

Investment Case: Virtus AlphaSimplex Managed Futures ETF

ASMF

Understanding ASMF

The **Virtus AlphaSimplex Managed Futures ETF (ASMF)** strives to deliver diversification to traditional long-only portfolios by seeking positive risk-adjusted returns with low long-term average correlations to traditional asset classes. The ETF is designed to target the risk/return characteristics of the 20 largest managed futures funds in the world with the ability to provide long or short exposure to global equities, fixed income, currencies, and commodities using exchange-traded futures contracts.

Why Managed Futures? The Case for Systematic Trend

Incorporating diversified sources of return within investment portfolios is a widely accepted core tenet of asset allocation. A search for strategies that can provide attractive total returns and diversification to both equity and fixed income allocations, however, can yield surprisingly limited results.

Managed futures have historically generated positive long-term absolute returns independent of overall market direction, providing a differentiated source and pattern of returns when compared to traditional stock and bond portfolios. Through their ability to take long or short positioning across a vastly diverse set of global markets, these strategies also have tended to have low long-term correlation to traditional stocks and bonds. This may provide much-needed diversification benefits, especially during periods of market crisis or dislocation.

Potential for Diversification and a More Efficient Portfolio

Index returns, risk, and correlation data (1/1/2000 – 12/31/2023)

Correlation Matrix

	1	2	3	4	5
1 SG CTA Index	1.00				
2 S&P 500® Index	-0.12	1.00			
3 MSCI ACWI Ex USA Growth Index	-0.06	0.87	1.00		
4 Bloomberg US Aggregate Bond Index	-0.01	0.11	0.18	1.00	
5 S&P GSCI Index	0.10	0.33	0.46	-0.08	1.00

Time Period: Since Common Inception (1/1/2000) to 12/31/2023

■ 1.00 to 0.67 ■ 0.66 to 0.33 ■ 0.32 to 0.00 ■ -0.01 to -0.33

Risk-Reward

	Return	Std Dev	Max Drawdown	Sharpe Ratio	Beta
SG CTA Index	4.45	8.73	-14.26	0.34	-0.07
S&P 500® Index	7.03	15.47	-50.95	0.40	1.00
MSCI ACWI Ex USA Growth Index	4.27	17.08	-57.37	0.23	0.95
Bloomberg US Aggregate Bond Index	4.05	4.14	-17.18	0.56	0.03
S&P GSCI Index	0.79	23.10	-87.22	0.08	0.50

Time Period: Since Common Inception (1/1/2000) to 12/31/2023

Calculation Benchmark: S&P 500® Index

Key Features

- 1 Diversification**
Replication models utilize 20 liquid futures contracts across global equity, fixed income, currency, and commodity markets.
- 2 Risk Management**
Disciplined, systematic approach to risk management process that considers volatility and correlation, among other aspects of risk.
- 3 ETF Accessibility**
ETF and index-replication approach reduces fees and single manager risk while offering daily liquidity and transparency.

