November 21, 2022

INVESTMENT STRATEGY BRIEF:

Signs of Balance

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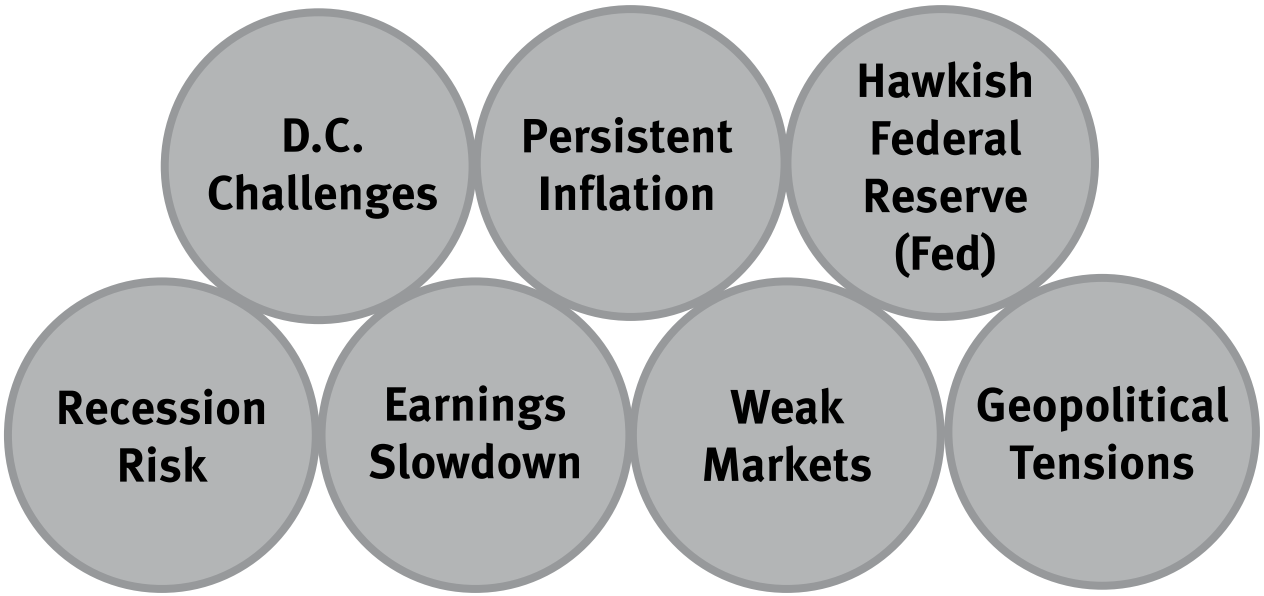
STIFEL

Signs of Balance

STIFEL

CHALLENGES IN 2022



2022 MIDTERM ELECTIONS - OVERVIEW

Midterm Elections:

- The anticipated "red wave" did not materialize, and Congress is divided with thin majorities.
- Gridlock is likely.
- Lame duck session focus:
  - Spending bill
  - National Defense Authorization Act
  - SAFE Banking Act
  - Tax extenders bill
- New Congress:
  - Topics of mutual interest to both parties such as, new regulations for tech companies and cryptocurrencies
  - Passing government spending bills and increasing the debt ceiling will be even more challenging

