

Monthly pension update

JANUARY 2019



DID YOU KNOW?

PG&E (ticker: PCG) filed for bankruptcy – surprisingly the issuer was within the A or better rated pension liability discount rate universe within the prior 12 months.

FUNDED STATUS FAST FACTS

83.9%

FUNDED STATUS
ROSE 2.2% THIS
MONTH

+2.2% YTD

FUNDED STATUS
INCREASE

-21BPS

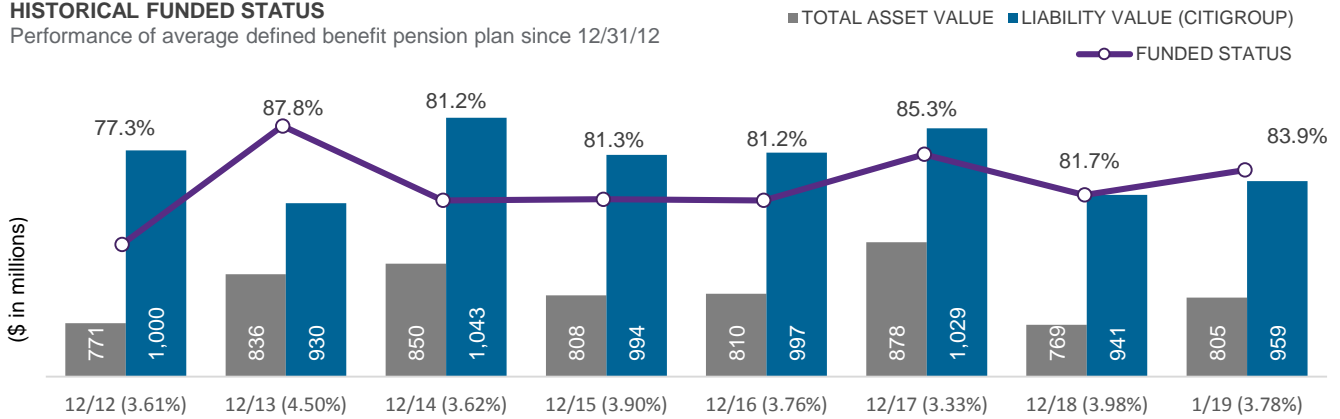
DISCOUNT RATE
YEAR TO DATE
CHANGE

MONTHLY CONTRIBUTORS OF
FUNDED STATUS CHANGE:
**TREASURY RATES AND
GROWTH ASSETS**

MONTHLY DETRACTORS OF
FUNDED STATUS CHANGE:
CREDIT SPREADS

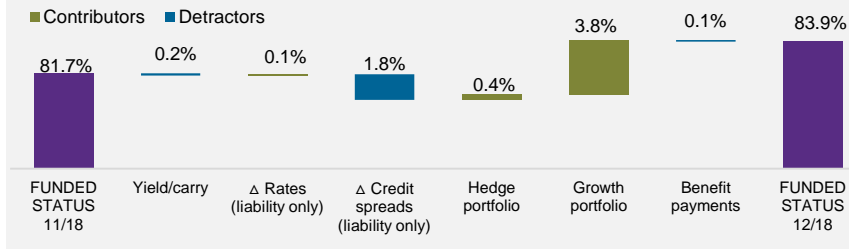
HISTORICAL FUNDED STATUS

Performance of average defined benefit pension plan since 12/31/12

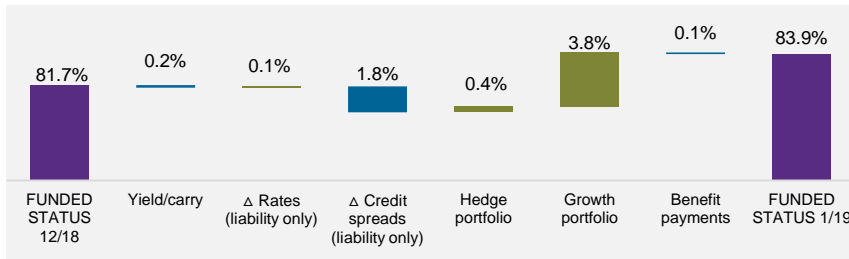


DISCOUNT RATES

MONTHLY FUNDED STATUS ATTRIBUTION



YEAR TO DATE FUNDED STATUS ATTRIBUTION



Changes	Month	Year
Funded Status %	▲ 2.2%	▲ 2.2%
Discount Rate (bps)	▼ (21)	▼ (21)
Treasury Rates(bps)	▲ 2	▲ 2
Credit Spreads (bps)	▼ (22)	▼ (22)
Liabilities (mm)	▼ \$18.4	▼ \$18.4
Assets (mm)	▲ \$36.0	▲ \$36.0
Funded Status (mm)	▲ \$17.6	▲ \$17.6

Note: Arrow indicates effect on funded status.

Source: J.P. Morgan, FTSE Pension Discount Curve, Bloomberg. As of January 31, 2019. For illustrative purposes only. Past performance is not indicative of future results.

MACROECONOMIC TRENDS IMPACTING PENSION PLANS

A breakdown of what you need to watch this month as you consider investment implications for your plan

GROWTH



