

Orlando's Outlook: Recession Watch for 2023

Presented by

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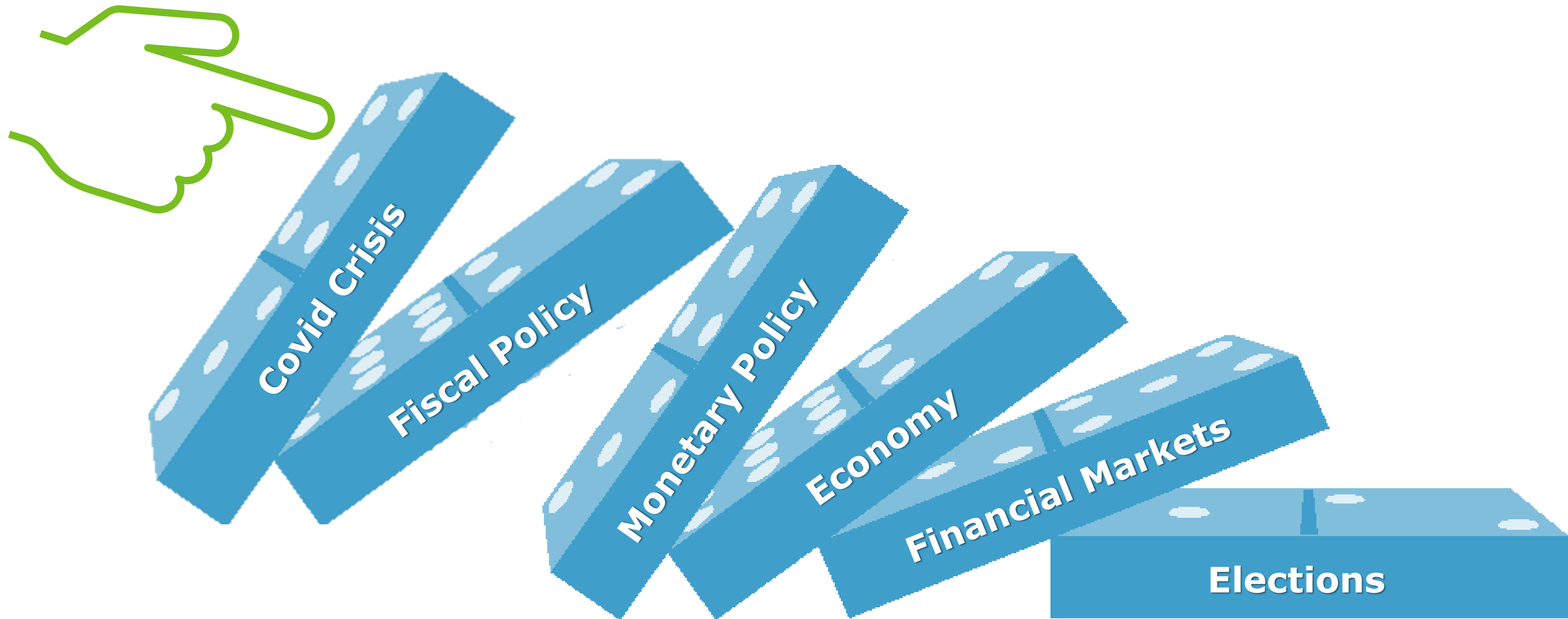
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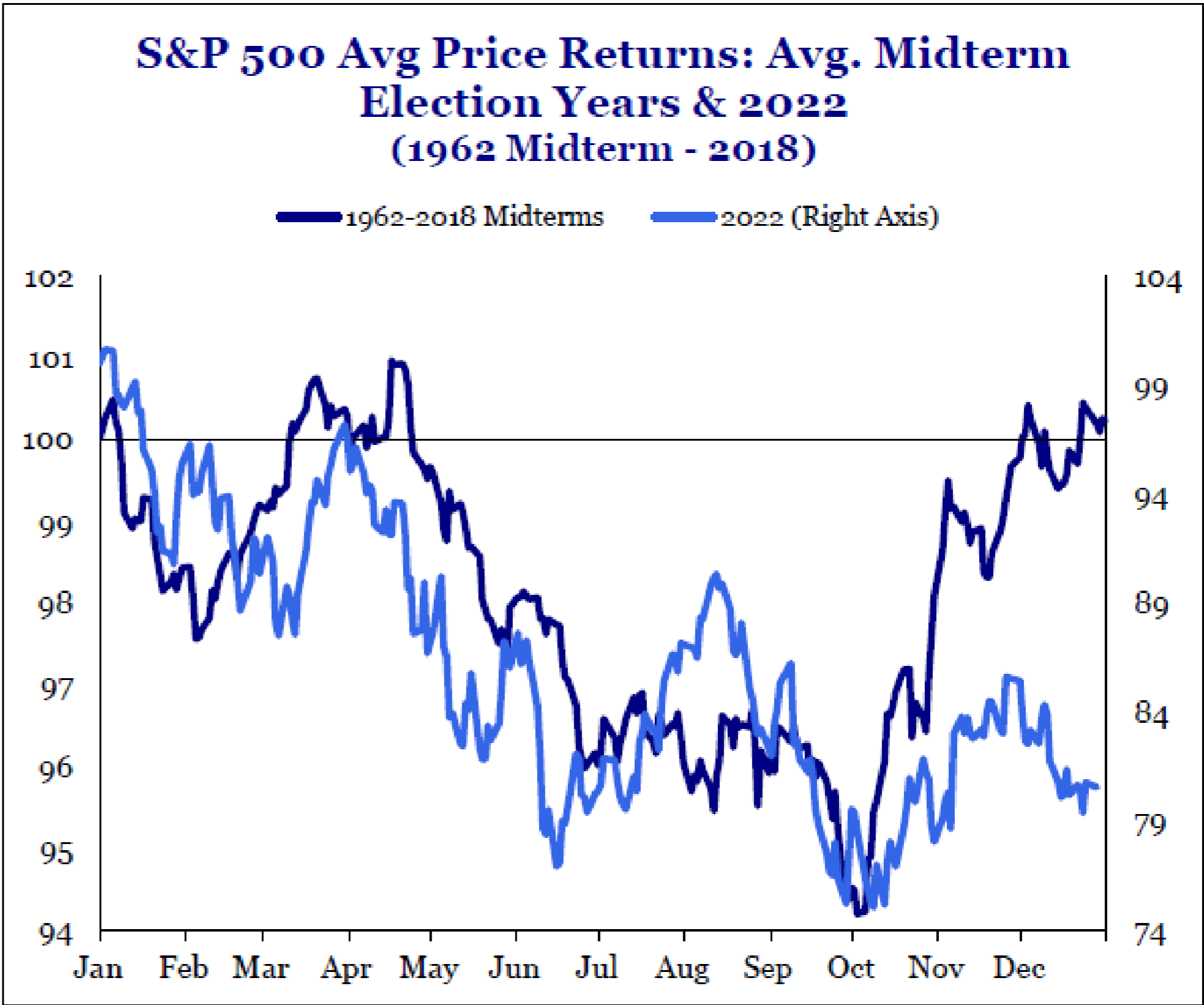
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Domino effect could topple economy into recession



2022 was a predictably volatile year

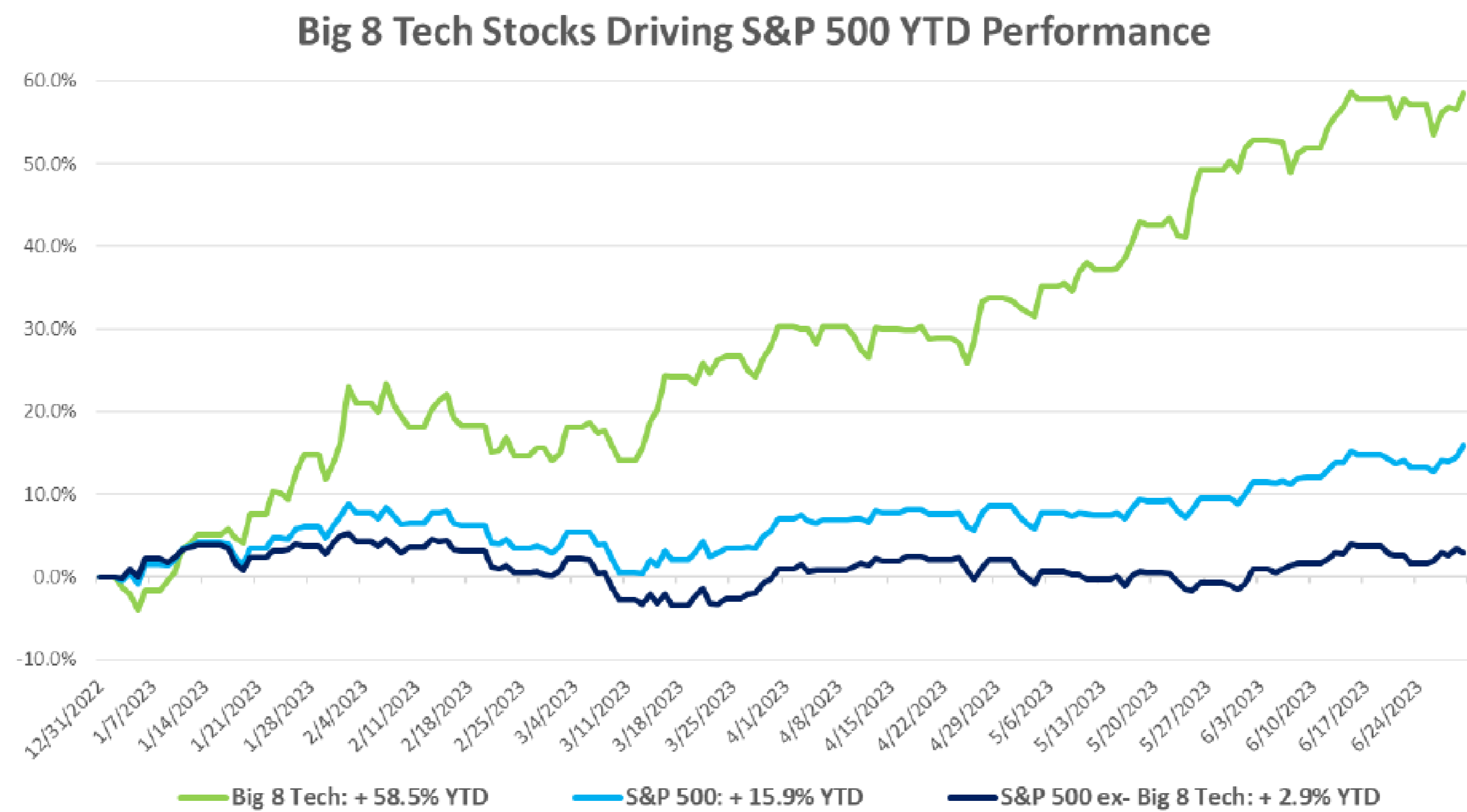
S&P 500 Returns In The Presidential Cycle Data: 12/31/44 - 12/31/2021					
Year Of Presidential Cycle	Average S&P 500 Price Return Since 1945				
	Q1	Q2	Q3	Q4	Year
Year 1	0.2%	2.8%	1.2%	4.2%	9.2%
Year 2	1.1%	-1.8%	-0.6%	6.4%	5.0%
Year 3	7.0%	4.6%	0.6%	3.4%	15.9%
Year 4	0.1%	3.3%	0.9%	2.3%	6.9%
All Years	2.0%	2.2%	0.5%	4.0%	9.2%



Source: Strategas as of January 3, 2023. Past performance is no guarantee of future results.

Equity market returns driven by Big Tech

Significant divergence between big tech and the rest of the market



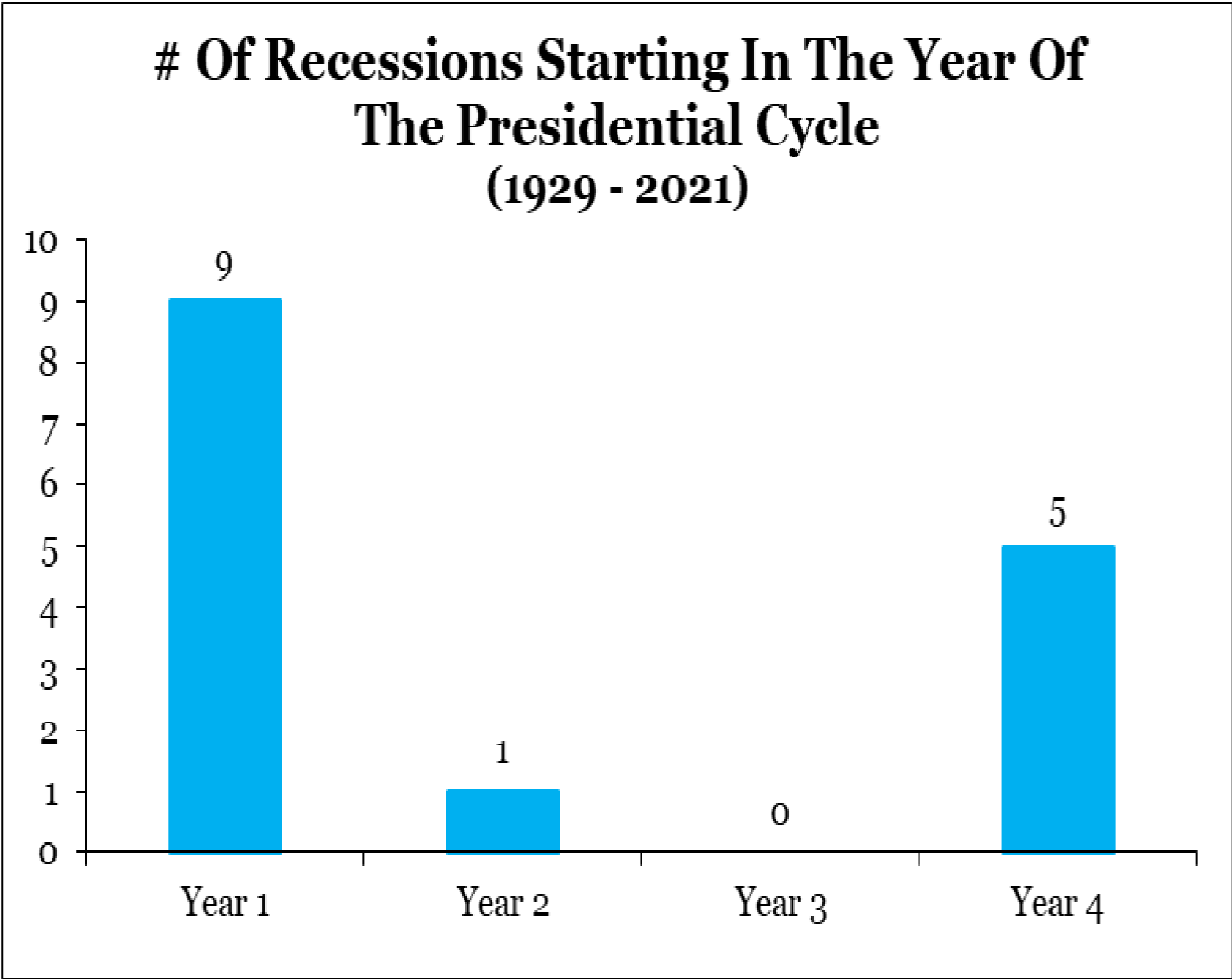
Big 8 Tech Stocks - Current S&P 500 Weights								
Apple	Microsoft	Alphabet	Amazon	NVIDIA	Tesla	Meta	Netflix	Total
7.7%	6.8%	3.6%	3.1%	2.8%	1.9%	1.7%	0.5%	28.2%

Note: Performance displays price return, not total return.
Source: Federated Hermes, Bloomberg as of June 30, 2023.

Debt-Ceiling Drama – we dodged a bullet

- Treasury hits \$31.4 trillion debt ceiling in January 2023
- Treasury Secretary Yellen has estimated an “X-date” of June 5
- President Biden and Senate Majority Leader Schumer want a clean lifting of the debt ceiling with no concessions.
- House Speaker McCarthy notes that unnecessary fiscal policy stimulus of \$5 trillion over the previous two years has resulted in the worst inflation in 40 years at 9.1% and an unsustainable total debt-to-GDP ratio of 123%.
- House passes the “Limit, Save & Grow Act” in April to lift the debt ceiling by \$1.5 trillion through March 2024 and reduce the federal debt by \$4.8 trillion. Several key components:
 - Claw back an estimated \$200 billion in unused and unspent COVID relief funds
 - Return nondefense discretionary spending to fiscal 2022 levels and implement 10-year spending caps with 1% annual growth
 - Repeal Biden’s signature 2022 Inflation Reduction Act (IRA), which spent \$1.4 trillion on climate and healthcare programs, added 80,000 new IRS agents, and increased corporate tax rates
 - Impose modest work requirements on some government benefit programs, such as food stamps, for able-bodied, childless adults
 - Prohibit student-debt cancellation
 - Tighten border security and expand traditional energy production

Political cycles are important for the economy and stocks

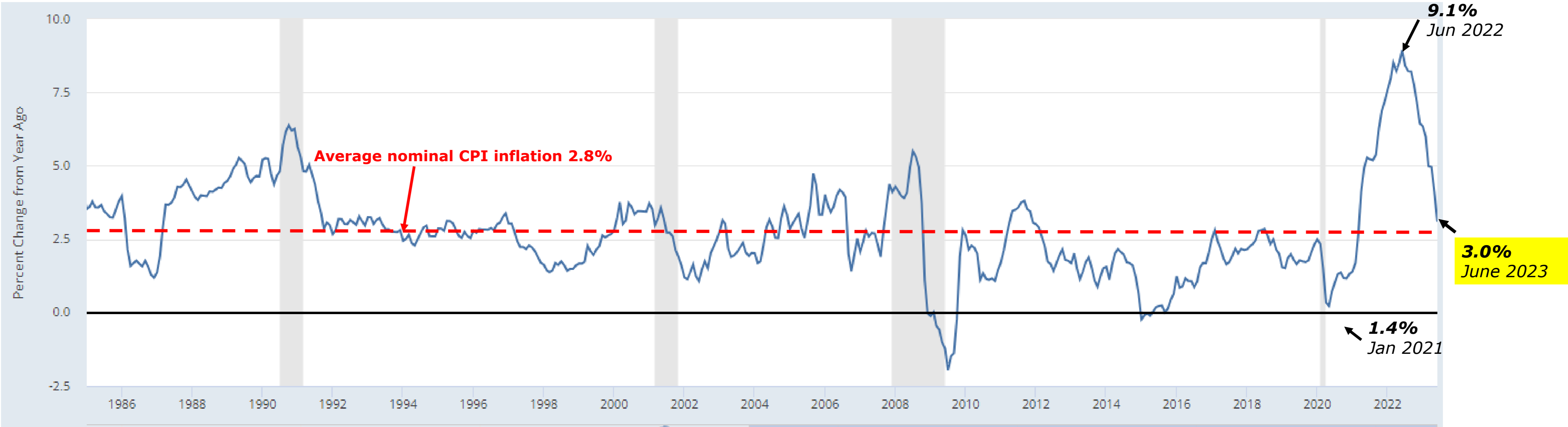


*Financial Crisis/Great Recession considered Jan 2008 (Year 4) start.

