

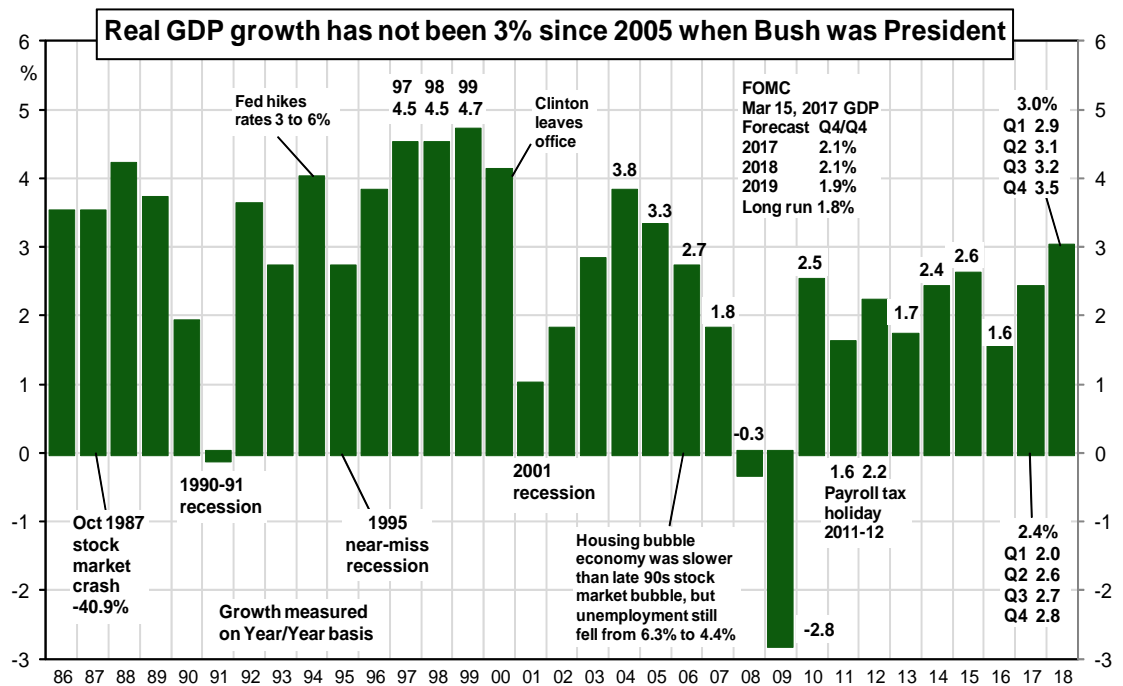
CHRISTOPHER S. RUPKEY, CFA
 MANAGING DIRECTOR
 CHIEF FINANCIAL ECONOMIST
 ECONOMIC RESEARCH OFFICE (NEW YORK)
 (212) 782-5702
 crupkey@us.mufg.jp