Replay of our Client Webinar:
2022 Midterm Elections Part 2 here

CONGRESS

HOUSE OF REPRESENTATIVES

211 Democrat

6 Undecided

218 Republican

220 Current

212 Current

SENATE

50 Democrat

1 Undecided

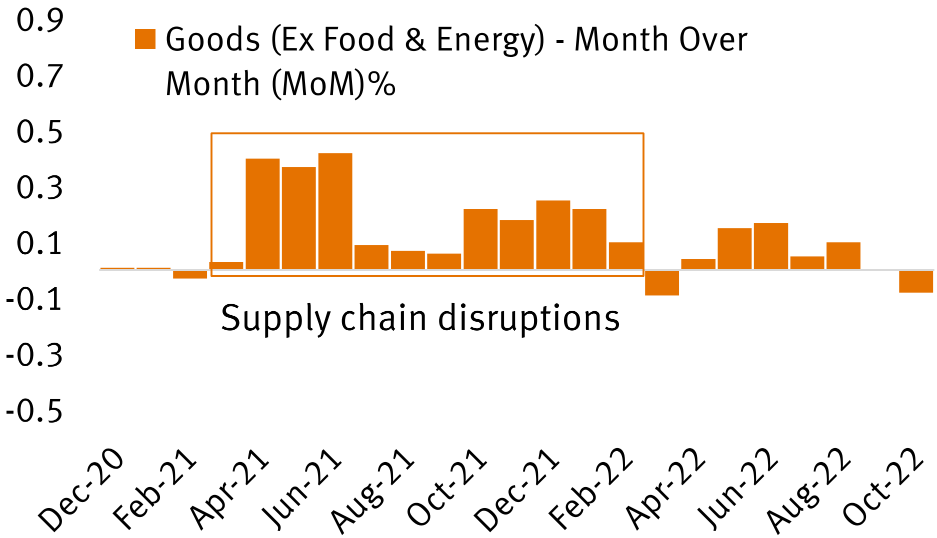
49 Republican

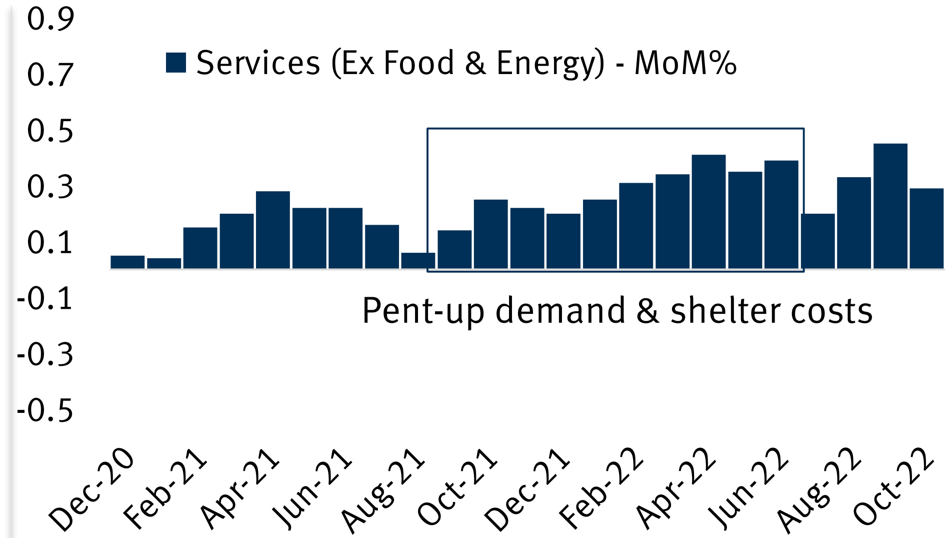
50 Current

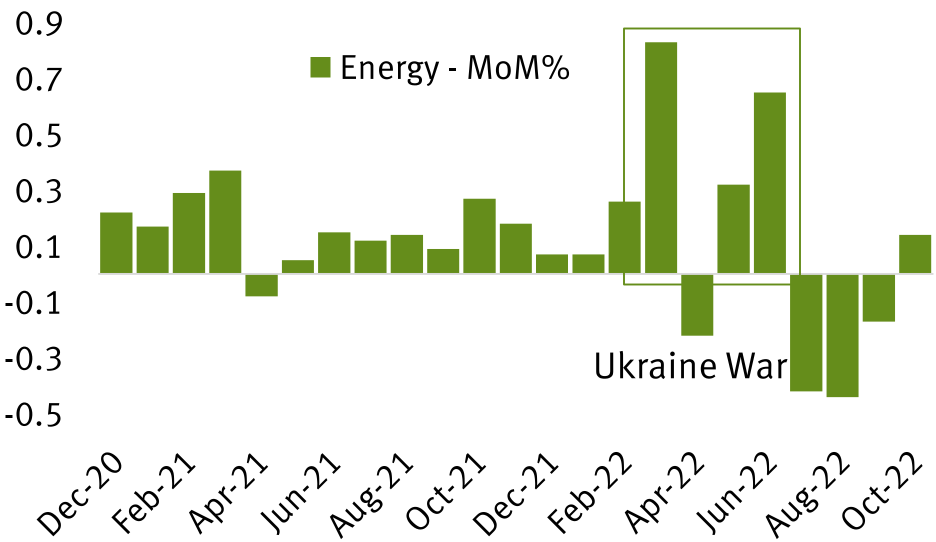
50 Current

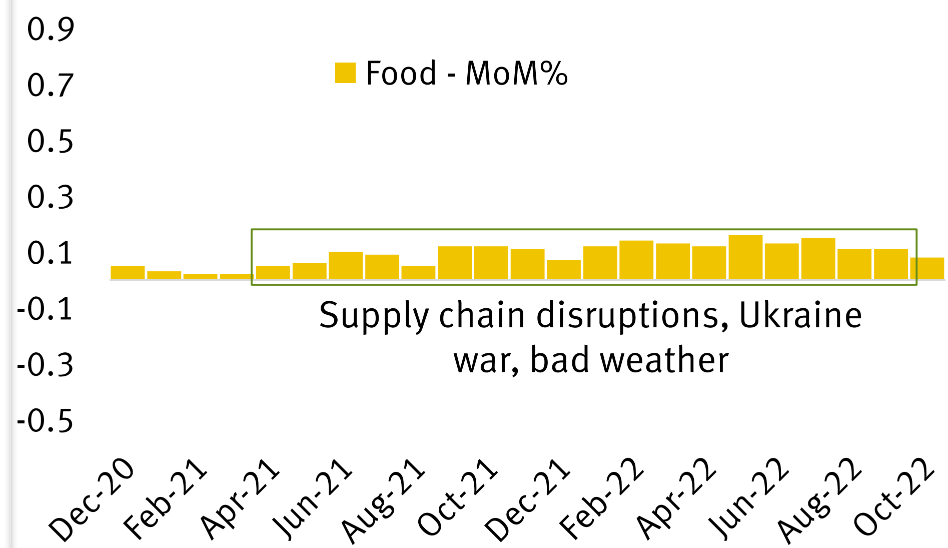
Source: Stifel Investment Strategy via WSJ, as of November 17th, 2022