Source: Strategas Research Partners as of September 28, 2022. Past performance is no guarantee of future results.

Nominal CPI rose from 1.4% y/y in January 2021 to a 41-year high of 9.1% in June 2022

Consumer Price Index
(percent change at annual rate, monthly)



Note: Shaded areas indicate recessions.
Source: FRED Economic Data and Bureau of Labor Statistics as of July 20, 2023.

Sharp divergence between declines in Headline and Core inflation (y/y)

Federal Reserve likely to remain hawkish and patient on interest rates

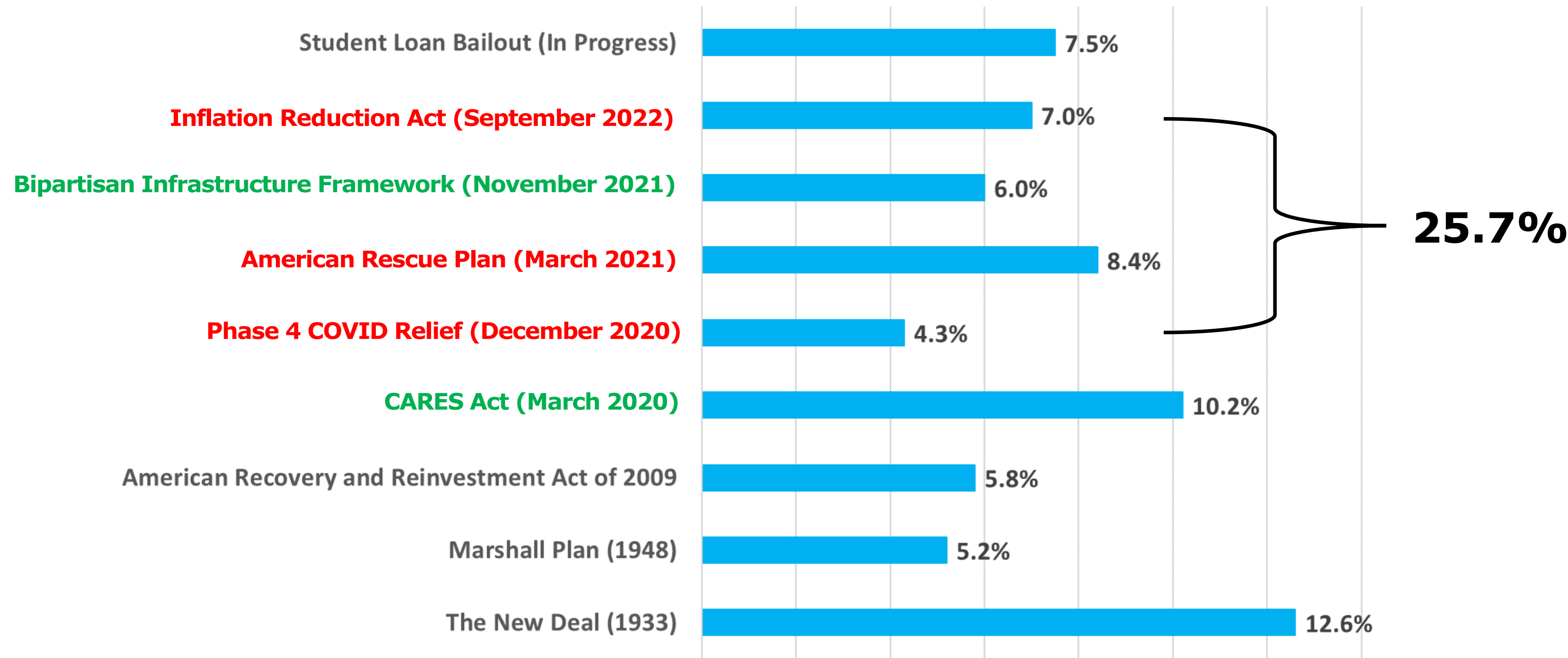
Consumer Price Index (CPI)					Personal Consumption Expenditure Index (PCE)			
Headline		Core			Headline		Core*	
Peak	9.1%	(June '22)	6.6%	(Sept. '22)	7.0%	(June '22)	5.4%	(Feb. '22)
Current	3.0%	(June '23)	4.8%	(June '23)	3.8%	(May '23)	4.6%	(May '23)
Change	(6.1%)		(1.8%)		(3.2%)		(0.8%)	
Time	12 Months		9 Months		11 Months		15 Months	
Change/ Month	(0.51%)		(0.20%)		(0.29%)		(0.05%)	
Headline/Core Change/Month Ratio		2.6:1			5.8:1			

*Federal Reserve’s preferred measure of inflation. In its June 2023 Summary of Economic Projections, the Fed estimates that core PCE will approximate 2.2% by year-end 2025, for an average monthly decline of (0.08%).

Source: Bloomberg and Federated Hermes as of July 20, 2023.

Historic Fiscal Policy

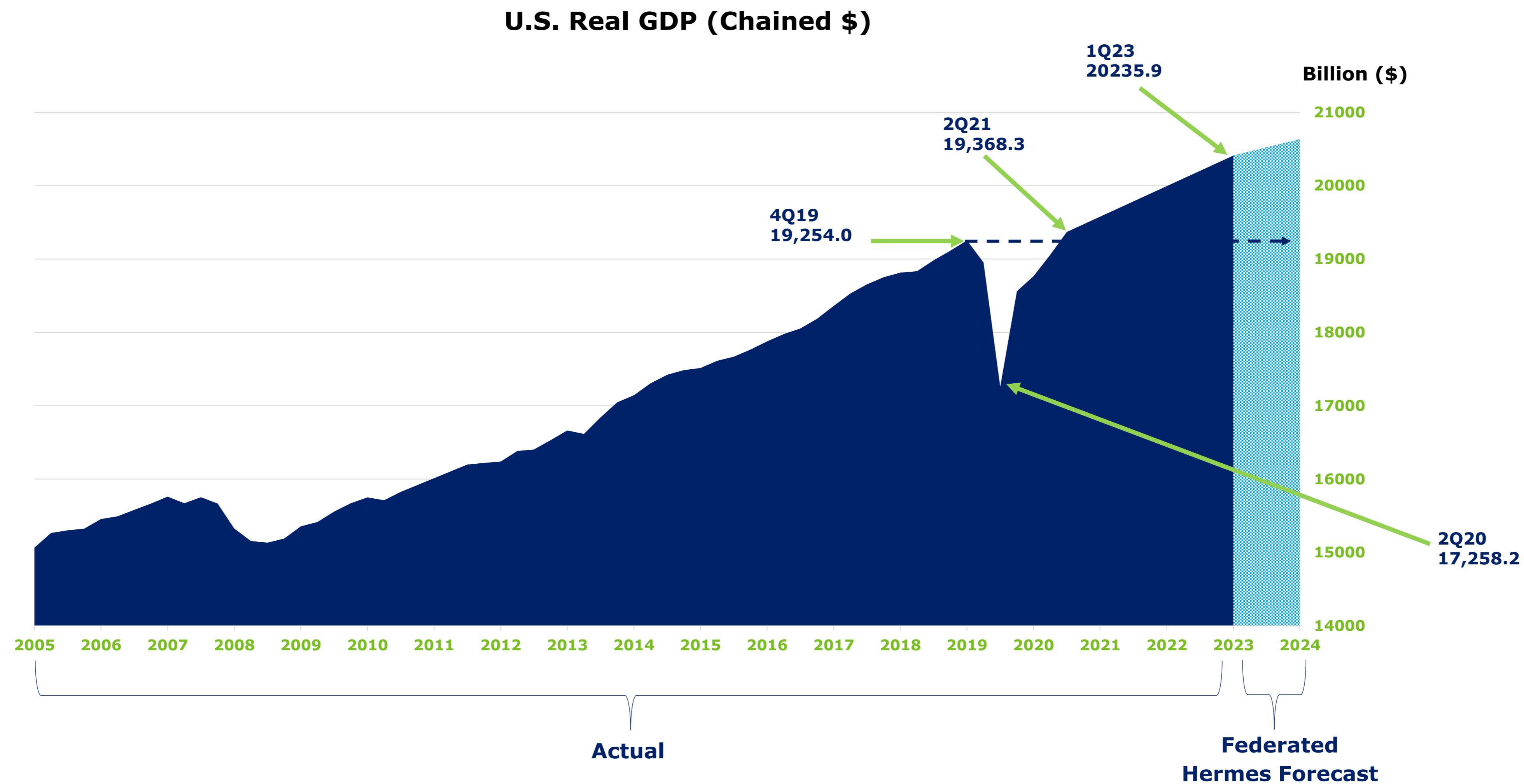
Select Stimulus as a Percentage of US GDP



Source: Axios and Crown and Company. November 1, 2021. Federated Hermes as of January 18, 2023.

The recovery is complete: GDP output gap fully closed in 2Q21

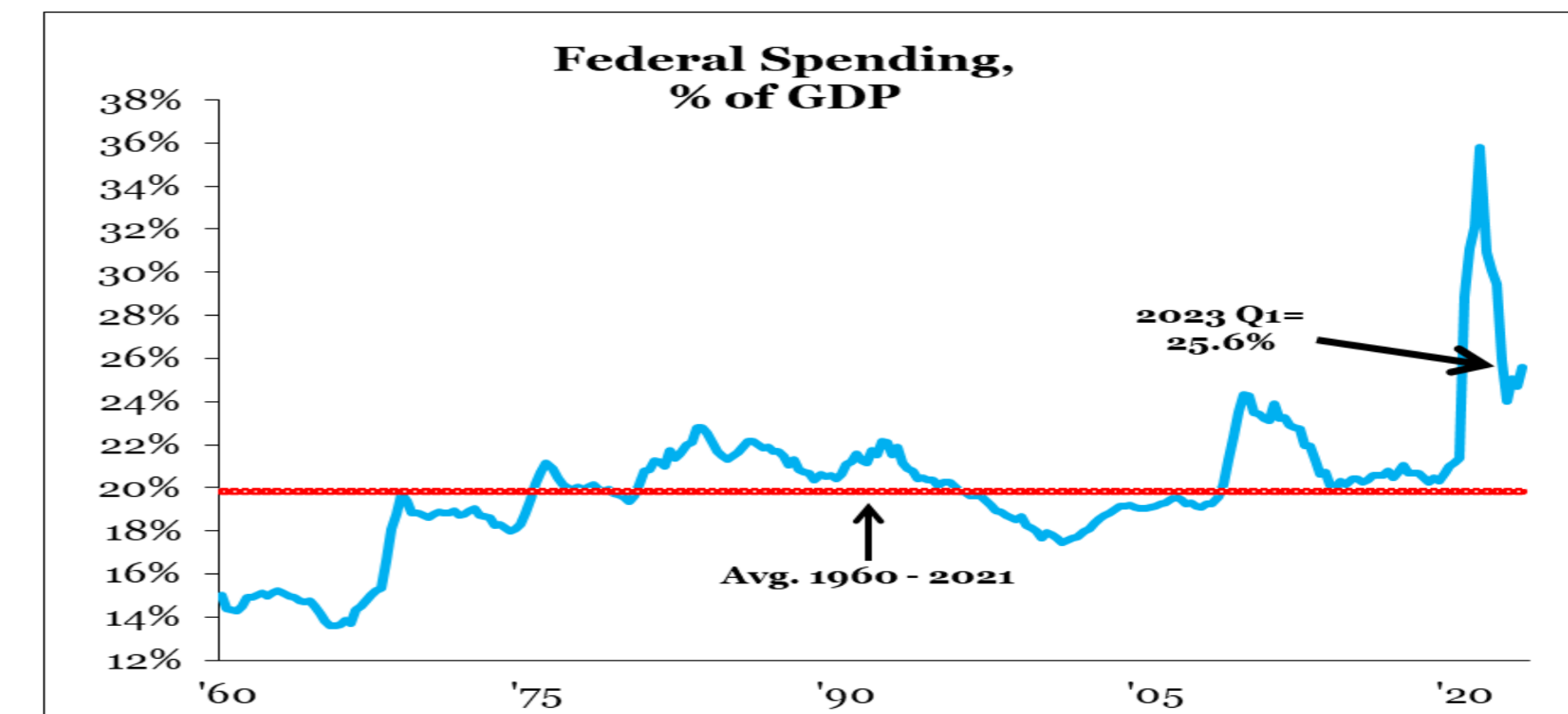
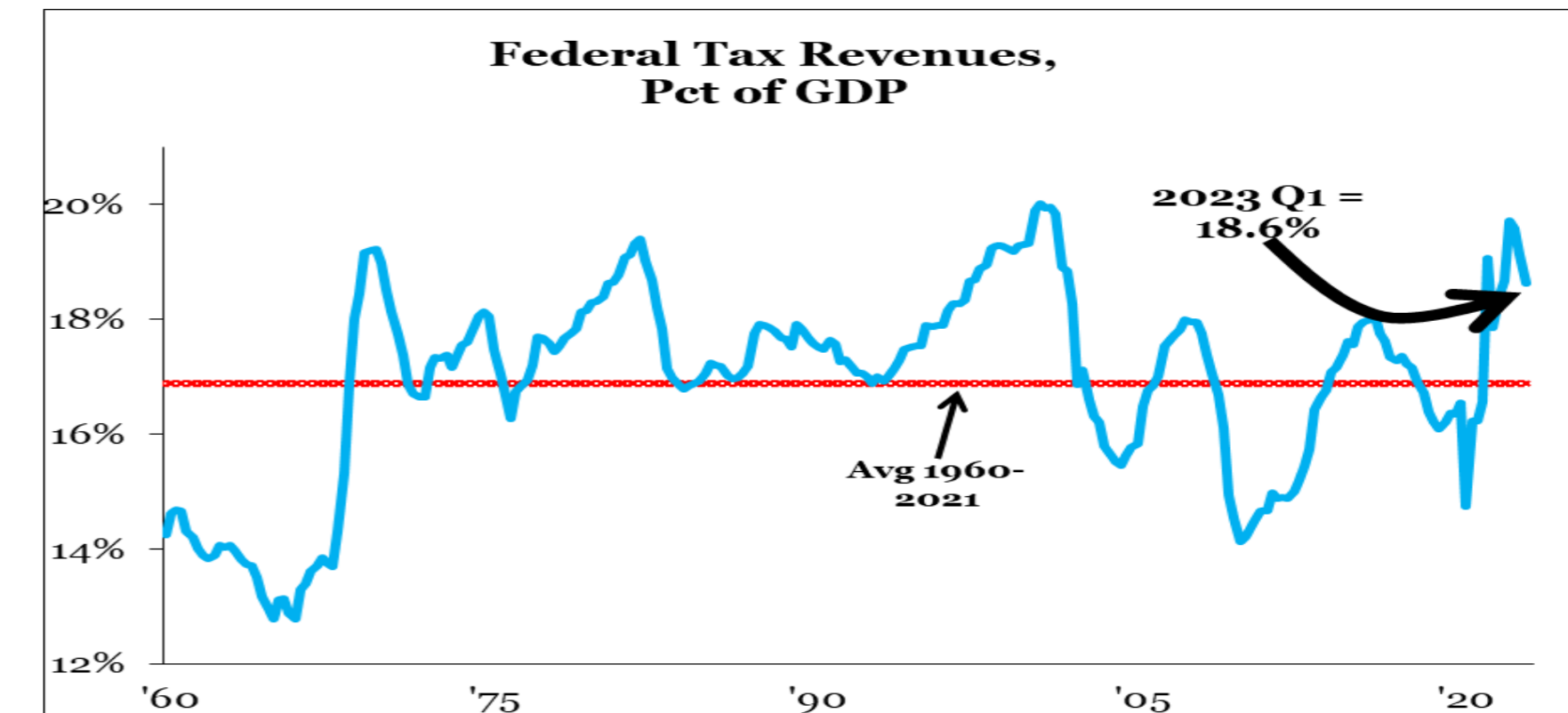
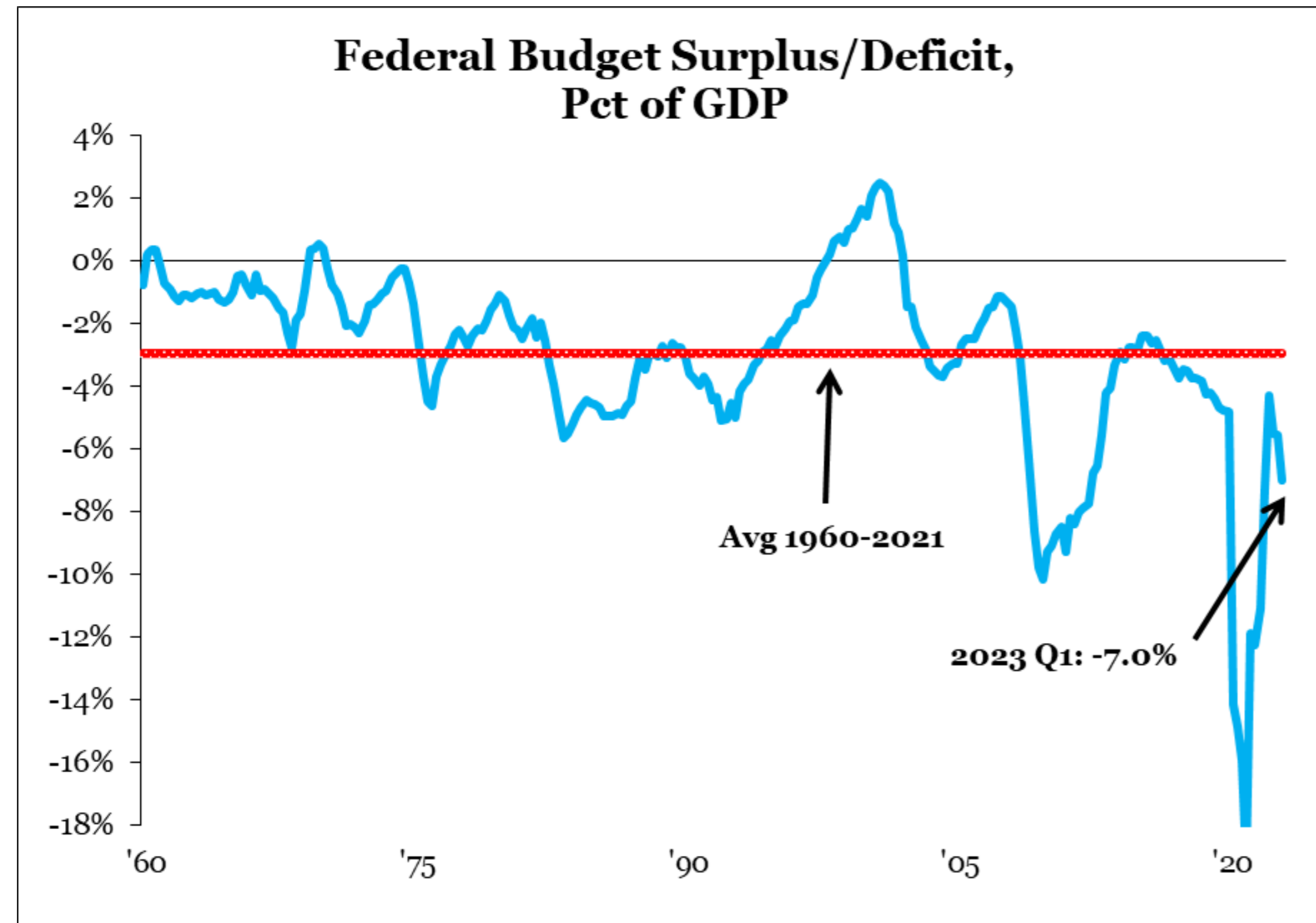
The V-shaped recovery has transitioned to a new economic expansion



Source: Bloomberg & Federated Hermes. As of May 23, 2023.

