

# Quadratic Interest Rate Volatility and Inflation Hedge ETF (IVOL)

---

Q2 2024

## About Quadratic Capital Management and Krane Funds Advisors

### Quadratic Capital Management

Quadratic Capital Management is an innovative asset management firm founded in 2013 by Nancy Davis. The firm has utilized its significant expertise in fixed income and options markets to construct IVOL. Quadratic Capital Management serves as the Investment Sub-Adviser to the IVOL ETF.

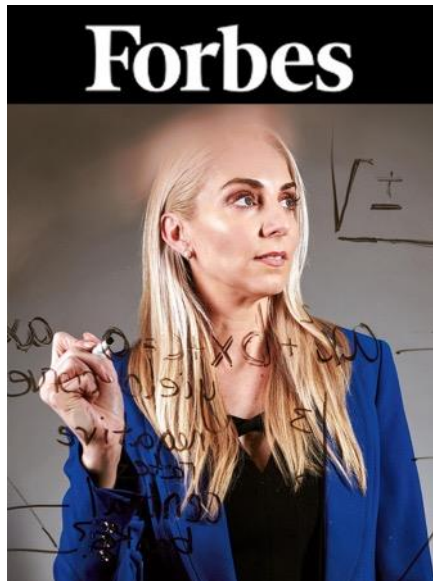
### Krane Funds Advisors

Krane Funds was founded in 2013 by Jonathan Krane and manages approximately \$8 billion. The firm seeks to provide innovative, first to market strategies that have been developed based on the firm and its partners' deep knowledge of investing. Krane Funds is majority owned by China International Capital Corporation (CICC). Krane Funds Advisors serves as the Investment Adviser to the IVOL ETF.



## Select IVOL Highlights, Milestones, and Awards

September 2019:  
Forbes profiles Nancy  
and IVOL strategy



March 2020:  
Barron's 100 Most Influential Women  
in Finance on inaugural list



April 2020:  
IVOL named "Best New US Fixed  
Income Fund of 2019" by ETF.com\*

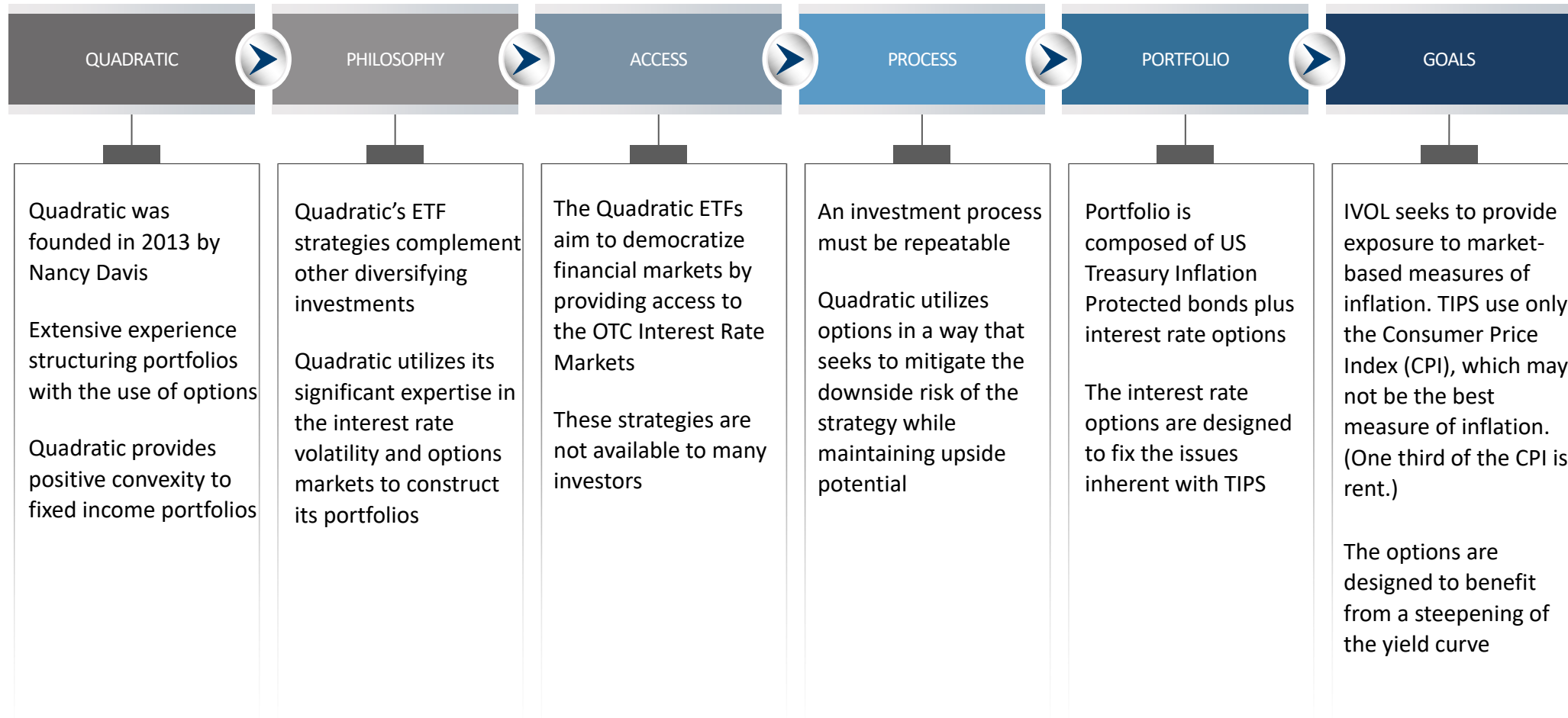


October 2022:  
WSJ profiled 6 investors' market  
views and strategies



## Quadratic Capital – Our Approach to Investing

IVOL is managed by Quadratic Capital, an innovative, woman-owned asset manager with extensive expertise in options trading and portfolio management.



## IVOL: Low Correlations To Common Asset Classes<sup>1</sup>

- IVOL may provide potentially attractive diversification during times when many other holdings sell off together.
- Historically, IVOL has acted as a partial hedge, given its very low correlations with the major indexes shown below.
- Historic data does not guarantee future trends, and it is possible that these correlations may change over time.

