

IBKRWEBINARS.COM



June 28, 2023

Nasdaq

Will Markets Stumble in Summer? Navigating Through and Beyond with Options

Kevin Davitt

Head of Index Options

Content

Nasdaq

Exchange and Industry Sponsored Webinars are presented by unaffiliated third parties. Interactive Brokers LLC is not responsible for the content of these presentations. You should review the contents of each presentation and make your own judgment as to whether the content is appropriate for you.

Interactive Brokers LLC does not provide recommendations or advice. This presentation is not an advertisement or solicitation for new customers. It is intended only as an educational presentation.



Disclosure:

Options involve risk and are not suitable for all investors. For information on the uses and risks of options, you can obtain a copy of the Options Clearing Corporation risk disclosure document titled [Characteristics and Risks of Standardized Options](#) by calling (312) 542-6901.

Multiple leg strategies, including spreads, will incur multiple transaction costs.

Any discussion or mention of an ETF is not to be construed as recommendation, promotion or solicitation. All investors should review and consider associated investment risks, charges and expenses of the investment company or fund prior to investing. Before acting on this material, you should consider whether it is suitable for your particular circumstances and as necessary, seek professional advice.

Futures are not suitable for all investors. The amount you may lose may be greater than your initial investment. Before trading futures, please read the [CFTC Risk Disclosure](#). For a copy visit interactivebrokers.com.

There is a substantial risk of loss in foreign exchange trading. The settlement date of foreign exchange trades can vary due to time zone differences and bank holidays. When trading across foreign exchange markets, this may necessitate borrowing funds to settle foreign exchange trades. The interest rate on borrowed funds must be considered when computing the cost of trades across multiple markets.

The Order types available through Interactive Brokers LLC's Trader Workstation are designed to help you limit your loss and/or lock in a profit. Market conditions and other factors may affect execution. In general, orders guarantee a fill or guarantee a price, but not both. In extreme market conditions, an order may either be executed at a different price than anticipated or may not be filled in the marketplace.

There is a substantial risk of loss in trading futures and options. Past performance is not indicative of future results.

Any stock, options or futures symbols displayed are for illustrative purposes only and are not intended to portray recommendations.

- IRS Circular 230 Notice: These statements are provided for information purposes only, are not intended to constitute tax advice which may be relied upon to avoid penalties under any federal, state, local or other tax statutes or regulations, and do not resolve any tax issues in your favor.
- Interactive Brokers LLC is a member of [NYSE FINRA SIPC](#)



Summer Stumble?

Navigating Through & Beyond with Options

Interactive Brokers

June 28, 2023

© 2023. Nasdaq, Inc. All Rights Reserved.

Kevin Davitt

Head of Index Options Content

DISCLAIMER

Index

Nasdaq® is a registered trademark of Nasdaq, Inc. The information contained above is provided for informational and educational purposes only, and nothing contained herein should be construed as investment advice, either on behalf of a particular security or an overall investment strategy. Neither Nasdaq, Inc. nor any of its affiliates makes any recommendation to buy or sell any security or any representation about the financial condition of any company. Statements regarding Nasdaq-listed companies or Nasdaq proprietary indexes are not guarantees of future performance. Actual results may differ materially from those expressed or implied. Past performance is not indicative of future results. Investors should undertake their own due diligence and carefully evaluate companies before investing. **ADVICE FROM A SECURITIES PROFESSIONAL IS STRONGLY ADVISED.**

Options

For the sake of simplicity, the examples included do not take into consideration commissions and other transaction fees, tax considerations, or margin requirements, which are factors that may significantly affect the economic consequences of a given strategy. An investor should review transaction costs, margin requirements and tax considerations with a broker and tax advisor before entering into any options strategy.

Options involve risk and are not suitable for everyone. Prior to buying or selling an option, a person must receive a copy of *Characteristics and Risks of Standardized Options*. Copies may be obtained from your broker, one of the exchanges or The Options Clearing Corporation, One North Wacker Drive, Suite 500, Chicago, IL 60606 or call 1-888-OPTIONS or visit www.888options.com.

Any strategies discussed, including examples using actual securities and price data, are strictly for illustrative and education purposes and are not to be construed as an endorsement, recommendation or solicitation to buy or sell securities.

