from 54.5 in December 2016, after hitting a 13-year high of 60.8 in September (a value above 50 is favorable)*

- *ISM non-manufacturing index dropped to 55.9 in December 2017, which was not much different from 56.6 in December 2016; this index peaked at 60.2 in October (a value above 50 is favorable)*

? *Capacity utilization (the U.S. operating rate) was 77.9% in December 2017 compared to 76.0% in December 2016; in spite of this rise capacity utilization in 2017 remained below the 80.0% level that typically leads to a sustained acceleration in business investment spending*

- *Reflecting the theme of vibrant investor optimism and strong economic activity, the GS analyst index leaped to 70.0 in December 2017, its highest level in six years, compared to 60.7 in December 2016 (the employment and wages sub-indices were even stronger in December); (a value above 50 is favorable)*

? S&P 500 earnings growth has been very strong, but National Income accounting data, which adjusts profits for inflation and depreciation, had been under downward pressure during 2015 and 2016 until a small increase in the second quarter and a much larger increase in the third quarter, which resulted in Q3/Q3 growth of 5.3%, still well below S&P 500 earnings growth

- **Business investment** spending growth should improve and be in a range of 1.0% to 3.0%.
  - Business investment grew at a stronger than expected rate of 6.1% over the first three quarters of 2017 and is expected to rise approximately 5% for the entire year
  - + According to the NFIB survey, capital spending has been solid but relatively stable during 2017, “but not enough for a significant improvement in GDP growth or productivity;” plans for capital outlays rose to the highest level since 2006 in August but fell 5 points to 27 in December; the percentage of companies making capital expenditures was 61 in December 2017 but remained well below the two previous cyclical peaks in 2006 and the late 1990s; nonetheless; anecdotal industry reports have been more upbeat than they have been in recent years
  - ? The fourth quarter 2017 EvercoreISI survey capital spending plans indicated that 36% of CFOs plan increases in 2018 compared to only 9% that planned increases in 2017 in the fourth quarter 2016 survey
  - ? EvercoreISI’s survey of capital goods rose steadily from 44.7 in January to 61.0 in December 2017 (a value above 50 indicates growth in activity)
  - ? EvercoreISI’s fourth quarter company inventory survey indicated that the overhang that emerged in the second quarter has disappeared; auto dealer inventories are still high but have decreased from +43% in the second quarter to +30% in the fourth quarter; home builder inventories moved from a very low -25% in the second quarter to an even lower -46% in the fourth quarter; retailers’ inventories were slightly above normal in the fourth quarter at +14%, while manufacturing and capital goods companies inventories were below normal at -19% in the fourth quarter
  - ? According to the Federal Reserve Senior Loan Office Opinion Survey, C&I lending credit standards eased in Q3; however, demand has weakened over the course of 2017
  - ? Commercial real estate credit standards remained unchanged in Q3, but demand weakened
- **Residential housing investment** should be about the same in 2017 as it was in 2016 in a range of 3% to 6%; housing starts should rise 2% to 5%.
  - ? NAHB housing market index catapulted to an all-time high of 74 in December compared to 67 in January 2017 (a value above 50 is favorable)
  - + Annualized housing starts from January through November were 3.3% above the 2016 total, and are up 2.6% over the previous 12 months; housing starts are on track to be at the lower end of the forecast range
  - Housing investment declined at an annual rate of -0.6% over the first three quarters of 2017, and is projected to grow a mediocre 1.5% to 2.0% for the entire year
  - + EvercoreISI’s homebuilders survey has been steady over the course of 2017: it was a strong 57.5 in December 2016 and 58.0 in December 2017 (a value above 50 is favorable)
  - ? Homeownership averaged 63.4% during 2016, the lowest level since 1967, but has edged up slightly to an average of 63.7% over the first three quarters of 2017; GS expects homeownership to stabilize at 65% over the next 3 years, which will boost annual housing starts by about 150,000

*to 200,000 cumulatively over the next 3 years and increase growth in housing investment by 1% to 2% annually*

*? According to the Federal Reserve's senior loan officer survey, mortgage credit standards for residential loans remained the same or eased slightly in Q3, but demand weakened*