31 MARCH 2017

MUFG | 1251 Avenue of the Americas
 New York, New York 10020

2.1% GDP FIRING ON ALL CYLINDERS WHEN YOU IGNORE “INVESTMENT” TREND

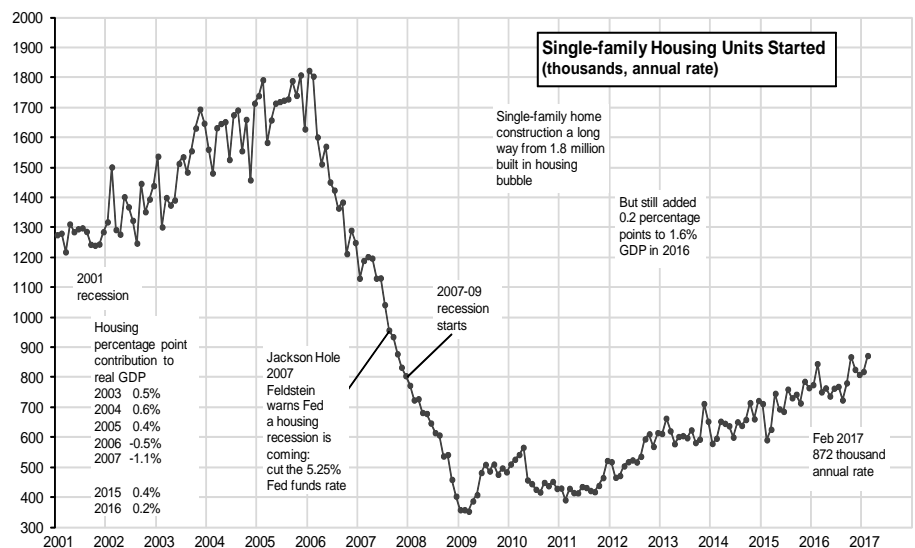
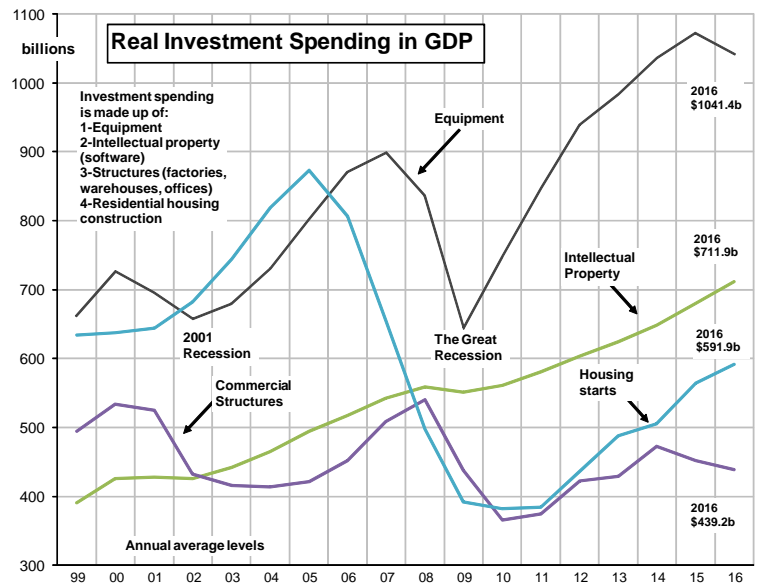
We got the third and final estimate for Q4 2016 real GDP. It came in at 2.1% versus the 1.9% first and second estimates. You would think the economy was really moving along at a fast clip and more Fed rate hikes on the way given how 10-yr Treasuries sold off on the news. 10-yr yields were 2.38% at the 830am EDT Thursday, March 30 GDP report release time, and were 2 bps higher an hour later and closed 4 bps higher at 2.42% at the end of the day. The new volatility.



Consumer spending was fine at 3.5% on the same “2.1% GDP basis.” [Please ignore consumer spending running only 0.3% in Q1 2017 with February data out Friday.] But business investment spending continues to lag. Trump’s economic team wants to try and boost growth and unleash business investment. The dirty little secret about business investment is that the lagging part of investment is not in equipment orders or intellectual property (R&D, software) or building new plants and offices; the weakness in investment spending in the GDP accounts is actually in residential housing construction, a sector where it can be truly said that activity hasn’t yet fully recovered from the 2007-09 recession. We hate to think the faster GDP growth the Fed wants to see before pushing interest rates higher at a faster pace is reliant on housing starts, but perhaps it is. We would need to think on it. The level of residential housing construction is certainly well below pre-recession highs.

For the full year 2016, GDP growth was 1.6% not the 2.6% growth of 2015. Most of this slowdown was the drop in inventories, and business equipment purchases were a drag as well, mostly in farm machinery and oil & gas drilling. So it is fairly easy to forecast growth returning to the mid-2% range in 2017. But we are not feeling so confident about our 3.0% full year 2018 forecast. Government spending has to provide 0.7 percentage points of this growth push and here Congress is looking increasingly unlikely to vote out any deficit spending kind of stimulus. We don't know what the Trump economics team has in mind, but the historical track record does not inspire much confidence that Washington can intervene in the economy and boost economic growth. The four years of trillion dollar Obama budget deficits from 2009 to 2012 did not seem to boost economic growth that much. The 2% payroll tax holiday that put as much as \$2,100 in workers pockets led to 1.6% GDP growth in 2011 and 2.2% in 2012 if "led" is the word.

We will keep our growth numbers where they are for now; including the 3.0% growth in 2018 (Fed sees 2.1% in 2018). The good news is faster economic growth may not be needed even if it sounds like a great campaign slogan. The Bernanke Fed always forecast stronger 3% growth, tried to make it happen, to ensure that unemployment from the recession would come back down. The reality is growth was slower than that and yet today's workers found jobs anyway. Today the economy has reached full employment. There is not a lot that Washington needs to do, except maybe something for manufacturing that is in decline, less production and fewer jobs. Time will tell if they can reverse that trend that has been a couple of decades in the making.

