

Quartz Spectrum Strategy

Actively managed strategy seeking capital appreciation through focused investments across all asset classes, with a secondary objective of capital preservation.

Investment Objective

Seeks capital appreciation, with a secondary emphasis on preservation of capital.

Blended Benchmark

60% MSCI ACWI Index / 40% Bloomberg Barclays US Aggregate Bond Index

Risk Benchmark

Morningstar Moderate Target Risk Index

Investment Adviser

Quartz Partners Investment Management is a Registered Investment Adviser specializing in tactical portfolio solutions. Our goal is to generate high risk-adjusted returns guided by real-time market research and tactical risk management principles.

Portfolio Managers

Joseph Arena, Chief Investment Officer
Kyle Webber, Portfolio Manager

Target Strategy Allocations, Past 3 Years



Strategy allocations may vary depending on the custodian selected and are based on the target portfolio at the end of each period. The portfolio is dynamically adjusted and will frequently and substantially change. Actual allocations will vary due to market fluctuations.

Advantages

Potential advantages of the strategy over a traditional multi-asset portfolio include:

- **Flexible:** an unconstrained asset class mix provides adaptive capabilities to the strategy. Long-term underperformance of certain asset classes that would be utilized in passive strategies can be avoided as a result of thorough analysis.
- **Research-Driven:** the asset allocation decision is driven by continuous research of the financial markets and economy. Quartz Partners believes that expected asset class returns in the intermediate-term are determined largely by macro factors such as inflation, interest rates, earnings, and policy.
- **Avoiding Permanent Loss of Capital:** The Strategy maintains a capital preservation objective, which Quartz Partners defines as seeking to avoid large losses that threaten the long-term trajectory of portfolio. Short-term Volatility is often seen as an opportunity and is not targeted by the strategy. Cash, US Treasuries, or other traditional defensive securities are utilized to achieve the strategy's capital preservation objective.

Strategy Description

The Quartz Spectrum is a multi-asset Strategy with a moderate risk profile over a full market cycle and seeks long-term capital growth with a secondary emphasis on capital preservation. The Strategy will be primarily determined based on our outlook on the financial markets and global economy. Relative strength and other technical analyses may also be used to make asset allocation decisions. The Strategy may invest across the entire asset class universe and seeks to provide positive total returns through tactical allocations amongst each of the distinct asset classes. As a result, the Strategy may offer varying levels of risk and does not resemble a traditional, diversified allocation of stocks and bonds.

The Strategy may consist of a mix of US equity, foreign equity, bond, REIT, Commodity, and/or cash or equivalent Securities. Target allocations to REITs and Commodity Securities are each limited to 30% of the portfolio, while equity, fixed income, and/or cash or equivalent Securities may make up to 100% of the Strategy. The Strategy is non-diversified and will often be concentrated in one or a select number of Securities.

In an attempt to meet the Strategy's secondary emphasis of capital preservation, the Quartz Spectrum Strategy will at times be invested up to 100% in US Treasury/government bond Securities and/or cash or equivalent Securities. This will generally occur when our market and/or economic outlook become negative, or when investment opportunities are constrained by valuations or other factors.

Portfolio Construction Process



MACRO ANALYSIS

We collect and analyze data points categorized by the P.R.I.C.E. Matrix: Policy (Fiscal and Monetary), Risk, Inflation & Interest Rates, Credit/Liquidity, and Earnings & Economy.



TREND ANALYSIS

An intermarket approach focuses on both absolute trends (momentum) in asset class prices and relative strength between different classes, e.g., size, style, sector and geography.



CONTRARIAN/EARLY STAGE OPPORTUNITY ANALYSIS

Macro & Trend Analysis are reevaluated with a contrarian perspective (value), seeking opportunities to capitalize on anticipated trend changes.



ASSET ALLOCATION & SECURITY SELECTION

The final portfolio is constructed using Exchange-Traded Products, which are selected based on their costs, underlying index, and tradability (volume, tracking error and bid-ask spread).

Quartz Spectrum Strategy

as of 3/31/2022



Annualized Total Returns %

	Spectrum (Gross)	Spectrum (Net)	Blended Benchmark
3mo	-5.39	-5.87	-5.55
YTD	-5.39	-5.87	-5.55
1 yr	12.73	10.52	2.70
3 yr	11.16	8.97	9.16
5 yr	10.16	8.00	8.05
Inception (3/1/15)	7.28	5.14	6.56

Annual Total Returns %

	Spectrum (Gross)	Spectrum (Net)	Blended Benchmark
2015 beg, 3/1	-2.21	-3.83	-3.73
2016	0.29	-1.70	5.92
2017	15.90	13.63	15.41
2018	1.90	-0.12	-5.52
2019	6.63	4.53	19.41
2020	13.89	11.66	13.49
2021	23.45	21.04	10.20
2022	-5.39	-5.73	-5.55

Primary (Blended) Benchmark = 60% MSCI ACWI Index / 40% Bloomberg Barclays US Aggregate Bond Index
Risk Benchmark = Morningstar Moderate Target Risk Index

Note: Because of the composite's unconstrained investment strategy, no appropriate benchmark exists. However, benchmarks are shown for reference purposes and as supplemental information.