- **Residential housing prices** should rise more slowly in 2017 in a range of 2% to 4% in 2016.
  - *The Federal Housing Finance Agency's Housing Purchase Price Index rose 6.3% during 2016 and 6.5% over the past four quarters*
  - *According to the S&P Case-Shiller index, the year over year trend in housing prices was an increase of 6.2% in September, which is well above the rate of increase in nominal incomes and, thus, is not sustainable*
  - *CoreLogic reported that housing prices are overvalued (more than 10% over sustainable value) in 34% of the U.S.'s 100 largest metropolitan areas and undervalued in 28% (more than 10% under sustainable value); however, overvaluation tends to be concentrated in the larger metropolitan areas (46% of the 50 largest metro markets are overvalued)*
  - ? I estimate that national housing prices were 9.7% above the long-term trend level in the third quarter of 2017; for comparative purposes, this measure peaked at +34.2% in the first quarter of 2006 and bottomed at -8.2% in the first quarter of 2012*
- **Trade deficit** should rise in 2017 as the increase in the value of the dollar depresses exports and increases imports.
  - + *The trade deficit in November, measured as a 12-month moving average, was 2.83%, slightly worse than December 2016's 2.67%*
- The **dollar's value** on a trade-weighted basis should rise due to stronger economic growth and higher interest rates relative to other developed economies.
  - *Trade-weighted dollar was down -7.0% in December 2017 from December 2016, although this is an improvement from the -8.7% decline in September; its December 2017 value was about the same as prevailed in February 2015; while U.S. growth in 2017 was relatively strong, global growth strengthened to a much greater degree and that accounted at least in part for the decline in the value of the dollar*
- **Oil prices** are likely to trade in a narrow band of \$40 to \$55 per barrel because abundant and flexible supply in the U.S. will constrain prices if global demand accelerates.
  - + *Oil prices (West Texas Intermediate Crude) averaged \$51 a barrel in 2017 compared to \$44 a barrel in 2016; however, oil prices averaged \$58 in December, reflecting stronger global growth and a change in Saudi Arabia's policy in the direction of limiting production to constrain international supply; in the long run downside risks to prices outweigh upside risks because of rapidly rising U.S. shale oil production capacity; higher prices will stimulate increased production but this will take several months to materialize*
- **Monetary policy**—the Federal Reserve will raise the federal funds rate one to three times during 2017 in 25 basis point increments.
  - + *As expected, the FOMC raised the federal funds rate by 25 basis points in March, June and December*
  - + *The FOMC updated its guidelines for shrinking its balance sheet at the June meeting; implementation began in October; so far there has been no unusual market reaction*

? *Financial conditions eased in 2017 and ended the year at 98.68 compared to 100.05 in December 2016; easy financial conditions in 2017 are indicative of favorable economic conditions and investor optimism*

- **Total inflation** measures (CPI and CPE) will be relatively stable in 2017: CPI will rise 2.0% to 2.4% and CPE will rise 1.7% to 2.0%.
  - + *Total CPE inflation was up 1.76% in November compared to November 2016; however, the index now appears to be headed higher by year end to 1.8%, which would be within the forecast range*
  - + *GS's inflation tracker was steady at 1.7% in December, November, October and September, which was up from 1.5% in August and 1.4% in July*
  - + *University of Michigan 5-10 inflation expectations declined to 2.4% in November from 2.5% in October, a level that had prevailed for much of the year*
  - + *5-year, 5-Year Forward CPI Inflation Expectation rate derived from Treasury Inflation Protected Securities was stable during 2017 and ended the year at 2.06% on December 29, 2017 compared to 2.08% on December 30, 2016; this translates into an expected long-run PCE inflation rate of approximately 1.81%*
  - + *The third quarter 2017 survey of professional forecasters indicated a decline in long-term expected CPE inflation to 2.00% and CPI to 2.25%*
- **Core PCE inflation** will rise slightly in a range of 1.6% to 1.9%, reflecting global disinflationary trends offset somewhat by the closing U.S. employment and output gaps.
  - *Core CPE inflation was up 1.48% in November compared to November 2016; it now appears that core PCE inflation will be slightly below the bottom end of the forecast range by the end of the year*
- The **10-year Treasury rate** is likely to fluctuate in a range between 1.75% and 2.75% in 2017. Faster than expected real GDP and employment growth would push the rate toward the top end of the range; greater than expected declines in inflation and/or heightened financial instability would push the rate toward the bottom end of the range.
  - + *The 10-year Treasury yield was 2.40% on December 29 compared to 2.45% on December 31, 2016*
  - ? *The yield curve slope, as measured by the 10-year—2-year Treasury yield spread, flattened from 130 basis points in December 2016 to 56 basis points in December 2017; this reflects tightening monetary policy*
- **Fiscal policy** will have a positive impact on real GDP growth during both fiscal year and calendar year 2017, raising real GDP growth by 0.2 to 0.3%.
  - *Congress passed the “Tax Cuts and Job Act” in late December 2017, too late to have any direct impact on 2017 GDP growth; however, the expected impact in 2018 and 2019 is 0.2% to 0.3% increase in real GDP growth in each year*
  - *Congress did not consider Infrastructure stimulus legislation in 2017, but may do so in 2018*
  - + *Congress passed legislation to provide \$15.2 billion in Hurricane Harvey relief aid and combined it with a suspension of the debt ceiling until December 6, thus averting the possibility of a government default for the time being; Congress passed an additional \$34 billion in emergency*

*relief for Hurricanes Irma and Maria and California wildfires; the Trump Administration has asked Congress for an additional \$81 billion, which the House has passed but the Senate has deferred action until 2018; this would bring the overall total of emergency relief nearly \$131 billion*

*+ Congress passed a three-month continuing budget resolution, which extended government spending at fiscal year 2017 levels to December 6, a second continuing resolution extended the date to Dec. 22, and a third extended the date to January 19, 2018; adoption of a fiscal year 2018 budget resolution will need to occur prior to the expiration of the continuing resolution to avert the possibility of a partial government shutdown; both Republicans and Democrats want to raise the spending caps, but a consensus on details has yet to be reached; adoption of the fiscal year 2018 budget by Congress will require 60 votes in the Senate, so at least nine Democratic Senators will have to agree to support the final budget resolution*

*? Congress re-imposed the federal debt ceiling on December 6, but it is unlikely to become binding before March 2018*

- The **deficit** as a percentage of nominal GDP will increase substantially from fiscal year 2016's level of 3.15% to a range of 3.50% to 4.25%. Stronger than expected growth and delayed implementation of tax cuts and infrastructure spending would push the deficit toward the lower end of the range.