IMBALANCES DRIVING INFLATION



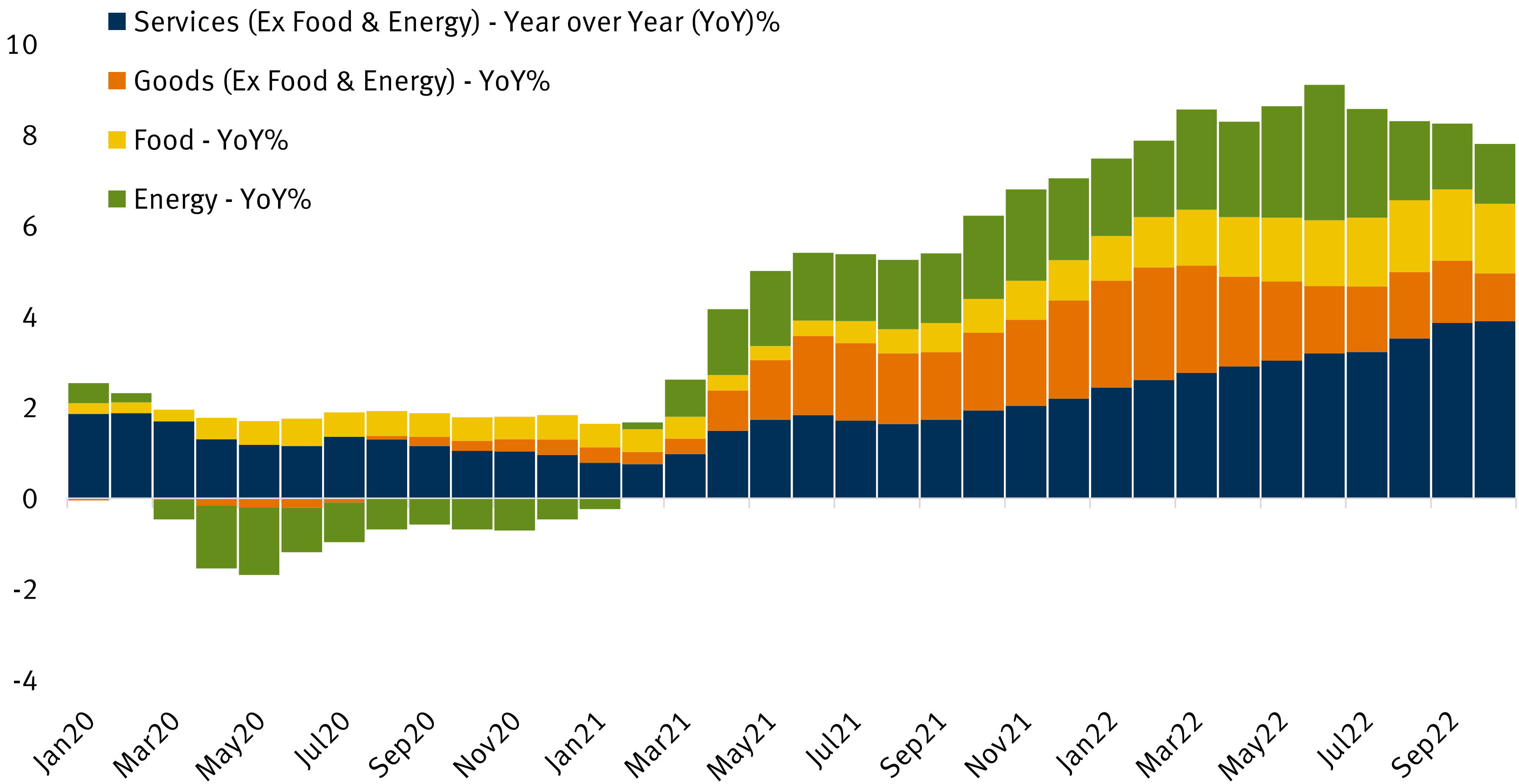






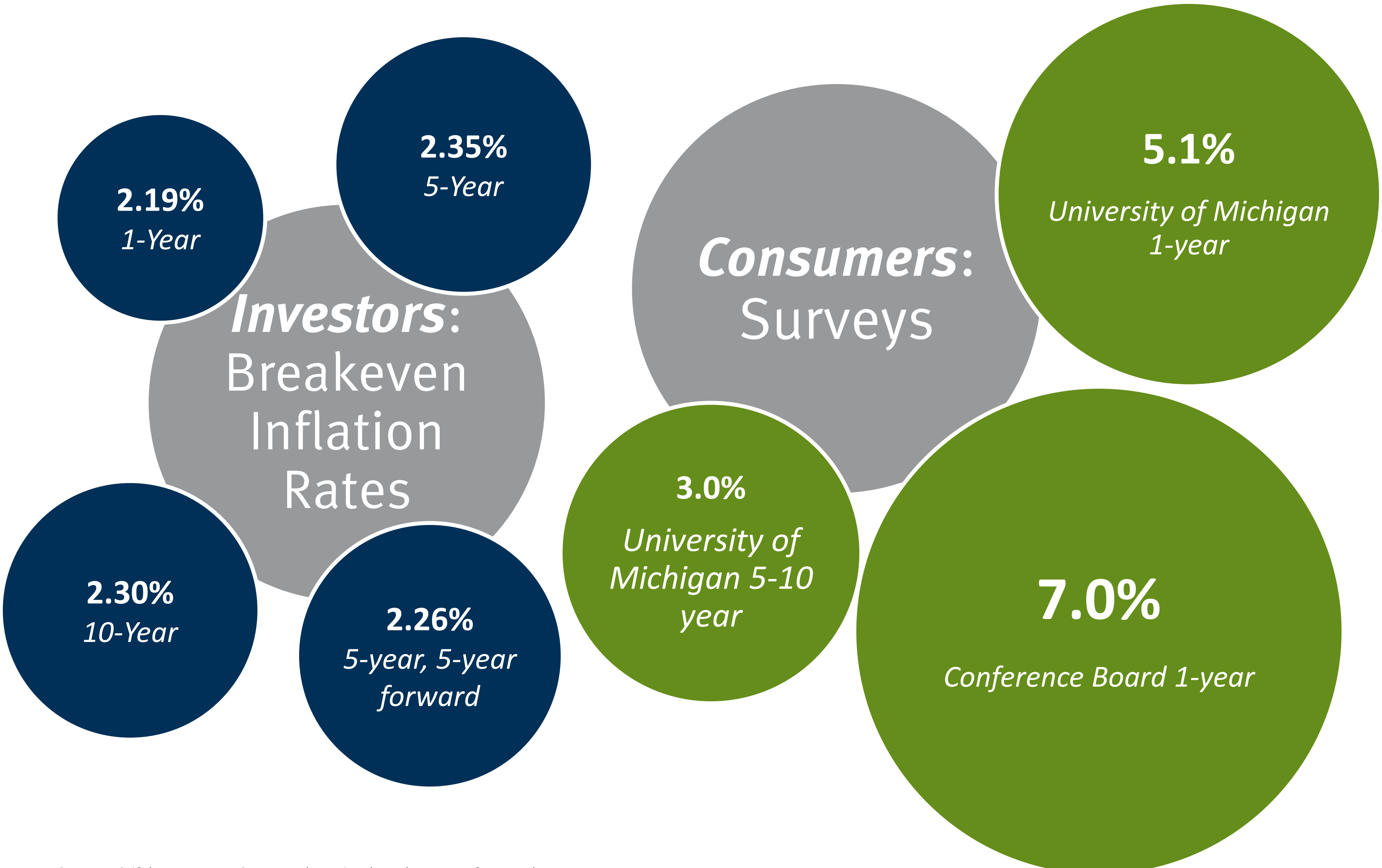
Source: Stifel Investment Strategy data via Bloomberg, as of November 17, 2022

IMBALANCES DRIVING INFLATION



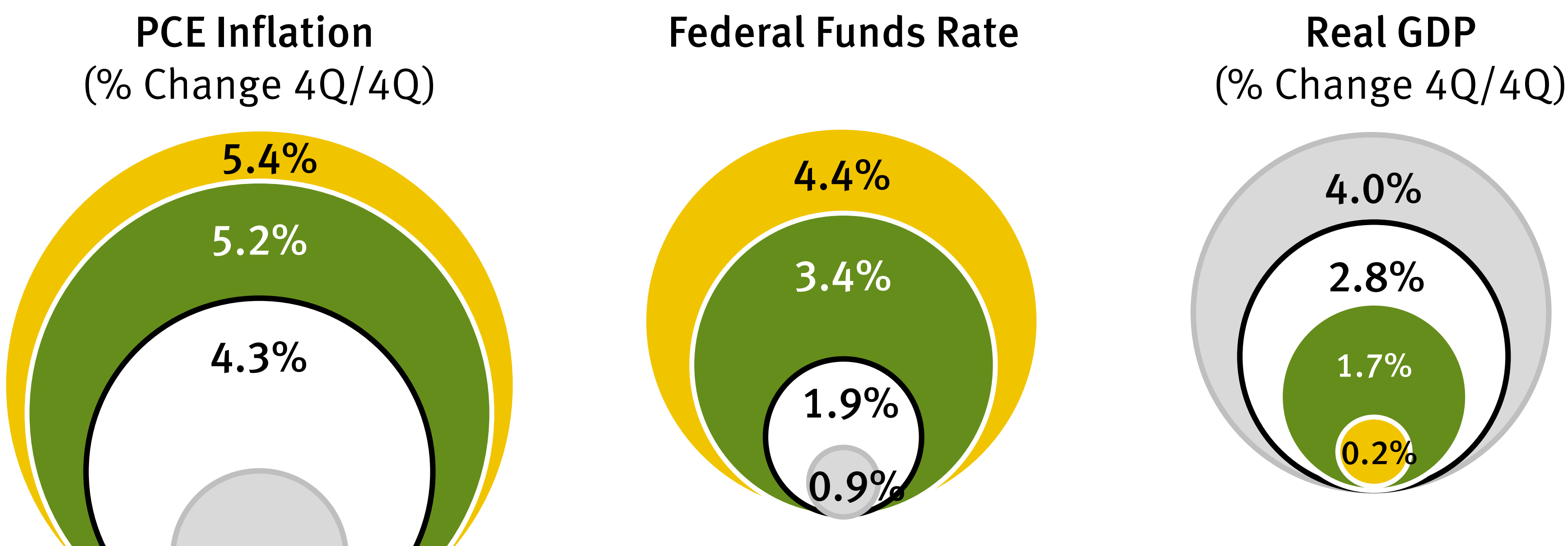
Source: Stifel Investment Strategy data via Bloomberg, as of November 17, 2022