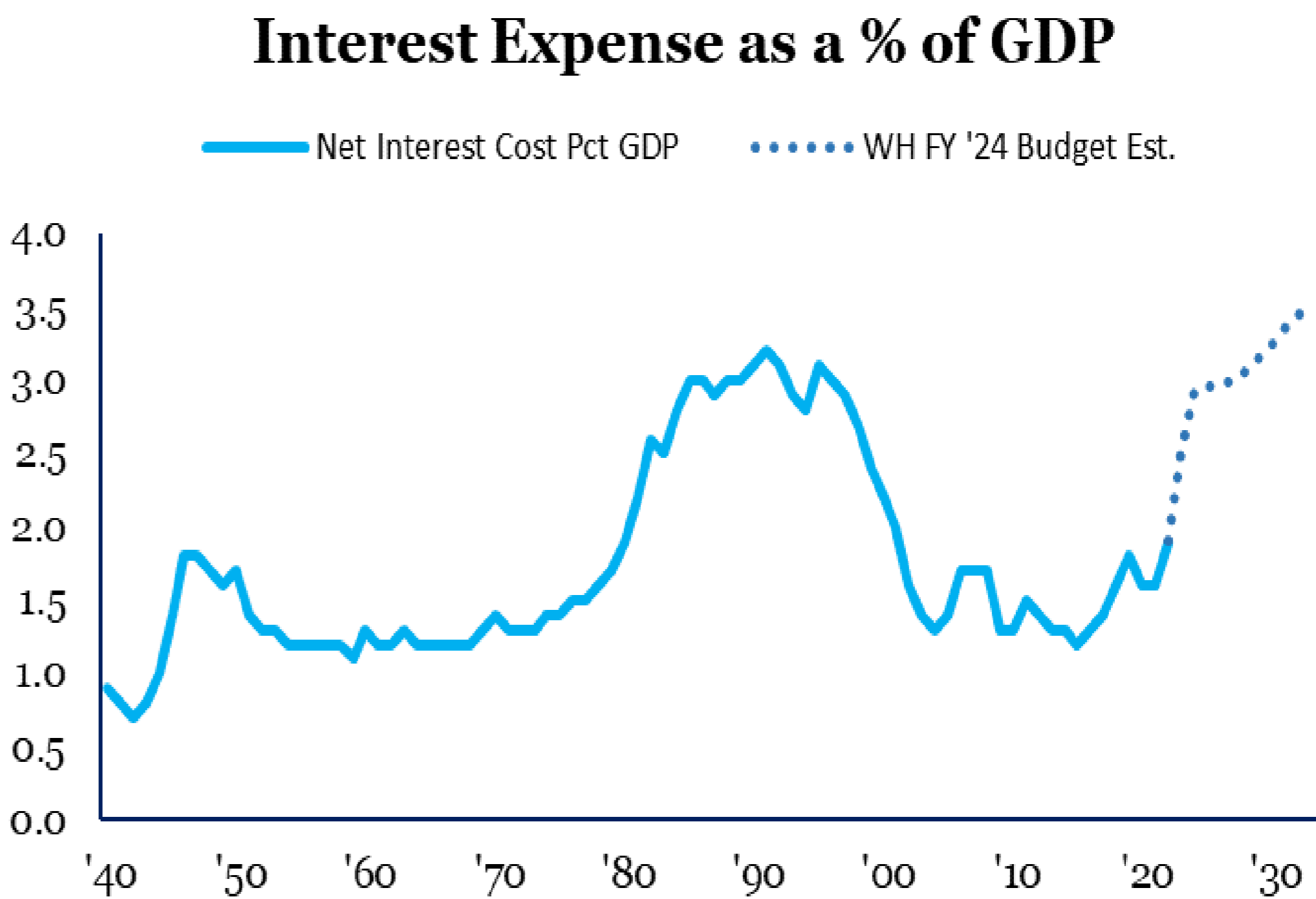
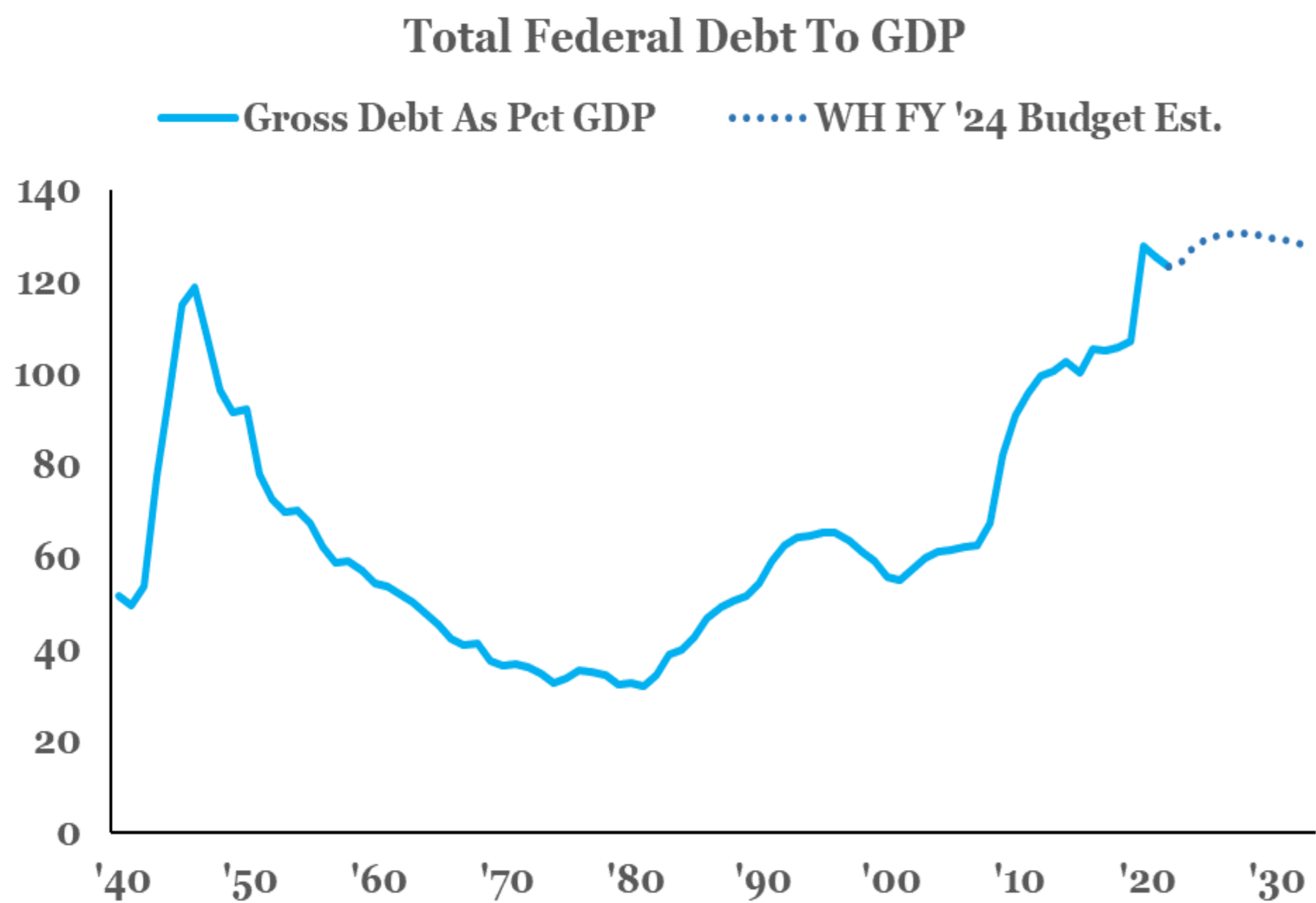
We have a spending problem, not a tax problem

Fiscal deficit driven by excessive spending, not a lack of tax revenues



The total federal debt is a growing problem

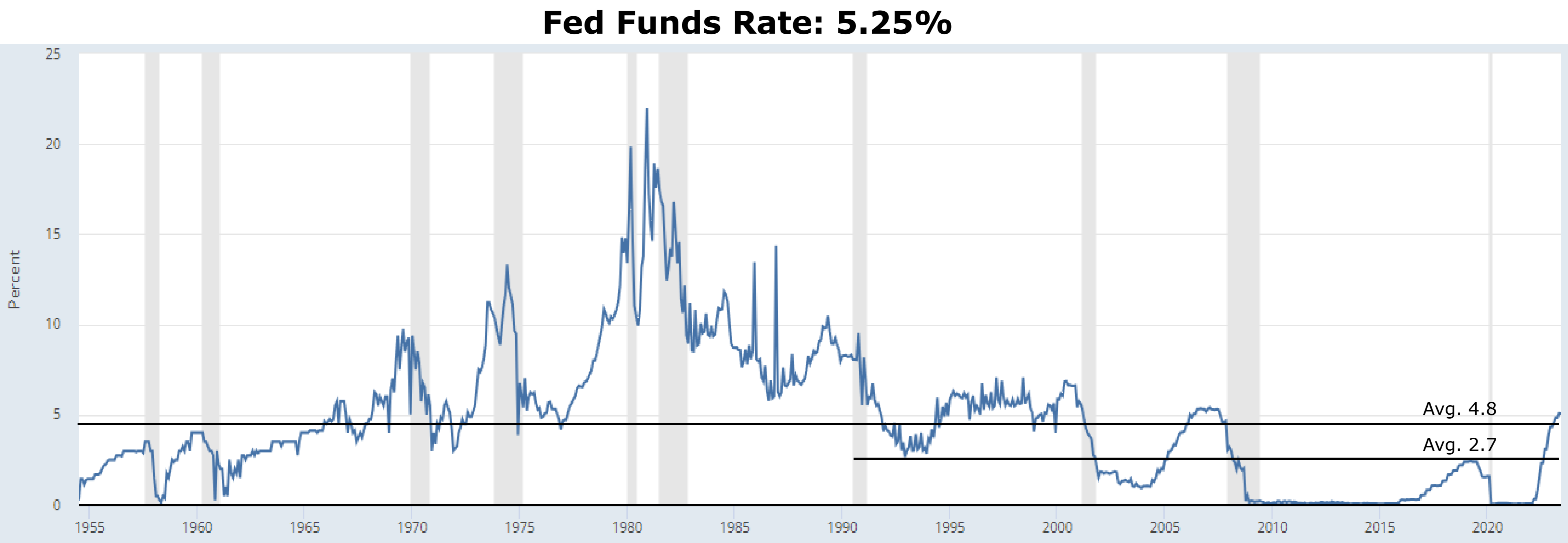
While debt levels have risen sharply, low rates mean that the interest burden has fallen dramatically



Federal Debt Held by Public (3/31/23)	\$25.6 trillion
Federal Debt Held by Fed Gov't Accounts (1/31/23)	\$6.8 trillion
Gross Federal Debt (2/10/23)	\$31.5 trillion
Federal Reserve Balance Sheet (4/26/23)	\$8.6 trillion
Current \$ GDP (LTM avg thru 1Q23)	\$25.9 trillion
Total Debt/GDP Ratio	122%

Source: Strategas Research Partners as of April 12, 2023. Federated Hermes as of May 23, 2023.

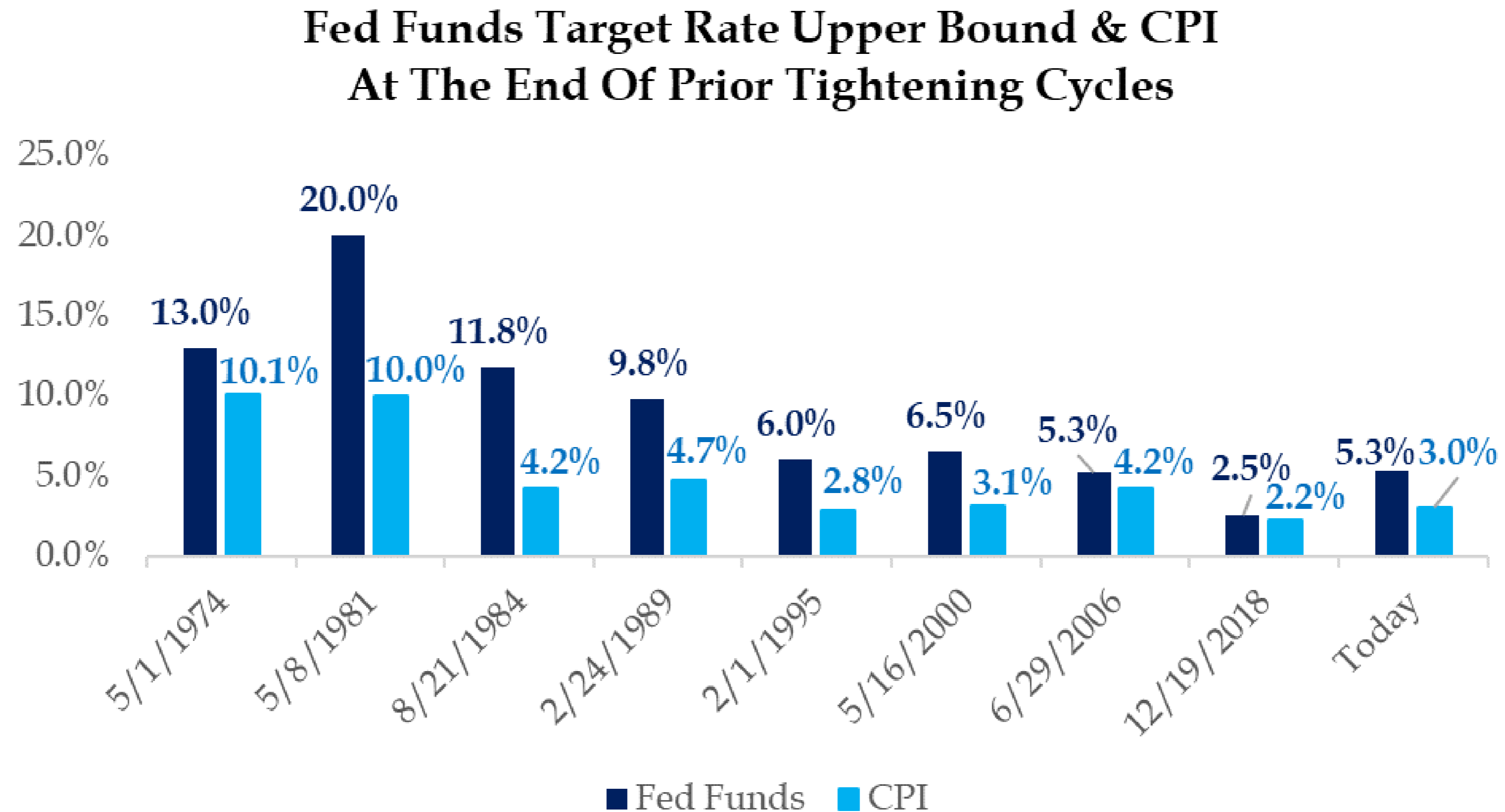
Fed's first hike typically precedes next recession by several years



Note: Shaded areas indicate recessions. Fed Funds Rate refers to the upper band.
Source: FRED Economic Data as of June 27, 2023.

A primary prerequisite for Fed easing:

Positive real rates



Who will replace Brainard as Fed Vice Chair?

Fed Chair

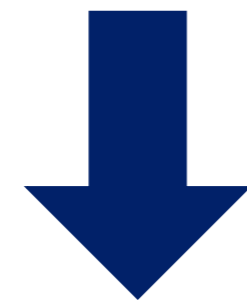


Jerome Powell, J.D.