Economic growth softened notably at the turn of the year, as manufacturing activity in Europe failed to rebound and U.S. data weakened more quickly than expected. While we are currently tracking U.S. growth below 2% in 1Q19, it seems reasonable to expect some improvement in the coming months. Headline inflation below 2% should boost purchasing power, which alongside further tightening in the labor market, should provide support for consumption. Furthermore, stimulus out of China could provide a boost to nominal growth outside of the U.S., providing support for the global expansion to continue into 2020.

INFLATION



Headline inflation continued to decelerate in January, primarily due to lower oil prices, but core measures of inflation remained relatively stable at around 2%. Given our expectation for further tightening in labor markets, particularly in the U.S., it seems unlikely that the core measure will weaken substantially this year. Headline inflation, however, could be noisy on the back of volatile commodity prices, but should remain below many policymakers' 2% targets in the months to come. The risk to this benign inflation view is the U.S. dollar, as a bout of significant dollar strength or weakness would alter the broader inflation narrative.

RATES



The Federal Open Market Committee (FOMC) reiterated its dovish stance at the January meeting, which seems to have appeased investors who were worried about a Fed policy error at the beginning of the year. While futures markets are now pricing in no Fed action this year, it seems premature to dismiss the potential for Fed rate increases in 2019. There are essentially two possible outcomes; either growth remains moderate, trade tensions are resolved, and markets are well behaved – in which case the Fed will hike rates – or growth slows faster than expected, trade remains unresolved, and financial markets are volatile – in which case the Fed will remain on hold.