*- The final fiscal year 2017 budget deficit was a better than forecast 3.41% and beat CBO's revised forecast by \$27 billion; the 3.41% could change a little, either up or down, when 2017 Q3 nominal GDP data are revised in July 2018*

- **State and Local investment** spending growth should range between 1.0% and 1.5%.

*- State and local spending fell at an annual rate of -0.2% during the first three quarters of 2017; growth for all of 2017 is expected to be zero*

*- EvercoreISI's survey of state and local tax revenues rebounded to 56.5 in December from 48.4 in November, 46.0 in October, 47.8 in September, 47.0 in August, and 48.2 in July (a value of the index above 50 indicates modest acceleration); until December, revenue growth had been weak all year, which may be related to the lack of growth in state and local investment spending in 2017*

2. **Rest of the World: End-of-the-Year Assessment:** Economic activity continues to be strong just about everywhere and has become self-reinforcing

- ✓ GS's global current activity indicator (CAI) has held at 5.0% or higher (November was 5.6% and December was 5.1%) from September through December, which is the highest sustained level in seven years
- ✓ CAI for major advanced economies accelerated from 1.5% last summer to 3.8% in December
- ✓ CAI for emerging markets been accelerating all year, rising from 4.3% in January to 6.5% in November and 6.2% in December
- ✓ OECD's global index of leading economic indicators has been rising slowly over the past year

- ✓ **The JP Morgan Global Manufacturing PMI increased to 54.5 in December from 52.7 in July, and is at the highest level since February 2011 during the initial recovery from the Great Recession**
- **Global growth** is likely to improve to 3.4% in 2017 from 3.0% in 2016. However, due to political instability in Europe and the possible negative impacts of a strong dollar on emerging market economies, risks are tilted to the downside.
  - *B of A increased its global growth expectation in 2017 to 3.7%*
  - *IMF upgraded its 2017 global growth forecast to 3.6% in the fall, but the full year number is likely to be a bit higher*
  - *GS raised its 2017 forecast to 3.7%*
  - *Global growth has accelerated, political instability has been limited, and the dollar has weakened*
  - ? *Global inflation drifted up slightly due to firming commodities prices; diminishing output gaps should create modest further upside pressure; global inflation is expected to be 2.7% in 2017 compared to 2.5% in 2016*
- **European growth** will be positive but will likely fall short of the consensus 1.4% because of potential social and political disruptions, but a decline in the value of the euro would have favorable consequences.
  - *Eurozone manufacturing PMI index has improved to 60.1 in November, which was its highest level since February 2011*
  - *B of A increased its 2017 GDP forecast to 2.3%*
  - *GS raised its 2017 forecast to 2.3%*
  - *GS's Euro area CAI was 4.0% in December, well above potential of 0.9% and also well above actual real GDP growth of 2.3% in 2017*
  - *The euro has strengthened*
- **European inflation** will rise from 2016's 0.2% but will probably fall short of the expected 1.2%.
  - *Thanks to rebounding energy prices, inflation in 2017 rose to 1.4%; core inflation was 0.9% in 2017*
- **European financial markets** should be relatively stable with periodic episodes of volatility prompted by specific events, such as the French and German elections or a potential banking crisis in Italy
  - + *No episodes of volatility occurred; potential volatility stemming from national elections was muted by strong upward momentum in economic growth*
- **European political dysfunction, populism and nationalism** will continue to worsen gradually. Countries to watch closely include France, Italy, the Netherlands, Greece, Spain, and Portugal. Germany's election will occur toward the end of 2017 and could be significant, depending upon whether political and social turmoil escalates in other parts of Europe earlier in the year.
  - ? *Dutch elections on March 15 resulted in a smaller than expected gain for the far-right Party for Freedom, which eliminated the possibility of a referendum on European Union membership*

- *Emmanuel Macron, a centrist Europhile, convincingly won the French presidential election and his party captured a majority of seats in the parliament; this was interpreted as a setback for populism*

+ *While the German Bundestag elections on September 24 apparently guaranteed a fourth four-year term of Chancellor for Angela Merkel, her party, the center-right Christian Democratic Union (CDU), and the center-left Social Democrat Party (SDP) lost substantial ground to parties on the left and the right; the right-wing Alternative for Germany party did much better than expected, garnering 12.7% of the votes, indicating that populism is gaining traction in Germany; at year end a tentative agreement was reached to continue the coalition government of the CDU and SDP*

+ *While the cyclical economic upturn in Europe has muted the tides of populism somewhat, Germany's election outcome indicates that it remains a significant force which could gain momentum should the European economy falter; Austria's new government includes a far-right populist party*

? *Italy is scheduled to hold elections in 2018; while popular support for the euro has ebbed, Italy's recent return to tepid growth may limit support for Euroskeptic parties, but it is still likely that centrist parties will emerge somewhat weaker just as has occurred in Germany and the Netherlands*

? *Greece has faded from the news and appears to be complying, albeit grudgingly, with creditor bailout requirements; however, the IMF expects yet another bailout will be required in 2018*

- **U.K. growth** is expected to decline to 0.9% in 2017 compared to 1.8% in 2016 as Brexit consequences begin to develop.