IVOL NAV Correlation To:	DOW	S&P 500	The Agg*	MSCI EM	HY Credit	Gold	VIX
Daily Correlation	0.03	0.03	0.40	0.02	0.09	0.21	0.03

Daily correlation from 5/14/19 to 3/31/24. Source: Bloomberg and Quadratic calculations

1. See end of deck for index definitions. Index returns are for illustrative purposes only and do not represent actual Fund performance. Index returns do not reflect any management fees, transaction costs or expenses. Indexes are unmanaged and one cannot invest directly in an index. Past performance does not guarantee future results. For actual fund performance visit our website [www.ivoletf.com](http://www.ivoletf.com).

\*Bloomberg US Aggregate Bond Index

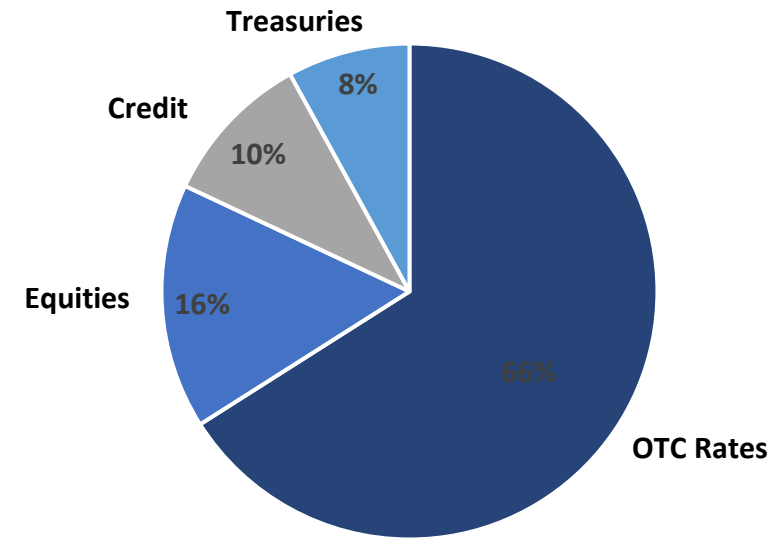
## Access: Exposure to the Rates Markets

- IVOL provides access to the OTC rates market, which is the largest single asset class; also provides the potential for differentiated performance from stocks and bonds. Until IVOL, this market was very difficult to access without ISDAs.
- IVOL's OTC rates options provide exposure to the shape of the yield curve, which is largely a result of inflation expectations. Thus, the options have the potential to increase in value with a normalization of inflation expectations and therefore function similar to options on inflation expectations.

### Key features:

- Potential for enhanced, inflation-protected distributions. IVOL has distributed at least 30 bps per month for over 4 years in a row.
- IVOL's options are fully funded, so the maximum downside is known and limited to the market value of the options.
- Through its options, **IVOL is long OTC fixed income volatility**, providing potential profit from market stress as volatility increases.
- **IVOL's Options have the potential to benefit from relative interest rate moves** – whether those moves are lower (or negative) rates in the front end and/or higher rates in the back end – **the options are agnostic to the level of interest rates.**

### Relative Sizes of US Financial Markets

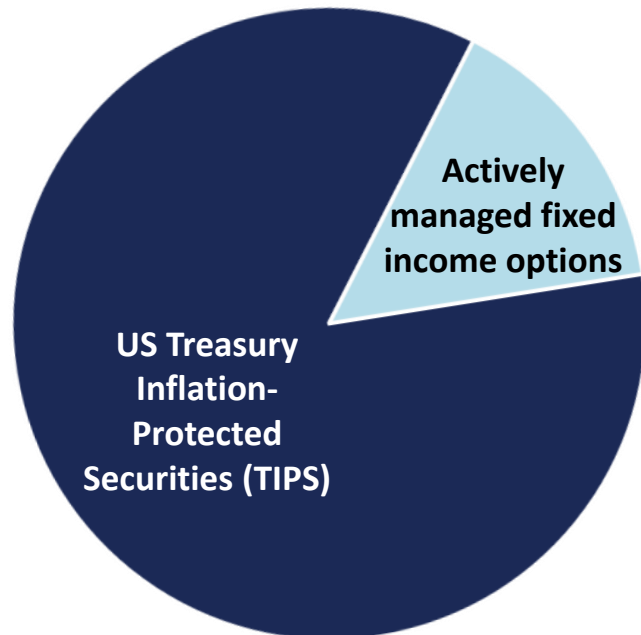


Source: Nasdaq, SIFMA and BIS. "US OTC Rates" defined as the notional value outstanding in interest rate contracts denominated in USD as of H1 2023.



## IVOL Portfolio Composition

- IVOL portfolio is approximately 85% US Treasuries (TIPS)
- The only index of inflation used by TIPS is the Consumer Price Index (CPI). Even the Fed does not use CPI as its primary gauge for inflation. Roughly one third of the entire index is rent.
- IVOL provides investors another way potentially to profit from inflation that isn't captured by the CPI index using dynamically managed fixed income options.



### TIPS Alone

- **TIPS are long duration;** therefore, they lose in price terms when interest rates move higher.
- Many investors **own short duration bonds** due to concerns about higher interest rates, and do not want duration exposure.
- **The Consumer Price Index (CPI) is the *only* inflation measure used in TIPS;** roughly 1/3 of CPI is rent. Rent costs may not be relevant for many investors.
- Using **TIPS alone linked to CPI as the only inflation protection** for a portfolio is similar to owning the Dow Jones Index as a sole allocation to equities.