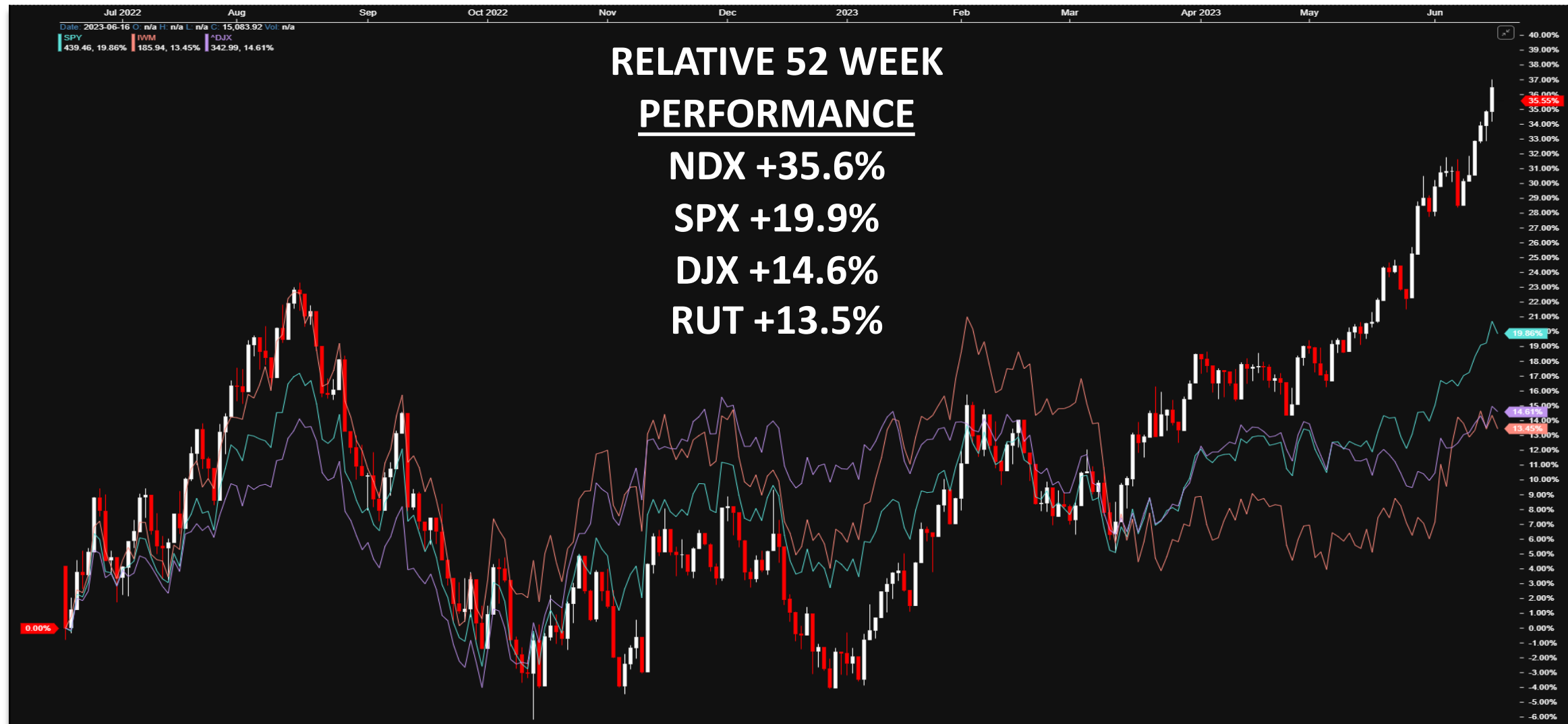
Nasdaq-100® Volatility Index

The Nasdaq-100® Volatility Index (Ticker Symbol: VOLQ) is calculated and administered by The Nasdaq Stock Market LLC. The Nasdaq-100 Volatility Index is a financial benchmark designed to measure changes in 30-day implied volatility of the Nasdaq-100 Index as further described in the methodology, rules and other information. VOLQ options, which are traded on Nasdaq Phlx LLC, are complicated financial products only suitable for sophisticated market participants. Market participants should put at risk only funds that they can afford to lose without affecting their lifestyles. Transacting in VOLQ options involves the risk of loss, which can be substantial and can exceed the amount of money deposited for a Nasdaq-100 Volatility Index position (except when buying options on VOLQ, in which case the potential loss is limited to the purchase price of the options).

Before transacting in VOLQ options, market participants should fully inform themselves about the Nasdaq-100 Volatility Index and the characteristics and risks of VOLQ Options. Market participants also should make sure they understand the product specifications for VOLQ Options and the methodologies for calculating and settling the Nasdaq-100 Volatility Index.