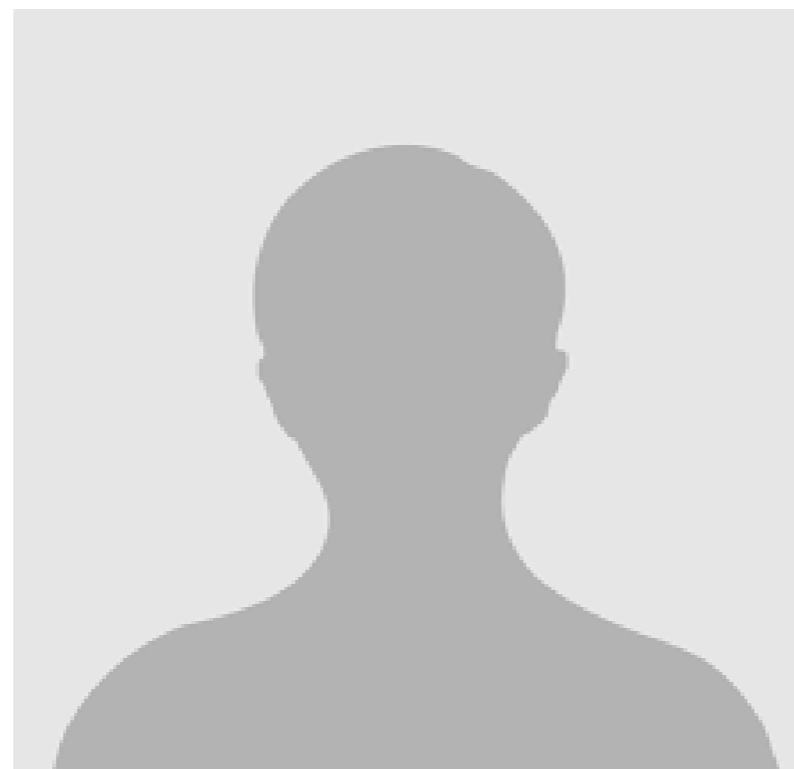
Former Vice Chair



Dr. Lael Brainard, Ph.D.



Vice Chair

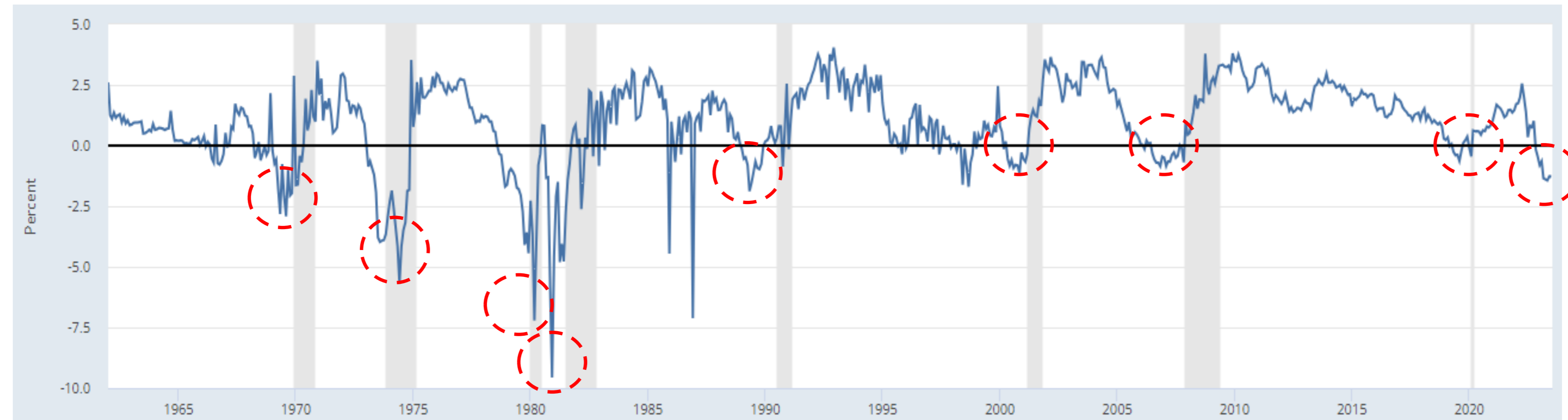


?

- Former Federal Reserve Vice Chair Dr. Lael Brainard has started her new position as White House National Economic Council Director, replacing Brian Deese.
- Now the process to replace her at the Federal Reserve begins.
- Appointments are typically driven by who can get confirmed by the Senate, where the Democrats currently hold the majority at 51.
- Nominee to replace the Vice Chair:
 - Dr. Philip Jefferson, Ph.D.
- Nominees for the Board of Governors:
 - Dr. Adriana Kugler, Ph.D.
 - Dr. Lisa Cook, Ph.D.
- Will the new balance of power within the Board of Governors potentially alter the Fed's current hawkish direction on monetary policy?

Inverted yield curve typically forecasts recessions by 1-2 years

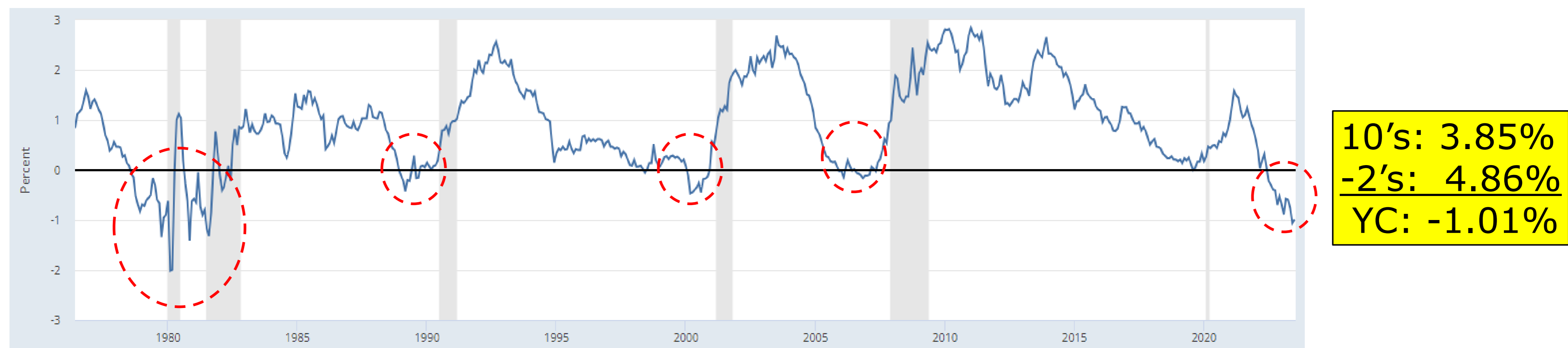
10-Year Treasury Constant Maturity Minus Federal Funds Rate



10's: 3.85%
-FF: 5.25%
YC: -1.40%

Historical 2/10 spread an excellent precursor for impending recession

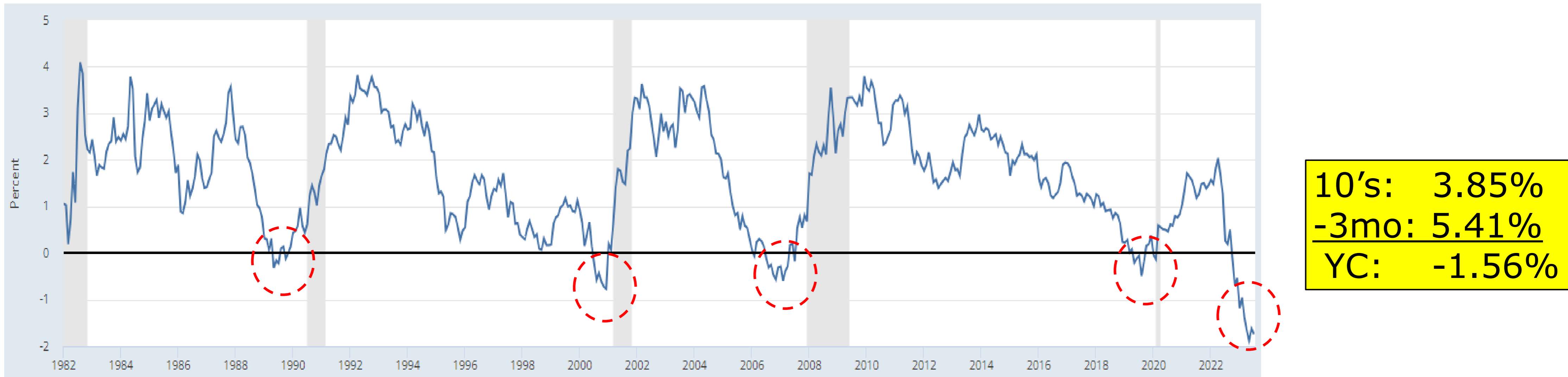
10-Year Treasury Constant Maturity Minus 2-Year Treasury Constant Maturity



Note: Shaded areas indicate recessions.
Source: FRED Economic Data as of July 20, 2023.

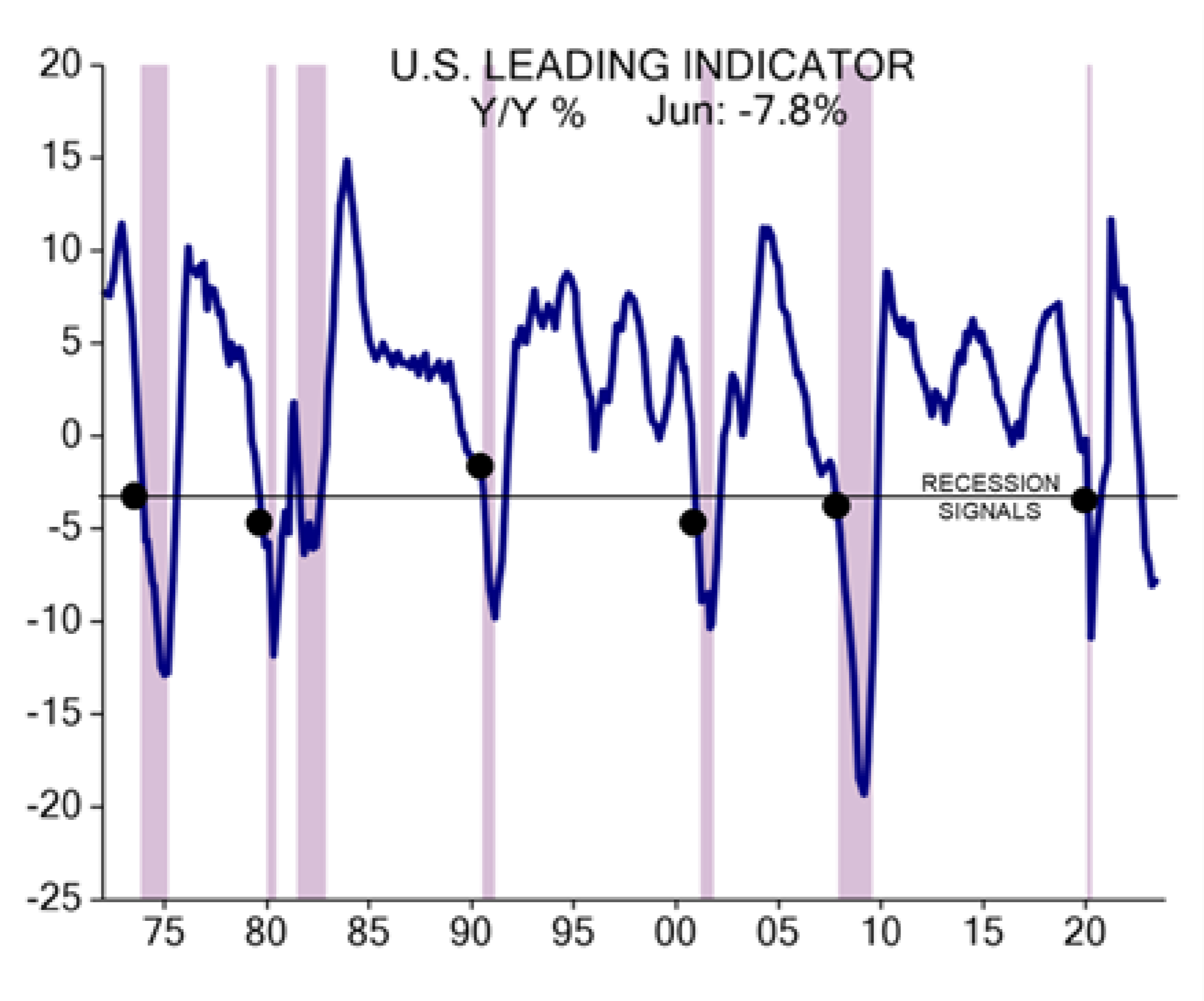
But is the 3-month/10-year curve a better signal?

10-Year Treasury Constant Maturity Minus 3-Month Treasury Constant Maturity



Note: Shaded areas indicate recessions.
Source: FRED Economic Data as of July 20, 2023.

Leading Economic Index (LEI) Recession Signal



Note: Shaded areas indicate recessions.
Source: Evercore ISI as of July 20, 2023.

Inflation and the price of gasoline are major drivers of recession

Energy/GDP Leverage Rule of Thumb:

Every 1 cent change in the retail price of gasoline @ pumps = an inverse change of \$1.18 billion in consumer discretionary spending

Daily nat'l avg. reg. unleaded gasoline price (Nov. 22, 2020) -- \$2.11/gal (trough)

Daily nat'l avg. reg. unleaded gasoline price (June 13, 2022) -- \$5.02/gal (peak)

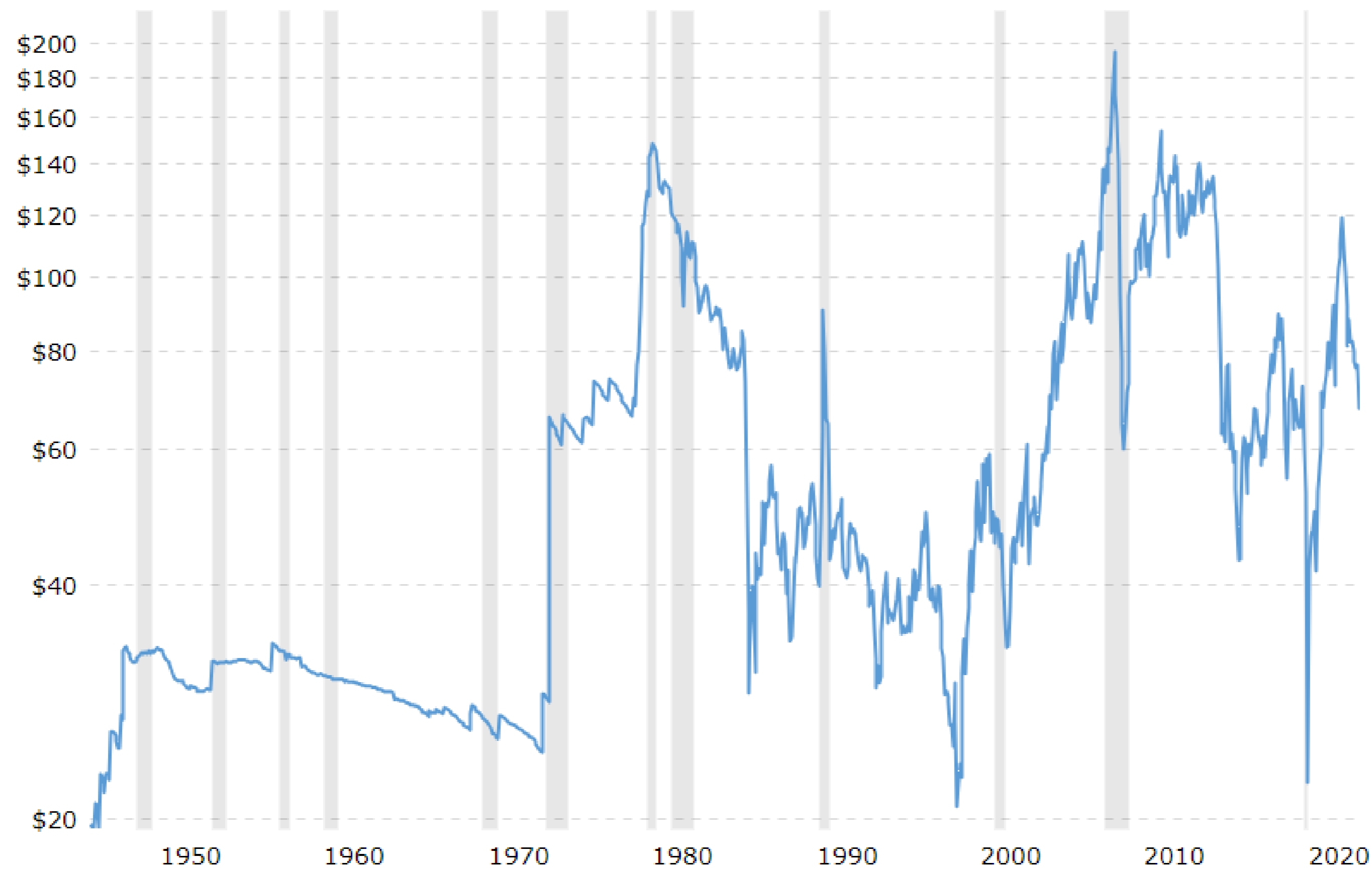
Delta – 138% increase \$2.91/gal

291 X \$1.18 billion = \$343.4 billion reduction in consumer discretionary spending

Divided by \$20.2 trillion (1Q23 Chained \$ GDP in U.S.) = 1.70% reduction in consumer spending

Divided by 70% (% of GDP for which consumer spending accounts) = 2.43% reduction in overall GDP annualized

Strong historical correlation between oil price spikes and subsequent recessions



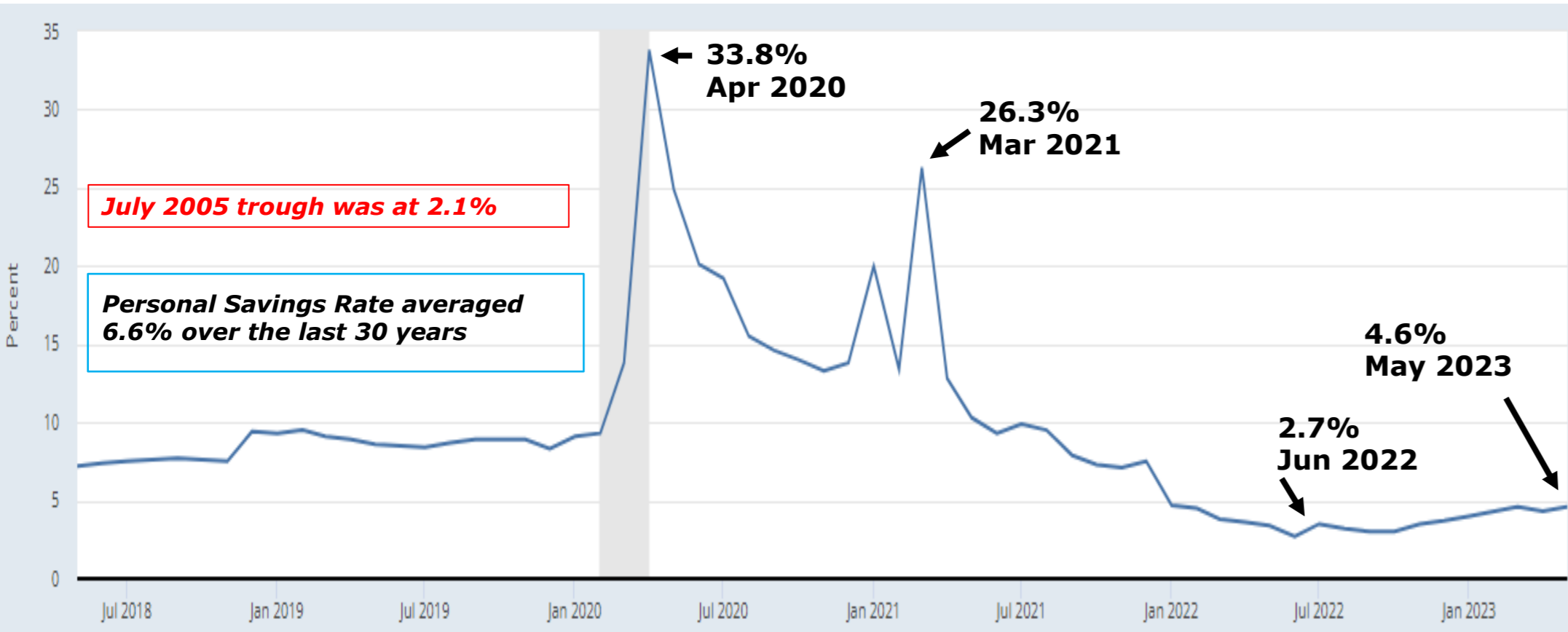
Note: Shaded areas indicate recessions.
Source: Macrotrends.net as of June 29, 2023.