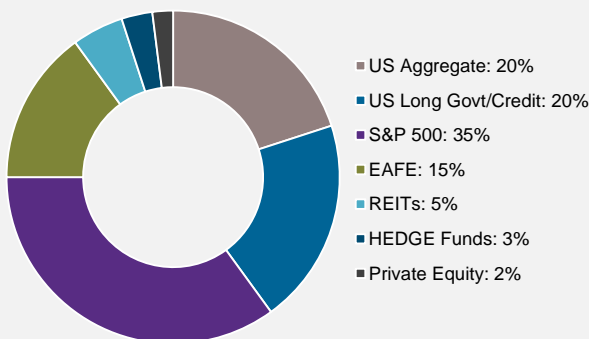
RETURNS



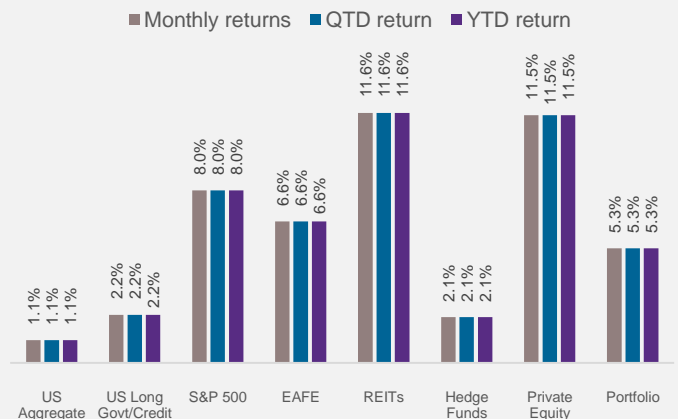
Stock market valuations have come back into line with long-term averages, suggesting muted returns from equities going forward. Taking a more tactical view – the S&P 500 is up over 10% year-to-date, which is what many forecasted returns would be for the year as a whole. As such, investors should prepare for higher volatility, particularly if trade negotiations with China begin to deteriorate. It has been interesting to note how the 10-year U.S. Treasury yield has failed to climb higher alongside the rebound in equity markets; this seems to be sending a signal that perhaps the stock market's enthusiasm is misplaced.

ASSET ALLOCATION & MARKET SNAPSHOT (As of 1/31/19)

PLAN ASSET ALLOCATION

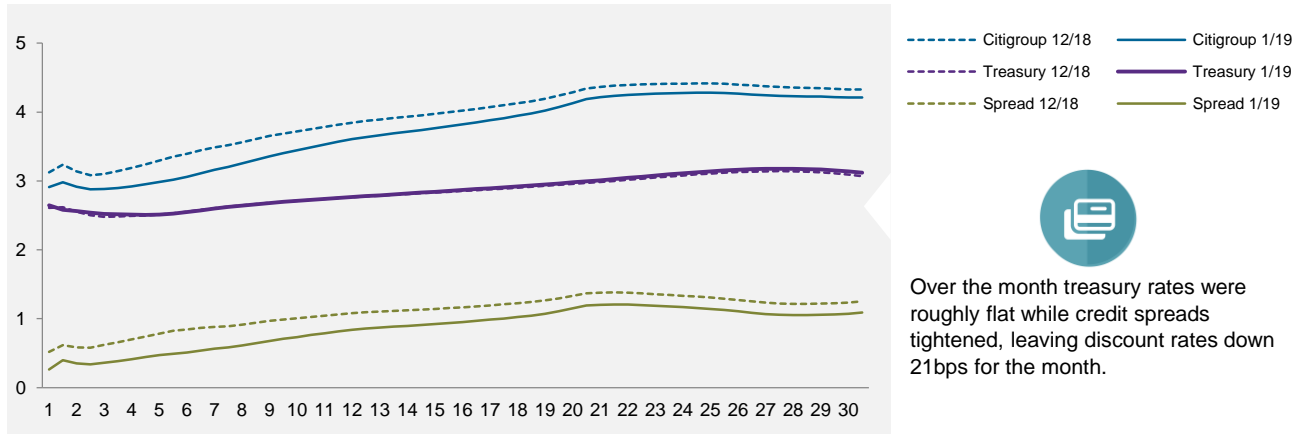


ASSET AND PORTFOLIO RETURNS



Source: J.P. Morgan, FTSE Pension Discount Curve, Bloomberg. As of January 31, 2019. For illustrative purposes only. Past performance is not indicative of future results. For more information on our fixed income outlook, please visit our blog: <http://blog.jp.organiinstitutional.com>

YIELD CURVE CHANGES



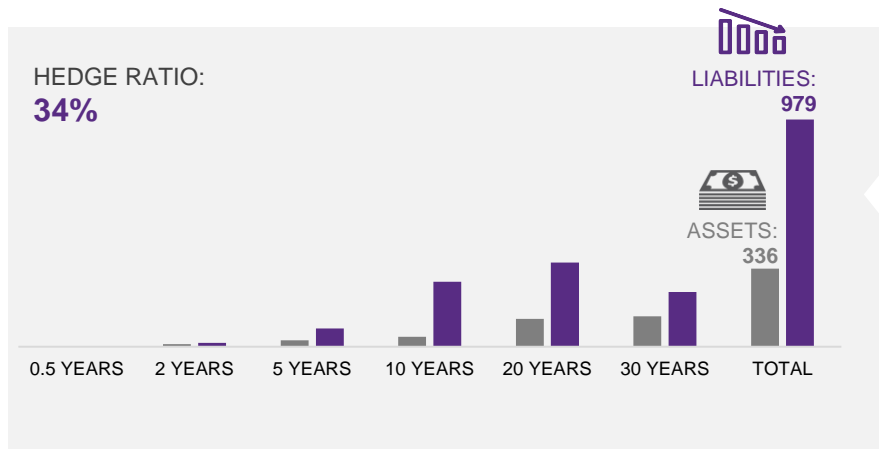
Over the month treasury rates were roughly flat while credit spreads tightened, leaving discount rates down 21bps for the month.