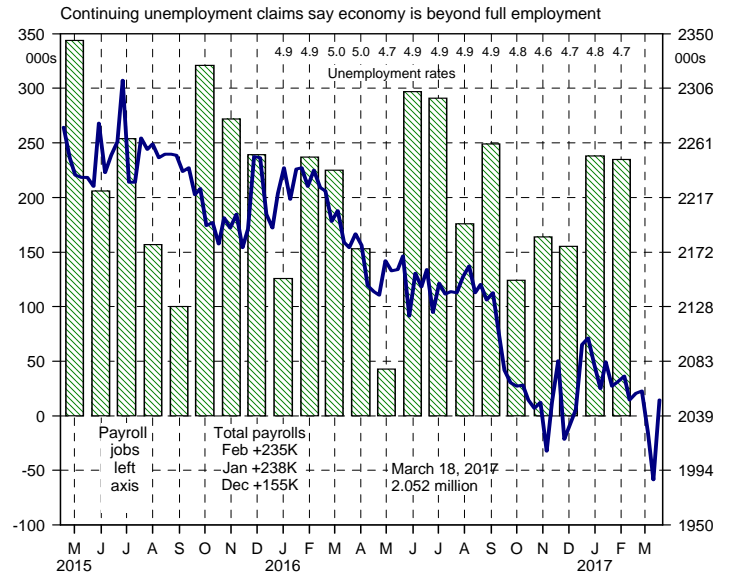
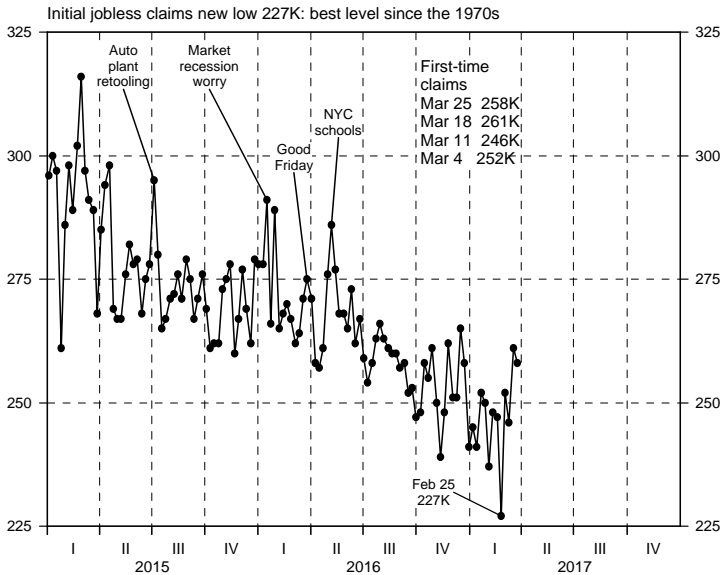


\$BLN Nominal GDP expenditures	Q4 15 YOY%		Q1 16	Q2 16	Q3 16	Q4 16 YOY%	
Equipment & Intellectual Property	1823.5	4.4	1806.4	1817.4	1813.2	1822.9	0.0
EQUIPMENT	1092.6	4.2	1066.3	1058.7	1049.3	1053.5	-3.6
Information processing equipment	322.1	4.6	319.9	316.8	322.8	324.4	0.7
Computers	75.4	-7.1	76.0	78.2	77.0	74.4	-1.3
Other processing equipment 1	246.6	8.7	243.9	238.6	245.8	250.0	1.4
Industrial equipment	224.7	3.8	222.2	227.3	226.1	228.7	1.8
Transportation equipment	310.7	10.3	301.3	297.6	286.7	286.6	-7.8
Other equipment 2	235.1	-3.2	222.9	217.0	213.7	213.8	-9.1
INTELLECTUAL PROPERTY	730.9	4.9	740.1	758.7	763.9	769.4	5.3
Software	330.1	3.8	336.0	339.4	342.6	343.7	4.1
Research & Development (R&D)	320.3	5.7	323.0	337.9	338.8	342.3	6.9
Entertainment, literary, artistic	80.6	6.2	81.1	81.4	82.5	83.4	3.5
1 Communication, medical, photocopy, office and accounting equipment; nonmedical instruments							
2 Furniture; agriculture, construction, mining/oilfield, and service industry machinery; electrical equipment							