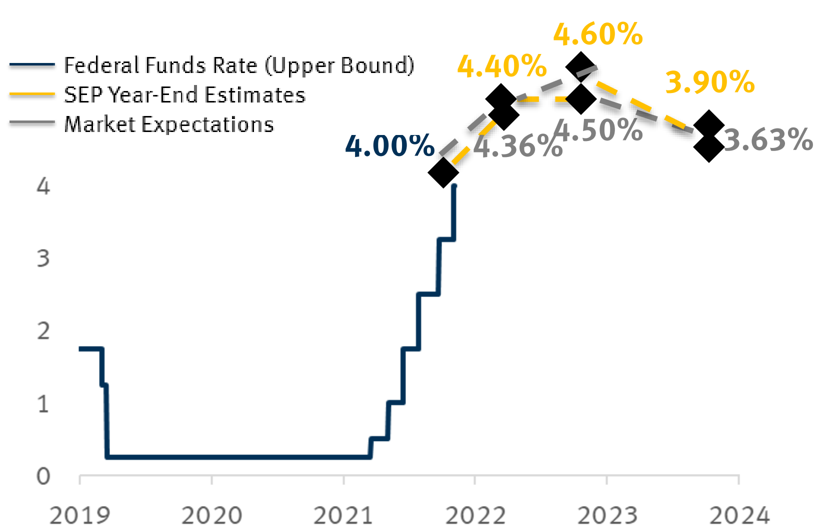
INFLATION EXPECTATIONS



Source: Stifel Investment Strategy data via Bloomberg, as of November 17, 2022

Market Sight|Lines - Federal Open Market Committee Update: Higher Rates for Longer





Source: Stifel Investment Strategy data via Bloomberg, as of November 14, 2022

Fed's Dual Mandate

Price Stability: 2%

Wage pressures subside
- *"Wages aren't coming down, they're just moving sideways at an elevated level"*

Food/shelter/core goods prices ease
- *"Price pressures remain evident across a broad range of goods and services"* ★
- *"Core services inflation moving up"* ★
- *"There will come a point at which rent inflation will start to come down…well out from where we are now"*

Supply chain pressures ease ★
- *"Supply side problems have resolved themselves"*

Inflation expectations fall towards 2% ★
- *"Longer-term inflation expectations appear to remain well anchored"*

CPI/PCE trends lower ★
- *"Good evidence of that would be a series of down monthly readings"*

Maximum Employment

Job quits slow | Initial jobless claims rise ★
- *"We would love to see vacancies coming down, quits coming down. They are coming down…but not by as much as we thought"*

Unemployment to job openings ratio declines
- *"Job creation still exceeds, sort of the level that would hold the market where it is"*

Unemployment above 4.4%
- *"The labor market remains extremely tight"*
- *"Overheated labor market where demand substantially exceeds supply"*

Deep recession
- *"Here in the United States we have a strong economy"*
- *"No one knows whether there's going to be a recession or not, and if so, how bad that recession would be"*

Severe financial conditions
- *"Financial conditions have tightened significantly in response to our policy actions"*

All quotes are by Federal Reserve Chair Jerome Powell during the November 2, 2022 post-Fed meeting press conference.

CONSUMER IS ENGAGED…FOR NOW

1.0%
Consumers' Contribution to Q2 GDP
1 year ago: 2.0%

8.3%
Retail Sales
1 year ago: 16.6%

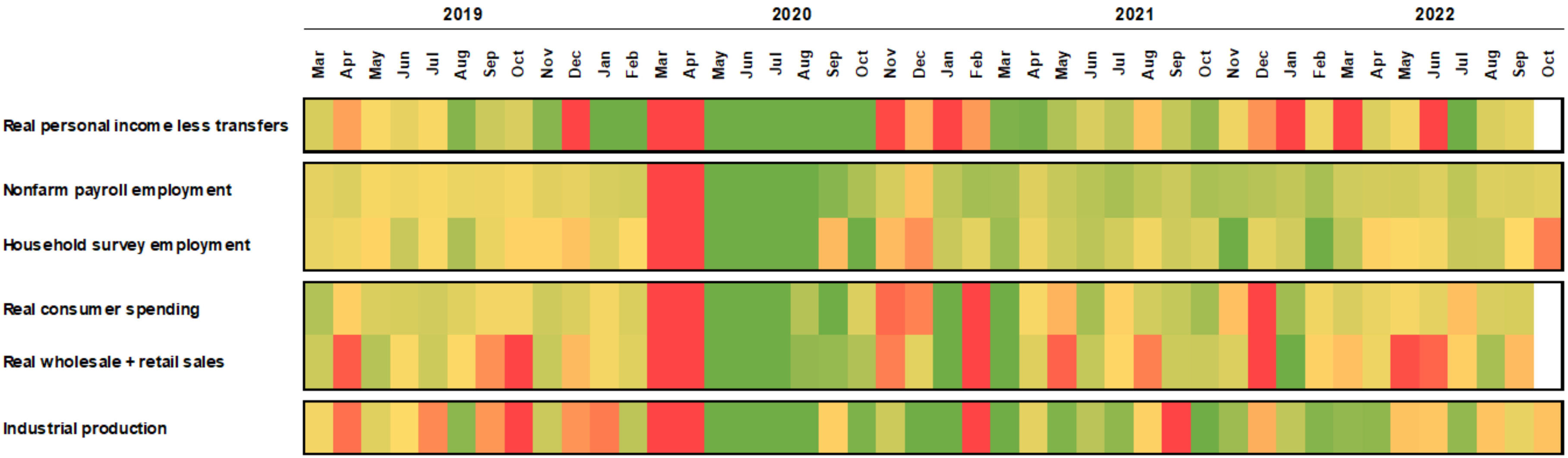
3.1%
Savings Rate
1 year ago: 7.9%

3.7%
Unemployment Rate
1 year ago: 4.6%

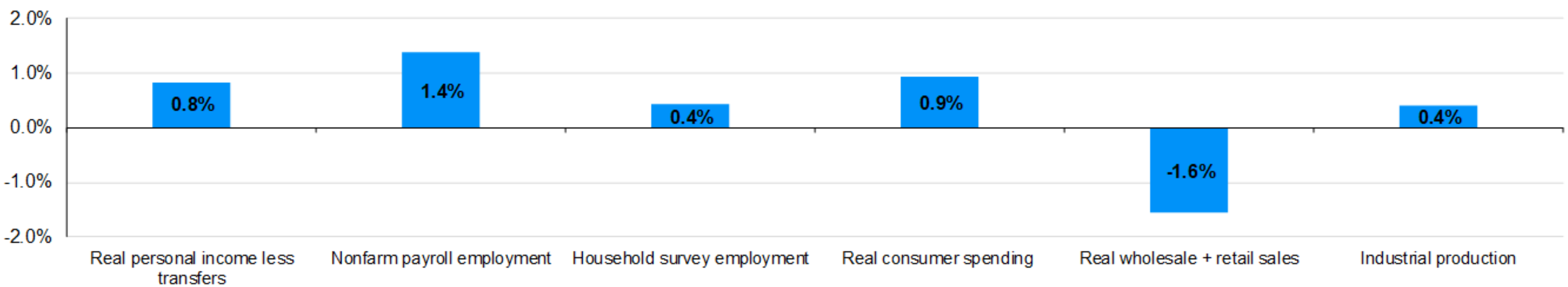
Source: Stifel Investment Strategy data via Bloomberg, as of November 16, 2022

Variables used by the NBER in making recession determination*

% change month-over-month



% change, last six months



Source: Bureau of Economic Analysis, Bureau of Labor Statistics, Census Bureau, Federal Reserve of St. Louis, NBER, J.P. Morgan Asset Management. Heatmap shading reflects 10 years of data, with green and red reflecting a range of +/- 0.5 standard deviations from a baseline of 0% monthly growth. *The NBER's definition of a recession involves a significant decline in economic activity that is spread across the economy and lasts more than a few months. Because a recession must influence the economy broadly and not be confined to one sector, the committee emphasizes economy-wide measures of economic activity. Specifically, they consider real personal income less transfers, nonfarm payroll employment, employment as measured by the household survey, real personal consumption expenditures, wholesale-retail sales adjusted for price changes and industrial production. There is no fixed rule about what measures contribute to the process or how they are weighted, but the committee notes that "in recent decades, the two measures we have put the most weight on are real personal income less transfers and nonfarm payroll employment." Guide to the Markets – U.S. Data are as of November 16, 2022.