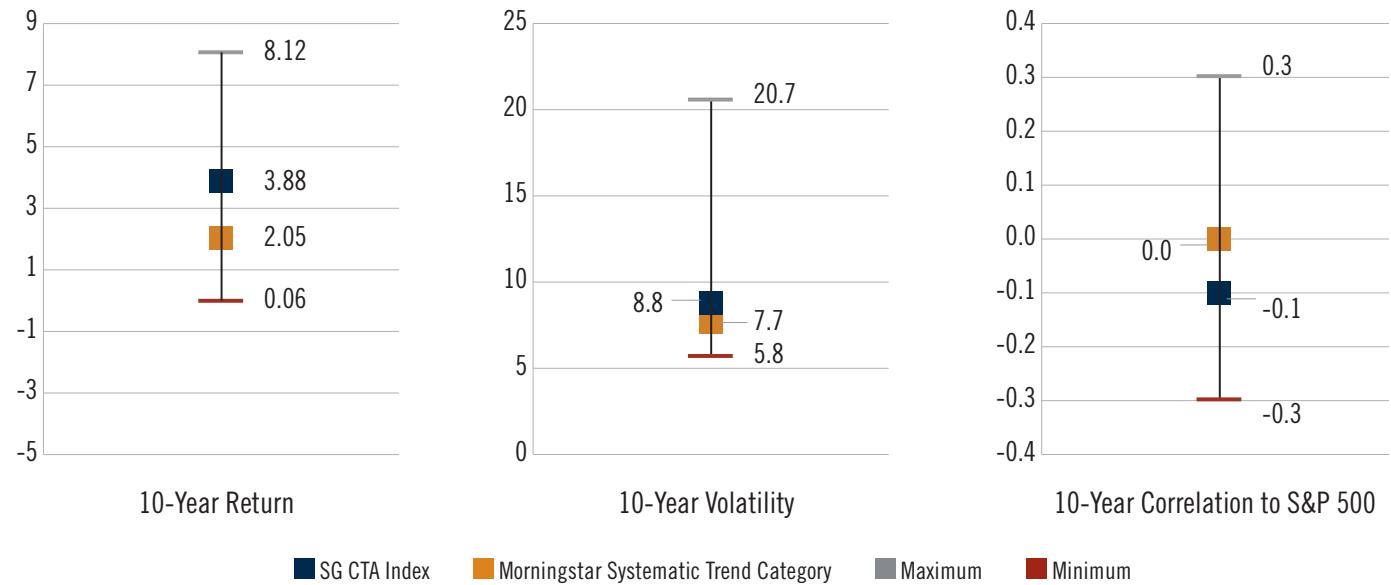
Past performance is not indicative of future results. Source: Morningstar Direct and Virtus Performance & Analytics. All data calculated since SG CTA Index inception (1/1/00), Sharpe Ratio (risk-free rate is 90-Day Treasury Bill) and Beta calculated against the S&P 500® Index. See last page for glossary and index definitions.

Why Replication? The Case for Index Tracking

Once investors have decided to incorporate managed futures into their portfolios, sourcing the right manager and investment vehicle within the space can be a complex undertaking.

One reason for this is that while the return profile of commonly followed managed futures indexes may have intuitive appeal, the magnitude of dispersion amongst manager styles and return profiles can come as a surprise.

10-Year Dispersion of Returns, Volatility, and Correlation Between Systematic Trend Funds Is Significant



Past performance is not indicative of future results.

Source: Morningstar Direct and Virtus Performance & Analytics. As of 12/31/23. See last page for glossary and index definitions.

Systematic trend is the most common sub-style of managed futures strategies; it is also the category Morningstar uses for most managed futures funds. As illustrated above, the dispersion of returns, volatility, and correlation to equities among category constituents is significant. The total return between funds varies by as much as 8% annualized over the most recent 10-year period.

On one hand, the dispersion of returns suggests potential benefits to taking a targeted approach to single-manager selection. On the other, simply tracking the index or peer group may prove more appealing for those looking to target the broad characteristics of the space while seeking to limit the risk of a single manager failing to deliver upon expectations.