? *The U.K. triggered the two-year withdrawal process from the EU on March 29; negotiations with the EU commenced in late June; as 2017 ended, a soft, rather than hard, exit appeared to be gaining policy ascendancy*

? *Prime Minister May unexpectedly held early parliamentary elections with the hope of strengthening the Conservative Party's majority; instead Conservatives lost seats, Labour gained and the Scottish National Party lost seats to both Conservatives and Labour; the election outcome pushed Brexit momentum in the direction of a soft landing*

- *Expected 2017 GDP growth is likely to be 1.5% (B of A) to 1.7% (GS); however, given the U.K.'s impending exit from the European Union, growth is expected to decelerate in future years*

- *GS's CAI was 2.2% in December well above potential of 1.3%; however, the UK index of leading indicators fell during the last few months of 2017*

- **China's GDP growth** is expected to be 6.6% but risks are to the downside.

- *The official 2017 GDP growth target has been cut to 6.5% from 7.0% set in 2016; 2017 GDP growth is likely to be 6.8% (B of A and GS)*

- *Growth momentum has been strong but some slowing is expected; however, downside risks of a sharp deterioration in growth are limited*

- *GS's current activity indicator was 7.1% in December, compared to potential growth of 6.7%*

? *The yuan was down against the dollar in early 2017r, but it strengthened later in the year; foreign reserves stopped dropping and remain near a hefty total of \$3 trillion*

- **China's leadership** will continue to be slow in implementing *economic reforms* but financial and political stability will be maintained.

+ *The 19<sup>th</sup> Communist Party Congress met in late October; President Xi received a second term; Xi set a policy course that strengthens political stability and probably diminishes the potential for financial instability*

? *Policy initiatives over the next several years will deemphasize economic growth and elevate the importance of initiatives that provide a “better life” for the Chinese people; economic reforms will occur but will be managed to assure social and political stability*

- **Japan's** economic policies will continue to fall short of achieving the 2.0% inflation target; inflation is expected to rise from 0.2% in 2016 to 1.2% in 2017. GDP growth will also continue to fall short of the policy target, but is expected to rise from 1.0% in 2016 to 1.5% in 2017. Population decline and slow implementation of market reforms will continue to weigh heavily on both growth and inflation.

- *Total inflation is expected to be 0.5%, and core inflation is expected to be 0.4%*

? *Unemployment is 2.8% compared to NAIRU of 3.6%; in 1992 and 2007 when the employment gap was this large, inflation rose to more than 2.0%*

- *B of A has marked up GDP growth for 2017 1.8%*

+ *GS expects 2017 GDP growth to be 1.4%*

- *GS's current activity indicator was a very strong 3.8% in December, well above Japan's full potential level of 1.3%*

- *Japan's economy is operating above full potential but the strong positive momentum appears to be solid and should continue for several more quarters*

? *Japan's stock market rose to its highest level since 1996 as company earnings continued to power ahead; profit margins were 6.2% in the second quarter compared to a 60-year average of 2.9%*

? *Prime Minister Shinzo Abe held early parliamentary elections during 2017; voters returned his party and coalition partner to power with a super-majority of 313 of 465 seats, which will ensure Abe remains in power for several more years*

? *Abe plans to deploy increased revenue from higher consumption taxes into fiscal spending measures including education; he also plans to reform Japan's constitution*

? *Shortages of labor are helping Japan lead robotic innovation*

? *Monetary policy is likely to remain highly stimulative for a long-time to come*

- **India** should continue to experience relatively strong real GDP growth in a range of to 7.0% to 8.0% in 2017.

? *State elections early in the year resulted in a major victory for Prime Minister Modi's Janata Party, which increased Modi's ability to pursue his reform agenda; most are optimistic that India will be able to sustain high GDP growth for a number of years*

+ *GS expects GDP growth to be 7.3% in 2017*

- *B of A expects GDP growth to be a somewhat slower 6.7% in 2017*

+ *GS's current activity indicator was volatile during 2017 but registered 7.6% in December*

- **Emerging market countries** should experience better growth in 2017 than in 2015 and 2016 when falling prices for commodities depressed economic activity in many countries. Growth is expected to improve from 2.6% in 2016 to 3.5% in 2017. However, a major downside risk is a strong dollar, particularly for emerging economies that have large amounts of dollar-denominated debt.

+ *Growth in emerging market countries, excluding China, accelerated in tandem with accelerating growth in developed economies to 3.6% (GS) or 3.7% (B of A); the dollar's decline in value helped growth accelerate*

+ *GS's current activity index for emerging markets countries, which includes China, trended higher during 2017 from 4.3% in January to 6.2% in December*

- **Brazil, Russia, and Venezuela, in particular**, will continue to struggle with the consequences of the steep decline in the prices of commodities and particularly in the price of oil.

+ *Expected 2017 GDP growth for Brazil is 0.6% (GS) to 1.0% (B of A); GS's current activity indicator has been positive so far in 2017 and was 3.9% in December, which bodes well for better growth in 2018; however, the political situation continues to be troublesome*

- *Economic conditions improved in Russia during 2017 and were aided by higher oil prices; GDP growth is expected to be 2.6% in 2017*

+ *Economic and political conditions continue to deteriorate in Venezuela; bond default is approaching and vulture investors are buying bonds from traditional investors; regime change does not appear to be imminent; President Trump has voiced strong negative sentiments, but no action has been taken to strengthen economic sanctions*

3. **Risks** — stated in the negative relative to the forecast (*+ risk realized; - risk not realized*).