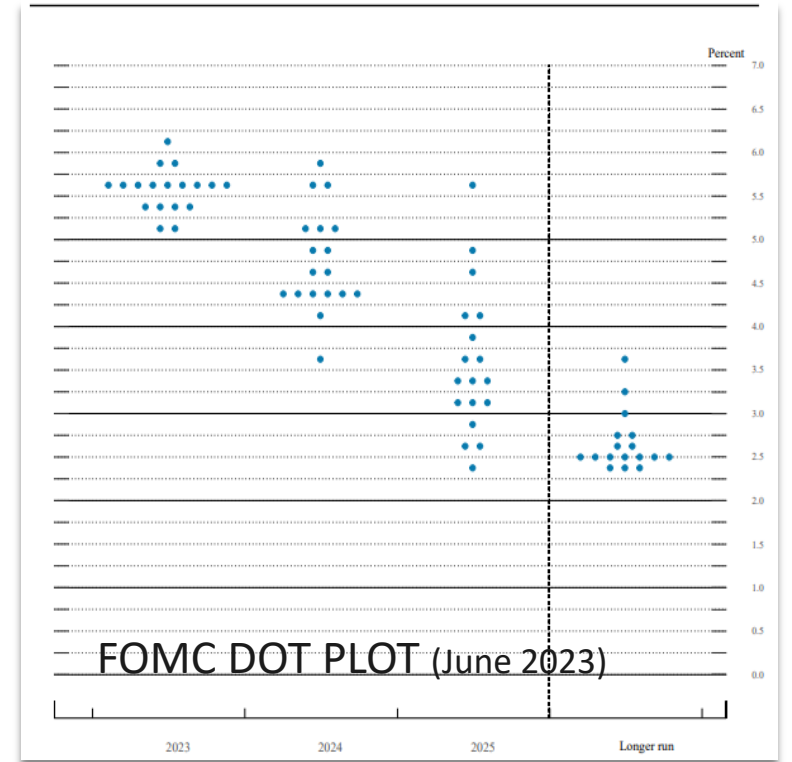


Market Update



Navigating with Options

The Stories We Tell

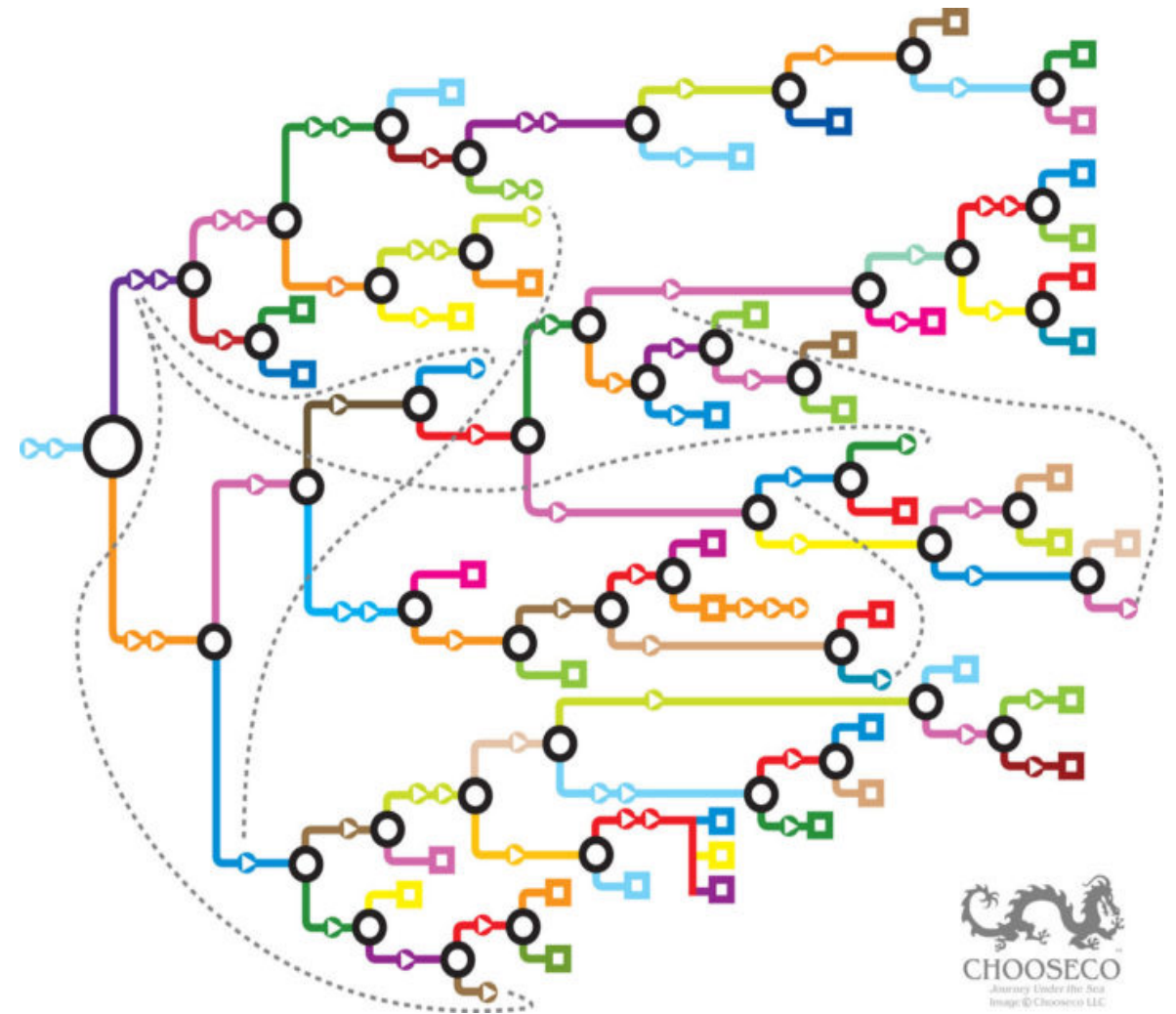


Source: Barron's, Business Insider, FOMC (June 2023)



Navigating with Options

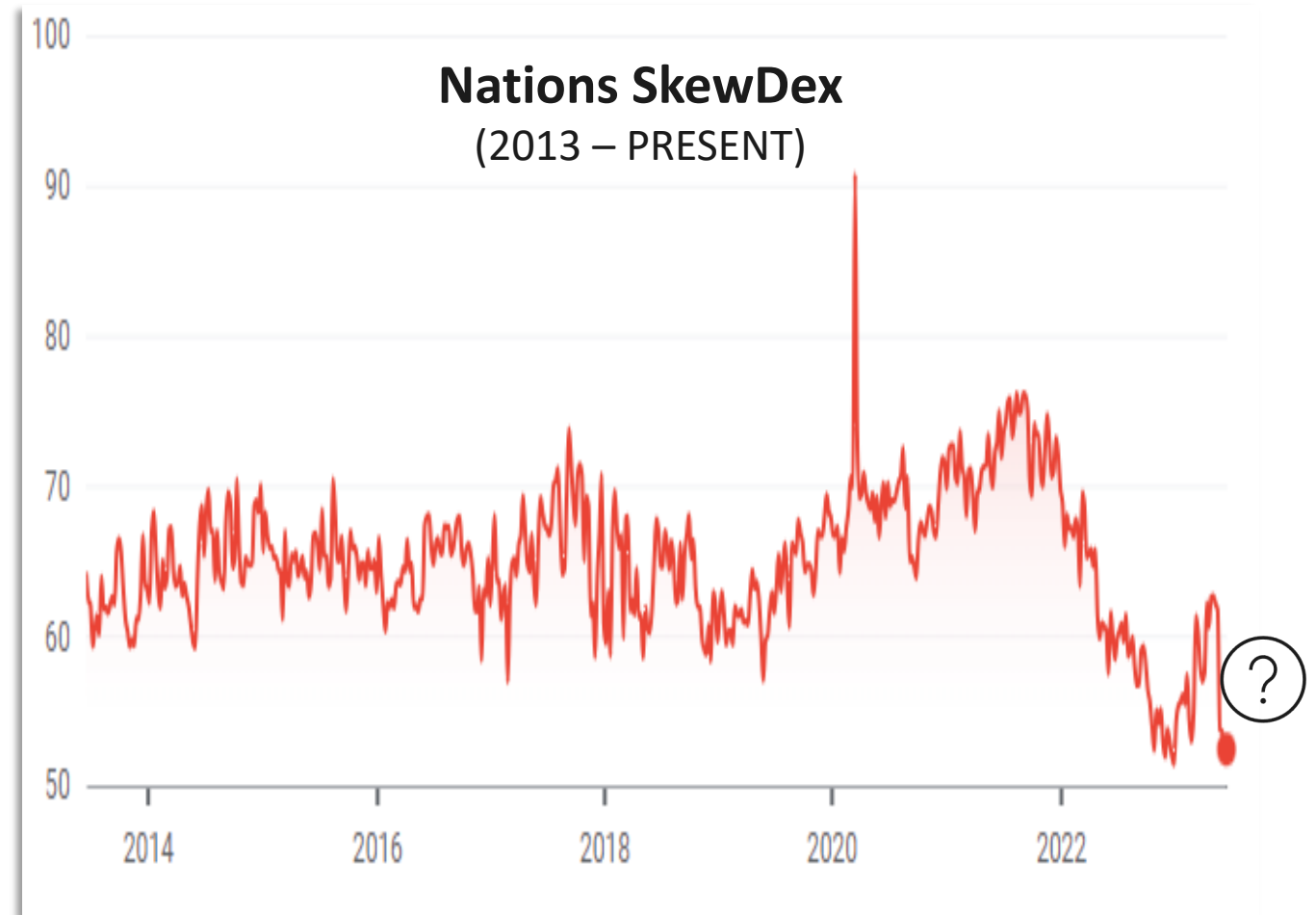
The Flexibility of Options



Source: ChooseCo LLC.

Navigating with Options Relationships

- Index Options Skew
 - Function of prevailing supply & demand dynamic in options markets.
 - Index skew tends to be positively correlated to the reference asset.
 - Skew typically when index .
- SkewDex Methodology
 - Compares cost of 1M ATM options to 1M OTM (1 Standard Dev) options.
 - Relative cost of OTM options (cost of protection).