JOBLESS CLAIMS—BEST OF BEST TIMES RIGHT NOW FOR LABOR MARKET

Unemployment claims have been elevated the last two weeks: at 258K for the March 25 week down just slightly from 261K. The lowest, best level in 44 years of 227K in the February 25 week is way back in the rearview mirror. It is hard to know what to make of this turn of events. The picture of an improving labor market has gone away over the last month and we cannot be sure what the trend is now. The monthly employment report is Friday, April 7 and should remain near 200K for payroll jobs, but jobs would most likely slow next month if initial claims hold above 250K.

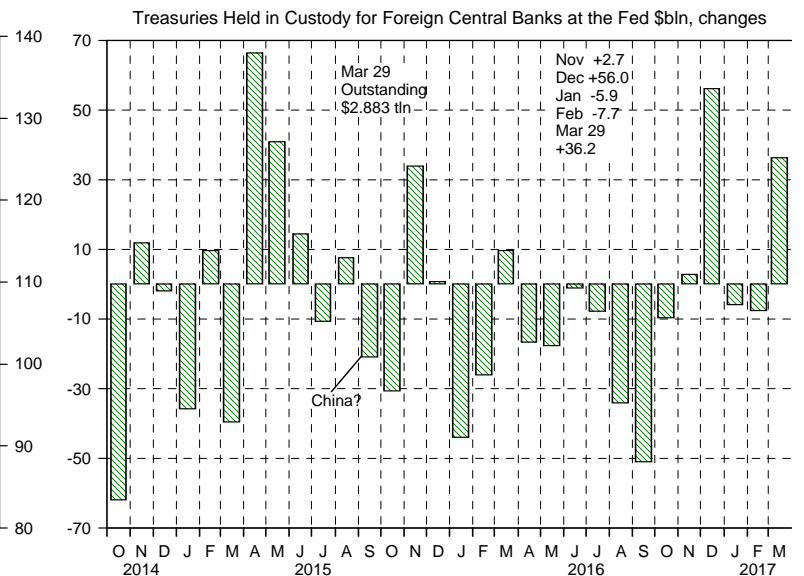
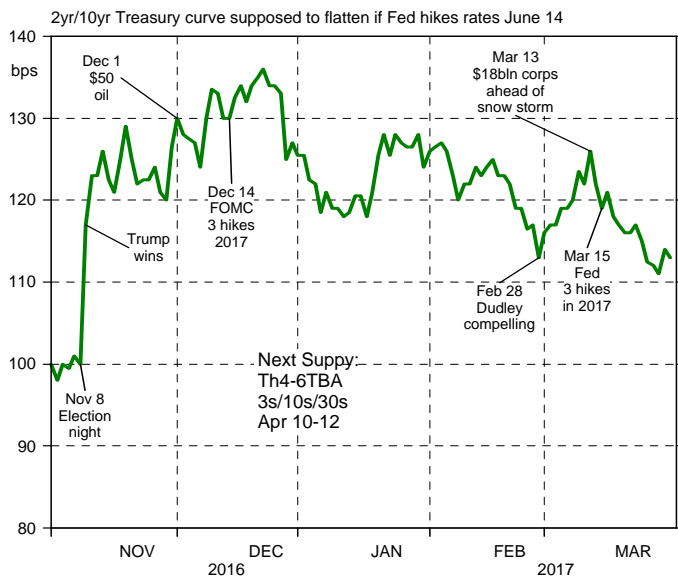
President takes Office	Unemployment
Clinton	Jan 1993 7.3%
Bush	Jan 2001 4.2%
Obama	Jan 2009 7.8%



TREASURY CURVE WAS STEEPER: TRUMP FISCAL STIMULUS MUMBO JUMBO

The yield curve between 2-yrs and 10-yrs was 113 bps on Friday versus 115 bps last week. 10-yr yields little changed this week at 2.39% Friday versus 2.41% last Friday, March 24. Market was a little asleep with NY Fed President Dudley on Friday saying the Fed might only need to go 100-150 bps higher on the Fed funds rate, which if the end point on “neutral” Fed funds is only 2.0 to 2.5% in his estimation for this cycle, it does not lend a lot of support to our 3% 10-yr forecast in December 2017.