**December Assessment:** No significant negative risks impacted economic activity or financial markets in 2017; a synchronous acceleration in global economic activity boosted nearly all global financial markets; developments in North Korea and Saudi Arabia pose potential risks, but have not impacted economic or market activity; synchronized acceleration in global economic growth and easy monetary policies have reduced market volatility

- **U.S. potential real GDP growth** falls short or exceeds expectations; falling short is the more serious risk

- *Risk not realized; updated forecasts for actual 2017 real GDP growth are in the middle to upper end of the 2.0-2.4% forecast range*

- **U.S. employment growth** is slower or faster than expected; slower growth is the more serious risk

+ *Employment growth in 2017 exceeded the top of the forecast range*

- **Employment participation rate** rises rather than remaining stable or falling modestly

- *The participation rate has been relatively stable, rising from 62.67% in December 2016 to 62.71% in December 2017*

- **U.S. hourly wage rate growth** falls from its 2016 level of 2.6% or rises much more rapidly than expected; falling wage growth is the more serious risk

+ *Risk realized; hourly wage rate growth was 2.57% for all employees in 2017*

- **U.S. Unemployment rate** rises
  - *Risk not realized, the rate has fallen more than expected*
- **U.S. productivity** remains below 1%
  - + *Q3 2016 to Q3 2017 productivity increased 1.3%; the 12-quarter moving average was 1.2%; the full year productivity increase is on track to be approximately 1.2% (12-quarter moving average)*
- **Real U.S. consumer income and spending** increase less or more than expected; less than expected increases are the more serious risks
  - *Consumer income rose within the expected range*
  - + *Consumer spending growth increased above the upper end of the expected range because of strong employment growth and elevated consumer optimism*
- **U.S. stock prices** fall more than or rise more than the expected range of -10% to +5%
  - + *Growth in stock prices was considerably above the upper end of the expected range*
- **Growth in U.S. residential housing investment and housing starts** are less than or more than expected; below expectations is the more serious risk
  - + *Housing investment growth is on track to be less than expected*
  - *Housing starts are likely to be within the expected range*
- **U.S. residential housing price increases** are less than expected
  - *Housing prices are rising more than expected; I estimate that housing prices nationally are approximately 10% above the long-term trend level*
- **U.S. private business investment** does not improve as much as or more than expected; falling short of expectations is the more serious risk
  - + *Business investment is likely to be above the top end of the forecast range*
- **U.S. manufacturing growth** contracts or expands more than expected; contraction is the more serious risk
  - + *Manufacturing surveys are strong; industrial production has increased*
- **U.S. trade deficit** does not widen as expected
  - *Trade deficit has edged up slightly*
- **Value of the dollar** rises substantially and triggers a global dollar squeeze
  - *Risk not realized, the dollar declined in value in 2017*
- **Oil prices** rise above or fall below the expected range
  - + *Prices were within the expected range for most of the year and then broke out above the top end of the range in December in response to tighter inventories, stronger global growth and political developments in Saudi Arabia*
- **U.S. monetary policy** tightens more than 75 basis points, spawns financial market uncertainty and contributes to global financial instability
  - *The FOMC increased the federal funds rate 75 basis points*
- **Financial conditions** tighten and cause financial market volatility
  - *Risk not realized, financial conditions eased in 2017 and are supportive of slightly greater real GDP growth*

- **U.S. inflation** falls or rises more than expected
  - + *Inflation was weaker than expected in 2017 and is will be lower than 2016's inflation rate*
- **U.S. interest rates** fall or rise more than expected
  - *Risk not realized; long-term rates have changed very little since the beginning of the year rather than rising slightly, as expected*
  - ? *In a potentially worrisome development, the yield curve slope, as measured by the 10-year – 2-year Treasury yield spread, has tightened from 125 basis points at the beginning of the year to 56 basis points in December*
- **U.S. fiscal policy** is more expansionary than expected
  - *Risk not realized; tax reform was signed just prior to Christmas; however, impacts on economic activity will not occur until 2018*
  - *Infrastructure stimulus did not occur*
- **Federal budget deficit** increases more than expected
  - *Risk not realized; the final fiscal year 2017 deficit was slightly smaller than expected*
- **U.S. state and local spending** does not rise as fast as expected
  - *Risk not realized; spending is likely to be stable in 2017*
- **Global GDP growth** does not rise as fast as expected
  - *Risk not realized; growth accelerated and is expected to be 3.8% (B of A and GS) in 2017*
- **Global trade** declines as the U.S. and other countries pursue protectionist policies
  - *Growth in global trade is at the highest level since 2011; other than cancelling TPP, the Trump administration took no material actions during 2017 to limit trade*
- **European growth** is considerably less than expected
  - *Risk not realized, growth accelerated significantly*
- **ECB's** quantitative easing program is not successful in raising inflation and stimulating the European economy
  - *Risk not realized, Europe's GDP growth accelerated significantly; inflation was slightly higher than expected*
- **Europe**—financial market turmoil reemerges
  - *Risk not realized; the steadily improving European economy strengthened the euro and bolstered stock prices; the absence of political turmoil also helped*
- **Europe**—political instability and social unrest rises more than expected threatening survival of the Eurozone and the European Union
  - *The Netherlands Party for Freedom, which has an anti-immigration platform and Euroskeptic sympathies, did not do as well as expected in the Dutch elections*
  - *France elected a moderate centrist, Emmanuel Macron, as president and gave him a parliamentary majority*
  - + *Centrist parties did poorly in Germany's Bundestag elections*
  - + *Austria's Peoples Party campaigned on limiting immigration and won a surprise parliamentary majority and formed a government with the far-right Freedom Party*