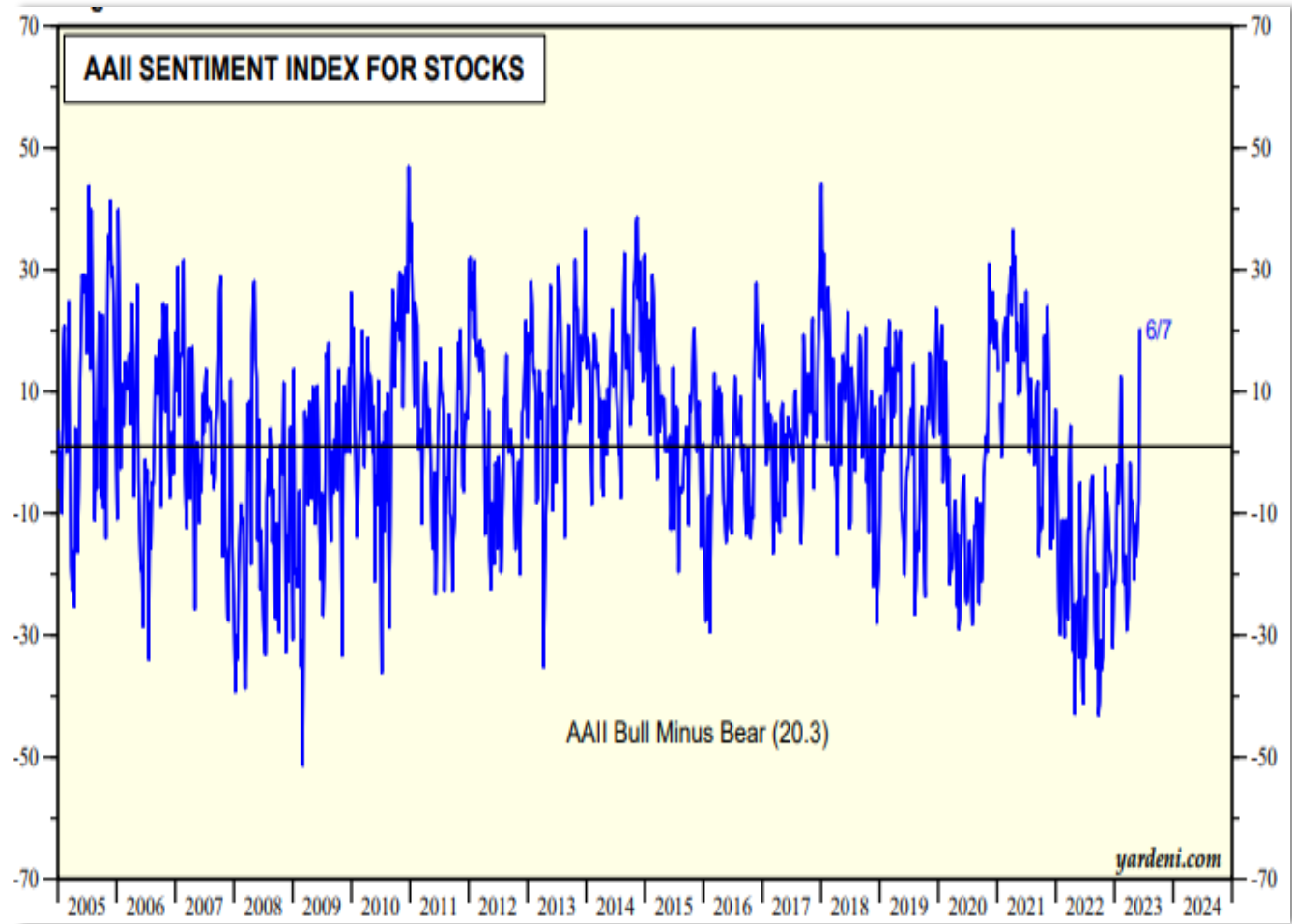


Source: Nations Indexes



Skew Collapse – Why?

- Index Options Skew
 - Sentiment shift > Demand for upside exposure.
 - The Nasdaq 100® Index arguably more reflective of shift in sector sentiment too. (AI ~ NVDA).
 - Sentiment is primarily influenced by price (Index level).
- More Specifically...
 - 1M ATM NDX IV slightly higher.
 - 1M ~16 delta NDX put IV unchanged to slightly lower.
 - Highest AAI since Nov '21.



Source: AAII & Yardeni Research

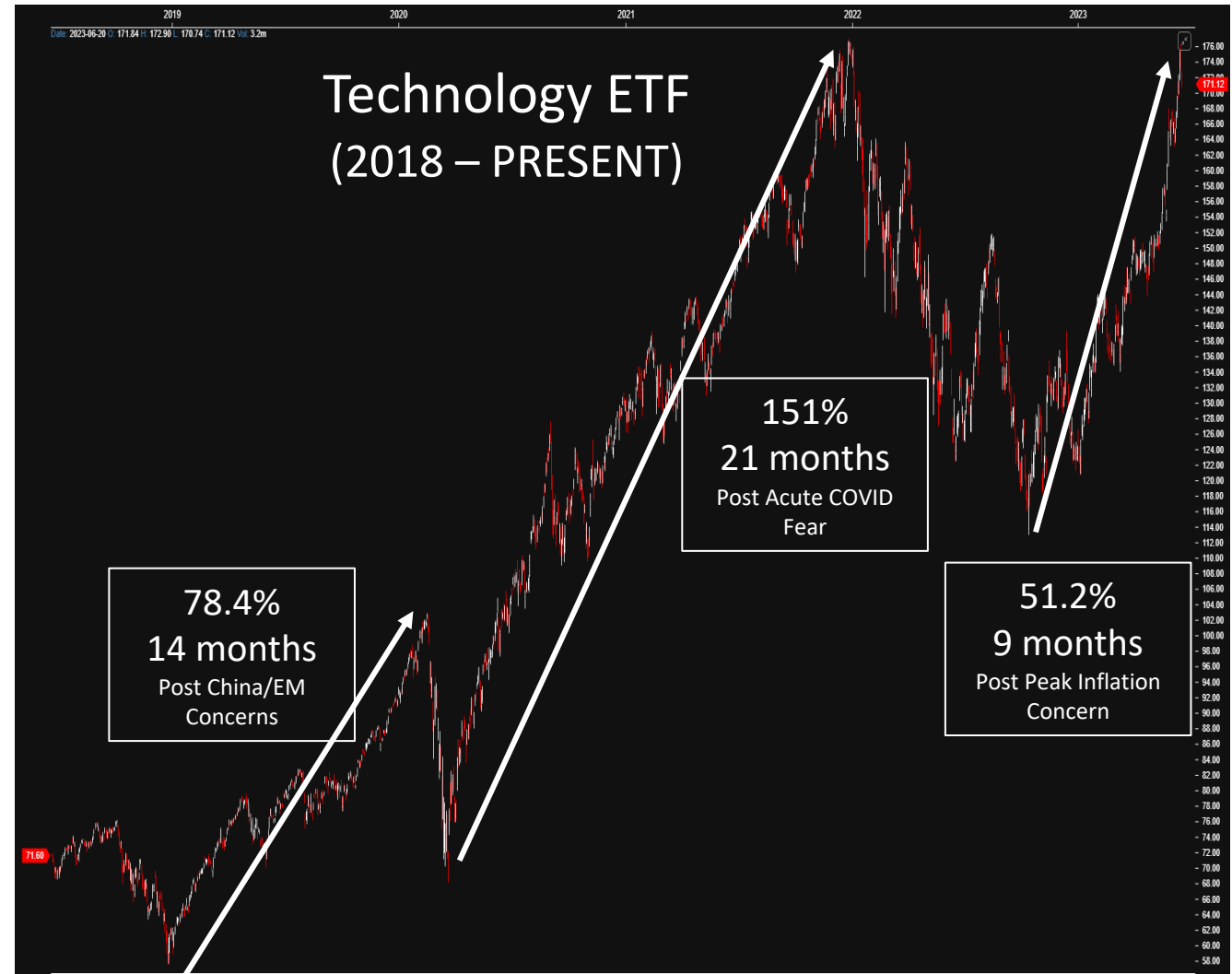


Navigating with Options

Leadership (Tech Sector ETF)

- Information Technology is King
 - Tech Sector ETF just missed new all-time highs (\$176.56 vs. \$176.30)
 - Be wary if leadership breaks lower.
- Constituents:

Symbol	Company	Weight
MSFT	Microsoft	23.96%
AAPL	Apple Inc.	22.64%
NVDA	Nvidia Corp	6.06%
AVGO	Broadcom	4.28%
CSCO	Cisco	2.52%
CRM	Salesforce	2.50%
AMD	Advanced Micro	2.3%



Source: State Street & LiveVol Pro



Navigating with Options

June OpEx Inflection?