OUR SUGGESTIONS

Recession-Recovery Dashboard

Financial	Yield Curve ★
	Credit Spreads
	Money Supply
Inflation	Wage Growth
	Commodities
	Inflation (PCE)
Consumer	Housing Starts
	Jobless Claims
	Retail Sales
	Job Sentiment
Business Activity	ISM New Orders
	Profit Margins
	Truck Shipments

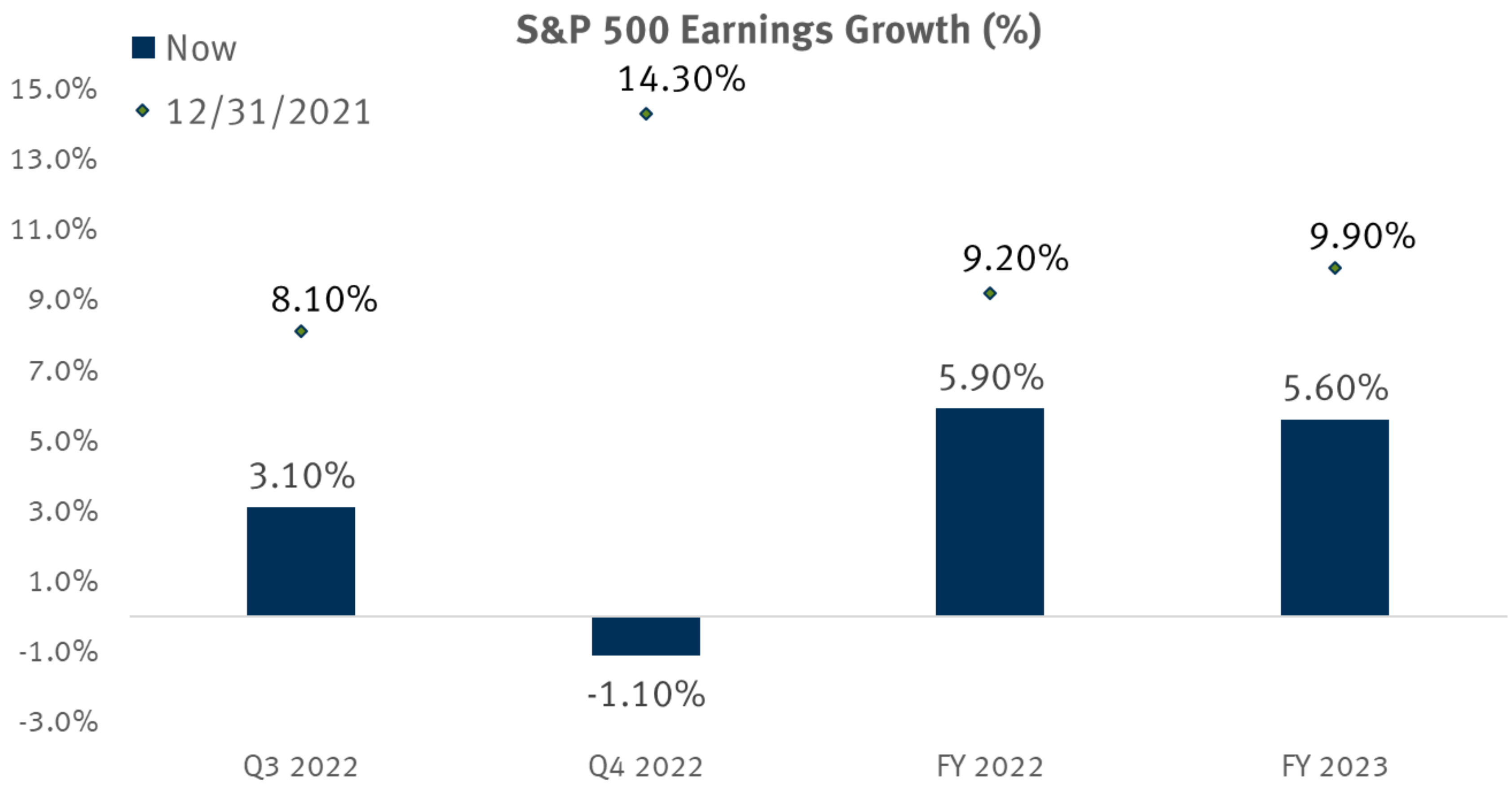
Expansion
Caution
Recession

- Various **yield curve** indicators suggest +50% probability of recession.
- **Credit spreads** have repriced on rate uncertainty outlook.
- **Money supply** growth has declined on normalized policy and banks cautiousness about lending money.
- **Wage growth is** contributing to inflationary pressures.
- **Commodities** may have eased on global growth fears but with OPEC+ policy to cut output, this represents an upside risk to energy prices.
- With the Fed being laser focused on **inflation** by aggressively tightening monetary policy, the probability of recession has gone up.
- **Housing starts** have stalled on higher costs, chain supply issues, and weak builder confidence.
- **Jobless claims** have rolled-over on a solid labor market.
- Overall **retail sales** remains supported by consumer spending.
- **Job sentiment has stabilized** as quits rate has been range-bound.
- **ISM New Orders** show manufacturing contracting while service remains in expansion.
- **Profit margins** remain historically high but risks are meaningful due to price pressures.
- **Truck shipments** indicate growth is slowing down.