### IVOL as Potential Solution

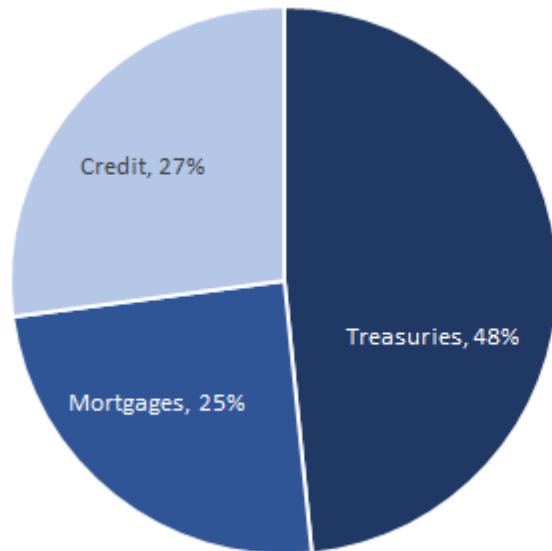
- IVOL seeks to **address the duration exposure in TIPS.** IVOL's options have the potential to profit if long dated interest rates move higher or if the yield curve steepens.
- IVOL **gives investors another way potentially to profit from inflation** rather than CPI alone.
- IVOL's options have the potential to **increase in value during times of market stress**
- IVOL provides a way to **profit from increased volatility, increased long term rates or lower than expected policy rates.**

## IVOL Completion Portfolio Application Example: Fixed Income

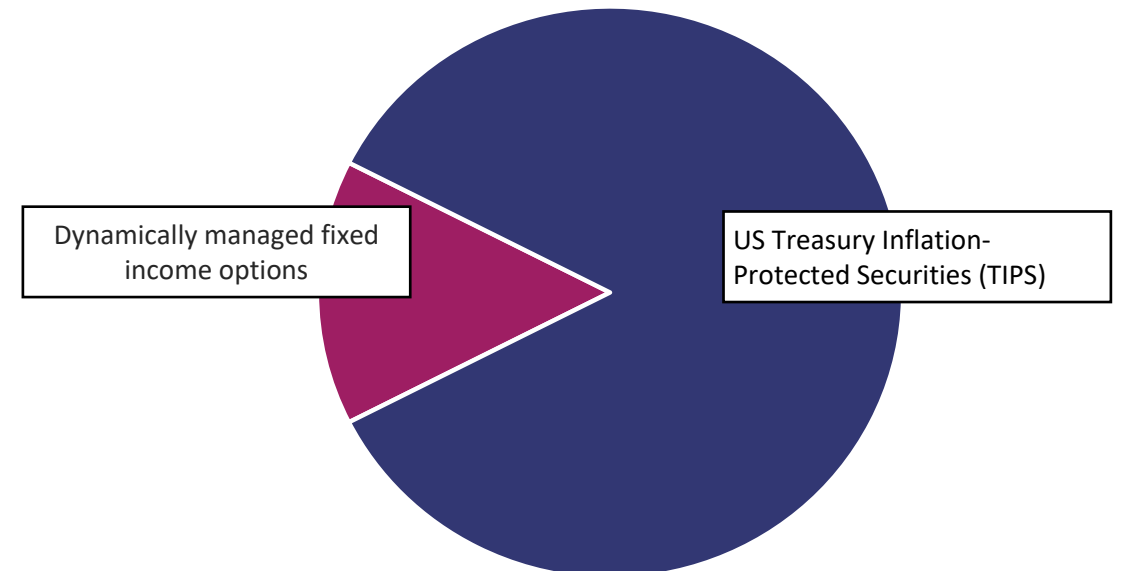
- Many investors utilize products tied to the Bloomberg US Aggregate Bond Index (“the AGG”) for fixed income exposure.
- Important issues with the "AGG" investors should keep in mind:
  - Roughly 25% of the AGG's holdings could be “short” volatility due to its large mortgage exposure<sup>1</sup>. Homeowners are long the option to prepay, leaving mortgage investors short options and short vol.
  - The AGG does not contain any inflation protected bonds (TIPS).
  - As a result, Investors who rely on the Agg for the totality of their bond exposure have two significant gaps in their exposure.