- Cliff Notes
 - Quarterly expiries tend to have largest open interest (March/June Sept/Dec).
 - Highest equity & ETF OI since Jan '23 & June '22.
 - Highest index OI since Dec '22 & Dec '21.
- More Freedom to Roam?
 - At the institutional/dealer level – Post OpEx exposure (risk) changes.
 - Growth in short-dated index option volumes perhaps curtails?

Exp	Equities Open Interest	ETF Open Interest	Indices Open Interest	Total
2021-06	78.8	33.5	5.6	117.8
2021-07	71.6	21.2	2.8	95.6
2021-08	67.3	21.3	2.5	91.1
2021-09	70.5	29.8	5.1	105.3
2021-10	67.3	21.3	2.8	91.4
2021-11	69.8	23.0	2.7	95.5
2021-12	70.7	32.6	6.8	110.2
2022-01	135.5	39.1	3.3	177.9
2022-02	56.7	21.7	3.0	81.4
2022-03	65.5	32.8	5.4	103.7
2022-04	58.7	24.8	2.9	86.4
2022-05	62.1	26.3	2.8	91.3
2022-06	77.8	38.0	5.6	121.3
2022-07	56.1	25.8	3.1	85.0
2022-08	57.3	26.0	3.2	86.5
2022-09	68.6	35.0	5.8	109.4
2022-10	58.5	27.5	3.5	89.4
2022-11	59.8	28.3	2.7	90.8
2022-12	59.2	37.1	7.5	103.8
2023-01	132.9	42.8	3.9	179.6
2023-02	52.0	24.1	3.1	79.2
2023-03	63.3	33.5	5.7	102.5
2023-04	58.1	28.9	3.3	90.3
2023-05	52.1	22.7	3.2	78.0
2023-06	75.6	37.5	6.3	119.4

	Equities Open Interest	ETF Open Interest	Indices Open Interest	Total
Total	-2.7%	-1.3%	13.2%	-1.6%
Calls	-10.2%	-8.2%	-0.2%	-9.4%
Puts	8.45%	4.55%	22.48%	7.84%

Source: SIG



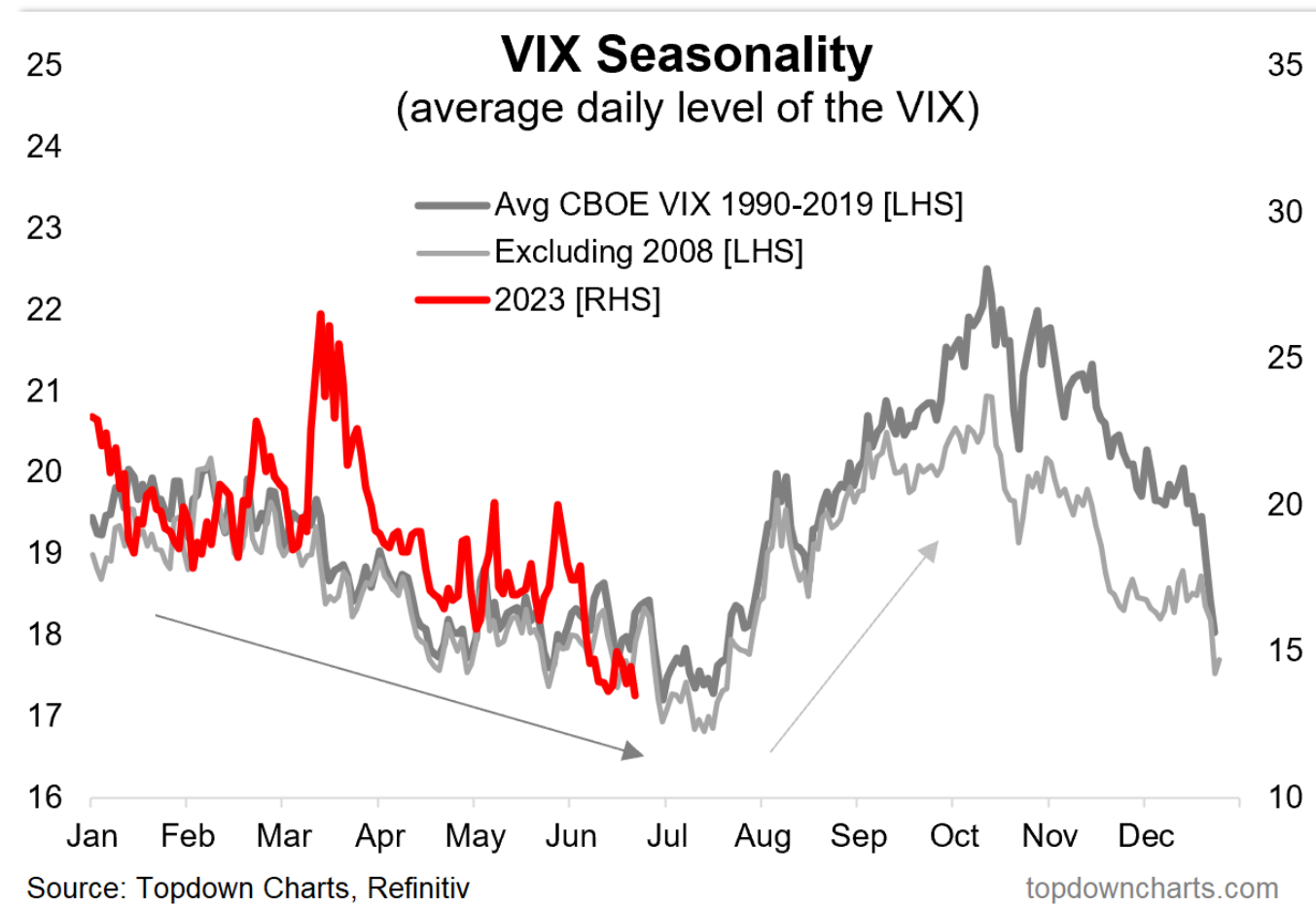
Navigating with Options

Quad Witch Inflection?



