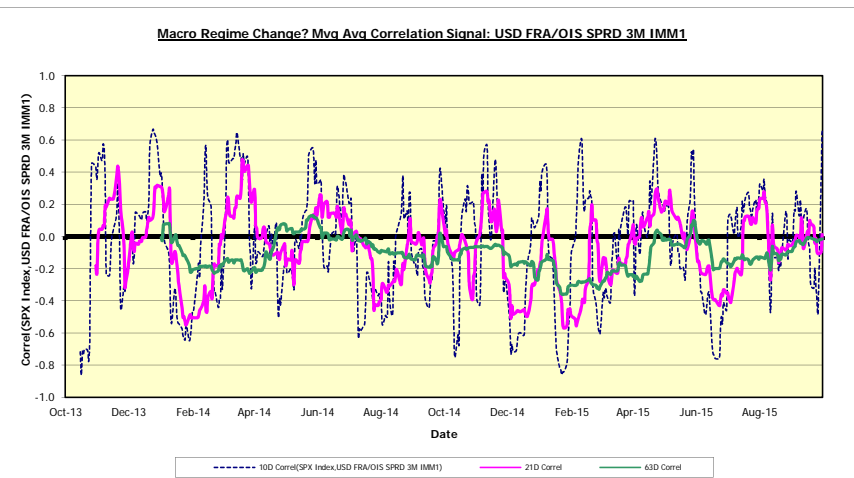
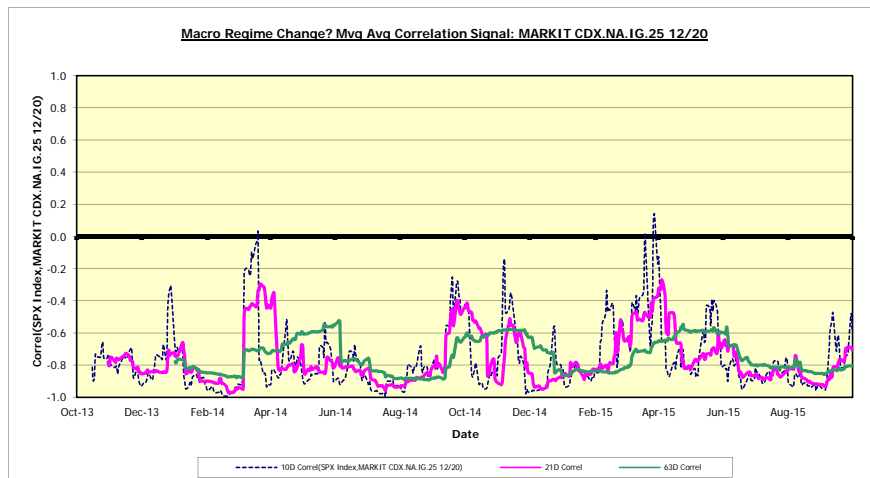
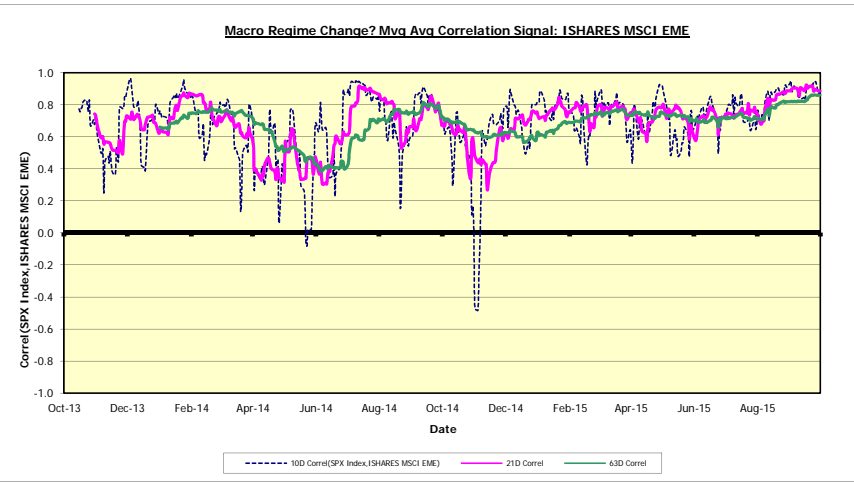
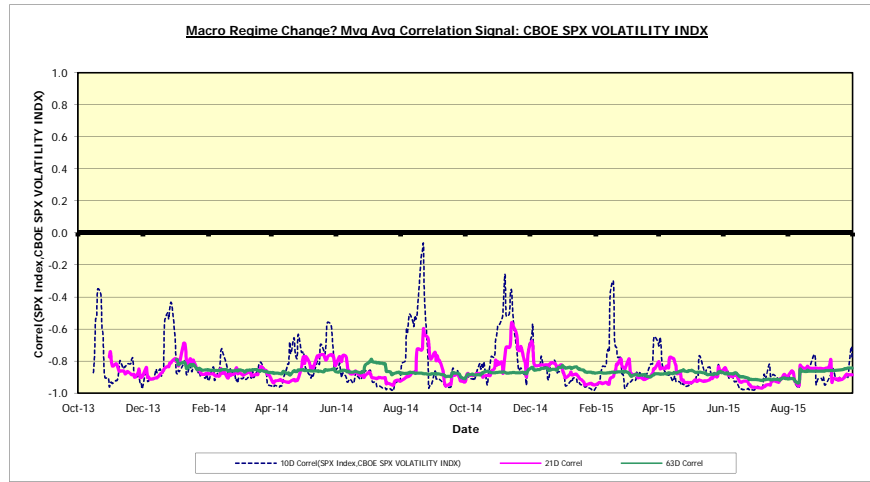