*IVOL may serve as a diversifier for such investors*

“The AGG” Composition



IVOL Composition





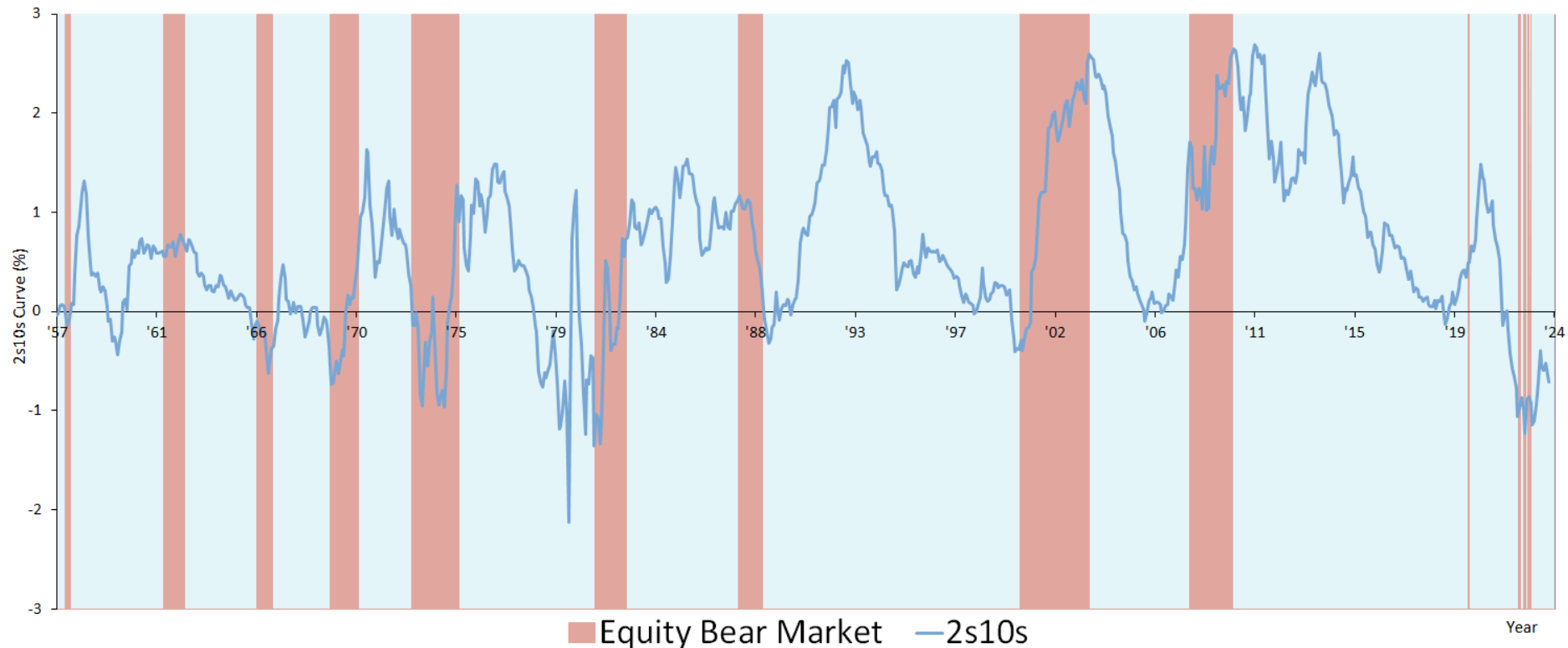
## IVOL Portfolio Applications

Investments:	Potential Risks:	How IVOL potentially manages risks:
<b>Fixed Income Completion</b>	The Bloomberg Agg Index is short fixed income volatility due to mortgages making up 25%. Homeowners are long the option to prepay, leaving mortgage investors short options/short vol. Additionally, the Agg includes no TIPS at all.	IVOL can act as a potential diversifier to the Agg. IVOL provides TIPS plus future inflation expectations outside of CPI. It is also long fixed income options, which can help to hedge the short volatility intrinsic to the Agg.
<b>Real Estate</b>	Higher rates increase the all-in cost of buying a home or other property and can depress demand.	IVOL may help hedge the risk of falling real estate prices brought on by rising long term interest rates.
<b>Equities Diversifier</b>	Some sectors with in equities can be seen as "defensive" and used with the goal to generate yield with less equity risk than the broader market. But "low vol" stocks are still stocks, with all that implies.	IVOL is a bond fund that owns fixed income volatility and may act as a market hedge since volatility has historically increased during large equity sell-offs.
<b>TIPS</b>	TIPS are set using the Consumer Price Index (CPI). About 1/3 of CPI is defined by "shelter," which is mostly rent. The only inflation exposure within TIPS is to the Consumer Price Index.	IVOL owns TIPS, but they are enhanced by interest rate options. These options serve to provide exposure to a broader measure of inflation than just CPI, which may not reflect actual price increases investors confront.
<b>Floating Rate Notes (FRNs)</b>	Frequently used for their potential to profit from higher yields, FRNs have credit risk and almost no sensitivity to interest rates.	IVOL has the potential to appreciate when the interest rate curve steepens and long dated inflation expectations move higher, giving investors a similar benefit to the one they are expecting from their FRN, but without the credit risk.
<b>Short Duration Bonds</b>	Investors in short duration bonds are usually concerned about higher rates and so they seek to minimize their duration risk exposure. But so called "short duration" bonds are still long duration.	IVOL's long volatility positions may help during bond market sell-offs should the yield curve steepen and volatility increase. And it has distributed at least 30 bps monthly for 4 years in a row.

## IVOL Hedge Portfolio Application Example: IVOL During Periods of “Risk Off” for Equities

- The IVOL portfolio potentially has the ability to benefit from equity market shocks. How can IVOL’s options potentially benefit equity holders? As the chart below shows, equity market sell-offs have historically been associated with a steepening of the yield curve.
- By holding interest rate options that are expected to pay off when the yield curve steepens, IVOL may also help hedge investors against equity market sell-offs.

### Relationship Between US Equity Market Sell-Offs and the Yield Curve



Source: Goldman Sachs and Quadratic Capital as of Q1 2024

S&P 500 is the equity index and 2s10s is defined as the difference between the 10y and the 2y swap rates. Past performance does not guarantee future results.

## IVOL Scenario Analysis

### Four Factors that Impact IVOL

POSITIVE

- ✓ Higher TIPS Bond Prices
- ✓ Higher Interest Rate Volatility
- ✓ Expectations for More Fed Cuts or Lower Short Dated Interest Rates
- ✓ Higher Long Dated Interest Rates

- ✗ Lower TIPS Bond Prices
- ✗ Lower Interest Rate Volatility
- ✗ Expectations for Less Fed Cuts or Higher Short Dated Interest Rates
- ✗ Lower Long Dated Interest Rates

NEGATIVE

✓ / ✗ indicates the potential effect these scenarios may have on IVOL.  
With ✓ indicating a potential positive effect and ✗ indicating a potential negative effect.  
“Long dated yields” defined as the yield on the 10y US treasury.

## IVOL Performance History

As of 3/31/24	Cumulative %			Average Annualized %		
	3 Mo	6 Mo	Since Inception	1yr	3yr	Since Inception
Fund NAV	-7.44%	-6.29%	-9.67%	-13.30%	-9.42%	-2.06%
Closing Price	-7.63%	-6.26%	--9.82%	-13.63%	-9.58%	-2.09%
Index*	-0.08%	4.62%	12.47%	0.45%	-0.53%	2.43%

IVOL shareholders have received minimum monthly distributions of 30 basis points each month for over 4 years. None of these distributions in 2022 were subject to ordinary income taxes or capital gains. Some distributions include a partial return of capital\*

As of 3/31/24, the 30-day SEC Yield is 1.58%. *30-day SEC yield is a standard yield calculation developed by the U.S. Securities and Exchange Commission (SEC) that allows for fairer comparisons of bond funds. It is based on the most recent 30-day period covered by the fund's filing with the SEC. It includes any TIPS principal adjustment from inflation as income. An exceptionally high 30-Day SEC yield may be attributable to a rise in the inflation rate, which might not be repeated.*

*The performance data quoted above represents past performance. Past performance does not guarantee future results. The investment return and principal value of an investment will fluctuate so that an investor's shares, when sold or redeemed, may be worth more or less than their original cost and current performance may be lower or higher than the performance quoted. For performance data current to the most recent month end, please visit [www.ivoletf.com](http://www.ivoletf.com) IVOL inception on 5/14/19. Past performance is no guarantee of future results.*

*\*Index is the Bloomberg US Treasury Inflation Linked Bond Index (Series L). Please note that although this index is provided for comparative purposes, the fund's strategy is benchmark agnostic. Index returns are for illustrative purposes only. Index performance returns do not reflect any management fees, transaction costs or expenses. Indexes are unmanaged and one cannot invest directly in an index.*

### Performance Comments:

- IVOL had positive performance in Q1 2023, rising +1.41%. The Fund held up especially well as worries grew around the US banking system. From March 6-15, SPX fell -3.9%, HY spreads widened 98 bps and IG spreads widened 18 bps. During the during the SVB Crisis, IVOL's NAV was up an impressive +14.2%.
- Since mid 2021, when the Fed's started hiking interest rates, IVOL underperformed its TIPS Index benchmark. The aggressive pace of the hikes caused the yield curve to experience its largest inversion in the history of the swaps market. This impacted IVOL's performance.
- In Q1 2021, IVOL had a strong outperformance of more than 4% compared to TIPS alone. This was largely a result of the increase in long dated interest rates. Like all bonds, TIPS are long duration and tend to lose value in price terms as interest rates rise. IVOL can potentially help investors if long dated interest rates move higher.
- During COVID-driven March 2020 sell-off from IVOL was up 0.80% on the month while TIPS alone (SCHP) was down -1.47%.