	31-Mar 2017	Q2 2017	Q3 2017	Q4 2017	Q1 2018	Q2 2018	Q3 2018
30-Yr Bond	3.03	3.10	3.20	3.40	3.60	3.70	3.80
10-Yr Note	2.40	2.50	2.70	3.00	3.20	3.40	3.50
5-Yr Note	1.93	2.10	2.40	2.70	3.00	3.20	3.30
2-Yr Note	1.25	1.50	1.75	2.00	2.25	2.50	2.75
3-month Libor	1.15	1.50	1.70	1.95	2.20	2.45	2.70
Federal Fund Rate	1.00	1.25	1.50	1.75	2.00	2.25	2.50
2s/10s spread	115	100	95	100	95	90	75



FEDERAL RESERVE POLICY

The Fed meets ~~June 13-14~~ strike that we mean May 2-3 to consider its monetary policy. The May 3 decision date is most unlikely given it is a non-press conference meeting. If they are only going three times a year then there is little point to telling markets every meeting is a “Live” one where action could take place. They don’t sound like the need to raise rates is all that urgent.

Headline PCE inflation is back to the Fed’s 2% target in Friday’s report for February (2.1% YOY). This is unlikely to light a fire under Fed officials and make them think they are behind the

curve. They don’t feel the economy is in danger of overheating. The consensus is for two more rate hikes in 2017 ending the year at a Fed funds rate of 1.5%. Unfortunately for those of us looking for 3% 10-yr Treasury yields, policy under Yellen (last day February 3, 2018) is not on a preset course. They are data dependent which means they might not raise rates at their June meeting if data like nonfarm payroll employment don’t continue to improve. It is early yet but how are they taking the slowdown in consumer spending the first quarter? A rags to riches story this week, real consumer spending was revised up to 3.5% in Q4 2016 but now with monthly declines in January and February (released with Friday’s personal income economic report), real consumer spending looks like it is only 0.3% to us in Q1 2017. They could well skip the June meeting waiting to see if

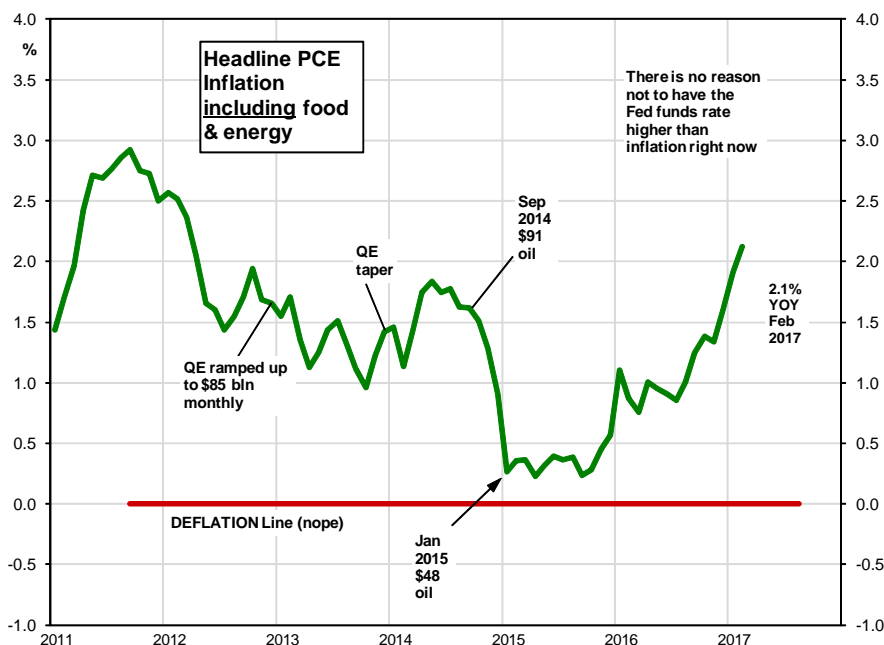
consumption rebounds or whether there is more clarity on Team Trump’s plans for tax reform that was to encourage growth and jobs. Economic conditions have to continue to evolve as anticipated, otherwise with Yellen in charge they may well skip a meeting, or two this year.