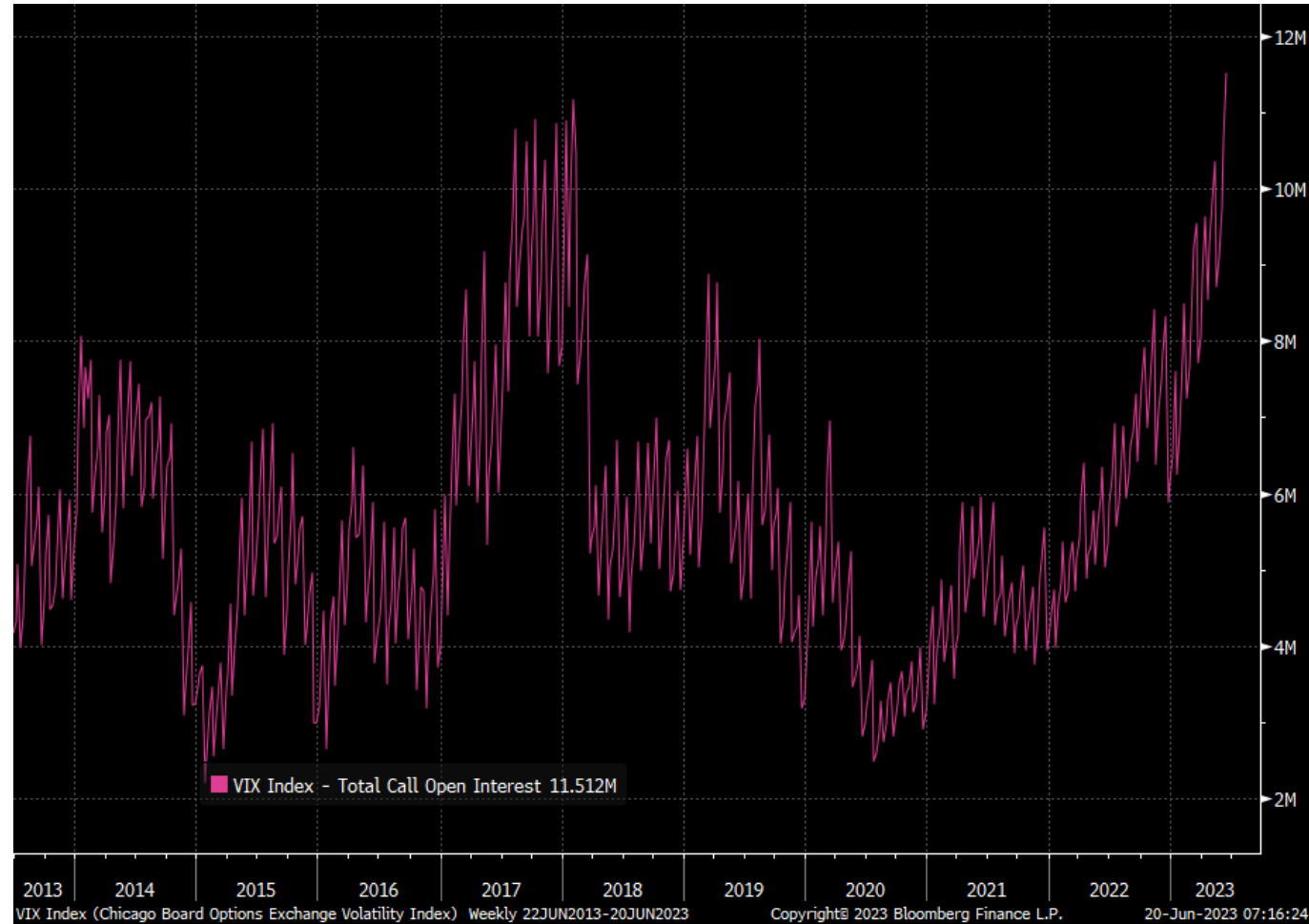
Forward Volatility Bottom Ahead?

- Does Volatility Cycle?
 - Historically speaking – fwd. vol measures (including VOLQ) tend to bottom in July.
 - **Always exceptions to seasonality!**
 - Limit short vega exposure into autumn?
- Crowded Trade Already?
 - VIX call open interest highest since late 2017.
 - Steep Index option term structure.
 - Mid-term IV already pricing potential for > swings.



Forward Volatility Bottom Ahead?

- Does Volatility Cycle?
 - Historically speaking – fwd. vol measures (including VOLQ) tend to bottom in July.
 - **Always exceptions to seasonality!**
 - Limit short vega exposure into autumn?
- Crowded Trade Already?
 - VIX call open interest highest since late 2017.
 - Steep Index option term structure.
 - Mid-term IV already pricing potential for > swings.