### \*IVOL Special Tax Treatment:

- IVOL is treated as a separate entity for federal tax purposes.
- The Fund expects that most of its income will be ordinary income because the assets underlying the rate-linked derivative instruments in which it invests are not capital assets.
- The tax treatment of IVOL's distributions is potentially compelling when compared to TIPS ETFs or other tax efficient strategies. This is because the options inside of IVOL receive ordinary tax treatment, which may be beneficial to IVOL's shareholders.
- Options expiring out of the money can provide tax benefits to the fund's distributions. At the end of the year, we look at the fund's distributions vs. the fund's net income. Net income includes any bond interest income less realized losses from the options, which are treated as ordinary assets and not as capital assets. If the fund's net income is less than the distribution, the difference will be treated as a return of capital and not taxed.

## Dedicated to Responsible Investing with a Strong Focus on Diversity

### Quadratic Capital Management LLC is a registered MWBE firm:

- Registered Small/Minority Business Enterprise
- Majority woman-owned firm



### The IVOL Fund:

- The IVOL Fund represents an ESG “impact” investment in so far as Quadratic is a registered Small/Minority Business Enterprise and a majority woman-owned firm and, thus, an investment in the Fund advances certain ESG social and governance principles.
- Focuses on diversification and the “S” and “G” within ESG
- Democratizes financial markets by giving investors access to the OTC rates markets



### Krane Funds is a UN PRI signatory and as such adheres to the following principles:

- To be active owners and incorporate ESG issues into our ownership policies and practices
- To seek appropriate disclosure on ESG issues by the entities in which we invest
- To promote acceptance and implementation of the Principles within the investment industry
- To work together to enhance our effectiveness in implementing the Principles
- To report on our activities and progress towards implementing the Principles



## IVOL Risk Profile

Investing involves risk, including possible loss of principal. There can be no assurance that the Fund will achieve its stated objectives, including its objective of eliminating the curve or inflation risk. Investors should take note of the following risks before investing in IVOL. A more thorough discussion of options investing can be found on the Options Clearing Corporation's website. A link to which can be found in the Important Notes section of this presentation.

- **A Flattening Yield Curve Risk:** IVOL may underperform or lose money when the U.S. interest rate curve flattens or inverts, perhaps significantly. When this occurs the Fund's investments may generally underperform a portfolio consisting solely of U.S. government bonds
- **Leverage Risk:** IVOL's OTC options may give rise to a form of leverage, which may magnify the Fund's potential for gain and the risk of loss. The Fund may potentially be more volatile than a portfolio of traditional investments such as stocks or bonds.
- **Liquidity & Counterparty Risk:** OTC options may be subject to liquidity risk and counterparty risk.
- **Credit & Non-Curve Interest Rate Risk:** IVOL's use OTC options is not intended to mitigate credit risk, or non-curve interest rate risk. Additionally, IVOL invests in debt securities, which typically decrease in value when interest rates rise.
- **Considered Speculative:** Investing in options tied to the shape of the swap curve is considered speculative and can be extremely volatile.
- **Concentration Risk:** The fund is non diversified.

## Guide to Trading ETFs

### ETF liquidity is determined by the asset class, not by the fund size

- Exchange-traded funds (ETFs) are a wrapper, and although an investor may hold a large percentage of an ETF, one must look at the percentage owned of the underlying asset class.

### ETF investors are not impacted by other investors' trades in the same ETF

- The ETF structure is unique in that all investors transact independently on an exchange. Being a large or small owner in a fund does not mean you're more or less impacted by the actions of other investors. In a mutual fund, all investors are impacted by the trading activity of other holders in the fund.

### An ETF closure does not create principal risk

- If a fund were to close, neither large nor small investors would have a principal risk. The fund would be liquidated by the portfolio manager, and the investors would receive back NAV of the fund, minus costs, at the time of liquidation.

### Trading in and out and fund size

- Investors can trade in and out of a fund regardless of the fund's AUM. ETF liquidity providers (market makers) can easily transfer the liquidity of the underlying basket into ETF shares. Market makers also accept NAV based orders for larger tickets.