INTERESTED IN A DEEPER DIVE ON FIXED INCOME?

[Click here](#) for all the charts you need to understand what is happening in the fixed income markets.

PLAN RISK ANALYTICS



DURATION SENSITIVITY

The overall hedge ratio is defined as the ratio of asset dollar duration to liability dollar duration.

We estimate that this is approximately 34%.

We note that a higher hedge ratio, constructed with better key rate duration (KRD) matching along the curve would reduce funded status volatility. Matching the dollar duration of assets and liabilities across the curve structure would better insulate the plan against non-parallel yield curve movements.

Change in Interest Rates	Change in Growth Portfolio								
	-20%	-15%	-10%	-5%	-	+5%	+10%	+15%	+20%
+100bps	77.5%	80.5%	83.5%	86.5%	89.5%	92.5%	95.5%	98.5%	101.5%
+75bps	76.3%	79.2%	82.2%	85.1%	88.0%	90.9%	93.8%	96.8%	99.7%
+50bps	75.2%	78.0%	80.9%	83.7%	86.6%	89.4%	92.2%	95.1%	97.9%
+25bps	74.1%	76.9%	79.7%	82.4%	85.2%	88.0%	90.7%	93.5%	96.3%
-	73.1%	75.8%	78.5%	81.2%	83.9%	86.6%	89.3%	92.0%	94.7%
-25bps	72.1%	74.8%	77.4%	80.0%	82.7%	85.3%	87.9%	90.5%	93.2%
-50bps	71.2%	73.8%	76.4%	78.9%	81.5%	84.0%	86.6%	89.2%	91.7%
-75bps	70.4%	72.9%	75.4%	77.9%	80.4%	82.9%	85.4%	87.9%	90.4%
-100bps	69.5%	72.0%	74.4%	76.9%	79.3%	81.7%	84.2%	86.6%	89.1%

SCENARIO ANALYSIS

The heat map shows the change in funded status under different instantaneous interest rate and growth portfolio movements.

We note that reducing the allocation to equities and increasing the hedge ratio will likely narrow the change of possible outcomes and help limit downside funded status scenarios.

Source: J.P. Morgan, FTSE Pension Discount Curve, Bloomberg. As of January 31, 2019. For illustrative purposes only. Past performance is not indicative of future results.

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Credit Risk: There is a risk that issuers and counterparties will not make payments on securities, repurchase agreements or other investments held by the strategy.

Such defaults could result in losses to the strategy. In addition, the credit quality of securities held by the strategy may be lowered if an issuer's financial condition changes. Lower credit quality may lead to greater volatility in the price of a security and in shares of the strategy. Lower credit quality also may affect liquidity and make it difficult for the strategy to sell the security. The strategy may invest in securities that are rated in the lowest investment grade category. Such securities are considered to have speculative characteristics similar to high yield securities, and issuers of such securities are more vulnerable to changes in economic conditions than issuers of higher grade securities.

Interest Rate Risk: Bonds and other debt securities will increase or decrease in value based on changes in interest rates. If rates increase, the investment generally declines. On the other hand, if rates fall, the value of the investments generally increases. Your investment will decline in value if the value of the investment decreases. Securities with greater interest rate sensitivity and longer maturities tend to produce higher yields, but also are subject to greater fluctuations in value. Usually, the changes in the value of fixed income securities will not affect cash income generated, but may affect the value of your investment.

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