Macro Regime Change? Mvg Avg Correlation Signal (10/13/13 - 10/13/15)

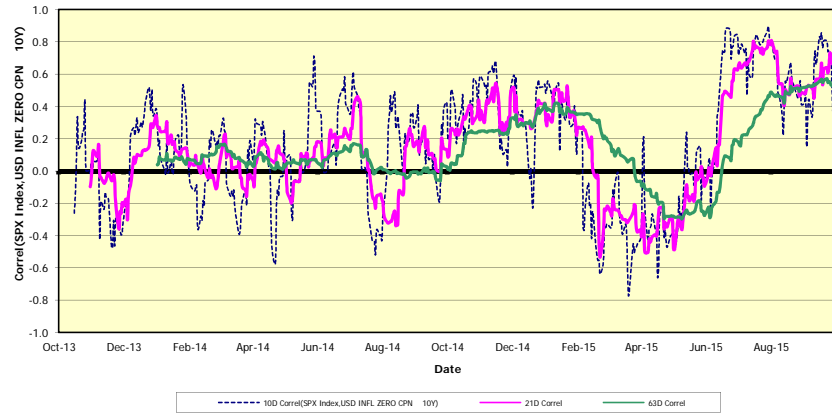
5

<-- 5D Change in Correl -->

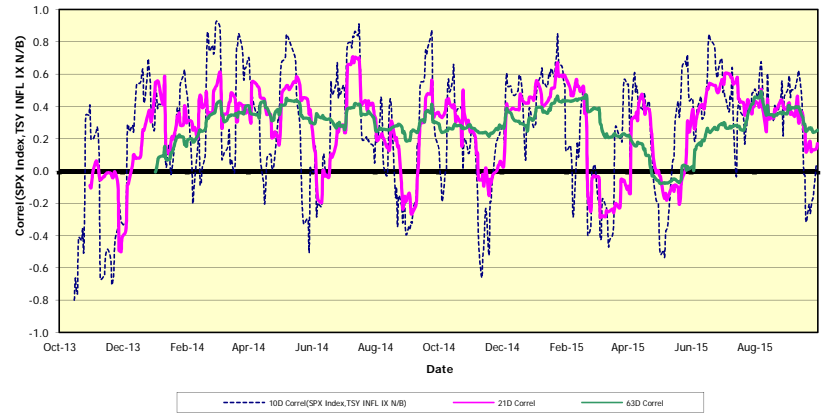
| Macro Factor wrt SPX Index | Current 10D | | 10D | | Current 21D | | 21D | | Current 63D | | 63D | |
|-------------------------------|-------------|----------------|--------|----------------|-------------|----------------|--------|-------------|-------------|-------------|--------|-------------|
| | Correl | Min/Med/Max | Correl | Min/Med/Max | Correl | Min/Med/Max | Correl | Min/Med/Max | Correl | Min/Med/Max | Correl | Min/Med/Max |
| CBOE SPX VOLATILITY INDX | (0.8) | -1.0/-0.9/-0.1 | (0.9) | -1.0/-0.9/-0.6 | (0.8) | -0.9/-0.9/-0.8 | 0.1 | 0.0 | 0.0 | | | |
| ISHARES MSCI EME | 0.9 | -0.5/0.7/1.0 | 0.9 | 0.3/0.7/0.9 | 0.9 | 0.4/0.7/0.9 | (0.0) | (0.0) | 0.0 | | | |
| MARKIT CDX.NA.IG.25 12/20 | (0.6) | -1.0/-0.8/0.1 | (0.7) | -1.0/-0.8/-0.3 | (0.8) | -0.9/-0.8/-0.5 | 0.2 | 0.1 | 0.0 | | | |
| USD FRA/OIS SPRD 3M IMM1 | 0.7 | -0.9/0.0/0.7 | 0.0 | -0.6/0.0/0.5 | (0.0) | -0.4/-0.1/0.1 | 0.9 | 0.1 | 0.0 | | | |
| USD INFL ZERO CPN 10Y | 0.4 | -0.8/0.2/0.9 | 0.6 | -0.5/0.1/0.8 | 0.5 | -0.3/0.1/0.6 | (0.3) | 0.0 | (0.0) | | | |