## Understanding ETF Liquidity

### An ETF is not a stock

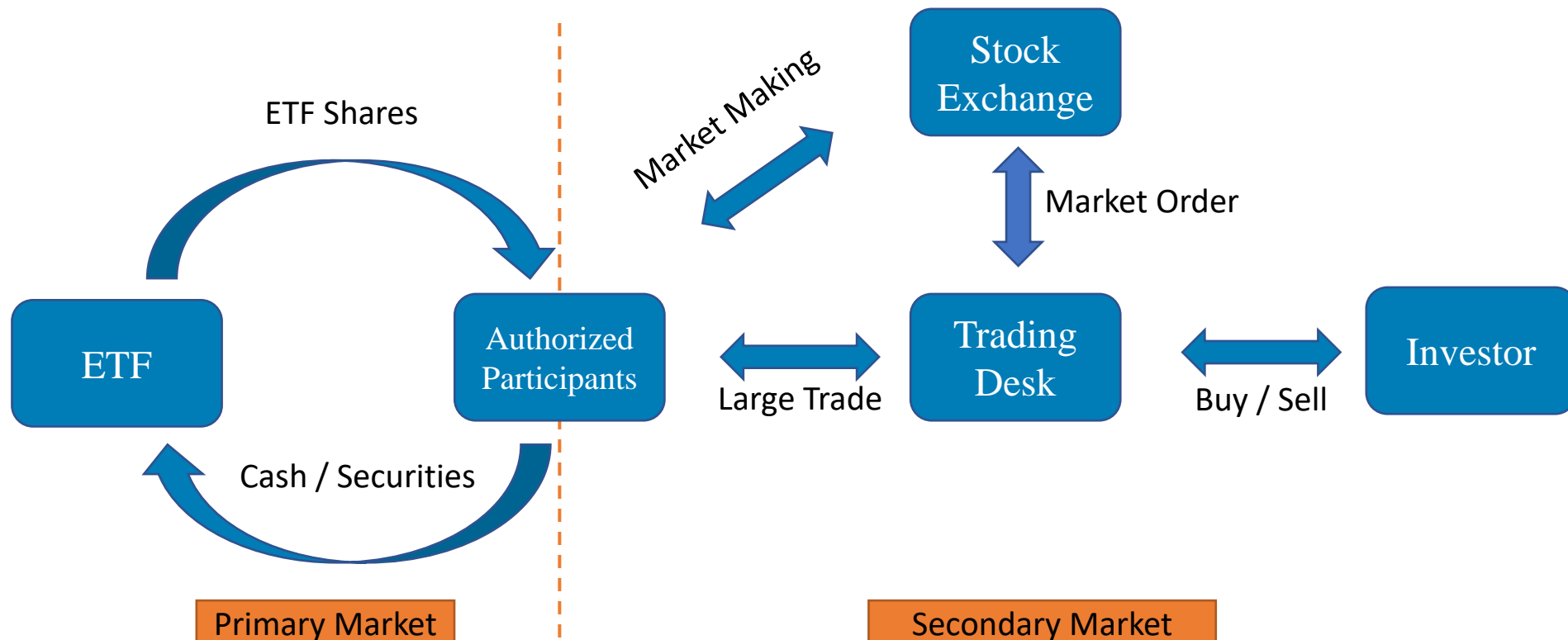
- If an ETF does not trade a certain number of shares per day, is the fund illiquid? No. It's a plausible assumption from a single-stock perspective, but with ETFs, there is more to consider. The key is to understand the difference between the primary and secondary market liquidity of an ETF.

### Primary Market vs. Secondary Market

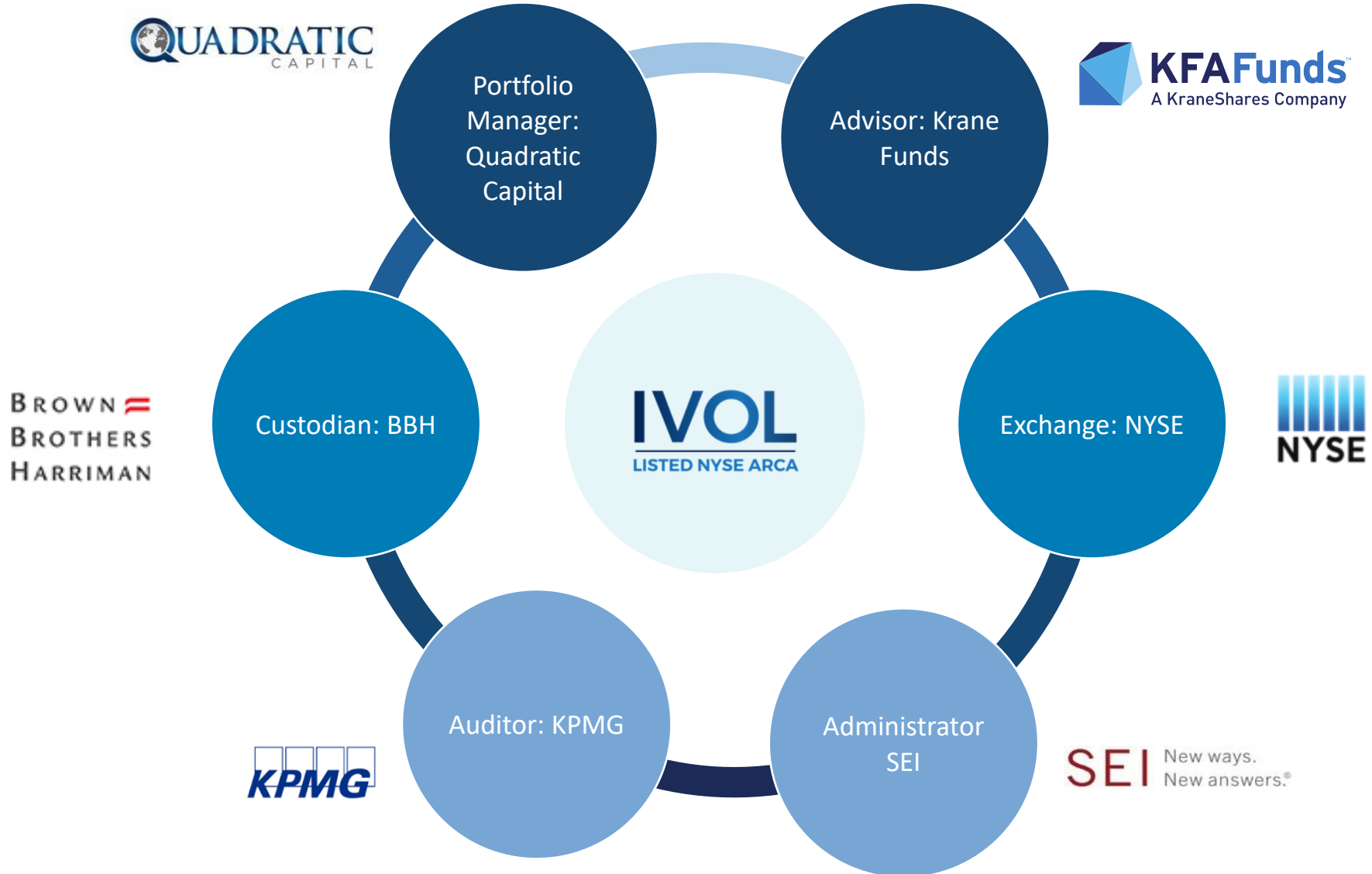
- Most noninstitutional investors transact in the secondary market—which means investors are trading the ETF shares that currently exist. Secondary liquidity is the “on screen” liquidity you see from your brokerage (e.g., volume and spreads), and it's determined primarily by the volume of ETF shares traded.
- However, one of the key features of ETFs is that the supply of shares is flexible—shares can be “created” or “redeemed” to offset changes in demand. Primary liquidity is concerned with how efficient it is to create or redeem shares. Liquidity in one market is not indicative of liquidity in the other market.
- The determinants of primary market liquidity are different than the determinants of secondary market liquidity. In the secondary market, liquidity is primarily a function of the value of the ETF shares traded and frequency and volume of the trading of those shares throughout the trading day. When placing a large trade—on the scale of tens of thousands of shares—investors are sometimes able to circumvent an illiquid secondary market by using an “authorized participant” (AP) to reach through to the primary market to “create” new ETF shares at NAV price.