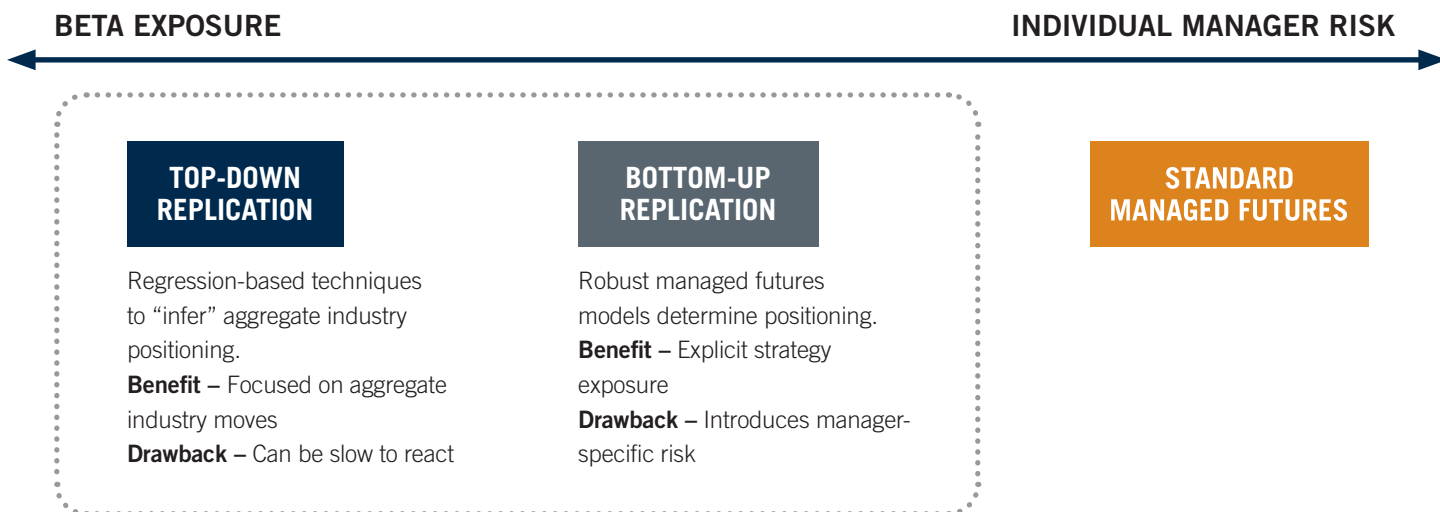
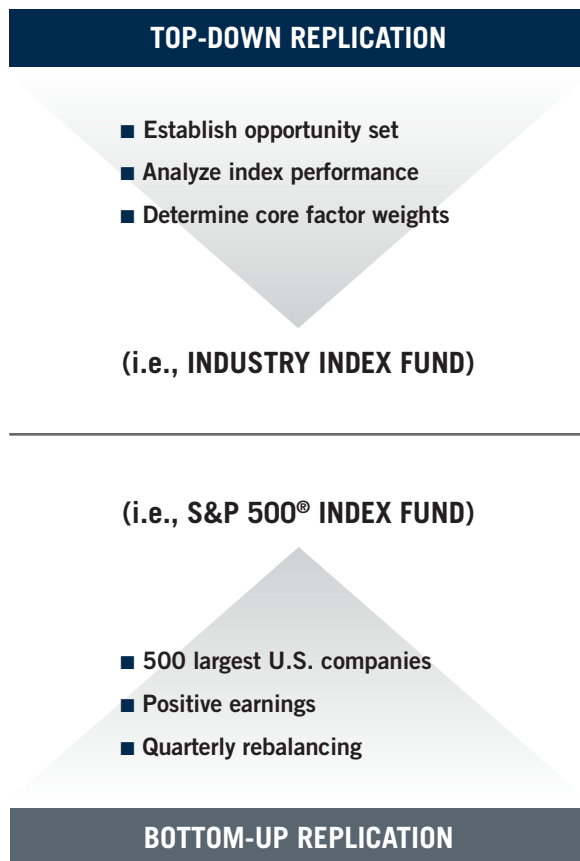
However, obtaining passive beta exposure that closely tracks managed futures indexes is a more complex process than tracking commonly followed equity indexes. One key reason for this is that managed futures indexes tend to be formed from manager peer groups of private hedge funds that do not regularly publish daily position sizing, in contrast to the S&P 500, for example, which utilizes a transparent rules-based approach that lends itself to “bottom-up” reconstruction of the index.

One established solution to replicating the aggregate exposures of hedge fund indices is through regression analysis that takes a top-down approach to infer aggregate index exposures based on recent performance of the underlying funds or index itself.

A second established solution is to take a bottom-up approach in trying to mimic the trading rules of managed futures strategies.¹ Because managed futures funds often take a systematic or rules-based approach to determine their exposures, it stands to reason that the identification of those trading rules has the potential to lead to similar results.

Each replication approach presents its own unique benefits and drawbacks. While the top-down approach may provide a viably accurate and actionable view of aggregate index exposures, it is reliant on analysis of past performance and may be slow to react to quick shifts in index exposures that can occur frequently among managed futures strategies that tend to be highly dynamic.