- *Populism remains worrisome but the improvement in European economic growth diminished this risk during 2017*
- **Chinese** leaders have difficulty implementing **economic reforms**
  - ? *The 19<sup>th</sup> Communist Party Congress met in late October—President Xi Jinping was confirmed for a second 5-year term, but more importantly he set a new policy course for China which deemphasizes economic growth and elevates the importance of a “better life” for the Chinese people*
- **China’s growth** slows more than expected
  - *Risk not realized in 2017*
- **Japan**—Abenomics and monetary policy are unsuccessful in raising inflation to the 2 percent target and economic growth continues to be below expectations
  - + *GDP growth in 2017 improved to 1.4% (GS) to 1.8% (B of A)*
  - *The inflation goal of 2% was not met; core inflation was 0.4% and total inflation was 0.5%, both measures were well short of the 2.0% target*
- **Emerging economies**—a strong dollar leads to serious difficulties especially for countries with large amounts of dollar-denominated debt.
  - *Risk not realized, the dollar’s value declined*
- Severe and, of course, unexpected **natural disasters** occur, which negatively impact global growth
  - *Hurricanes and wildfires buffeted the U.S., but there was no apparent significant negative impact on U.S. GDP growth*
- **New risk** – North Korea’s developing nuclear strike capability and potential for pre-emptive military intervention to neutralize that capability
  - + *Risk is simmering after the UN passed new stiff sanctions and North Korea’s leader and President Trump traded bellicose comments—“North Korea would be met with fire and fury like the world has never seen.”*
  - + *North Korea continues to escalate the situation by testing ICBM missiles, two of the latest of which overflew Japan’s northern most island of Hokkaido, and detonating what it claimed was a hydrogen bomb*
  - + *North Korea now possesses the ability to launch massive global disabling cyber attacks*
  - *At year end a thaw in North and South Korea relations emerged in conjunction with the upcoming Olympic games*
- **New risk**—Saudi Arabia’s anti-corruption purges of members of the royal family and prominent businessmen by crown prince Mohammad bin Salman and heightened tensions with Iran could elevate political turbulence in the Middle East and threaten higher oil prices
  - + *Oil prices (Brent crude) rose and the dollar’s value fell as tensions escalated*

## Outlook—2018 and Beyond—Forecast Summary for the U.S. and the Rest of the World, Highlights of Key Issues, and Identification of Risks

Observations about the 2018 U.S. and global economic outlook and risks to the outlook are listed below. As events unfold during 2018, this will enable the reader to track my analytical prowess. Observations which are on track are denoted by “+”; observations not on track are denoted by “-”; indeterminate observations are denoted by “?” and general observations are denoted by “✓”.

In general, 2018 should be a good year economically both in the U.S. and globally. Economic growth accelerated in all parts of the world during 2017 and considerable momentum will carry over into 2018. In addition, the passage of the “Tax Cuts and Jobs Act” in late 2017 will provide strong fiscal stimulus in the U.S. over the course of 2018 and 2019. However, the U.S. economy begins 2018 operating at full capacity and many global economies are approaching full capacity. Strong, above trend momentum in economic activity, will result in a buildup in imbalances. Optimism and favorable feedback loops will contribute to growth momentum in 2018 but this will also contribute to larger and more worrisome imbalances as time passes. Thus, the potential severity of risks will build during 2018. Realization of risks may occur before the year ends, but past experience suggests that positive momentum could persist for a time longer than the next 12 months, with the consequence that the eventual and inevitable correction of large imbalances could be very painful.

Forecasting accuracy, which is always difficult, becomes much more so when the economy is strong and above the long-term sustainable trend level, which is the situation in which the U.S. economy finds itself currently. The difficulty in forecasting involves pinpointing the turning point. Almost no one does this well. Recession forecasting models are relatively crude and forecast lead times have been very short. What we know from experience is that recessions occur when the economy becomes overheated. The timing of onset, however, depends upon human psychology. And, when human psychology is highly positive, as it is currently, it tends to feed upon itself and sustain momentum.

### 1. U.S.

- **2017 real GDP Y/Y** growth projections range from 2.3% to 2.8%. The FOMC’s central tendency Q4/Q4 projections range from 2.2% to 2.6%. (Q4/Q4 projections are highly dependent upon potential anomalies in Q4 data; therefore, Y/Y estimates, which average all four quarters, usually are more stable estimates.) Risks are tilted to the upside because of federal tax cuts and spending increases, robust optimism and strong momentum in global economic activity.
- **Real GDP output gap**, which disappeared during 2017, will become positive, which means the economy will overheat during 2018. By the end of 2018 the positive output gap should be in a range of 0.7% to 1.1 %. (CBO will revise its estimates of potential real GDP growth, probably in February 2018 and again during the summer of 2018, which will change the forecast of the end of the year output gap.)
- **Potential structural rate of real GDP growth** will remain well below actual real GDP growth during 2018 in a range of 1.5% to 1.7%. Long-term potential real GDP growth will edge up in coming years to between 1.7% and 1.9%.
- **Productivity** should rise during 2018 from approximately 1.2% in 2017 to a range of 1.3% to 1.5% as growth improves and investment increases; it will fall well short of the historical 2.1% average.