## Flow Chart of Creation Redemption Process for ETFs

- Small trades in ETFs flow normally are done in the secondary market, where all market participants can trade. It behaves like a stock, and everyone can buy (sell) from the best seller (buyer)
- Large and institutional trades – which normally would be a high percentage of the daily volume – are done in the primary market. The trading desk of the major broker dealers are called Authorized Participants and can create and redeem shares directly with the fund.
- IVOL Unit size for the primary market is 25,000 shares



## The IVOL Ecosystem



## Portfolio Management and Capital Markets Leadership



**Nancy Davis, Chief Investment Officer, Quadratic Capital Management**

Nancy Davis founded Quadratic Capital in 2013. Nancy is the portfolio manager for the Quadratic Interest Rate Volatility and Inflation Hedge ETF (Ticker: IVOL). Nancy began her career at Goldman Sachs where she spent nearly ten years, the last seven with the proprietary trading group where she became Head of Credit, Derivatives and OTC Trading.

Nancy has been the recipient of numerous industry recognitions. Barron's named her to their inaugural list of the "100 Most Influential Women in U.S. Finance." Institutional Investor called her a "Rising Star of Hedge Funds." The Hedge Fund Journal tapped her as one of "Tomorrow's Titans."

Nancy writes and speaks frequently about markets and investing. She has been profiled by Forbes, and interviewed by Barron's, The Economist, The Wall Street Journal, and The Financial Times among others. Ms. Davis is a frequent guest on television including CNBC, Bloomberg, CNN, CBS and ABC.



**Glenn Christal, Chief Operating Officer, Quadratic Capital Management**

Glenn Christal is responsible for overseeing the business and trading operations for the company. Previously, Glenn Christal was at Tudor Investment Corp, a multi-billion macro hedge fund, for fifteen years where he was the Treasurer and chair of the Treasury and Credit Committees. Mr. Christal oversaw collateral management, cash management, credit and trade documentation negotiations. His prior role was the Chief Operations Officer at Millennium Partners where he oversaw trade operations.



**Henrique Rocha, Market Strategist, Quadratic Capital Management**

Henrique Rocha joined Quadratic in 2015. Previously, he worked at Goldman Sachs as an Interest Rates and Foreign Exchange Strategist, responsible for tactical idea generation for institutional clients, including banks, corporations, hedge funds, asset managers, and sovereigns.

He holds a B.S. magna cum laude in Electrical Engineering from Yale University, where he was a member of Phi Beta Kappa and Tau Beta Pi.

## Quadratic Capital and Krane Funds Leadership



[Jonathan Krane, Chief Executive Officer, Krane Funds Advisors](#)

Jonathan Krane is the founder and Chief Executive Officer of Krane Funds Advisors, the premier platform for developing and delivering differentiated, high-conviction investment strategies to global investors and KraneShares, an asset management firm delivering China-focused exchange traded funds to global investors.



[Jonathan Shelon, Chief Operating Officer, Krane Funds Advisors](#)

Jonathan is the Chief Operating Officer at KraneShares. Prior to KFA, he was the Chief Investment Officer of the Specialized Strategies Team at J.P. Morgan, overseeing \$40 billion in AUM and a Portfolio Manager at Fidelity Investments where he was responsible for \$150 billion in assets for over five million shareholders in Fidelity's target date strategies, the Freedom Funds.



[Odette Gafner, Chief Compliance Officer, Krane Funds Advisors](#)

Odette Gafner is Head of Compliance at KFA and joined the firm March in 2019 to oversee the compliance program for the Funds and to serve as the Chief Compliance Officer (CCO) to Krane Fund Advisors. Odette has over 12 years of experience implementing policies and establishing best practice across the asset management industry. Prior to joining the KraneShares team, Odette worked at BlackRock for 12 years.



[James Maund, Head of Capital Markets, Krane Funds Advisors](#)

James Maund joined KraneShares as head of Capital Markets in January 2020. James has more than 15 years of experience in ETF trading and capital markets. Prior to joining KraneShares, James was a vice president in the Institutional ETF Group / ETF Capital Markets Group at State Street Global Advisors. Prior to State Street, James was an ETF trader at Goldman Sachs & Co.

## Quadratic Capital and Krane Funds Leadership



**Brendan Ahern, Chief Investment Officer, Krane Funds Advisors**

Brendan Ahern is the Chief Investment Officer at Krane Funds Advisors (KFA). Mr. Ahern joined KFA in 2012 and was an original member of the team that launched its first ETFs. He leads the firm's research and education efforts and actively works with investors on a variety of subjects ranging from asset allocation to trading to articulating the growing influence that index providers hold in the asset management industry. Prior experience includes over ten years with Barclays Global Investors (subsequently BlackRock's iShares), which he joined in 2001 during the rollout of their ETF business.



**David Adelman, Managing Director and General Counsel, Krane Funds Advisors**

Ambassador (Ret.) David Adelman is a Managing Director and the General Counsel of Krane Funds Advisors. He previously was a Managing Director at Goldman Sachs in Hong Kong and partner in two global law firms practicing law in New York, Washington, D.C., and Atlanta. David was the 15th United States Ambassador to Singapore serving during the first term of the Obama-Biden Administration



**Julian Daniels, Managing Director, Krane Funds Advisors**

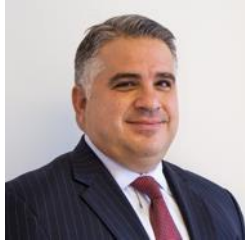
Julian Daniels joined KraneShares in August 2018 as a Managing Director to head the firm's institutional efforts. Prior to KraneShares, Julian was a senior member of the VanEck institutional business development team. Prior to VanEck, he was an Associate at Select Access Management.



**Florence Moon, Director, Krane Funds Advisors**

Florence Moon joined KraneShares in June 2019 as a Director to support the firm's institutional efforts. Florence has over 12 years of experience working with institutional clients, handling all aspects of client service and relationship development. Prior to KraneShares, Florence spent 12 years with VanEck Global where she was a senior member of the institutional business development team.