Source: Bloomberg

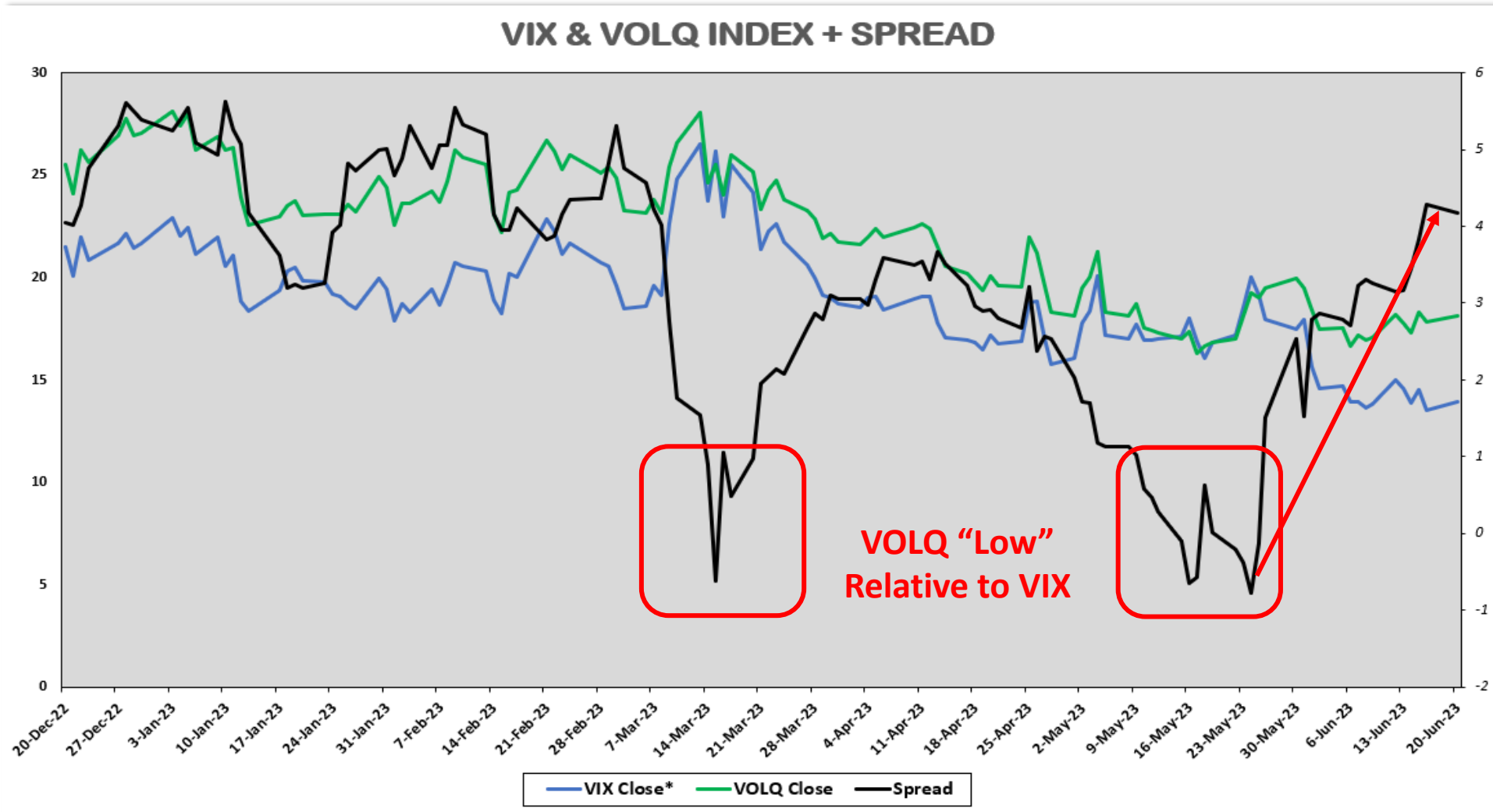


Where's the Risk Premium?

- Equity “Premium”
 - Typically, forward (Index) earnings expectations > short-term yields.
 - Over the past 18 months – Yields up considerably & earnings have slowed.
- Compensation for Risk?
 - Short-term realized + fwd. vol measures very low.
 - Indexes fractionally below all-time highs from early 2022.

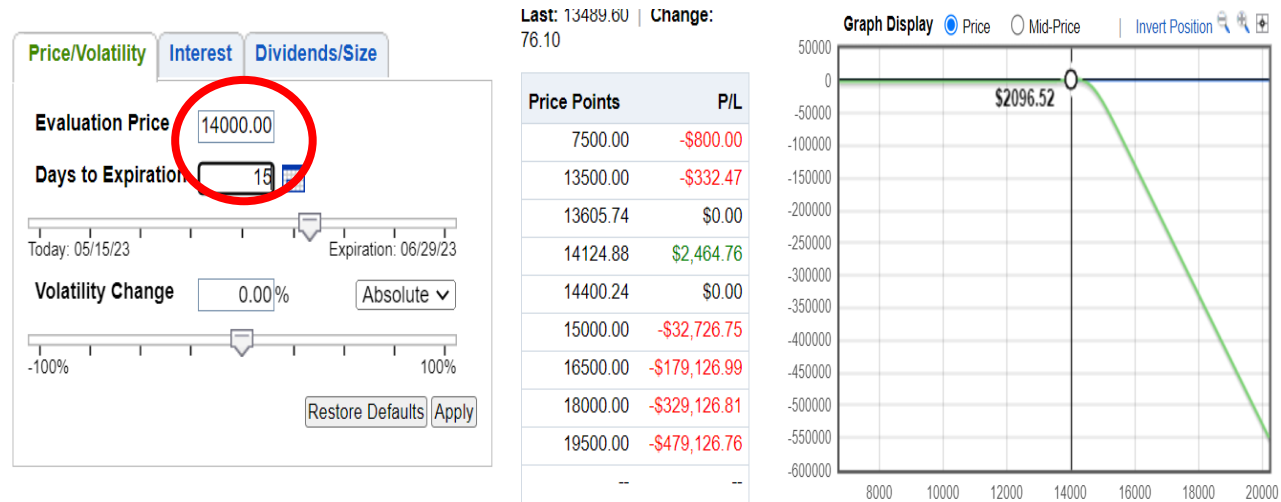


Update from Previous IBKR



Revisiting: Index Ratio Call Spread (May)

- Alternative to Call Butterfly
 - Way to express a directional bias with a lower premium than a standard call spread (Paid 8.00 for ratio v. 35.50 for call spread).
 - Affords greater flexibility for exit.
 - Will require more capital.
 - Vega risk substantially higher.



- Considerations
 - Higher margin requirements.
 - Undefined risk in one direction.
 - Can be turned into (defined risk) butterfly by purchasing (1) 14,750 call to limit upside exposure.
 - Same structure can be applied using put ratio.

Total Strategy

Bid	Mid	Ask	Delta	Gamma	Theta	Vega
4.80	7.10	9.40	-1.79	-0.01	49.27	-434.16

Buy/Sell	Quantity	Expiration/Strike	Bid	Ask	Theoretical Price	Evaluation Price
<input checked="" type="radio"/> Buy <input type="radio"/> Sell	1	Jun 30 2023 14250 Call	62.00	63.60	64.644	63.00
<input type="radio"/> Buy <input checked="" type="radio"/> Sell	2	Jun 30 2023 14500 Call	27.10	28.60	28.827	27.50