| TSY INFL IX N/B | 0.0 | -0.8/0.3/0.9 | 0.2 | -0.5/0.3/0.7 | 0.3 | -0.1/0.3/0.5 | 0.3 | (0.0) | (0.0) | | | |
| US TREASURY N/B | 0.4 | -0.7/0.4/0.9 | 0.6 | -0.5/0.5/0.8 | 0.6 | -0.2/0.4/0.7 | (0.0) | 0.1 | 0.0 | | | |
| YC Spread 10-5 | 0.6 | -0.7/0.3/0.9 | 0.5 | -0.4/0.2/0.6 | 0.2 | 0.0/0.2/0.5 | (0.0) | (0.0) | (0.0) | | | |
| Euro Spot | (0.7) | -0.9/-0.1/0.9 | (0.1) | -0.8/-0.1/0.8 | (0.5) | -0.6/0.0/0.5 | (0.0) | (0.1) | (0.0) | | | |
| Australian Dollar Spot | 0.3 | -0.8/0.2/0.9 | 0.4 | -0.4/0.2/0.7 | 0.5 | -0.1/0.2/0.5 | (0.1) | (0.1) | 0.0 | | | |
| BRL-USD X-RATE | 0.6 | -0.6/0.3/0.9 | 0.5 | -0.3/0.3/0.8 | 0.4 | -0.1/0.3/0.6 | 0.1 | 0.1 | (0.0) | | | |
| JPY-USD X-RATE | (0.6) | -0.9/-0.5/0.6 | (0.6) | -0.9/-0.5/0.4 | (0.7) | -0.8/-0.5/0.1 | 0.1 | (0.0) | 0.0 | | | |
| WTI Cushing Crude Oil Spot Px | 0.1 | -0.7/0.2/0.8 | 0.5 | -0.4/0.2/0.7 | 0.4 | -0.1/0.1/0.5 | (0.2) | (0.0) | (0.0) | | | |
| GOLD SPOT \$/OZ | (0.3) | -0.8/-0.1/0.9 | 0.1 | -0.6/-0.1/0.5 | (0.1) | -0.3/-0.1/0.2 | (0.5) | (0.1) | (0.0) | | | |
| LMEX LONDON METALS INDEX | 0.3 | -0.7/0.2/0.9 | 0.5 | -0.5/0.2/0.7 | 0.4 | -0.1/0.2/0.4 | (0.3) | (0.2) | (0.0) | | | |
| LME COPPER SPOT (\$) | 0.4 | -0.8/0.1/0.9 | 0.6 | -0.4/0.1/0.8 | 0.4 | -0.2/0.1/0.4 | (0.3) | (0.1) | (0.0) | | | |