## Quadratic Capital and Krane Funds Leadership



**Guy Ferrara, Managing Director, Krane Funds Advisors**

Guy has spent the last 20 years in the asset management industry. Prior to KFA, Guy worked for UBS in client education, portfolio construction, and asset retention. Over the course of his 20-year career his mission has always been improving real financial outcomes for client's and the financial advisors who serve them.



**Joseph Dube, Head of Marketing, Krane Funds Advisors**

Joseph joined KraneShares in June 2012 as Head of Marketing. He is in charge of creating and maintaining all client-facing marketing materials including websites, advertisements, pitch books, and fact sheets as well as the bi-weekly research newsletter. He takes pride in designing and developing the highest quality educational material for retail investors, financial advisors, and journalists. Joseph has a BFA from the Rochester Institute of Technology. He was a Rotary Youth Exchange student to Argentina and is fluent in Spanish.



**Libby Landis, Vice President, Product Marketing, Krane Funds Advisors**

Libby joined KraneShares marketing department in March of 2019 to create marketing content for current and prospective institutional and retail investors. Through use of articles, webinars, press releases, research and brand partnerships Libby aims to produce content that is engaging, relevant and educational to KraneShares' audience.



**Brooke Farley, Business Development, Quadratic Capital Management**

Brooke Farley joined Quadratic in 2018. Previously, she was a consultant for McKinsey & Company and a risk underwriter at Bond Investors Guaranty. Ms. Farley received her BA in Art History from Manhattanville College and received a Master of International Affairs (MIA) from Columbia University's School of International and Public Affairs. Ms. Farley holds her Series 7 and Series 63 Securities licenses.



## The Quadratic Interest Rate Volatility and Inflation Hedge ETF

### Key Fund Information

Ticker	IVOL
Fund Name	Quadratic Interest Rate Volatility and Inflation Hedge ETF
Primary Exchange	NYSE
Total Annual Fund Operating Expense	1.03%
Inception Date	5/13/2019
Distribution Frequency	Monthly

## Index Definitions

**The Dow Jones Industrial Average (“Dow”)** is an index that tracks 30 large, publicly-owned companies trading on the New York Stock Exchange and the NASDAQ.

**The S&P 500, (“S&P”),** is a stock market index that measures the stock performance of 500 large companies listed on stock exchanges in the US.

**The MSCI Emerging Markets (“MSCI EM”)** Index captures large and mid cap representation across 26 Emerging Markets (EM) countries.

**The iBoxx iShares High Yield Corporate Bond Index (“HY Credit”)** is designed to reflect the performance of USD denominated high yield corporate debt.

**VIX** is a CBOE index that represents equity volatility of 30-day expectations of the S&P 500 equity index.

**Bloomberg US Aggregate Bond Index (“Agg”)** is a broad-based benchmark that measures the investment grade, US dollar-denominated, fixed-rate taxable bond market. The index includes Treasuries, government-related and corporate securities, MBS (agency fixed-rate pass-throughs), ABS and CMBS (agency and non-agency).

Bloomberg US Treasury Inflation Linked Bond Index (Series L). It measures the performance of the US Treasury Inflation Protected Securities (TIPS) market.

## Important Notes

**The performance data quoted represents past performance. *Past performance does not guarantee future results.* The investment return and principal value of an investment will fluctuate so that an investor's shares, when sold or redeemed, may be worth more or less than their original cost. Current performance may be lower or higher than the performance quoted. For performance data current to the most recent month end, please visit [www.IVOLETF.com](http://www.IVOLETF.com).**

ETF shares are not redeemable with the issuing fund other than in large transactions with institutional investors. Shares of any ETF are generally bought and sold at market price (not NAV). Market price returns are based on the official closing price of an ETF share or, if the official closing price isn't available, the midpoint between the national best bid and national best offer (“NBBO”) as of the time the ETF calculates current NAV per share. NAVs are calculated using prices as of 4:00 PM Eastern Time. The returns shown do not represent the returns you would receive if you bought and sold shares at other times. Any brokerage commissions will reduce returns.

There is no guarantee the Fund will declare distributions in the future or that, if declared, such distributions will remain at current levels or increase over time.

Investing involves risk, including possible loss of principal. There can be no assurance that a Fund will achieve its stated investment objectives. The Fund does not seek to mitigate credit risk, non-curve interest rate risk, or other factors influencing the price of U.S. government bonds, which factors may have a greater impact on the bonds’ returns than the U.S. interest rate curve or inflation. There is no guarantee that the Fund’s investments will eliminate or mitigate curve risk, or inflation risk on long positions in U.S. government bonds. In addition, when the forward U.S. interest rate curve flattens, the Fund’s investments will generally underperform a portfolio comprised solely of the U.S. government bonds. In a flattening curve environment (a reduction in the spread between shorter and longer term interest rates), the Fund’s strategy could result in disproportionately larger losses in the Fund’s options as compared to gains or losses in the U.S. government bond positions. The Fund’s exposure to options subjects the Fund to greater volatility than investments in traditional securities and may magnify the Funds’ gains or losses. The Fund is non-diversified and therefore has concentration risk.

OTC options generally have more flexible terms negotiated between the buyer and the seller. As a result, such instruments generally are subject to greater counterparty risk. OTC instruments also may be subject to greater liquidity risk. There are risks involved with investing in options including the potential loss of the amount, or premium, paid for the option.

**This material must be preceded or accompanied by a current [prospectus](#). Investors should read it carefully before investing or sending money.**

IVOL is distributed by SEI Investments Distribution Co. (SIDCO), 1 Freedom Valley Drive, Oaks, PA 19456. The Fund's sub-advisor is Quadratic Capital Management LLC (Quadratic). The Fund's advisor is Krane Fund Advisors LLC (Krane). SIDCO is not affiliated with Quadratic or Krane. Neither Quadratic, Krane nor SIDCO or their affiliates provide tax advice. Please note that (i) any discussion of U.S. tax matters contained in this communication cannot be used by you for the purpose of avoiding tax penalties; (ii) this communication was written to support the promotion or marketing of the matters addressed herein; and (iii) you should seek advice based on your particular circumstances from an independent tax advisor.