Source: Fidelity



Structured Option Strategies

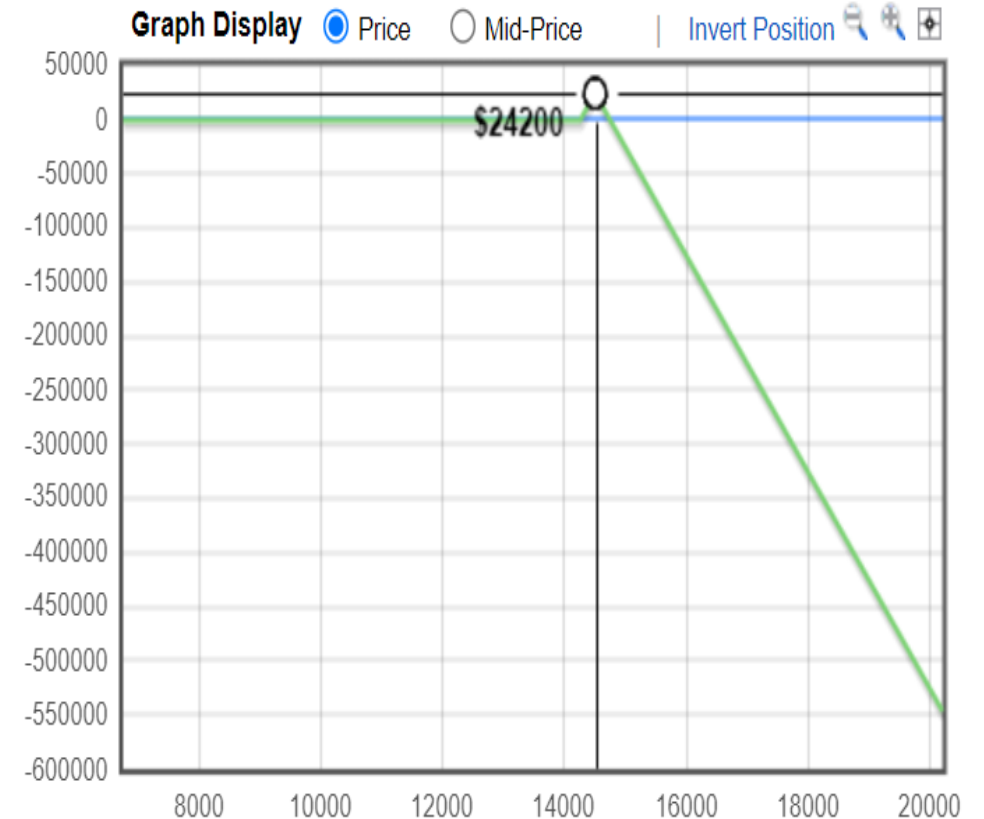
Revisiting: Index Ratio Call Spread

- Positives
 - Cost of entry – lower & in some situations zero cost/credit.
 - Risk management flexibility – easier to exit ahead of expiration or turned into butterfly.
- Negatives
 - If IV moves quickly higher or...
 - Index moves quickly in the direction of the short strike.
 - Move too early = Negative

.NDX - .NDX

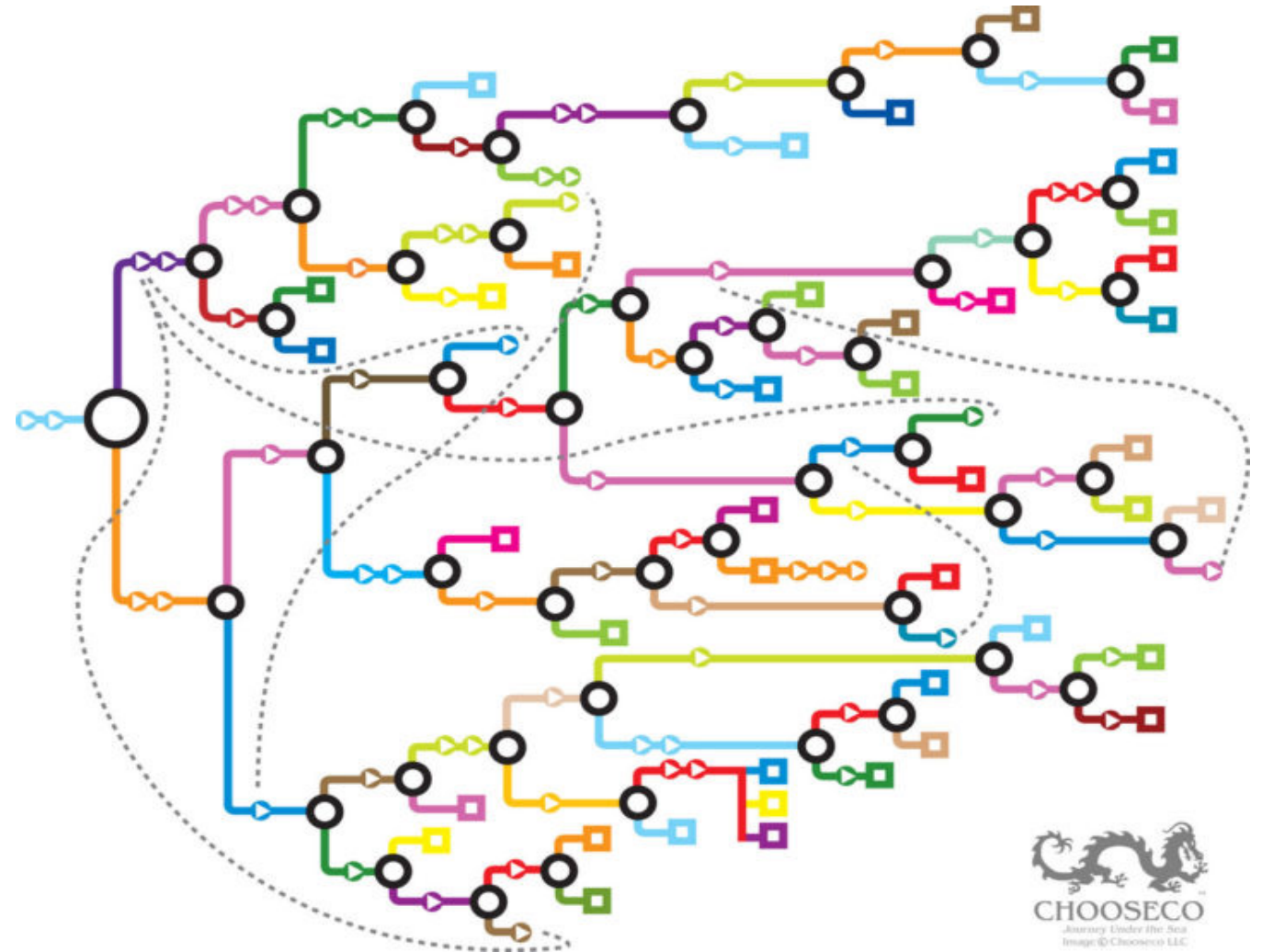
Last: 13489.60 | Change:
76.10

Price Points	P/L
7500.00	-\$800.00
14254.54	\$0.00
14500.00	\$24,200.00
14742.00	\$0.00
15000.00	-\$25,800.00
16500.00	-\$175,800.00
18000.00	-\$325,800.00
19500.00	-\$475,800.00
--	--
--	--



Risk Management – Have a PLAN!

- Alternatives are COSTLY!
 - IV moved up quickly
 - Index moved well beyond short strike.
 - Margin requirements would increase.
- Plans Protect
 - Butterfly? (Buying the 14750C) = cleanest.
 - Long deltas elsewhere?
 - Futures?
 - Stubbornness can be very costly – just ask me 😊 .



Questions?

Contact Us:

indexoptions@nasdaq.com

Nasdaq-100[®] Ecosystem:

<https://www.nasdaq.com/nasdaq-100-options-xnd-nqx-ndx-volq/>

Foreign Currency Options:

<https://www.nasdaq.com/solutions/foreign-currency-options>