In contrast, the bottom-up approach is informed by its own explicit trading rules to determine reaction time and exposures; however, this introduces manager-specific risk to the process. As previously discussed, dispersion of single-manager performance is significant so attempts to mimic the trading rules of these same managers is far from guaranteed to produce index-like exposures and performance.



ASMF seeks to address these shortcomings with a hybrid approach, combining aspects of the top-down and bottom-up techniques, striving to improve the risk-adjusted return characteristics of the managed futures industry in a daily liquid and transparent ETF wrapper.

¹ For example, a CTA may look to follow “trends” in an index by comparing its current price to its 200-day average price: if the current price is above the 200-day average, then they would hold a long position; if it’s lower, they would hold a short position. In either case, they stand to profit if the current price trend continues.

Why AlphaSimplex? The Case for Enhanced Beta

As pioneers in the field of hedge fund replication, AlphaSimplex has been at the forefront of researching and developing systematic, quantitative alternative investment strategies since the firm's founding in 1999.

As a leading provider of systematic investment strategies, AlphaSimplex is positioned to offer a distinct hybrid approach to managed futures replication, combining aspects of top-down replication with proprietary bottom-up insights.

- **Managed Futures Industry Replication** – Top-down approach utilizes advanced statistical techniques to identify and emulate core exposures or beta of the 20 largest managed futures funds in the world, in order to deliver the aggregate view of the industry while reducing single-manager risk.
- **AlphaSimplex-Informed Trend** – Bottom-up approach incorporates AlphaSimplex proprietary model data to influence portfolio positioning with the objective of enhancing risk-adjusted returns and reducing tracking error.

ASMF combines robust statistical techniques with informed industry expertise, includes a wide asset set, and incorporates risk-management controls. The result is a portfolio with the potential to more closely track the realized results of a diversified portfolio of leading managed futures hedge funds.



For more information, contact us at 1-800-243-4361 or visit www.virtus.com.

The commentary is the opinion of AlphaSimplex. This material has been prepared using sources of information generally believed to be reliable; however, its accuracy is not guaranteed. Opinions represented are subject to change and should not be considered investment advice or an offer of securities.

IMPORTANT RISK CONSIDERATIONS

Exchange-Traded Funds (ETF): The value of an ETF may be more volatile than the underlying portfolio of securities it is designed to track. The costs to the portfolio of owning shares of an ETF may exceed the cost of investing directly in the underlying securities. **Derivatives:** Derivatives may include, among other things, futures, options, forwards and swap agreements and may be used in order to hedge portfolio risks, create leverage, or attempt to increase returns. Investments in derivatives may result in increased volatility and the portfolio may incur a loss greater than its principal investment. **Equity Securities:** The market price of equity securities may be adversely affected by financial market, industry, or issuer-specific events. Focus on a particular style or on small, medium, or large-sized companies may enhance that risk. **Interest Rate:** The values of debt instruments may rise or fall in response to changes in interest rates, and this risk may be enhanced for securities with longer maturities. **Credit Risk:** If the issuer of a debt instrument fails to pay interest or principal in a timely manner, or negative perceptions exist in the market of the issuer's ability to make such payments, the price of the security may decline.

Currency Rate: Fluctuations in the exchange rates between the U.S. dollar and foreign currencies may negatively affect the value of the portfolio's shares.

Commodity and Commodity-Linked Instruments: Commodity and commodity-linked instruments may experience a return different than the commodity they attempt to track and may also be exposed to counterparty risk. **Foreign & Emerging Markets:** Investing in foreign securities, especially in emerging markets, subjects the portfolio to additional risks such as increased volatility, currency fluctuations, less liquidity, and political, regulatory, economic, and market risk.