Energy roundtrip in 2023?

- U.S. dollar weakness contributes to rising commodity prices
- EU & US price caps at \$60 a barrel result in less Russian production for G-7
- OPEC+ cuts crude oil production by 4.66 million barrels per day
- U.S. mismanagement of energy exploration & production and drawdown of Strategic Petroleum Reserve (SPR) by half for political reasons
- Potentially difficult weather
- China emerges from COVID lockdowns

Personal balance sheets are under pressure

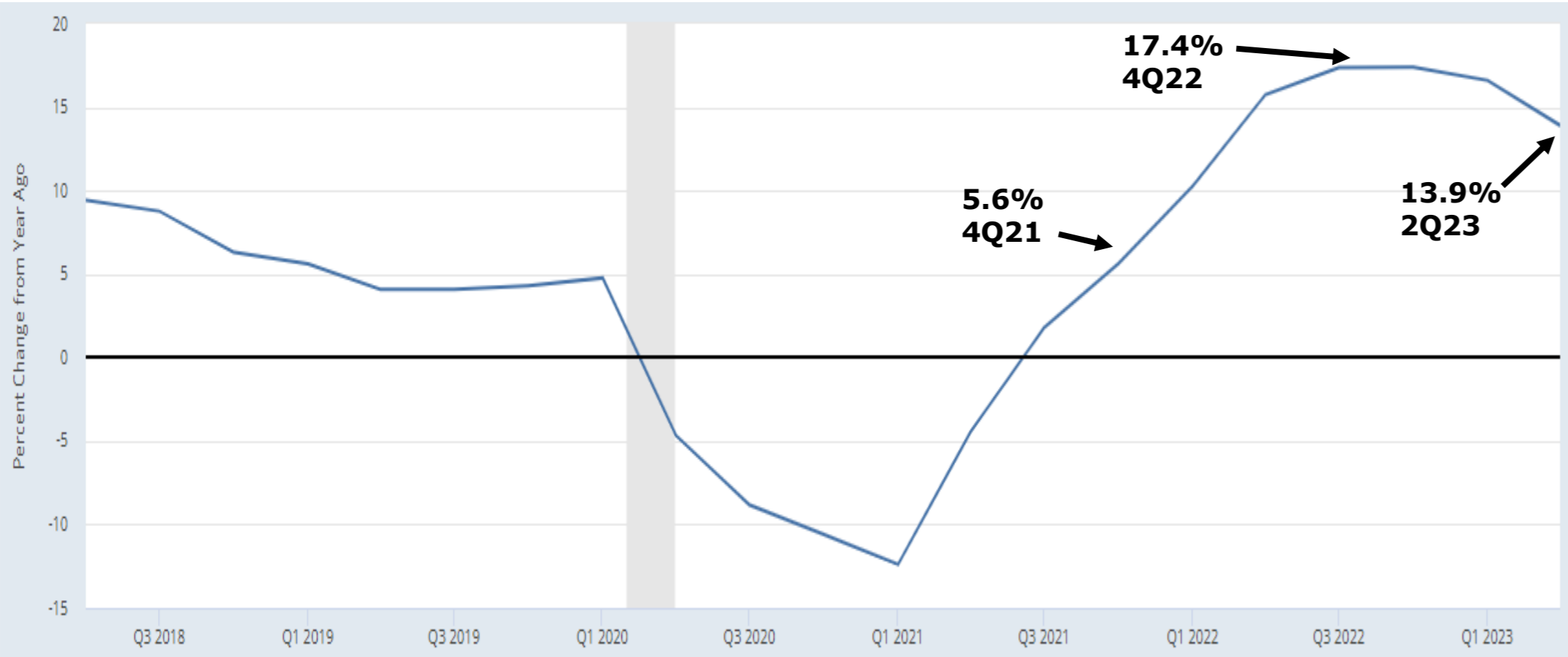
Personal Savings Rate (monthly)



U.S. Personal Savings (Cumulative)
Apr 2023: \$0.54 T vs Pre-COVID Trend



Consumer Loans: Credit Cards and Other Revolving Plans (monthly)



Delinquency Rate on Credit Card Loans (quarterly)



Note: Shaded areas indicate recessions.
Source: FRED Economic Data as of June 30, 2023. Piper Sandler Macro Research as of June 27, 2023 (top right).

Retail sales slowing sharply from post-covid peak

Retail sales y/y % change

Retail Sales Season	2023	2022	2021	2020	2019	2018
"MAPRIL"	1.7%	8.6%	39.5%	(12.9)%	3.0%	4.4%
BTS*	1.5%	9.8%	14.7%	4.2%	3.3%	5.1%
XMAS	TBD	7.1%	15.3%	5.8%	4.2%	2.6%
Average	TBD	8.5%	23.2%	(1.0)%	3.5%	4.0%

Note: The three most important retail sales seasons share a 73% positive correlation over the past 30 years. Personal consumption accounts for 70% of GDP.

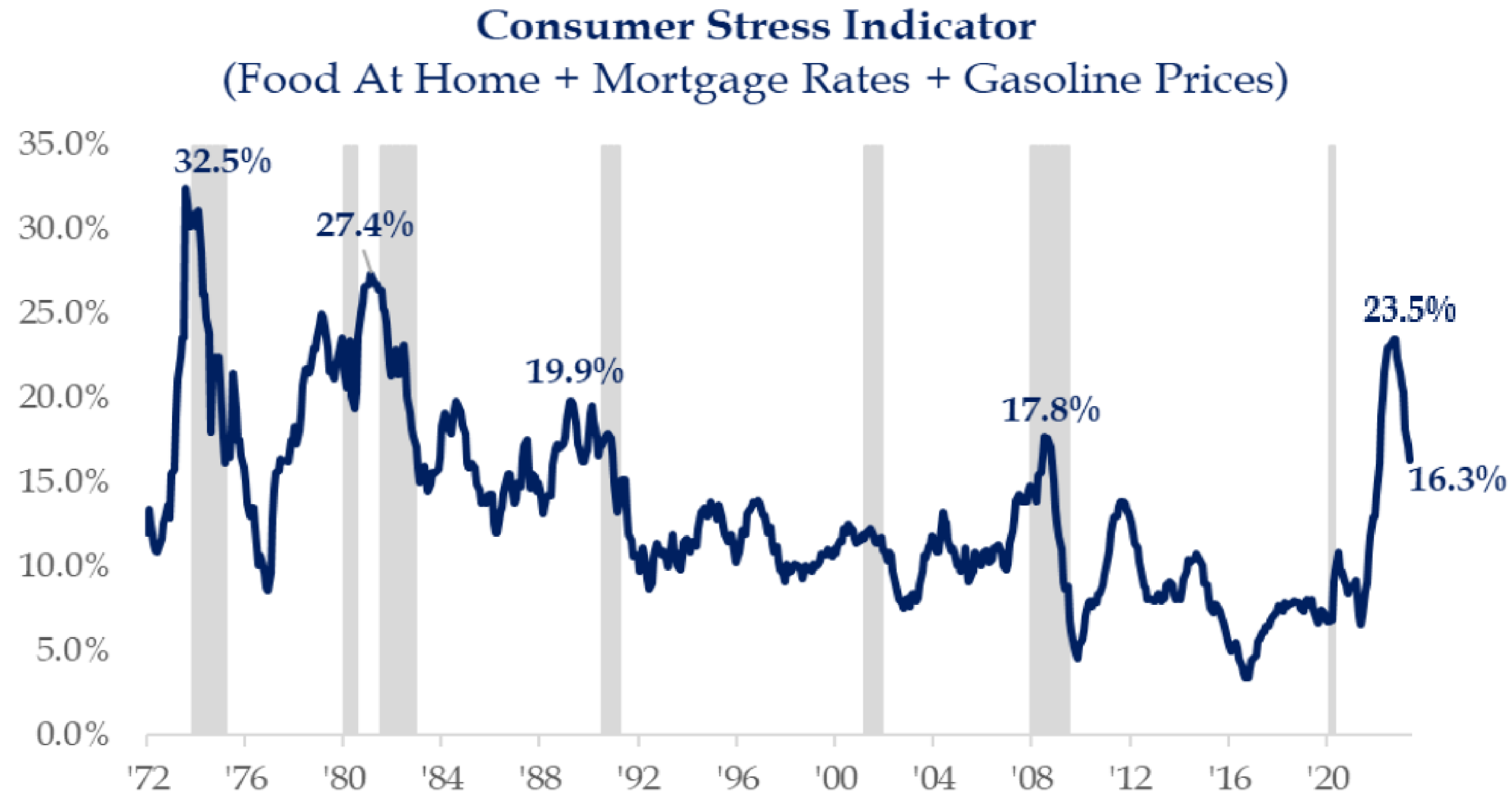
MAPRIL = March & April combined.
BTS = Back to School (June through September)
XMAS = Christmas (October through January)
TBD = To Be Determined

Green shaded areas indicate a positive reading.
Red shaded areas indicate a negative reading.
Yellow shaded areas indicate a positive reading below 2%.

* June 2023 data only.
Source: Bloomberg, Commerce Department and Federated Hermes as of July 18, 2023.

Consumer Stress Indicator

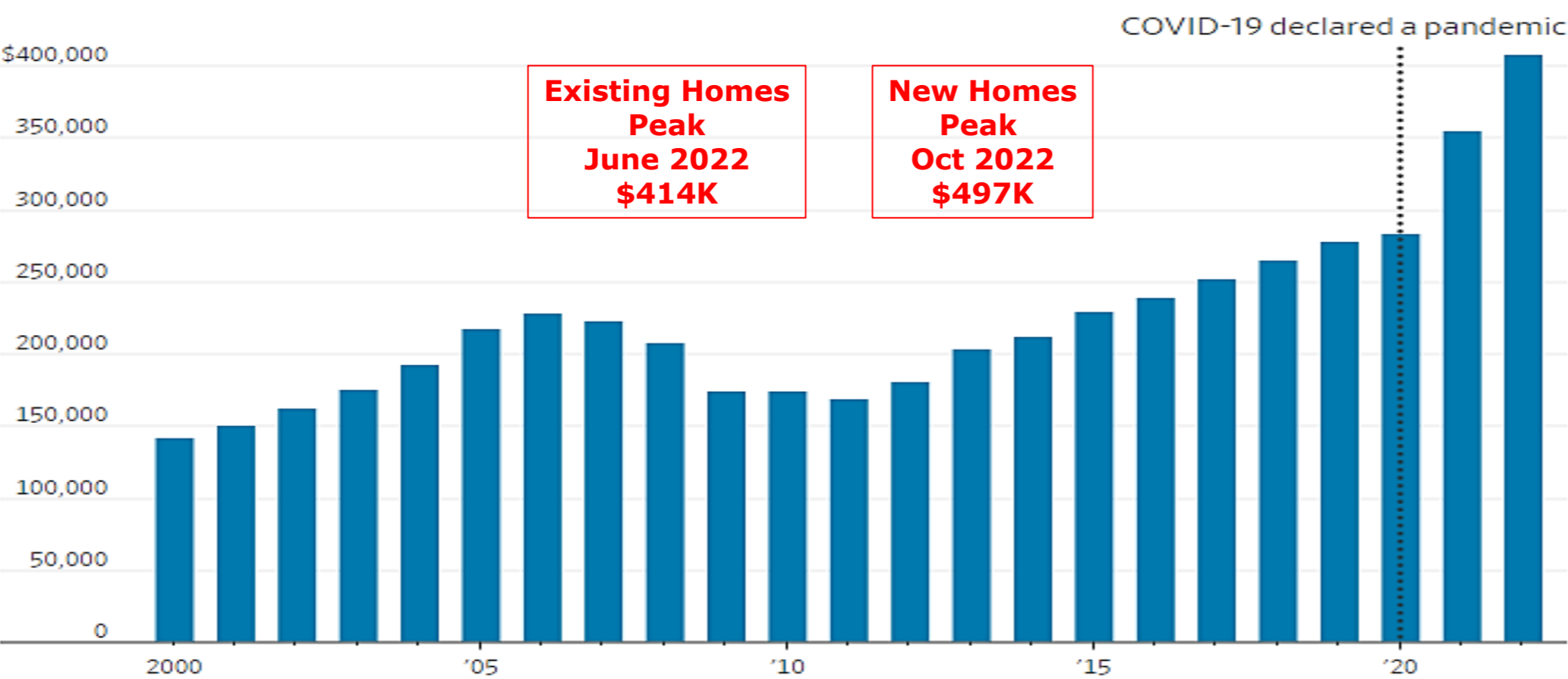
Consumers are feeling the strain of rising costs



Historically readings at the current levels have only come down after the economy dipped into a recession.

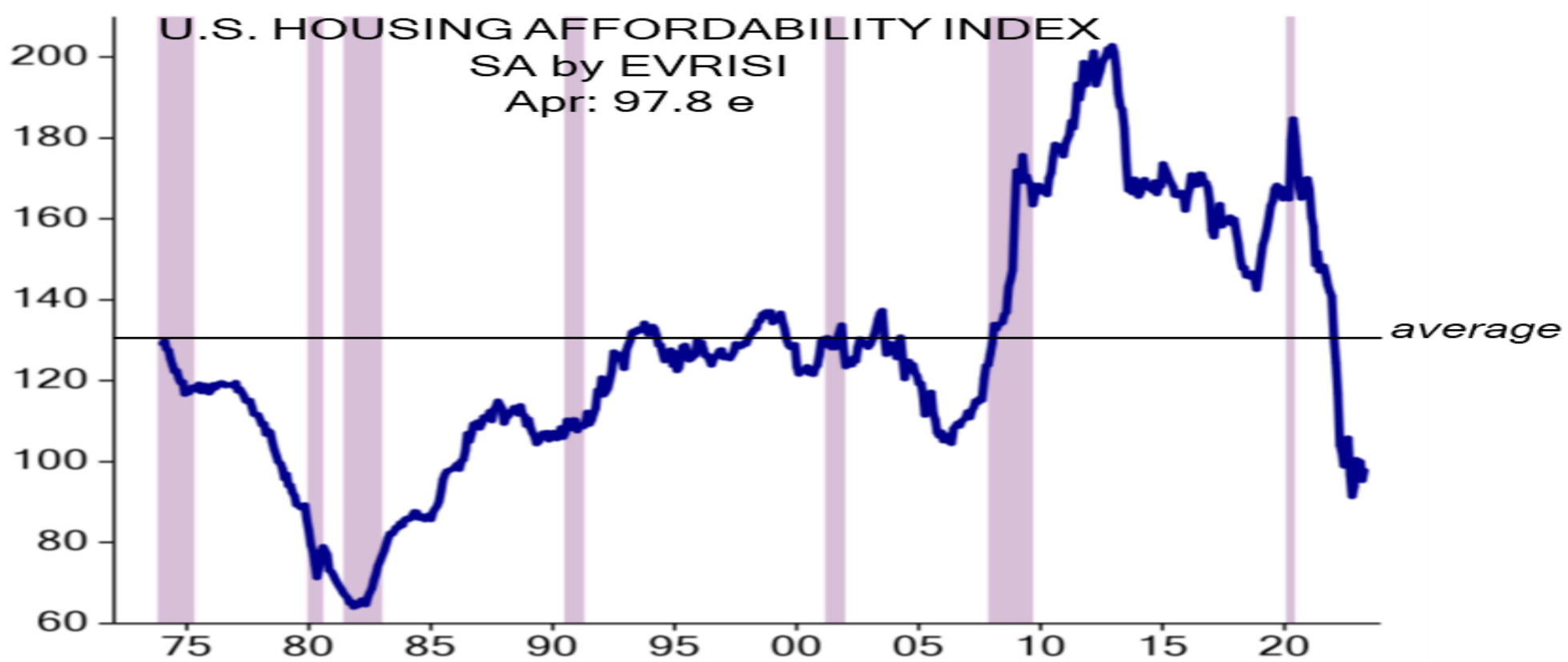
Housing affordability plummets

Median Sale Price of Existing Homes from May of Each Year



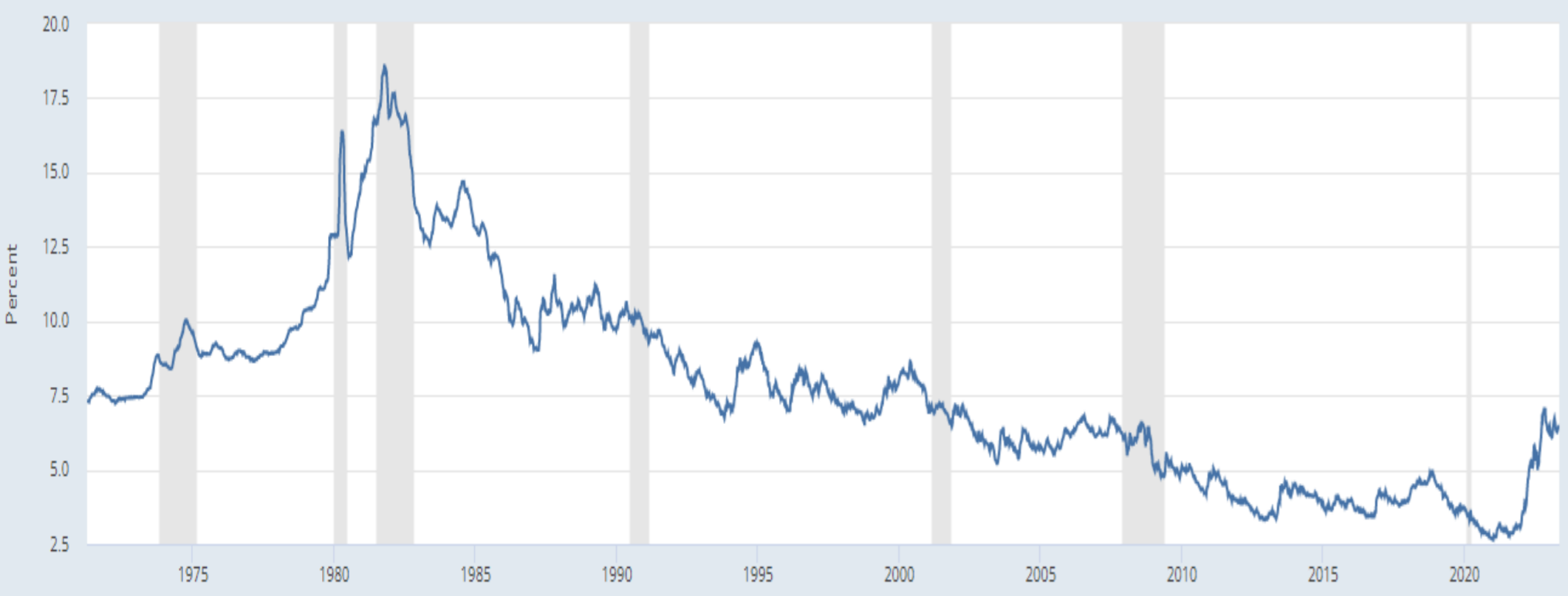
Note: World Health Organization declared Covid-19 a pandemic in March 2020.
Source: National Association of Realtors as of July 2022.