- ***Payroll and household employment*** growth should slow during 2018 because employment is above its long-term natural level and converge closer to the natural rate of growth in the labor force which is about 80,000 to 100,000 new entrants monthly; however, given the strength in expected economic activity during 2018, payroll and household employment growth should average between 140,000 and 180,000 per month during 2018.
- ***Employment participation*** should remain relatively constant during 2018 in a range of 62.55% to 62.85%, as strong employment growth offsets the longer-term declining trend in participation due to demographically-embedded retirements of baby boomers.
- ***Unemployment rate*** should edge down slightly from 4.1% to between 3.5% and 3.9%.
- ***Hourly wage*** growth, reported by BLS for all employees and non-supervisory and production workers, should edge up slightly during 2018 to a range of 2.6% to 3.0%.
- ***Nominal consumer disposable income*** growth, measured on a Y/Y basis should increase during 2018 because of strong employment growth, rising wage rates and tax cuts; growth should be in a range of 4.0% to 5.0%.
- ***Nominal consumer spending*** growth on the Y/Y basis should remain strong during 2018 because of strong employment growth, rising wage rates, tax cuts, easier access to credit and high levels of optimism; growth should be in a range of 3.5% to 4.5%.
- ***Consumer confidence*** in 2018 should be relatively stable near the cyclically high levels experienced in 2017.
- ***Consumer credit growth*** will remain relatively strong during 2018; growth should match or slightly exceed what occurred in 2017.
- ***Household personal saving rate*** will rise slightly as growth in disposable income exceeds growth in consumer spending; historically, a good portion of tax cuts has been saved initially rather than being spend; the saving rate should improve to a range of 3.50% to 4.25%.
- ***Stock prices***, as measured by the S&P 500 average, should be between 10% higher or 10% lower: on the downside reflecting pressure on profits margins from rising labor costs and higher short-term interest rates and, perhaps fading speculative momentum in an overextended market; on the upside reflecting growth friendly fiscal policy; U.S. stock prices are probably overvalued as 2018 commences, but price momentum is strong and appears to be self-reinforcing for a while longer.
- ***Business activity*** will remain strong with both the PMI manufacturing and service indices averaging above 50.
- ***Business investment*** inflation-adjusted spending growth should increase because of strong demand and favorable tax incentives; growth in 2018 should be well above the long-term trend level in a range of 4.5% to 5.5%.
- ***Business credit*** growth should continue to expand near levels experienced in 2018 to expand, but credit spreads should begin to widen; the impact of new tax provisions which will reduce the attractiveness of debt financing is uncertain, but could contribute to a slight slowing in business credit growth.
- ***Residential housing investment*** should be a little stronger in 2018 in a range of 3% to 6%; housing starts should also rise in a range of 3% to 6%.
- ***Residential housing prices*** should rise more slowly in 2018 in a range of 3% to 5%.

- **Trade deficit** should rise more rapidly in 2018 in a range of -3.0% to -3.5%.
- The **dollar's value** on a trade-weighted basis should continue its recent moderate decline due to stronger global economic growth.
- **Oil prices** are likely return to the long-term range of \$40 to \$55 that balances global supply and demand because abundant and flexible supply in the U.S. will constrain prices if global demand accelerates; however, strong global growth, OPEC production controls and speculative trading will cause oil prices to exceed this range during much of the year and perhaps for the entire year.
- **Monetary policy**—the Federal Reserve will raise the federal funds rate three to four times during 2017 in 25 basis point increments.
- **Total inflation** measures (CPI and CPE) will rise early in 2018 but then move lower later in the year as the impacts of the recent rise in energy prices falls out of the indices: CPI will rise 1.8% to 2.1% and CPE will rise 1.6% to 1.9%.
- **Core PCE inflation** will rise from 2017's depressed level in a range of 1.7% to 1.9%, reflecting global disinflationary trends offset somewhat by overheating U.S. economic activity and employment.
- The **10-year Treasury rate** is likely to rise somewhat during 2018 and fluctuate during the year in a range between 2.25% and 3.00%. Faster than expected real GDP and employment growth would push the rate toward the top end of the range; greater than expected declines in inflation and/or heightened financial instability would push the rate toward the bottom end of the range.
- **Federal fiscal policy** involving tax cuts and spending increases will have a positive impact on real GDP growth during 2018, raising real GDP growth by approximately 0.3%.
- **State and local investment spending** growth will remain subdued below a growth rate of 1.0%, which will be well below the long-term trend.
- The **deficit** as a percentage of nominal GDP will increase from fiscal year 2017's level of 3.41% to a range of 3.75% to 4.25%. Stronger than expected growth would push the deficit toward the lower end of the range. Because the full effects of the "Tax Cuts and Jobs Act" will impact only approximately half of fiscal year 2018, significant negative consequences for the size of the federal deficit will not occur until fiscal 2019.

## 2. Rest of the World

- **Global growth** is likely to improve to 3.8% in 2018 from 3.7% in 2016. This is a considerable improvement from slower growth in recent years. Global economic momentum built in the last few months of 2017 and this should carry over into 2018. However, downside risks, such as U.S. trade policies and an emerging global monetary tightening cycle, and, of course the low probability risks of significant eruption of political turmoil in the Middle East and Korea, are lurking in the background. These risks are not expected to dampen growth momentum in 2018, but prudence argues for monitoring them closely.
- **Global inflation** is expected to rise from 2.7% in 2017 to 3.0% in 2018, reflecting strong economic growth and shrinking or closed output gaps.