Still we don’t want to be too pessimistic on the outlook for higher interest rates this year. Unemployment is 4.7% and core PCE inflation is 1.8% YOY and improvement from these levels is still expected based on our forecast later this year, and this should speed up their rate hikes or at least ensure they stick with the three rate hikes per year “plan.”

Selected Fed assets and liabilities					Sep 10
Fed H.4.1 statistical release					2008**
billions, Wednesday data	29-Mar	22-Mar	15-Mar	8-Mar	pre-LEH
Factors adding reserves					
U.S. Treasury securities	2464.335	2463.974	2463.812	2463.650	479.782
Federal agency debt securities	13.329	13.329	13.329	13.329	0.000
Mortgage-backed securities	1769.118	1777.645	1771.184	1763.191	0.000
Primary credit (Discount Window)	0.000	0.001	0.010	0.013	23.455
Term auction credit (TAF auctions)	0.000	0.000	0.000	0.000	150.000
Asset-backed TALF	0.000	0.000	0.000	0.000	
Maiden Lane (Bear)	1.707	1.707	1.707	1.704	29.287
Maiden Lane II (AIG)	0.000	0.000	0.000	0.000	0.000
Maiden Lane III (AIG)	0.000	0.000	0.000	0.000	0.000
<u>Central bank liquidity swaps</u>	1.007	1.019	0.917	0.491	62.000
Federal Reserve Assets	4515.7	4524.5	4515.9	4506.0	961.7
3-month Libor %	1.15	1.16	1.15	1.11	2.82
Factors draining reserves					
Currency in circulation	1536.334	1533.834	1531.006	1528.995	834.477
Term Deposit Facility	0.000	0.000	0.000	0.000	0.000
Reverse repurchases w/others	260.357	251.013	226.510	212.124	0.000
Reserve Balances (Net Liquidity)	2269.984	2313.962	2368.120	2351.131	24.964
Treasuries within 15 days	13.559	13.559	0.000	0.000	14.955
Treasuries 16 to 90 days	46.911	46.910	60.469	60.468	31.549
Treasuries 91 days to 1 year	183.368	183.363	183.357	183.351	69.272
Treasuries over 1-yr to 5 years	1216.893	1216.867	1216.841	1216.815	170.807
Treasuries over 5-yr to 10 years	376.236	376.203	376.170	376.137	91.863
Treasuries over 10-years	627.368	627.071	626.975	626.878	101.337

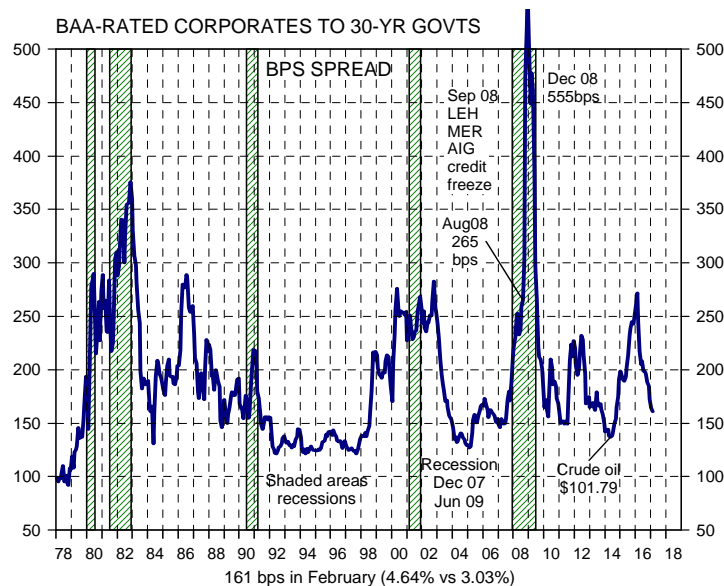
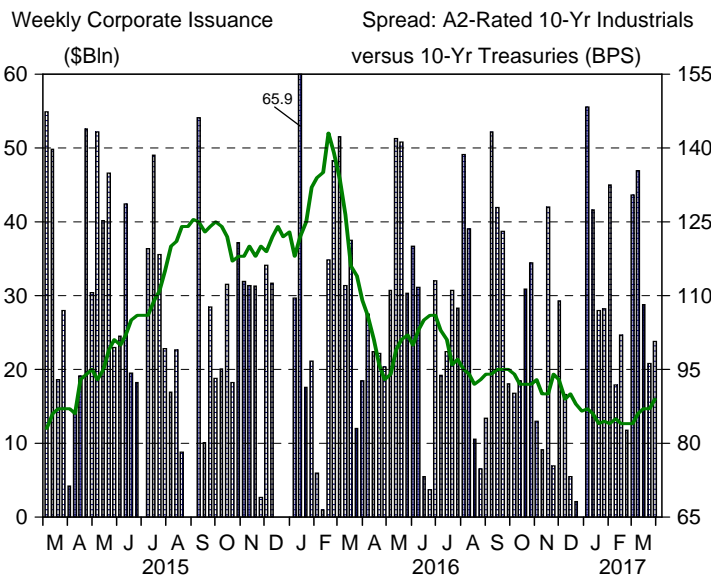
**September 10, 2008 is pre-Lehman bankruptcy of 9-15-08