United States Housing Affordability Index



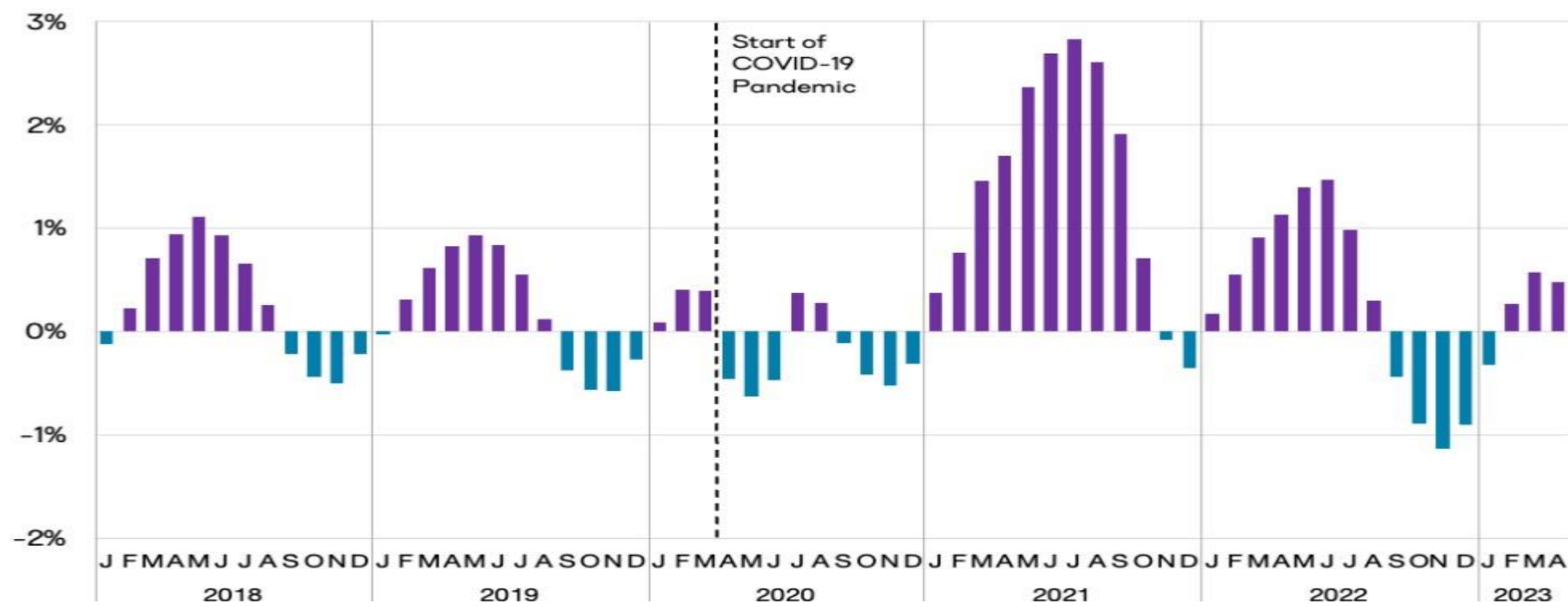
Note: Higher values represent greater affordability. Shaded areas indicate recessions.
Source: Evercore ISI as of May 17, 2023.

30-Year Fixed rate Mortgage Average in the United States



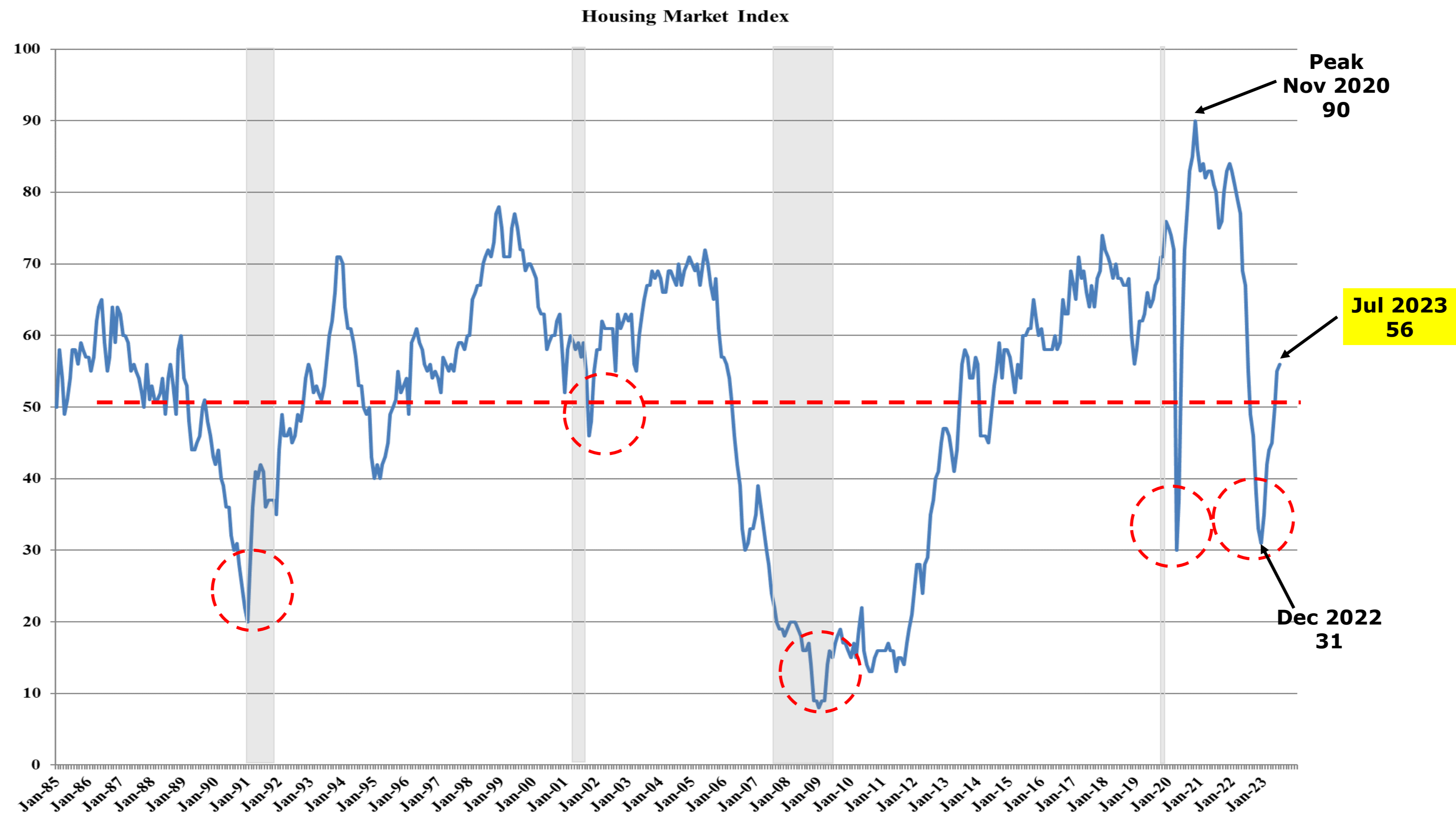
Source: FRED Economic Data as of May 17, 2023. Shaded bars indicate recessions
Shaded areas indicate recessions. Past performance is no guarantee of future results.

Month-over-Month Change in National Rent Index (2018 – Present)
MoM Change in National Rent Index (2018 - Present)



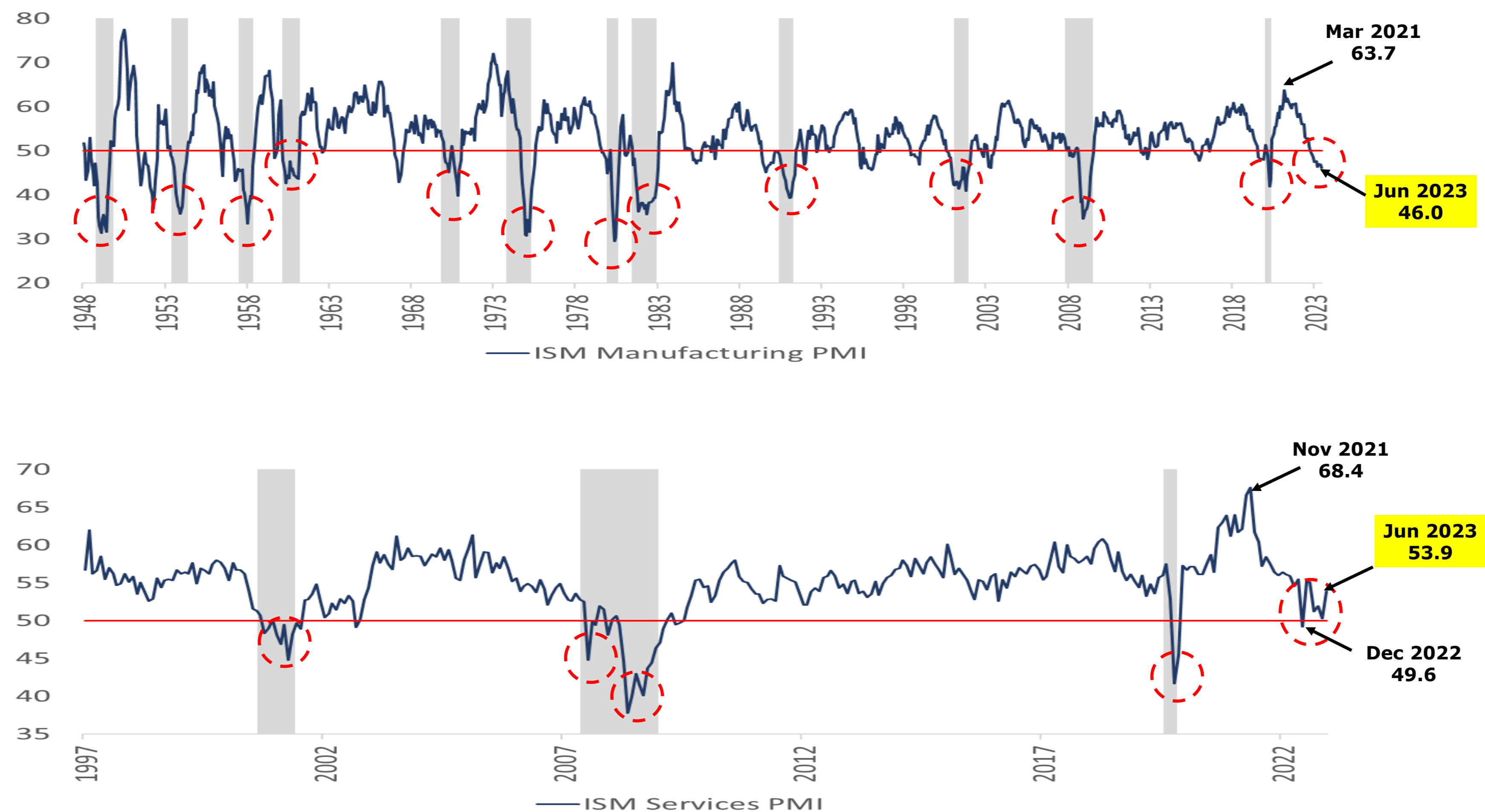
Source: Apartment List Rent Estimates as of April 27, 2023.

Housing decline contributes to recession fears



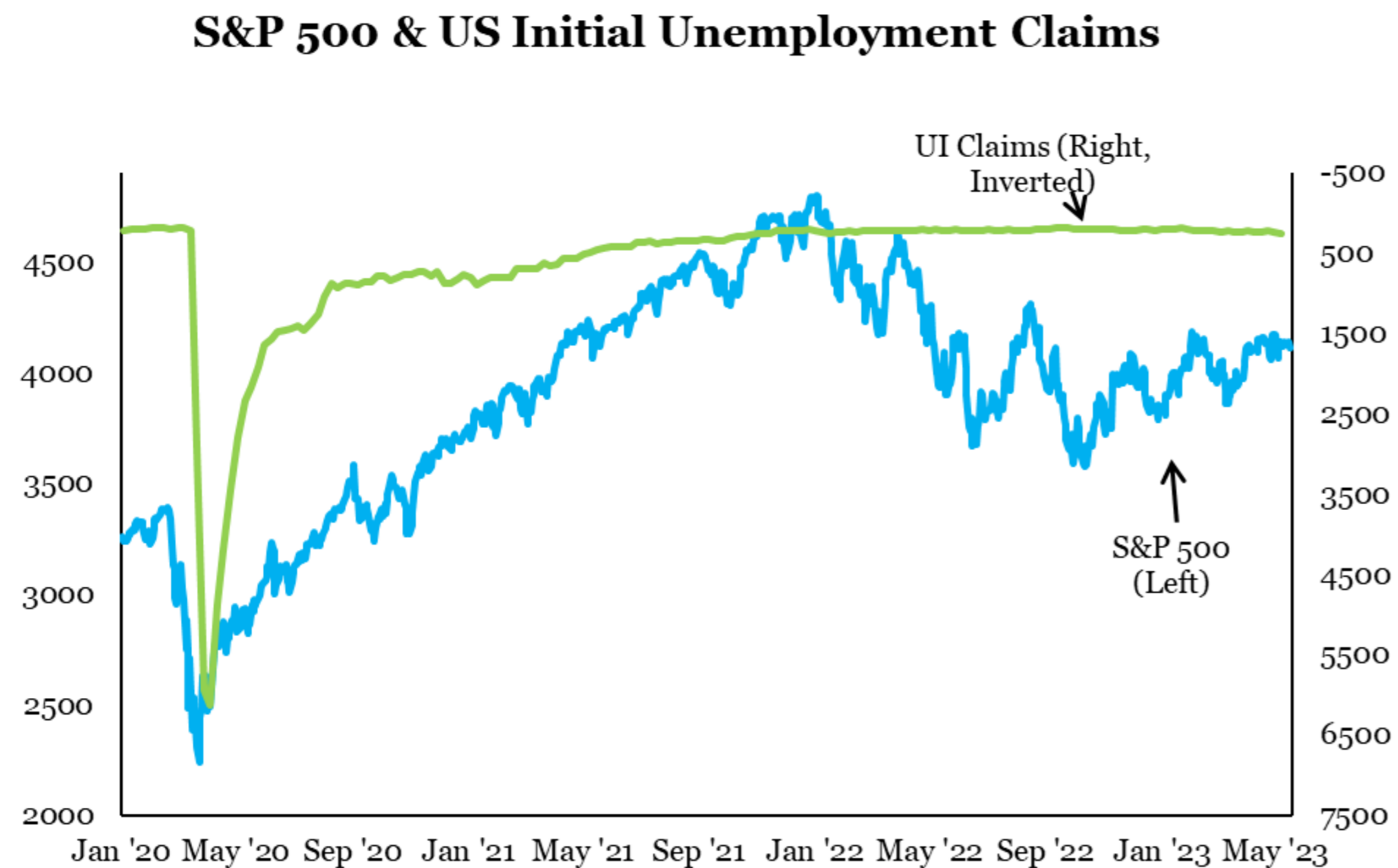
Note: Shaded areas indicate recessions.
Source: NAHB/Wells Fargo Housing Market Index. U.S. Census Bureau. As of July 20, 2023.

ISM indices in contraction territory



Note: Shaded areas indicate recessions.
Source: ISM and Bloomberg. As of July 6, 2023.

U.S. labor market & stocks are linked



↑ S&P 500 up 120% (intraday price only from March 23, 2020, to peak on January 4, 2022).

↻ Initial Weekly Jobless Claims down 97% from March 2020 to trough on March 19, 2022.

↻ S&P 500 down 28% from January 4, 2022, to October 13, 2022.

↑ Initial Weekly Jobless Claims up 57% from March 19, 2022, to July 16th, 2022.

K-shaped recovery in labor market – canary in the coal mine?

