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Which Equity Subsectors are the Most Rate Sensitive?

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The U.S. Federal Reserve has been voicing its intention the past few months to move away from zero rates and begin tightening monetary policy, possibly before year-end. The mere possibility that the Fed might move the Fed Funds target rate -- from its post-December 2008 range of 0-25 basis points (bps) to either a hard target of 25 bps or a new range of 25-50 bps -- has been enough to send the U.S. dollar soaring against a broad range of currencies. Meanwhile, many of the central banks whose currencies have weakened against the dollar are moving in the opposite direction of the Fed, easing rather than tightening monetary policy. The possibility of U.S. rate hikes combined with the reality of a stronger dollar, expanded production and a decelerating China have pressured commodity prices.

While members of the Federal Open Markets Committee (FOMC) have been, for the most part, talking up the possibility of initiating rate increases, Fed Funds Futures have been bringing down their pricing of rate hikes (Figure 1). One year ago, Fed Funds Futures priced a Fed Funds effective rate of almost 0.80% for the end of 2015 and around 1.80% for December 2016. As of September 17, 2015 those expectations center on 0.22% for December 2015 and 0.76% for December 2016. Diminished expectations of when Fed rate hikes will start and how far they will go, once commenced, have a great deal to do with the temporary reduction in inflation as a result of lower commodity prices and a stronger dollar that have caused import prices to fall by over 11% year on year.

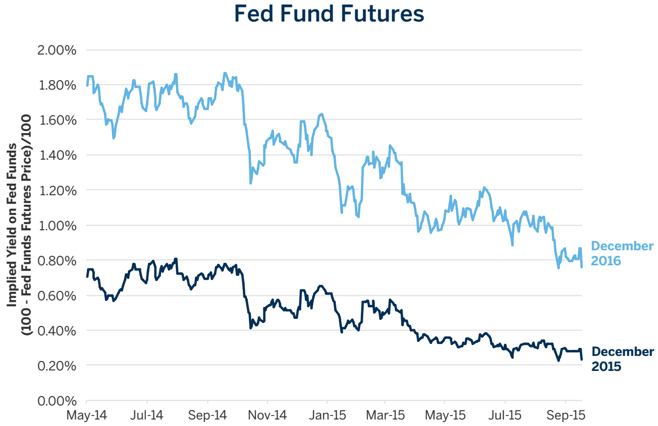
As we approach 2016, the impact of lower commodity prices is likely to roll off the year-on-year inflation numbers (unless energy prices fall a great deal more). As such, markets and policy makers are likely to turn their attention towards the strength of the labor market and begin adjusting interest rate expectations higher.

The one asset class that has been relatively tranquil amid the rate debate and shifting expectations over Fed policy has been equities. For the first seven months of the year, the S&P 500 traded in one of its narrowest ranges ever. When it finally broke out to the downside in August, the decline was triggered by fears over slowing growth in China and not by concerns regarding a tightening of U.S. monetary policy.

Part of the reason why equities have not shown a strong, generalized reaction to shifting interest rate expectations may have to do with the responses of the different sectors within the equity market itself. Higher short-term interest rates may benefit some sectors and harm others.

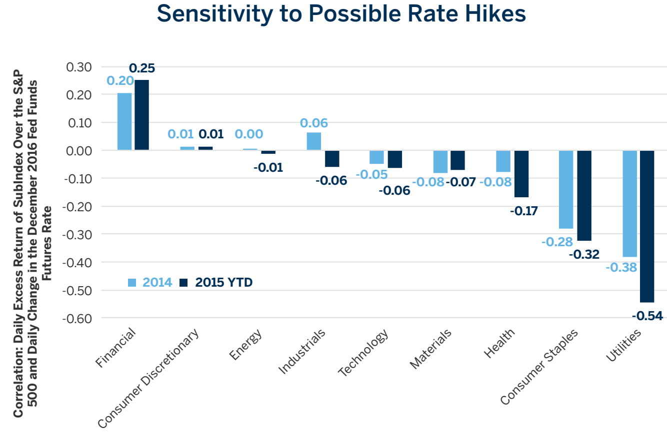
In this study we examine the correlation between the daily changes in expectations for the Fed Funds effective rate in 2016 and the daily outperformance/underperformance of the nine sectors within the S&P 500 versus the index itself. The reason for taking this approach is simple: the daily change in the S&P 500 has a positive correlation with the daily change in the Fed Funds Future implied rate. When stocks go down, expectations for rate hikes also go down and vice versa.

Figure 1.



Source: Bloomberg Professional (Codes: FFZ5 and FFZ6)

Figure 2.



Source: Bloomberg Professional (IXA1, IXY1, IXP1, IXI1, IXT1, IXD1, IXC1, IXR1, IXS1, ES1 and FFZ6)

As such, by looking at the outperformance/underperformance of each sector versus the S&P 500 and correlating that with Fed Funds, we can eliminate the equity market's overall correlation with changes in the anticipated Fed Funds effective rate, and we can instead focus on which subsectors of the equity market benefit from or are harmed by changes in rate expectations on a relative basis. The results may come as a surprise (Figure 2).

The sector that stands to gain the most from Fed rate hikes is financial services. The S&P E-mini Financial Select Future tended to outperform the S&P 500 as a whole on days in which Fed Fund Futures rates rose (prices fell). By contrast, three sector futures (S&P E-Mini Utilities, Consumer Staples, and Health) tended to underperform the S&P 500 on days in which rate expectations rose and tended to outperform on days in which rate expectations fell. Technology and Materials E-Mini Futures exhibited a similar but weaker pattern whereas Consumer Discretionary, Energy and Industrial E-Mini Futures showed mixed/weak reactions to changes in rate expectations.

Also of note, the reactions of each subsector index, whether positive or negative, tended to become stronger in 2015 versus 2014. This intuitively makes sense to us as the possibility of actual rate hikes seems much more real and less hypothetical this year than they did last year.

We think that the market, which currently prices a Fed Funds effective rate of 0.76% for December 2016, might be underestimating the true magnitude of possible Fed moves. It would not surprise us to see rates in the 1.00% to 1.75% range by the end of 2016. If the Fed's actual rate-moves exceed the market's current expectations, and if the correlations remain as they were in 2014 and 2015 year-to-date, this would imply some likelihood that financial stocks will outperform and that the health, consumer staples, and utilities sectors could underperform.

On the other hand, if the Fed opts not to raise rates as much as the market currently prices and Fed Fund finishes 2016 below 0.76%, it might lead to a an underperformance of the S&P E-Mini Financial Select Futures and an outperformance of the S&P E-Mini Health, Consumer Staples, and Utilities Futures with respect to the S&P 500 Future.

One should note, however, that the correlations between Fed Funds Futures and the outperformance/underperformance of the E-Mini Select Futures versus the S&P 500 Future are also not exceptionally stable over time. Still, with overall earnings growth quite modest, commodities in bear markets and a Fed rate-rise on the way, we expect quite a lot of action among S&P 500 sectors in the coming 12 months.