If there’s inflation but the Fed doesn’t see any inflation, then that’s a problem for the higher rates forecast.



CORPORATE BONDS: APPLIED MATERIALS, FORD MOTOR, UNION PACIFIC

Corporate bond offerings were \$23.8 billion in the March 31 week versus \$20.8 billion in the March 24 week. On Tuesday, Rockwell Collins sold \$4.65 billion 2s/5s/7s/10s/30s. It priced \$1.3 billion 3.5% 10-yrs (m-w +20bp) at 110 bps (BBB/Baa2). The aerospace and defense company will use the proceeds to help finance the acquisition of B/E Aerospace. Corporate bonds (10-yr Industrials rated A2) were 89 bps above 10-yr Treasuries on Friday versus 87 bps last Friday.



TREASURY MARKET OUTLOOK

EXPECTED 10-YR 2-3 WEEK TRADING RANGE 2.00% to 2.75%

Week's 10-YR Range

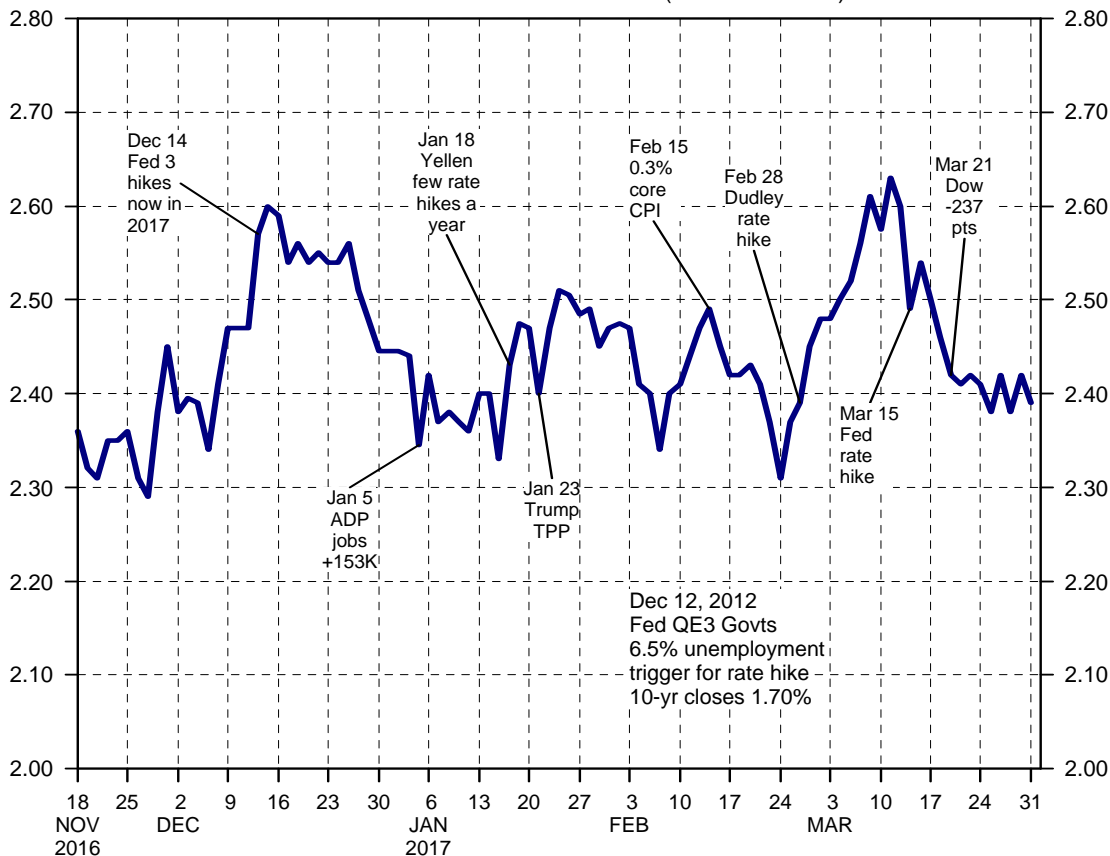
HIGH 99-05 2.35%

Monday, March 27, start of the week highs

LOW 98-14 2.43%

Friday, March 31, hit in London trading after modest selling on Thursday on 2.1% US GDP

RECENT TREND IN 10-YR GOVERNMENT NOTES (N.Y. CLOSING)



Analyst Certification

The views expressed in this report accurately reflect the personal views of **Christopher S. Rupkey**, the primary analyst responsible for this report, about the subject securities or issuers referred to herein, and no part of such analyst's compensation was, is or will be directly or indirectly related to the specific recommendations or views expressed herein.

The information herein is provided for information purposes only, and is not to be used or considered as an offer or the solicitation of an offer to sell or to buy or subscribe for securities or other financial instruments. Neither this nor any other communication prepared by The Bank of Tokyo-Mitsubishi UFJ, Ltd. (collectively with its various offices and affiliates, "BTMU") or should be construed as investment advice, a recommendation to enter into a particular transaction or pursue a particular strategy, or any statement as to the likelihood that a particular transaction or strategy will be effective in light of your business objectives or operations. Before entering into any particular transaction, you are advised to obtain such independent financial, legal, accounting and other advice as may be appropriate under the circumstances. In any event, any decision to enter into a transaction will be yours alone, not based on information prepared or provided by BTMU. BTMU hereby disclaims any responsibility to you concerning the characterization or identification of terms, conditions, and legal or accounting or other issues or risks that may arise in connection with any particular transaction or business strategy. While BTMU believes that any relevant factual statements herein and any assumptions on