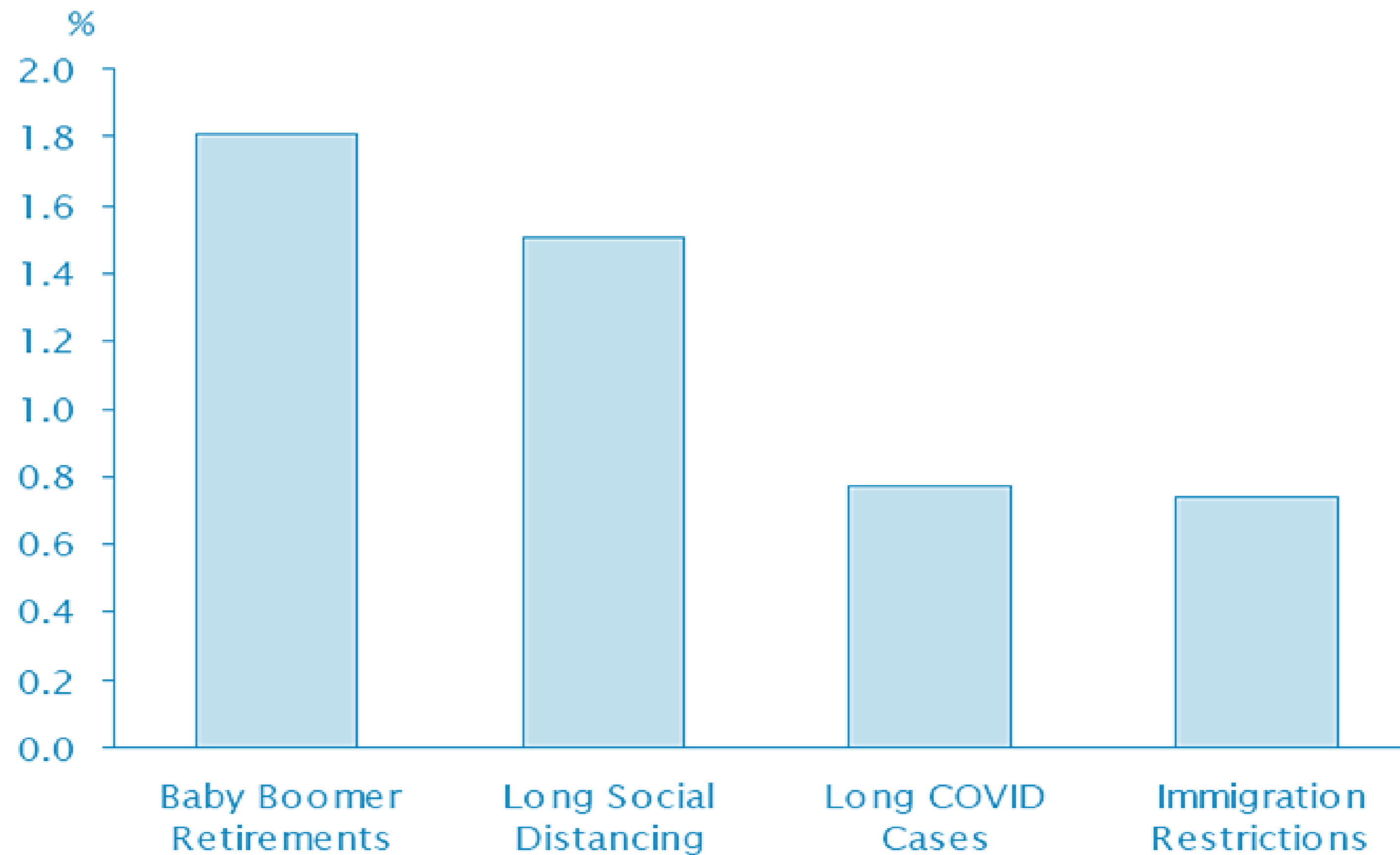
A large, bold, blue letter 'K' is centered within a white square box. The letter is stylized with a thick stroke and a slight shadow effect.

- Pre-pandemic unemployment (for those over 25 years of age with less than a high school diploma) was 5.8% in February 2020. It soared to a cycle peak of 21.2% in April 2020 and declined to a 31-year record-low of 4.4% in November 2022. But it rose to 6.0% in June 2023.
- Pre-pandemic unemployment (U-3) for the overall economy was 3.5% in February 2020, a half-century low. It soared to a cycle peak of 14.8% in April 2020 and declined to 3.4% in April 2023, a new 53-year low. But it rose to 3.6% in June 2023.
- Pre-pandemic unemployment (for those over 25 years of age with a bachelor's degree or higher) was 1.9% in February 2020. It soared to a cycle peak of 8.4% in April 2020 and declined to a 22-year low of 1.8% in September 2022. It has since risen to 2.0% in June 2023.

Note: In its June 2023 Summary of Economic Projections, the Federal Reserve estimates that U-3 will rise to 4.1% by year-end 2023 and to 4.5% by year-end 2024.

Where are all the workers?

**Baby Boomer Retirements, Long Social Distancing, Long COVID and Immigration Restrictions
As a Share of the Labor Force
(Mid-2022 Compared to February 2020)**



What's causing the shortage of workers?

■ **For retiring Baby Boomers:**

- SPX rose by 120% from March 2020 to January 2022
- Existing home prices rose by 57% from January 2020 to June 2022

■ **For low-skill & low-wage workers:**

- Federal stimulus payments
- Overly generous federal unemployment benefits
- Medicaid enrollment expansion
- Expansion of the number of food-stamp recipients and a 30% increase in benefits
- Student loan interest deferral and debt cancellation
- Expansion of child tax credits

Recessions have been a determining factor in whether presidents get re-elected

No Recessions Two Years Before Re-Election

President	Recession?	Re-Elected?
Obama	No	Yes
Bush II	No	Yes
Clinton	No	Yes
Reagan	No	Yes
Nixon	No	Yes
LBJ	No	Yes
Eisenhower	No	Yes
Truman	No	Yes
FDR	No	Yes
FDR	No	Yes
FDR	No	Yes
Wilson	No	Yes

Recessions Two Years Before Re-Election

President	Recession?	Re-Elected?
Trump	Yes	No
Bush I	Yes	No
Carter	Yes	No
Ford	Yes	No
Hoover	Yes	No
Taft	Yes	No

Source: Strategas Research Partners as of June 28, 2023.

GDP: Unprecedented V-shaped recovery

Views are as of July 19, 2023

	1Q	2Q	3Q	4Q	FY
2007	1.2	2.6	2.4	2.5	2.0
2008	(1.6)	2.3	(2.1)	(8.5)	(0.1)
2009	(4.6)*	(0.7)*	1.5	4.3	(2.6)
2010	2.0	3.9	3.1	2.1	2.7
2011	(1.0)	2.7	(0.2)	4.6	1.5
2012	3.3	1.8	0.7	0.4	2.3
2013	3.5	0.6	3.2	2.9	1.8
2014	(1.4)	5.2	4.7	1.8	2.3
2015	3.3	2.3	1.3	0.6	2.7
2016	2.4	1.2	2.4	2.0	1.7
2017	1.7	2.0	3.4	4.1	2.2
2018	2.8	2.8	2.9	0.7	2.9
2019	2.2	2.7	3.6	1.8	2.3
2020	(4.6)	(29.9)**	35.3	3.9	(2.8)
2021	6.3	7.0	2.7	7.0	5.9
2022	(1.6)	(0.6)	3.2	2.6	2.1
2023	2.0A	1.7E	0.9E	0.6E	1.8E
2024	0.4E	0.5E	0.8E	1.1E	0.7E

Note: *Great Recession ended June 2009. **Pandemic Recession ended April 2020.
Source: The Commerce Department as of September 2022 and includes benchmark revisions recently made.

Federated Hermes Forecast

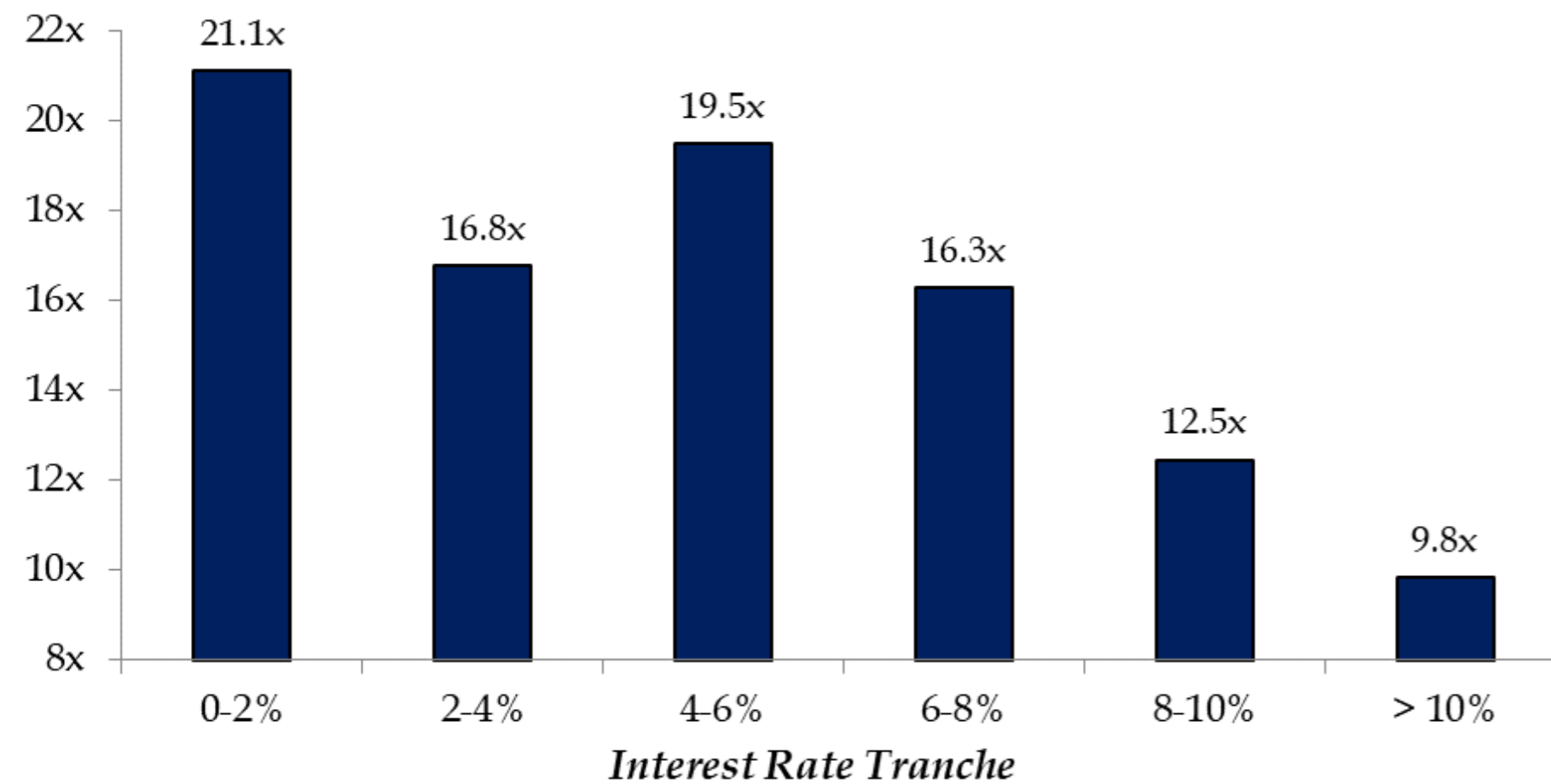
Views are as of July 19, 2023

	2016A	2017A	2018A	2019A	2020A	2021A	2022A	2023E	2024E
Real GDP	1.70%	2.30%	3.00%	2.20%	(3.50)%	5.90%	2.10%	1.80%	0.70%
Core CPI	2.20%	1.80%	2.20%	2.30%	1.60%	5.50%	5.70%	3.90%	2.90%
Core PCE	1.80%	1.60%	2.00%	1.60%	1.50%	4.90%	4.40%	3.60%	2.60%
Benchmark 10yr Treasury Yield	2.50%	2.40%	2.68%	1.92%	0.92%	1.51%	3.88%	3.25%	3.00%
Fed Funds Rate (upper band)	0.75%	1.50%	2.50%	1.75%	0.25%	0.25%	4.50%	5.50%	4.00%
S&P 500 EPS	\$119	\$133	\$163	\$167	\$137	\$208	\$219	\$200	\$230
Target Forward P/E	16.8x	16.4x	15.0x	23.6x	18.1x	21.8x	19.2x	19.1x	N/A
S&P 500 Target Price	2,239	2,674	2,507	3,231	3,756	4,766	3,840	4,400	N/A

PCE = Personal Consumption Expenditures. 2016, 2017, 2018, 2019, 2020, 2021 and 2022 are actual unless otherwise noted. Views are as of the date indicated and are subject to change based on market conditions and other factors. These views should not be construed as a recommendation for any specific security or sector. Source: Federated Hermes and the Commerce Department.

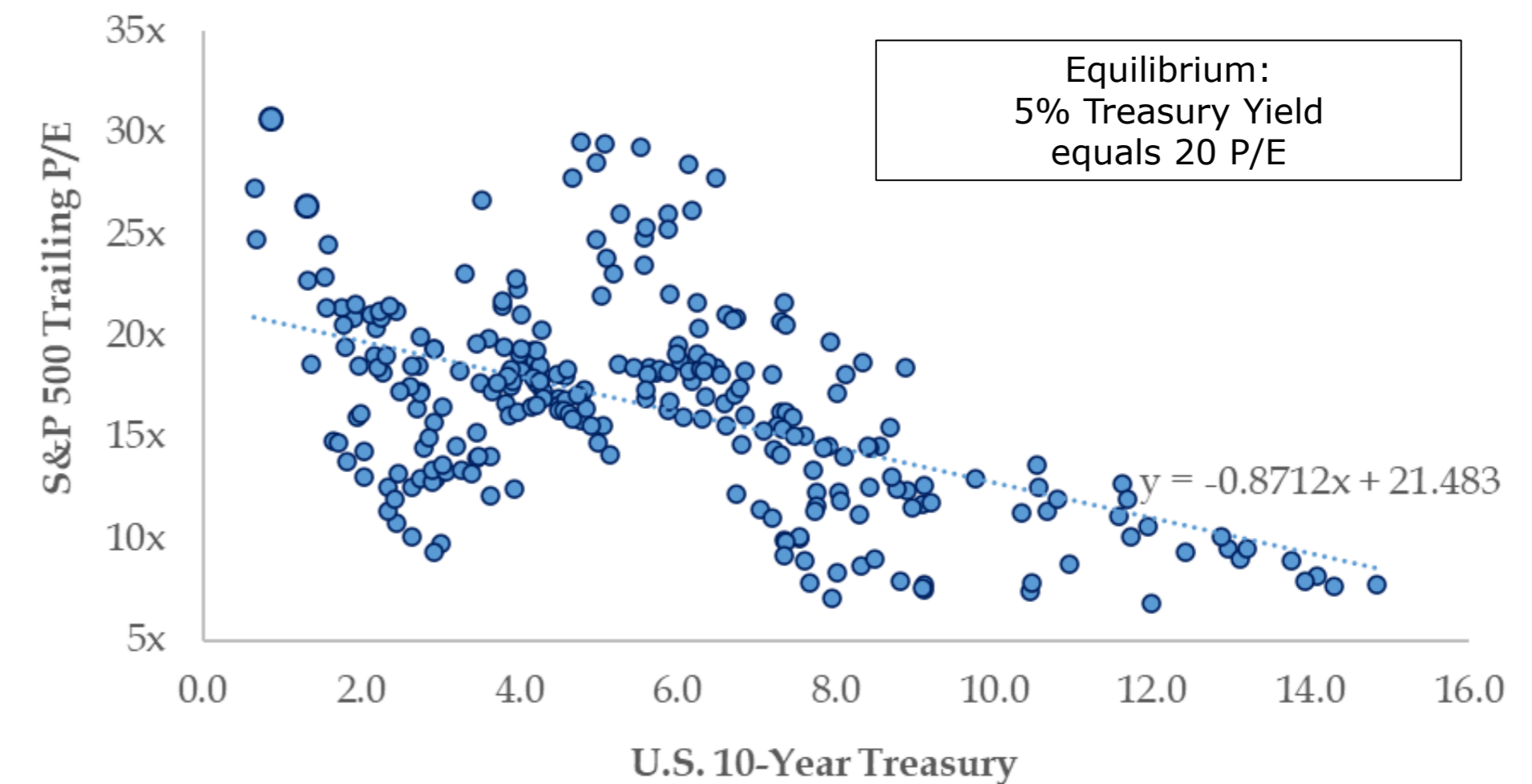
“Rule of 20” and “Fed Model” suggest that rising inflation and interest rates could compress P/E’s

S&P 500 Average Trailing P/Es by Interest Rate Tranche



When yields are below average, rising rates tend to drive valuations higher

U.S. 10-Year Treasury Yield vs. S&P 500 Trailing P/E (1953 - Current)



Federated Hermes Investment Focus

Views are as of July 19, 2023

Equities
3% Overweight

Fixed Income
4% Underweight
Duration: 105%

Cash
1% Overweight

Recommended Equity Sector Allocation

Overweight	Neutral	Underweight
<ul style="list-style-type: none">• Energy• Health Care• Staples• Utilities	<ul style="list-style-type: none">• Comm. Services• Industrials• Materials• Technology	<ul style="list-style-type: none">• Discretionary• Financials• REITs