★ *Previously in cautionary territory.*

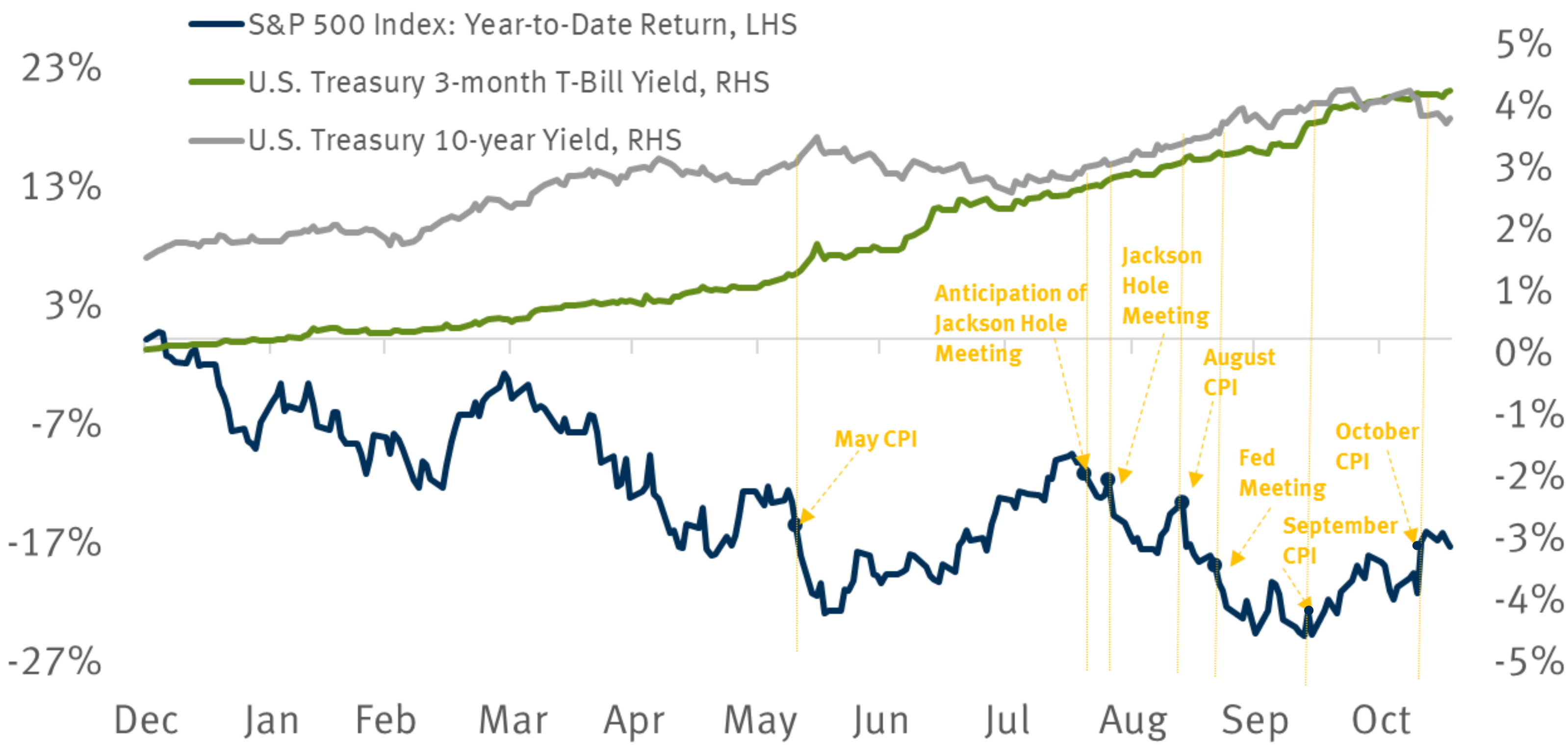
 Source: Stifel Investment Strategy data via Bloomberg, as of November 16, 2022

Many companies citing supply chain, inflation, and recession



Source: Stifel Investment Strategy via FactSet, as of November 16, 2022

MARKETS REACTING NEGATIVELY

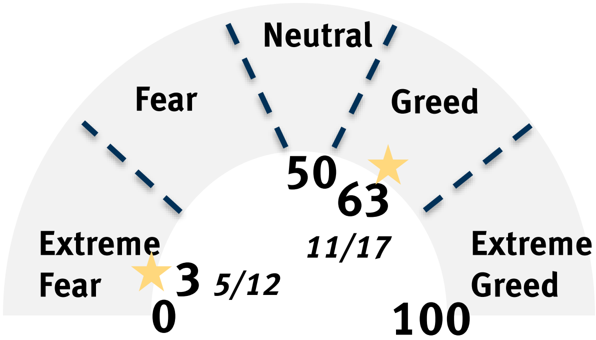


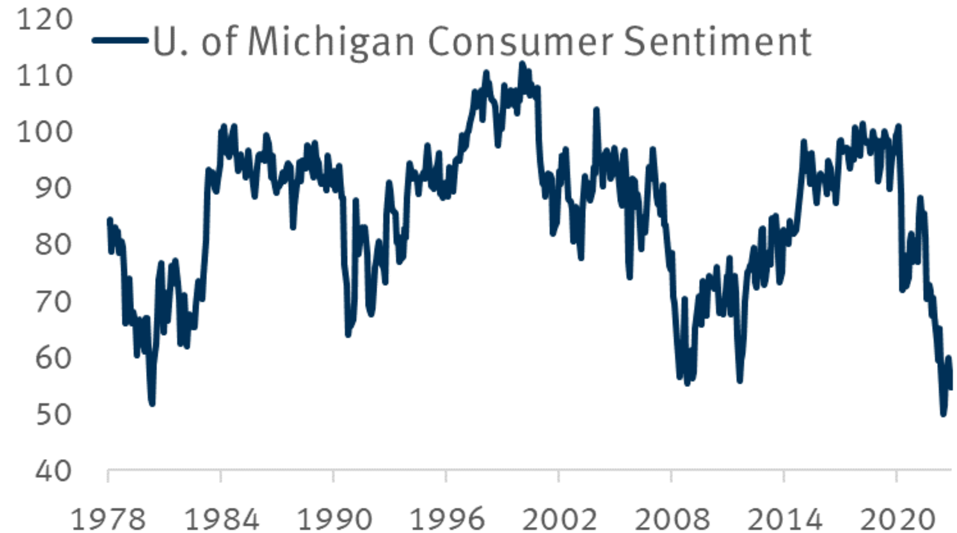
Source: Stifel Investment Strategy data via Bloomberg, as of November 17, 2022 (intra-day)

60/40 DISAPPOINTS IN 2022

Source: Stifel Investment Strategy data via Bloomberg, as of November 16, 2022. Data since 1977.