Leverage: When a portfolio is leveraged, the value of its securities may be more volatile and all other risks may be compounded. **Financial Concentration:** Because the portfolio is presently heavily weighted in the financial sector, it will be impacted by that sector's performance more than a portfolio with broader sector diversification. **Portfolio Turnover:** The portfolio's principal investment strategies may result in a consistently high portfolio turnover rate. A higher portfolio turnover rate may indicate higher transaction costs and may result in higher taxes when the portfolio is held in a taxable account. **Quantitative**

Model: Investments selected using quantitative models may perform differently from the market as a whole or from their expected performance. There can be no assurance that use of a quantitative model will enable the portfolio to achieve positive returns or outperform the market. **Market Price/NAV:** At the time of purchase and/or sale, an investor's shares may have a market price that is above or below the fund's NAV, which may increase the investor's risk of loss.

Market Volatility: The value of the securities in the portfolio may go up or down in response to the prospects of individual companies and/or general economic conditions. Local, regional, or global events such as war, terrorism, pandemic, or recession could impact the portfolio, including hampering the ability of the portfolio's manager(s) to invest its assets as intended. **Prospectus:** For additional information on risks, please see the fund's prospectus.

GLOSSARY

Beta is a quantitative measure of the volatility of a given portfolio relative to the overall market. Higher beta suggests higher volatility. Beta can also refer to relative volatility to a portfolio's stated benchmark. **Correlation:** A measure that determines the degree to which two variables' movements are associated. The correlation will vary from -1 to +1. A -1 indicates perfect negative correlation and +1 indicates perfect positive correlation. **Maximum Drawdown** measures the peak-to-trough decline during a specific record period of an investment, fund, or commodity. A drawdown is usually quoted as the percentage between the peak and the trough. **Sharpe Ratio** measures the efficiency, or excess return per unit of risk, of a manager's returns. It is calculated by taking the portfolio's annualized return, minus the annualized risk-free rate (typically the 30-Day T-Bill return), divided by the portfolio's annualized standard deviation. The greater the Sharpe Ratio, the better the portfolio's risk adjusted return. **Standard Deviation** measures variability of returns around the average return for an investment portfolio. Higher standard deviation suggests greater risk.

INDEX DEFINITIONS

The **Bloomberg US Aggregate Bond Index** measures the U.S. investment grade fixed rate bond market. The index is calculated on a total return basis. The **MSCI ACWI ex USA Growth Index** captures large and mid cap securities exhibiting overall growth style characteristics across 22 Developed Markets (DM) countries and 24 Emerging Markets (EM) countries. The growth investment style characteristics for index construction are defined using five variables: long-term forward EPS growth rate, short-term forward EPS growth rate, current internal growth rate and long-term historical EPS growth trend and long-term historical sales per share growth trend. The **S&P 500® Index** is a free-float market capitalization-weighted index of 500 of the largest U.S. companies. The **S&P GSCI® Index** is designed to reflect the performance of a production-weighted basket of physical commodities. The index is calculated on a total return basis with all proceeds reinvested. The **SG CTA Index** is designed to represent the performance of the 20 largest Trend Following commodity trading advisors (CTA) programs in the managed futures space. To qualify for inclusion in the index, a program must be open to new investment, report returns on a daily basis and be an industry recognized trend follower as determined at the discretion of the SG Index Committee. The index is equally weighted, and rebalanced and reconstituted annually. AlphaSimplex Group, LLC is a part of the SG CTA Index. All indexes are unmanaged, their returns do not reflect any fees, expenses, or sales charges, and they are not available for direct investment. The **Morningstar Systematic Trend Category** represents funds that primarily implement trend-following, price-momentum strategies by trading long and short liquid global futures, options, swaps, and foreign exchange contracts. The remaining exposure may be invested in a mix of other complementary nontraditional risk premia. These portfolios typically obtain exposure referencing a mix of diversified global markets, including commodities, currencies, government bonds, interest rates and equity indexes.

Please consider a Fund's investment objectives, risks, charges, and expenses carefully before investing. For this and other information about any Virtus Fund, contact your financial professional, call 800-243-4361, or visit virtus.com for a prospectus or summary prospectus. Read it carefully before investing.

Not FDIC Insured | May Lose Value | Not Bank Guaranteed