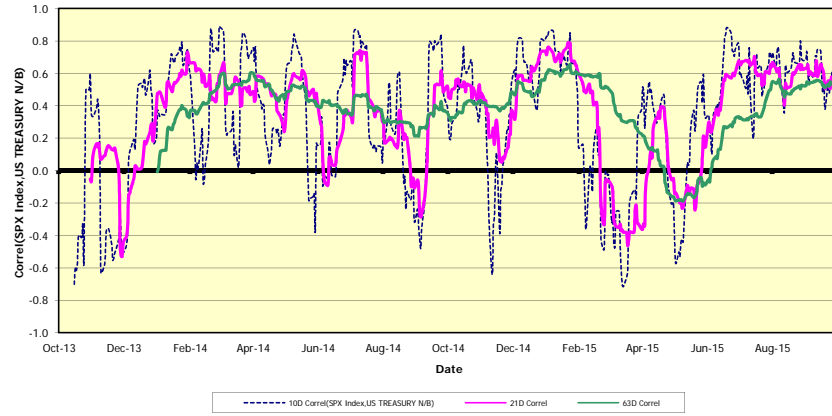
Macro Regime Change? Mvg Avg Correlation Signal: USD INFL ZERO CPN 10Y



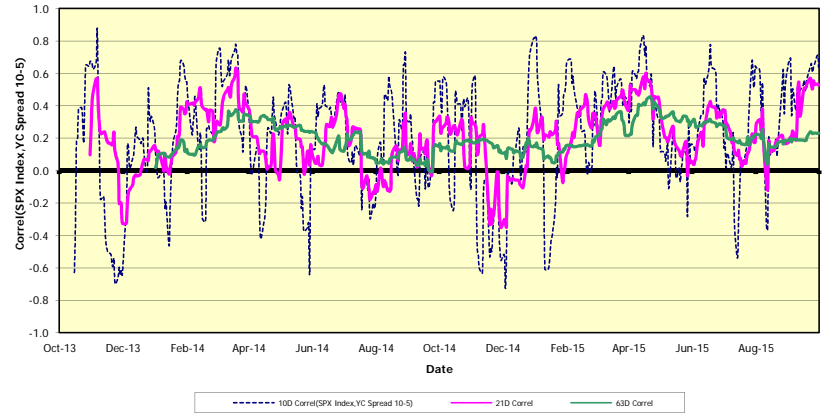
Macro Regime Change? Mvg Avg Correlation Signal: TSY INFL IX N/B



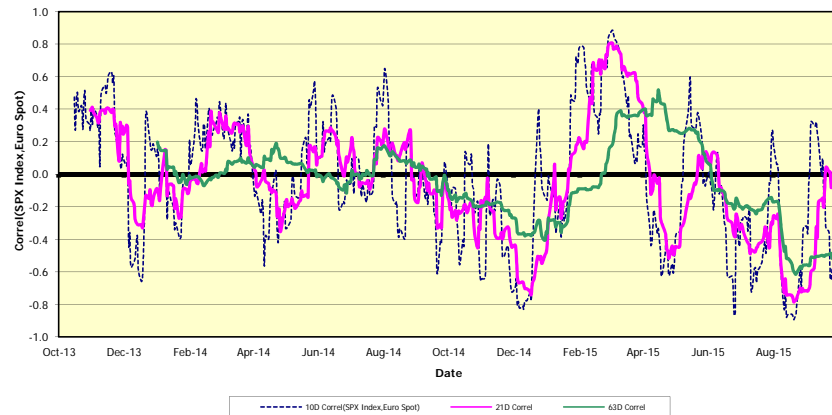
Macro Regime Change? Mvg Avg Correlation Signal: US TREASURY N/B



Macro Regime Change? Mvg Avg Correlation Signal: YC Spread 10-5



Macro Regime Change? Mvg Avg Correlation Signal: Euro Spot



Macro Regime Change? Mvg Avg Correlation Signal: Australian Dollar Spot