CNN – Fear and Greed Index



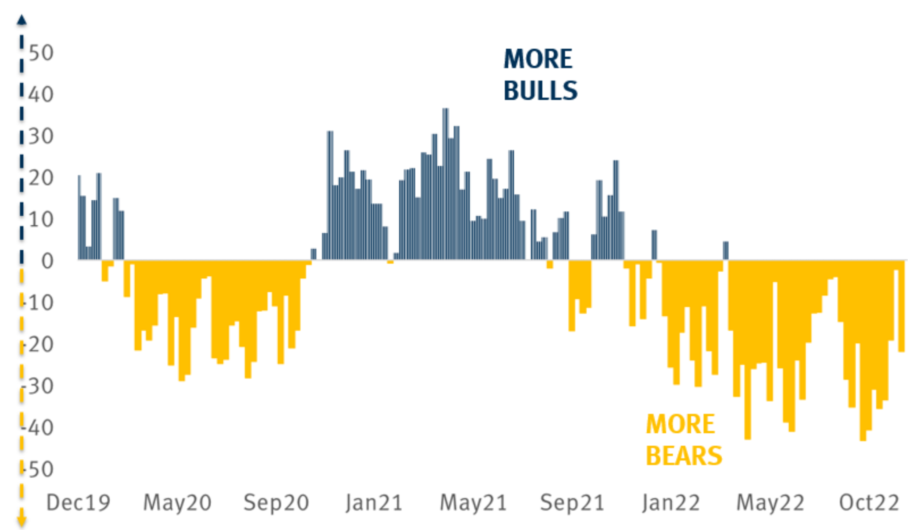


Global Fund Manager Survey

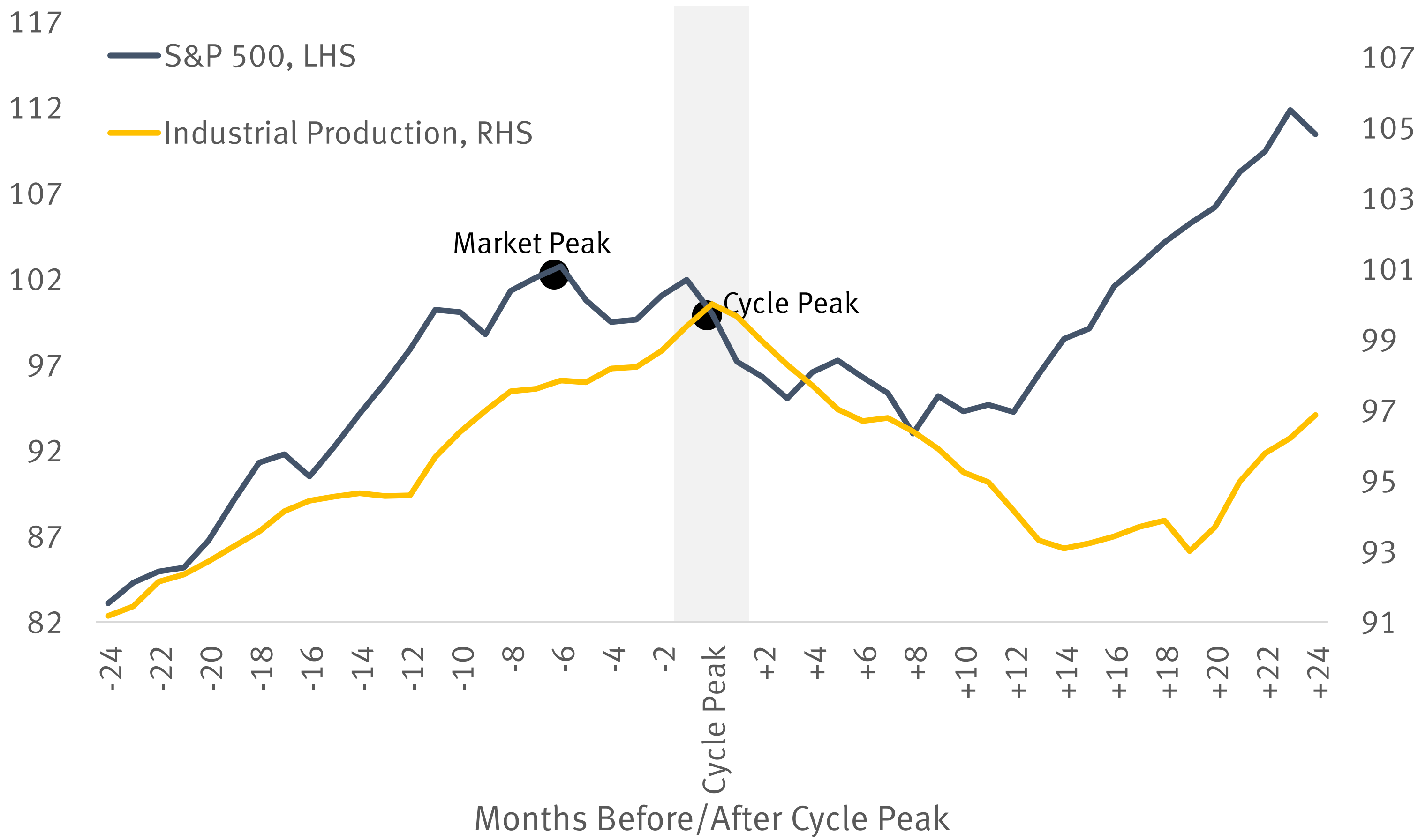
6.3%

Cash Allocation: The highest since 2001

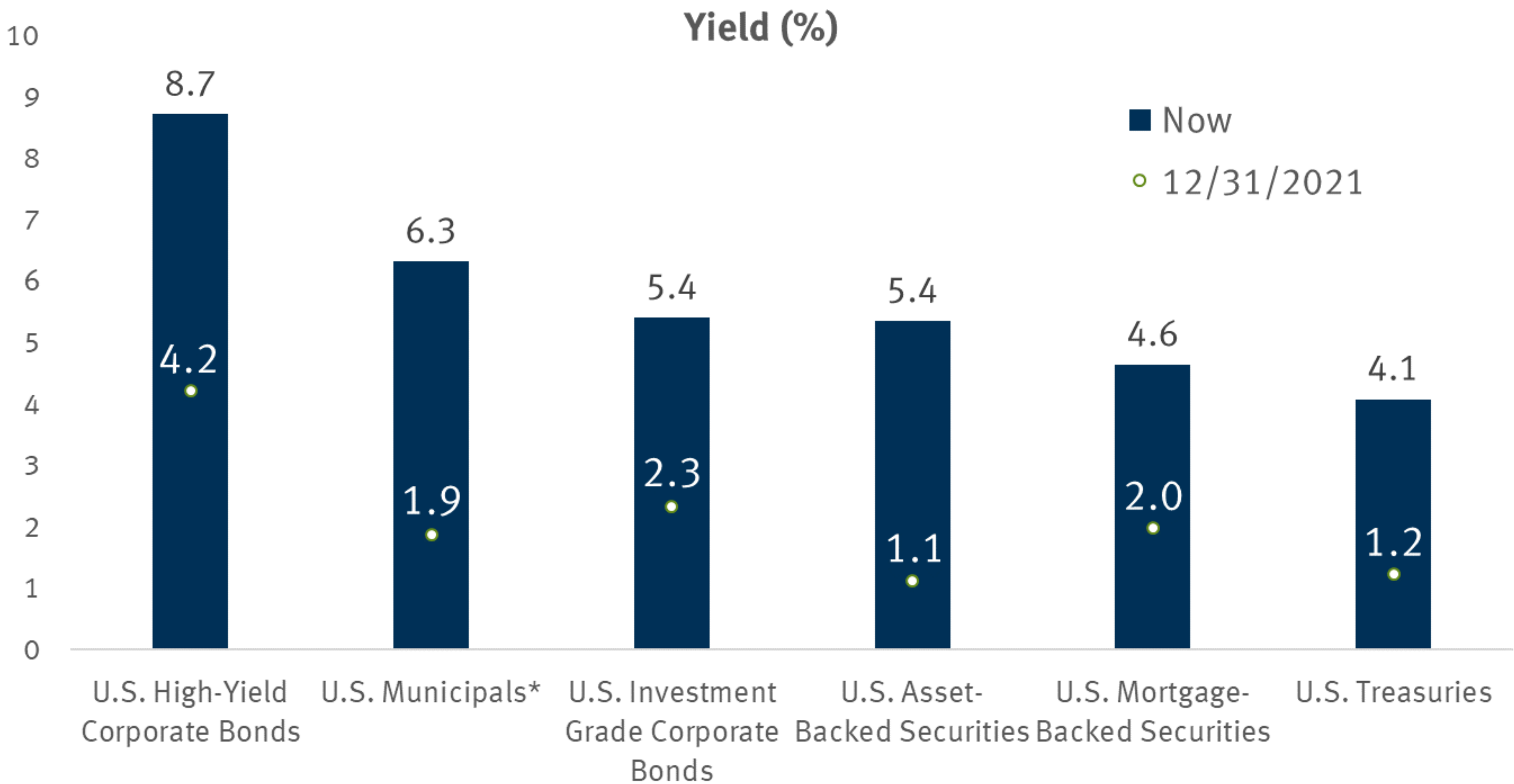
Weekly, AAII % bulls less % bears



Source: Stifel Investment Strategy data via Bloomberg and CNN and Bank of America Global Fund Manager Survey, as of November 17, 2022



Source: Stifel Investment Strategy data via Strategas Research Partners, as of November 16, 2022; Data since 1950.



