# TRENDFLEX

**Baseline Analytics** 

# Trend Flex Market Trend Risk Assessment Tool: Technical, Economic, Fundamental

- TrendFlex Signal: credit risk as a leading indicator of equity price performance. <u>Confirms the market trend</u>.
- TrendFlex Score: Broad selection of equity trend change indicators. <u>Defines the risk to the market trend</u>.
  - Indicators are weighted based on historic performance vs. equities.
  - Technical patterns and correlations are key.
  - Broad group of indicators;
    - Market Indices
    - Relative strength and momentum indicators
    - Economic

# The TrendFlex Signal

#### TrendFlex Credit Risk Premium Signal (Cr)

ClassicCo

Credit spreads are unique leading indicators of a change in the S&P 500 market trend. When stocks are risky, bonds tend to outperform, and "risk-free" U.S. Government debt tends to outperform corporate debt. Trend Flex assesses this relative performance of government and corporate bond markets and has arrived at the Classic (short-term) and Allegiance (intermediate to long-term) timing indicators.

Allegiance C.

 TrendFlex(Cr) is a credit risk-premium indicator based on the relative performance of the iShares iBoxx Investment Grade Corporate Bond ETF (LQD) and the iShares 7-10 Year Treasury Bond ETF (IEF), compared to a moving average of its ratio.

#### Performance (as of February 10, 2017):

|                    | Classic G           | Allegiance G        |
|--------------------|---------------------|---------------------|
| Inception Date     | 5/9/2011            | 5/3/2006            |
| Cumulative Return  | 104.6%              | 250.2%              |
| S&P 500            | 53.9% (1.9x return) | 85.5% (2.9x return) |
| Total Trades       | 57                  | 22                  |
| Winning Trades (%) | 33 (58%)            | 18 (82%)            |
| Losing Trades (%)  | 23 (40%)            | 4 (18%)             |
| Breakeven Trades   | 1 (2%)              | 0 (0%)              |

# The TrendFlex Cr Signal



TrendFlex Classic Cr: short-term. Average 1 trade per month. 21.9% annual return.



TrendFlex Allegiance Cr: Intermediate to long-term. Average 1.5 trades per year. 25.5% annual return.





### The TrendFlex Score

- When the TrendFlex(Cr) signals are in effect, the **TrendFlex Score** is utilized to assess the **risk** of a change in the trend of the S&P 500.
- A weighted score is derived from eleven indicators to define a tactical investment strategy to hedge or reinforce the major trend as defined by the TrendFlex Cr signals. These indicators are organized into several categories:
  - Index Reviews (S&P500, Dow, NASDAQ). Key moving average and momentum criteria are reviewed utilizing classic technical analysis.
  - Internal Market Strength (i.e. Price and Volume Momentum). Includes Advance-Decline measures, Up Volume vs. Down, and High vs. Low %.
  - Market Psychology. A contrarian perspective incorporating technical analysis of CBOE Put/Call and VIX reading relative to their respective moving averages and trading extremes.
  - Credit Risk (Government vs. Corporate), as identified by the relative performance of the iBoxx Investment-Grade Corporate bond ETF (LQD) and the 10-Year Treasury ETF (IEF).
  - Intermarket Relationships (bonds, commodities, stocks)
  - Style (small cap, large cap, value and growth).

### TrendFlex Score Indicators

The weightings for these indicators were determined following extensive back-tested technical analysis modeling from data going back to 2006.

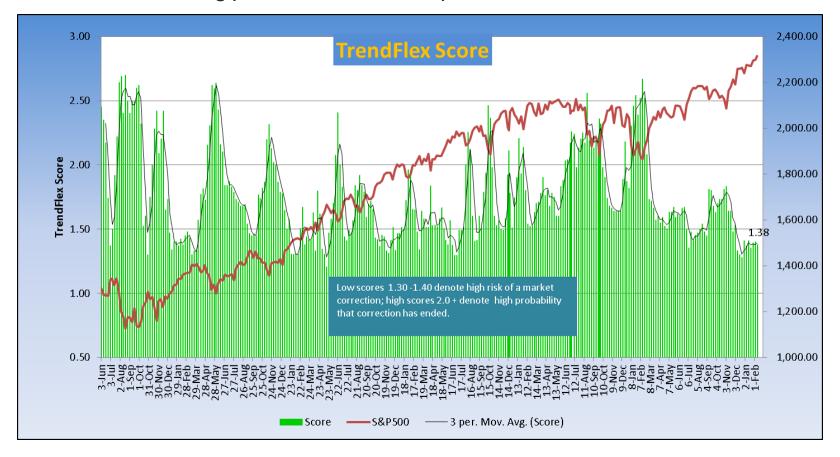
| Indicator  | Weighting |
|--|-----------|
| NYSE Advance-Declines; Up vs. Down volume; High vs. Low %              | 10.0%     |
| Ratio of S&P 500 and US Treasury Bonds                                 | 12.5%     |
| S&P 500 Index (daily chart)  | 17.5%     |
| S&P 500 Index (weekly chart)   | 10.0%     |
| Credit risk premium  | 15.0%     |
| NYSI Summation Index   | 10.0%     |
| % of Stocks in S&P 500 trading over their 50-day simple moving average | 5.5%      |
| CBOE Volatility index (VIX) and CBOE Put/Call Ratio                    | 12.0%     |
| Intermarket Relationships and Style                                    | 7.5%      |

# TrendFlex Score (con't)

- The resulting weightings are applied to a technical analysis score that ranges from 1.0 (highly bullish on equities) to 3.0 (highly bearish on equities). These extremes denote the potential of a trend change (i.e. a score close to 1.0 indicates an overly-extended bullish period, at which time hedges to long equity positions are recommended).
- At extreme readings of the resulting weighted TrendFlex Score
  (above 2.60 and below 1.40), the probability of a market trend change
  is high. An alert is signaled when the score closes below (bullish) or
  above (bearish) its 3-week simple moving average (grey solid line in
  the chart below).

## TrendFlex Score (con't)

 As can be seen in the TrendFlex Score chart below, the TrendFlex Score as it crosses above or below its three-week moving average, has identified shortterm market turning points since its inception in 2010.



# TrendFlex Score (con't)

- A bullish environment exists when the TrendFlex Score is below its moving average. Bars that shift from negative to positive tend to precede a downtrend in the S&P 500, as the TrendFlex Score is above its moving average, which is bearish for equities. These shifts above and below its moving average are utilized to signal an impending change in trend of the S&P 500 (likewise providing an indicator for other major equity indices).
- Again, the TrendFlex Score is utilized as a hedge (or enhancement) to the TrendFlex Cr signals, which are considered to be the "major" trend.