- **European growth** will be positive but will slow to 1.4% (GS) to 2.0% (B of A) from 2017's stronger than expect pace. The potential for tighter monetary policy poses downside risk to growth.
- **European total inflation** will fall from 1.5% in 2017 to 1.5% in 2018, but **core inflation** will rise from 0.9% to 1.1%; both measures will remain considerably below the 2.0% target.
- **European financial markets** should be relatively stable, as long as economic growth remains solid; some volatility could occur depending upon the outcome of the Italian elections.
- **European political dysfunction, populism and nationalism** should remain quiescent during 2018 as long as economic growth remains relatively strong. Countries to watch closely, however, Italy and Greece.
- **U.K. growth** is expected to decline to 1.0% to 1.1% in 2018 compared to 1.5% to 1.7% in 2017 as the consequences of Brexit develop.
- **China's GDP growth** is expected to be in a range of 6.3% (GS) to 6.6% (B of A) but risks are to the downside as President Xi emphasizes the goal of a "better quality life" over GDP growth.
- **China's leadership** will continue implement **economic reforms** gradually; financial and political stability will be maintained.
- **Japan's** economic policies will continue to fall short of achieving the 2.0% inflation target; total inflation is expected to rise from 0.5% in 2017 to 1.0% in 2018; core inflation is expected to rise from 0.4% in 2017 to 0.6% in 2018. GDP growth will also continue to fall short of the policy target, but is expected to fall to a range of 1.1% (GS) to 1.7% (B of A). Population decline and slow implementation of market reforms will continue to weigh heavily on both growth and inflation.
- **India** should continue to experience relatively strong real GDP growth in a range of to 7.0% to 8.0% in 2018.
- **Emerging market countries, excluding China**, should experience better growth in 2018 than in 2017. Growth is expected to improve from 3.6% in 2017 to 3.9% in 2018.
- **Brazil and Russia** will benefit from higher oil prices; Russian growth is expected to improve from 2.6% in 2017 to 3.0% in 2018; Brazilian growth is expected to improve from 0.6/1.0% in 2017 to 2.6% in 2018.
- Although the rise in oil prices might save **Venezuela** from default and bankruptcy in 2018, this seems to be the likely outcome.

### 3. **Risks** – stated in the negative relative to the forecast.

- **U.S. potential real GDP growth** falls short or exceeds expectations; falling short is the more serious risk as this is likely to happen only if recession occurs
- **U.S. productivity** falls below the bottom end of the 1.3% to 1.5% range
- **U.S. employment growth** is slower or faster than expected; slower growth is the more serious risk as this is likely to happen only if recession occurs
- **Employment participation rate** falls below the bottom of the forecast range rather than remaining relatively stable or rising modestly

- *U.S. hourly wage rate growth* is lower or higher than the forecast range of 2.6% to 3.0%; falling wage growth is the more serious risk
- *U.S. unemployment rate* rises above the forecast range or falls below it
- *Nominal U.S. consumer disposable income* increases less or more than expected; a less than expected increase is the more serious risk
- *Nominal U.S. consumer spending* increases less or more than expected; a less than expected increase is the more serious risk
- *U.S. stock prices* fall more than or rise more than the expected range of -10% to +10%
- *U.S. business activity* contracts or expands more than expected; contraction is the more serious risk
- *U.S. private business investment* does not improve as much as or more than expected; falling short of expectations is the more serious risk
- *Growth rates in U.S. residential housing investment and housing starts* are less than or more than expected; below expectations is the more serious risk
- *U.S. residential housing price increases* are stronger than or less than expected; stronger than expected price growth would be an indication of price speculation, while slower than expected price growth would most likely be caused by recession or deteriorating consumer confidence
- *U.S. trade deficit* does not widen as much as expected
- *Value of the dollar* rises rather than falling as expected and triggers a global dollar squeeze
- *Oil prices* rise above or fall below the expected range; high oil prices is the greater concern because it would be indicative of unsustainable price speculation
- *U.S. monetary policy* tightens more than 75 to 100 basis points, spawns financial market uncertainty and contributes to global financial instability
- *Financial conditions* tighten and cause financial market volatility
- *U.S. inflation* falls or rises more than expected
- *U.S. long-term interest rates* fall or rise more than expected
- *U.S. fiscal policy* is more expansionary than expected due to larger than expected increases in spending
- *Federal budget deficit* increases more than expected
- *U.S. state and local spending* does not rise as fast as expected
- *Global GDP growth* does not rise as fast as expected
- *Global trade* declines as the U.S. and other countries pursue protectionist policies
- *European growth* is considerably less than expected
- *ECB's* quantitative easing program is not successful in raising inflation
- *Europe*—financial market turmoil reemerges
- *Europe*—political instability and social unrest rises more than expected threatening survival of the Eurozone and the European Union
- *Chinese* leaders have difficulty implementing *economic reforms*

- *China's growth* slows more than expected
- *Japan*—Abenomics and monetary policy are unsuccessful in raising inflation to the 2 percent target
- *Emerging economies*—a strong dollar leads to serious difficulties especially for countries with large amounts of dollar-denominated debt.
- Severe and, of course, unexpected *natural disasters* occur, which negatively impact global growth
- Political instability in the *Middle East* causes a spike in oil prices
- *North Korea* threatens global political stability and potential nuclear war by persisting in testing nuclear devices and intercontinental ballistic missiles

*Bill Longbrake is an Executive in Residence at the Robert H. Smith School of Business at the University of Maryland.*