DEFINITIONS

Alpha: a measure of the difference between a fund's actual returns and its expected performance, given its level of risk as measured by beta. **Beta:** a measure of the volatility, or systematic risk, of a security or a portfolio in comparison to the market as a whole. **Beta:** a measure of the volatility, or systematic risk, of a security or a portfolio in comparison to the market as a whole. **Standard deviation:** a measure of the dispersion of a set of data from its mean. It is designed to gauge the historical risk of an investment in terms of its past volatility. **Sharpe Ratio:** the average return earned in excess of the risk-free rate per unit of volatility or total risk. **MSCI ACWI Index:** a market capitalization weighted index designed to provide a broad measure of equity-market performance throughout the world. The MSCI ACWI is maintained by Morgan Stanley Capital International (MSCI), and is comprised of stocks from both developed and emerging markets. **Bloomberg Barclays Capital U.S. Aggregate Bond Index:** comprised of approximately 6,000 publicly traded bonds including U.S. Government, mortgage-backed, corporate, and Yankee bonds with an approximate average maturity of 10 years. The **Morningstar Target Risk Index** family is designed to meet the needs of investors who would like to maintain a target level of equity exposure through a portfolio diversified across equities, bonds and inflation-hedged instruments. The Morningstar Moderate Risk Index seeks approximately 60% exposure to global equity markets.

Investors should carefully consider the underlying funds' fees, expenses, objectives and risks carefully before investing. Quartz Partners Investment Management ("Quartz") puts forth its best effort to achieve the objectives of its strategies. However, there is no guarantee that the objectives will be achieved. An Account's return and principal will fluctuate so that the Account, when redeemed, may be worth more or less than the amount in the Account at or subsequent to the effective date of the Investment Management Agreement. All results are expressed in US dollars and reflect reinvestment of dividends, capital gains, and other earnings as well as the deduction of trading or other expenses incurred. Performance reflects the gross return of the composite reduced by the maximum annual fee of 2%. Actual fees paid and performance may vary based on factors including account size, custodian, contributions and withdrawals, which may cause your returns to differ from those listed in this report. In particular, accounts held at variable annuities and/or fund families will have performance that frequently deviates from the listed data due to fees and investment options. Please contact Quartz or your custodian for your specific performance information. Quartz strategies may involve above-average portfolio turnover, which could negatively impact the net after-tax gain experienced by an individual client. Performance results do not reflect the impact of taxes. Investments in the programs are subject to investment and manager risk, which carry the potential for a loss of principal. Tactical management strategies do not protect against losses in declining markets and there is no guarantee that the strategy performance will meet or exceed the listed benchmark. Quartz's risk management process includes an effort to monitor and management risk, but should not be confused with and does not imply low risk. High yield bonds may be subject to greater market fluctuations, risk of default or loss of income and principal than higher rated securities. The benchmarks referenced herein have not been selected to represent an appropriate benchmark with which to compare a client's performance, but rather are disclosed to allow for comparison of the client's performance to that of certain well-known and widely recognized indices. Indexes are unmanaged, do not incur management fees, costs and expenses, and cannot be invested in directly. Quartz is an investment adviser registered with the SEC under the Investment Advisers Act of 1940. SEC registration does not constitute an endorsement of the firm by the SEC nor does it indicate that the advisor has attained a particular level of skill or ability. Quartz's Form ADV Part 2: Firm Brochure and other account documentation are available upon request. Quartz may pay a portion of the annual advisory fee to a solicitor who is responsible for introducing an investor to Quartz. Quartz claims compliance with the Global Investment Performance Standards (GIPS®). A complete list and description of the firm's composites and composite reports that adhere to the GIPS® standards are available by emailing info@quartzpartners.com. GIPS® is a registered trademark of CFA Institute. CFA Institute does not endorse or promote this organization, nor does it warrant the accuracy or quality of the content contained herein.

Risk Statistics (Since Inception, Gross Returns)

	Spectrum	Blended Benchmark
Standard Deviation	10.47	8.74
Beta	0.87	1.00
Alpha	1.59	0.00
Sharpe Ratio	0.64	0.74

	Spectrum	Risk Benchmark
Standard Deviation	10.47	11.60
Beta	0.65	1.00
Alpha	1.68	0.00
Sharpe Ratio	0.64	0.67

Growth of a \$100,000 Investment