Sub-Asset Class Active Positioning

Equities

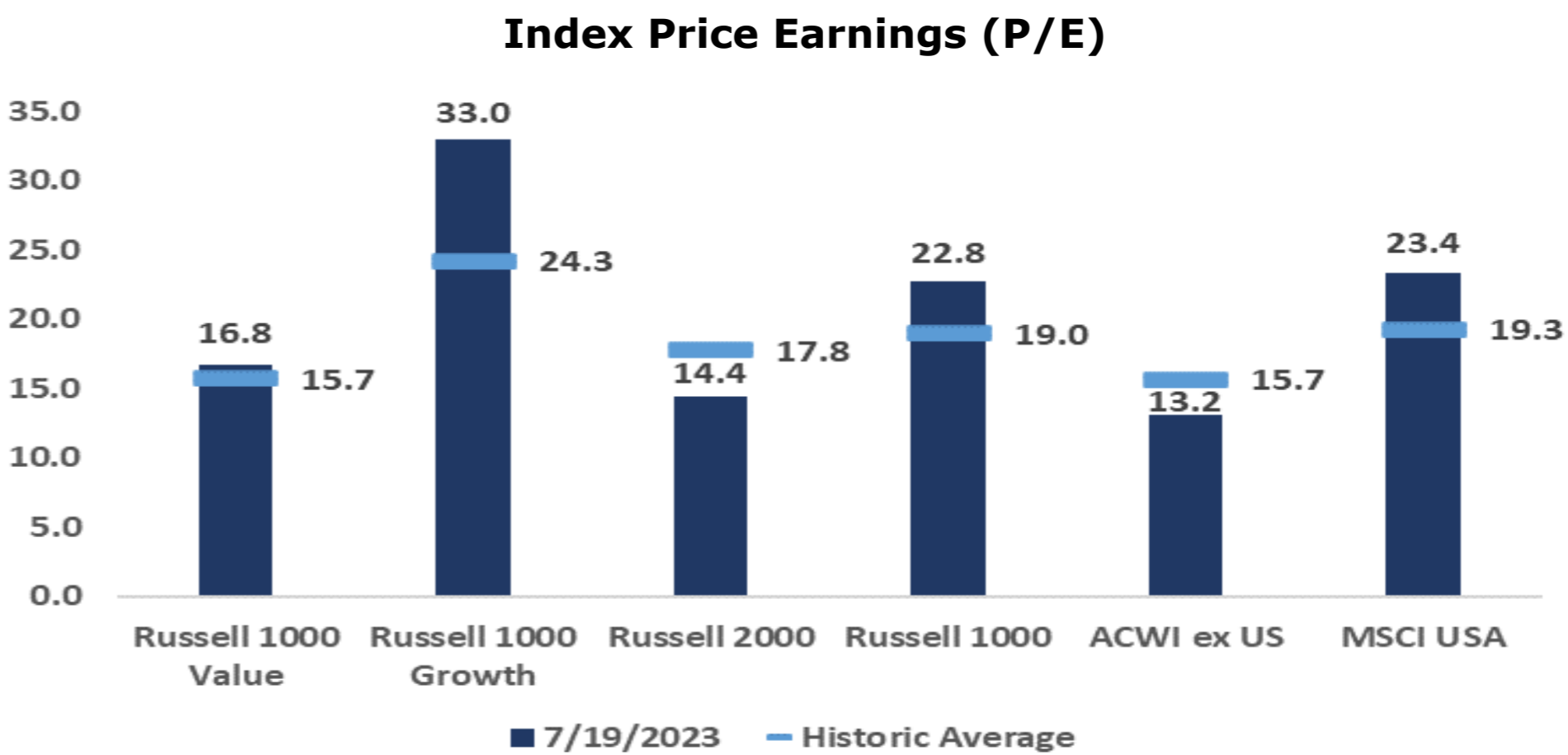
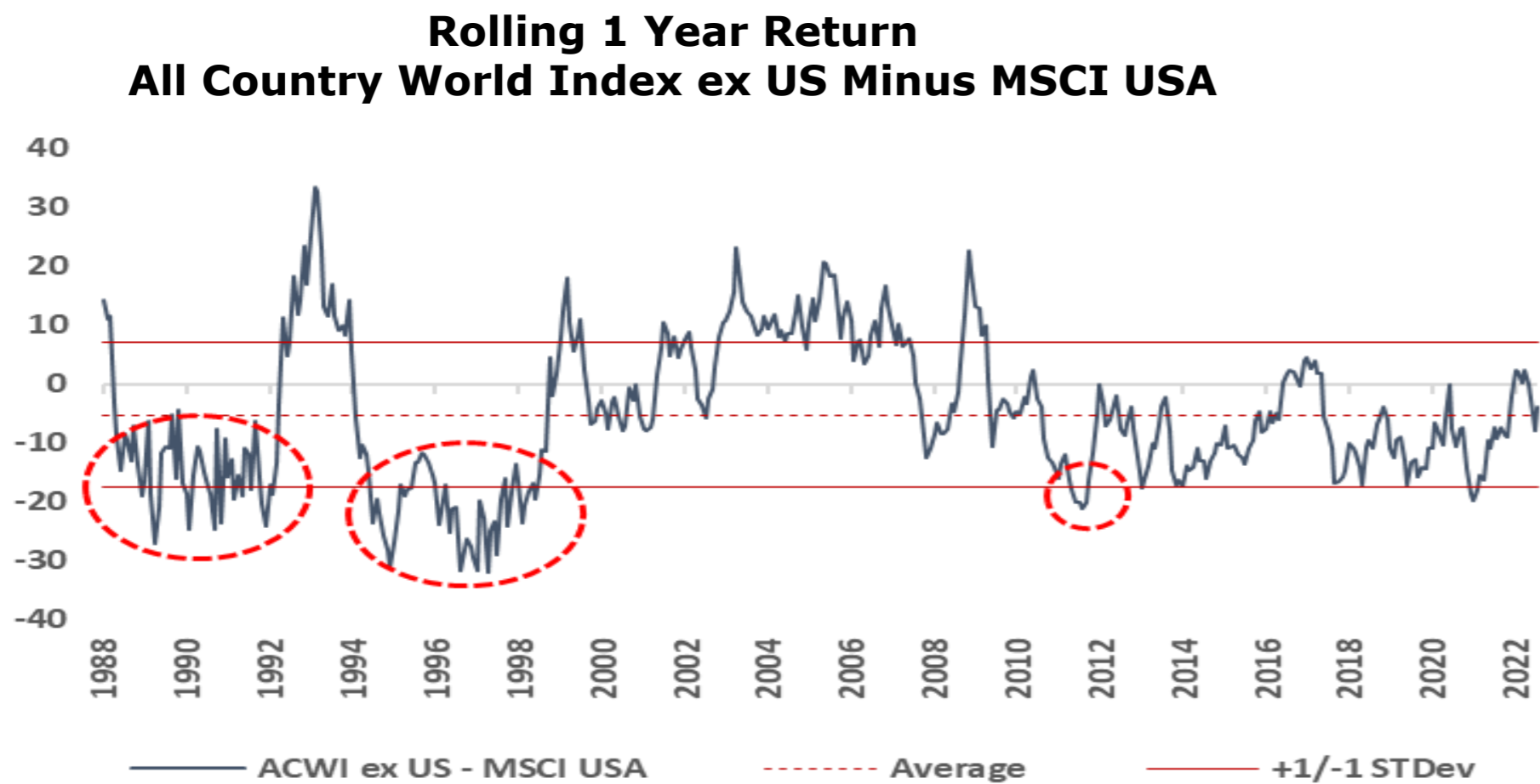
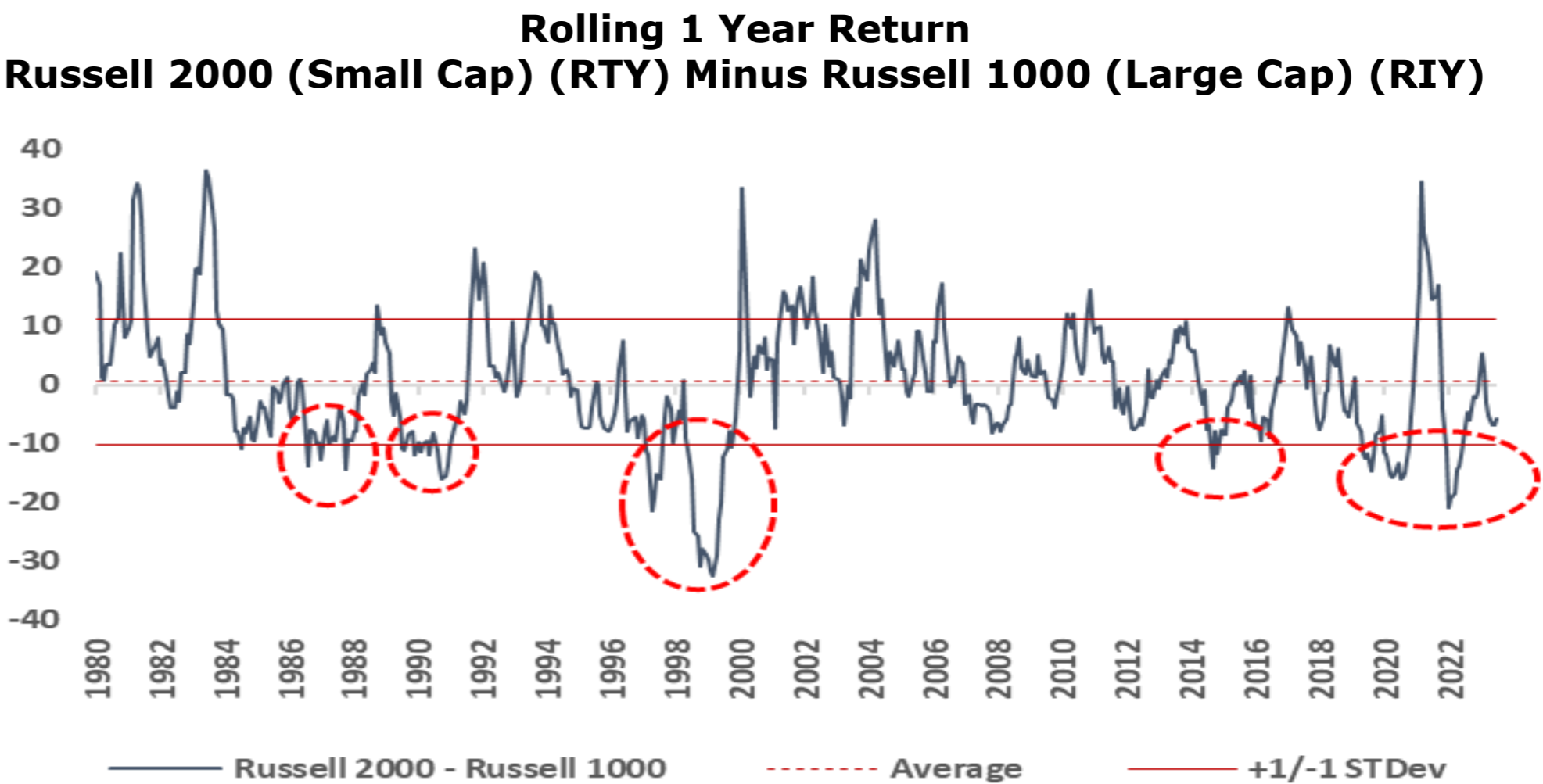
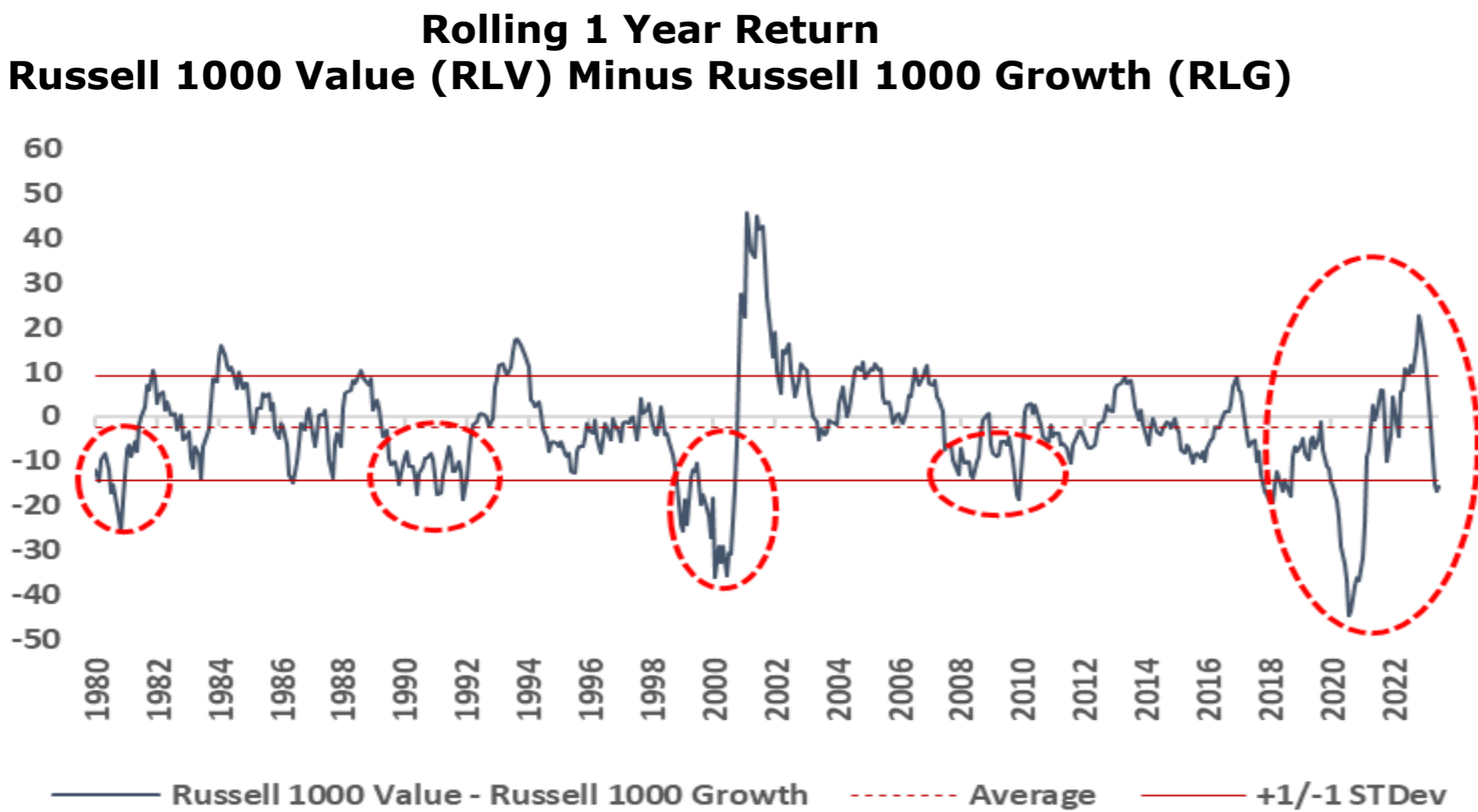
Overweight	Neutral	Underweight
<ul style="list-style-type: none">• U.S. Small Cap Growth• U.S. Small Cap Value• U.S. Large Cap Value• Emerging Markets• International Developed	<ul style="list-style-type: none">• International Small-Mid Cap	<ul style="list-style-type: none">• U.S. Large Cap Growth

Bonds

Overweight	Neutral	Underweight
<ul style="list-style-type: none">• MBS	<ul style="list-style-type: none">• Emerging Markets• International Developed• Muni's• TIPs	<ul style="list-style-type: none">• Agencies• CMBS• High Yield• IG Corporates• Treasuries

The information and data contained herein are provided solely for informational purposes. Accordingly, this communications does not represent specific investment advice and should not be construed as an investment recommendation.

Overweight Domestic Large and Small Cap Value and International



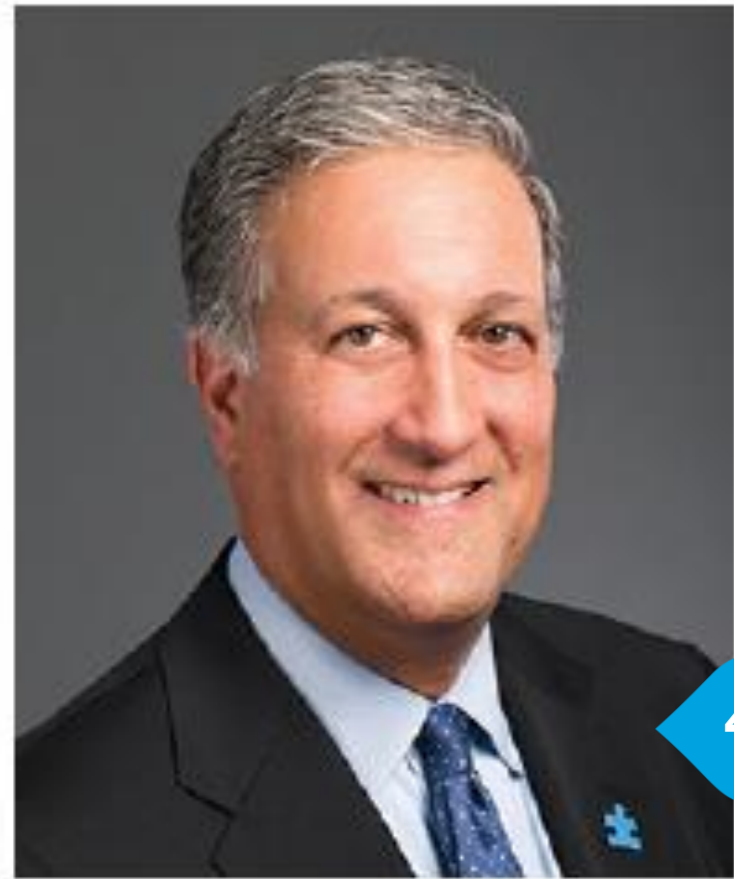
NOTE: P/E adjusted to include only positive earnings.

Source: MSCI, Russell, Bloomberg and Federated Hermes. As of July 20, 2023.

Conclusion: We have a bullish long-term view on equities

- **Peak inflation**
- **Peak Federal Reserve tightening**
- **Peak equity valuation**
- **Trough economic and corporate profit growth**
- **Potential for more economic and market-friendly fiscal policies**

Biography



Philip Orlando, CFA

Chief Equity Market Strategist

Head of Client Portfolio Management

Senior Vice President

42 Years of Industry Experience

Phil Orlando is Federated Hermes' chief equity strategist and the head of the Client Portfolio Management team. He joined Federated in 2003 and, with more than 40 years of industry experience, Phil is responsible for the formulation of Federated Hermes' views on the economy, the financial markets and the firm's positioning strategies.

He serves as the chairman of both the Macro Economic Policy and the PRISM Asset Allocation committees. As the head of the Client Portfolio Management team, Phil is responsible for bringing extensive macroeconomic, investment strategy and product knowledge directly to clients in collaboration with the sales team.

Throughout his career, Phil has been recognized for his ability to accurately synthesize the interrelationship among highly complex financial, economic and political market developments, and translate them into easily understandable concepts. He is a popular keynote speaker, addressing many national investment conferences.

For more than 25 years, Phil has been a regular contributor to the financial media, including CNBC, Bloomberg, Fox Business News, Reuters, The Wall Street Journal and The New York Times, among many other media outlets.

Phil received his bachelor's degree and MBA from New York University. He is a CFA® charterholder.

Phil is married and has three children. While he spends much of his time off with his family, he is also very active in charity work. He is on the Board of Directors of two Westchester-based charities that work with special-needs children: The Foundation for Empowering Citizens with Autism (FECA) and Extraordinary Ventures New York (EVNY). He is also an advisory-board member of the Cancer Support Team (CST).