which information herein are based, are in each case accurate, BTMU makes no representation or warranty regarding such accuracy and shall not be responsible for any inaccuracy in such statements or assumptions. Note that BTMU may have issued, and may in the future issue, other reports that are inconsistent with or that reach conclusions different from the information set forth herein. Such other reports, if any, reflect the different assumptions, views and/or analytical methods of the analysts who prepared them, and BTMU is under no obligation to ensure that such other reports are brought to your attention.

Copyright 2017 Bank of Tokyo-Mitsubishi UFJ All Rights Reserved

The articles and opinions in this publication are for general information only, are subject to change, and are not intended to provide specific investment, legal, tax or other advice or recommendations. The information contained herein reflects the thoughts and opinions of the noted authors only, and such information does not necessarily reflect the thoughts and opinions of MUFG or its management team. We are not offering or soliciting any transaction based on this information. We suggest that you consult your attorney, accountant or tax or financial advisor with regard to your situation. Although information has been obtained from sources we believe to be reliable, neither the authors nor MUFG guarantee its accuracy, and such information may be incomplete or condensed. Neither the authors nor MUFG shall be liable for any typographical errors or incorrect data obtained from reliable sources or factual information.

About MUFG Union Bank, N.A.

MUFG Union Bank, N.A., is a full-service bank with offices across the United States. We provide a wide spectrum of corporate, commercial and retail banking and wealth management solutions to meet the needs of customers. We also offer an extensive portfolio of value-added solutions for customers, including investment banking, personal and corporate trust, global custody, transaction banking, capital markets, and other services. With assets of \$115.4 billion, as of December 31, 2015, MUFG Union Bank has strong capital reserves, credit ratings and capital ratios relative to peer banks. MUFG Union Bank is a proud member of the Mitsubishi UFJ Financial Group (NYSE: MTU), one of the world's largest financial organizations with total assets of approximately ¥295.8 trillion (JPY) or \$2.5 trillion (USD)¹, as of December 30, 2015. The corporate headquarters (principal executive office) for MUFG Americas Holdings Corporation, which is the financial holding company and MUFG Union Bank, is in New York City. The main banking office of MUFG Union Bank is in San Francisco, California.