Viking Analytics: Weekly Gamma Band Update 1/18/2021

We share the Weekly Gamma Bands Update by Viking Analytics. The report uses options gamma to help you better manage risk and your equity allocations.

Gamma Band Update 01/18/21

- The SPX Gamma Band model can be viewed as a long-only trend-following model that reduces exposure when options markets show elevated risk. Since 2007, following this model has similar returns to a long-only position, although with much lower risk exposure. &#2013266080;&#2013266080;The Gamma Band model has resulted in a 74% improvement in risk-adjusted return since 2007 (measured by the Sharpe Ratio).&#2013266080; A quick video introduction of the Gamma Band model and other indicators can be seen by following [this link](#).
- The Gamma Band model has maintained a high exposure to the S&P 500 since the U.S. election. The model will generally maintain a 100% allocation as long as price closes above Gamma Neutral, currently at 3,753.
- The model will cut S&P 500 exposure to 0% if price closes below the lower gamma bound, currently near 3,520.
- Our binary Smart Money Indicator continues to have a full allocation but could turn cautionary if smart money becomes more protective. The Smart Money had been trending towards the safe zone, but recently stopped its decline, perhaps signaling more bullishness.
- SPX skew is approaching a cautious range, which may seem odd with stocks close to all-time-highs.
- We publish many different signals each day in four different pdf reports. A sample copy of all of our reports can be downloaded by visiting our [website](#).&#2013266080;

SPX - Gamma Neutral With Gamma Bands

Date	Prior Close	Upper Band	Gamma Neutral	Lower Band	Model Allocation
01-04-21	3,756.07	3,830	3,693	3,464	100%
01-11-21	3,824.68	3,870	3,732	3,501	100%
01-18-21	3,768.25	3,895	3,753	3,518	100%

Smart Money Residual Index

This indicator compares ?smart money? options buying to ?hot money? options buying.&#2013266080; Generally, smart money will purchase options to insure stable returns over a longer term.&#2013266080; Smart money has in-depth knowledge and data in support of their options activity. In contrast, ?Hot money? acts based on speculation, seeking a large payoff.

At the moment, hot money is more cautious than smart money, and the back-test for this model supports a long position.&#2013266080; When the Sentiment goes below zero (and the line moves from green to red), then this model will cut all equity exposure to zero.&#2013266080; When the market is in the red regime below, the market has an overall negative return.

SPX Skew ? the Price of Protection

Another tool we use to evaluate market risk is called ?skew,? which is the relative cost of buying puts versus calls.&#2013266080; When puts command a larger-than-usual premium to calls, then the market will have higher volatility (in the red zone below), and this can often be a signal to reduce equity exposure.&#2013266080;

As the market continues to settle near all-time highs, one might expect a more bullish skew result.&#2013266080; There is perhaps some risk priced in ahead of the January 20th inauguration.

Gamma Band Background

Market participants are increasingly aware of how the options markets be the ?tail that wags the dog? of the equity market.&#2013266080;

The [Gamma Band indicator](#) adjusts equity exposure dynamically in relation to the Gamma Neutral and other related levels.&#2013266080; This has shown to reduce equity tail risk and improve risk-adjusted returns.&#2013266080; In our model, we compare the daily close of the SPX to the

Gamma Neutral and Lower band levels to adjust our equity exposure allocation from 0% to 100%.

We back-tested this strategy from 2007 to the present and discovered a 74% increase in risk-adjusted returns (shown below). The Gamma Band model is a relatively slow but reliable signal. Free samples of all of our daily reports can be downloaded from our [website](#).

	sharpe	kurtosis	annual_vol
Gamma Band Return	0.77	8.03	0.10
SPX Return	0.44	12.70	0.21

* Gamma Bands improve backtested Sharpe by: 74.2%

SPX - Gamma Bands Performance
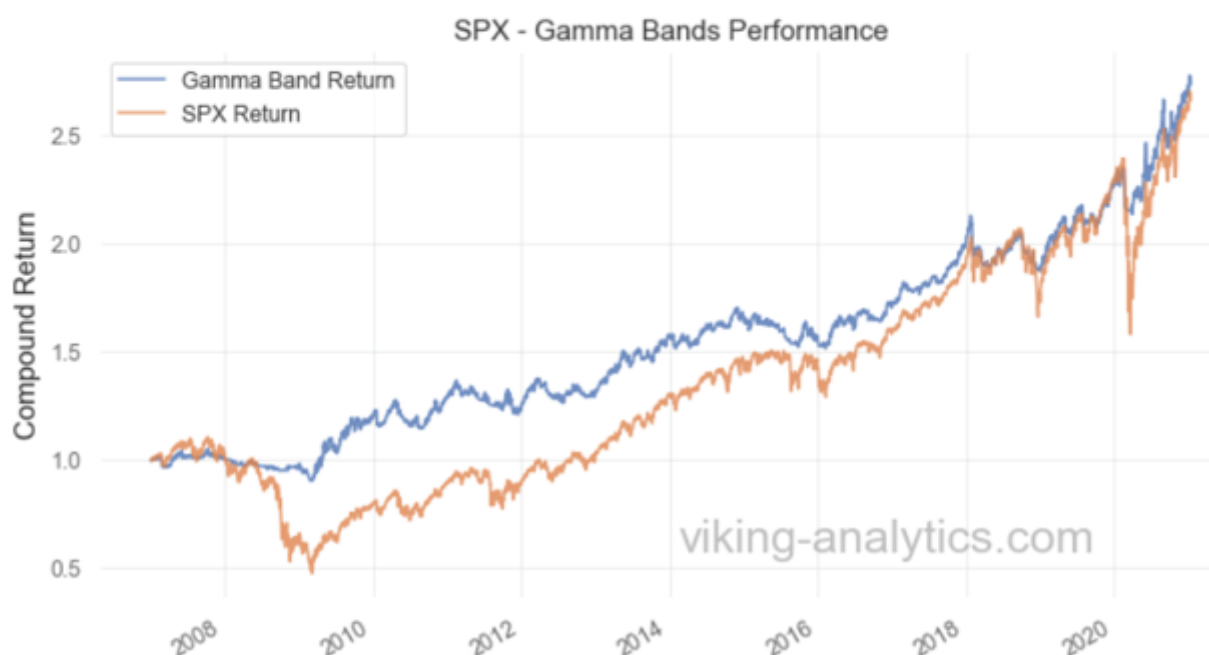
Authors

Viking Analytics is a quantitative research firm that creates tools to navigate complex markets. If you would like to learn more, please visit our [website](#), or download a complimentary report.

Erik Lytikainen, the founder of Viking Analytics, has over twenty-five years of experience as a financial analyst, entrepreneur, business developer, and commodity trader. Erik holds an MBA from the University of Maryland and a B.S. in Mechanical Engineering from Virginia Tech.

Rob McBride has 15+ years of experience in the systematic investment space and is a former Managing Director at a multi-billion dollar hedge fund. Furthermore, he has deep experience with market data, software, and model building in financial markets. Rob has a M.S. in Computer Science from the South Dakota School of Mines and Technology.