**Based on taxable equivalent yield.*

Source: Stifel Investment Strategy data via Bloomberg, as of November 16, 2022

GEOPOLITICAL TENSIONS

- G20 Summit: "Recover Together, Recover Stronger."
- Ukraine detailed a 10-point peace plan to end Russia's invasion, with some signals of international support.
- President Biden met in person with President Xi for the first time since taking office, setting the stage for future negotiations in the near term.

NAVIGATING THE REST OF 2022

SEPTEMBER	
2	Employment
13/14	Inflation
15	Retail Sales
16	Consumer Sentiment
20/21	Housing
21	Fed Policy Decision
21	FOMC Economic Projections

OCTOBER	
7	Employment
12	Federal Open Market Committee (FOMC) Minutes
13/14	Inflation
14	Retail Sales
14	Consumer Sentiment
19/20	Housing
27	Third Quarter GDP (Adv Est.)

NOVEMBER	
2	Fed Policy Decision
4	Employment
8	Mid Term Elections
10	CPI/Core CPI
11	Consumer Sentiment
15	PPI/Core PPI
16	Retail Sales
17/18	Housing
23	FOMC Minutes

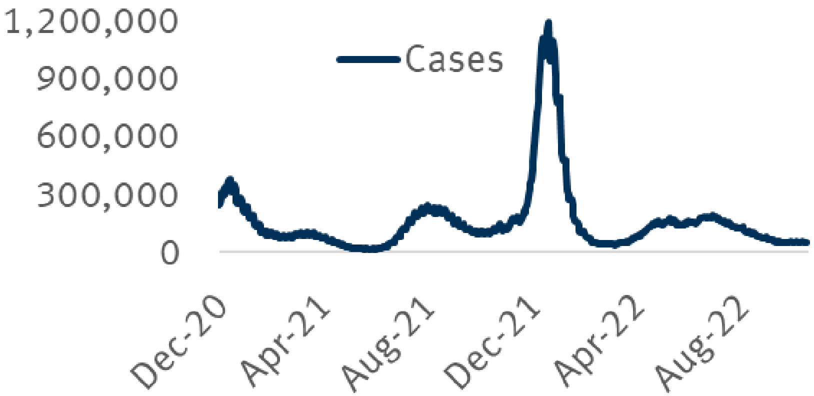
DECEMBER	
2	Employment
9	Consumer Sentiment
9/13	Inflation
14	Fed Policy Decision
14	FOMC Economic Projections
15	Retail Sales
20/21	Housing

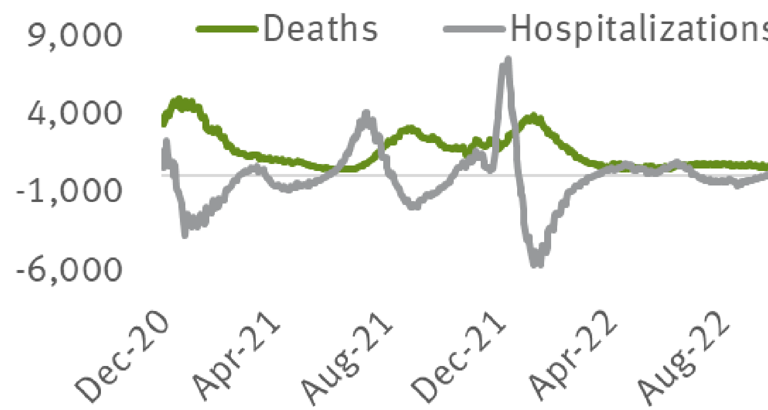
OTHER IMPORTANT TOPICS

- Russia-Ukraine War
- China-Taiwan Tensions
- Progression of Earnings Forecasts
- Third Quarter Earnings Season
- Progression of PMI measures
- Business and consumer sentiment
- Global Inflation
- Global Central Bank Policy

Macro Environment

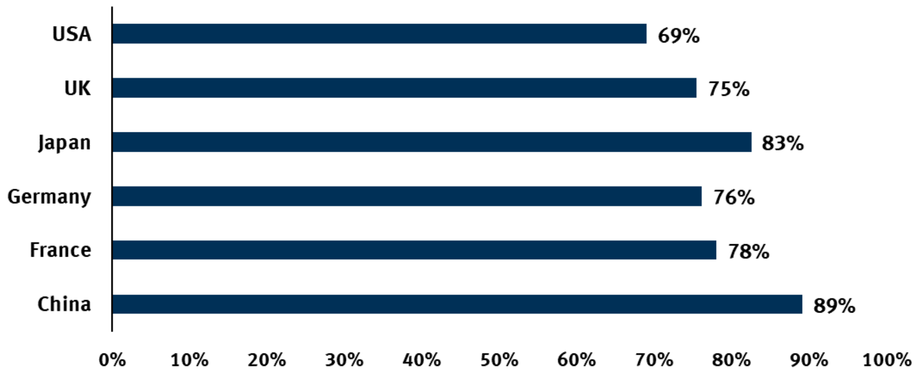
PANDEMIC EASING





Source: Stifel Investment Strategy via Bloomberg, Our World in Data, as of November 17, 2022; based on 7-day moving average data. Change in cases, deaths, and hospitalizations shown above.

Share of Population Fully Vaccinated



Source: Stifel Investment Strategy via ourworldindata.org as of November 17, 2022

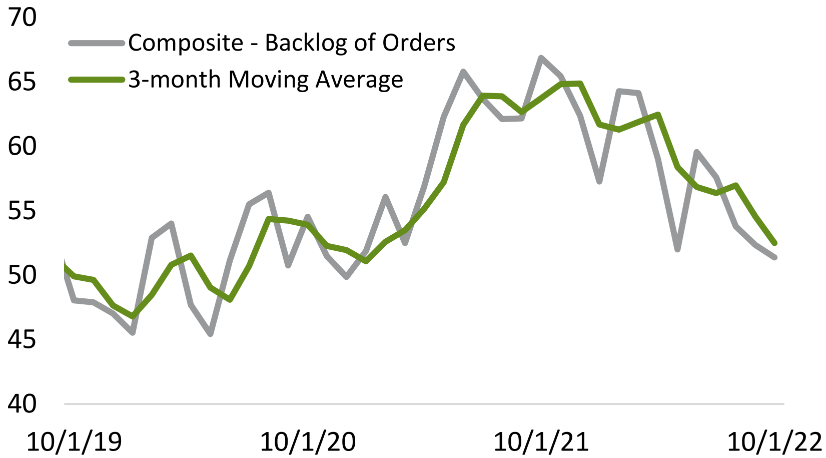
EFFECTIVENESS AT PREVENTING

		Original Strain		Omicron Variant	
	Vaccine	**Severe Disease**	**Infection**	**Severe Disease**	**Infection**
U.S.	Johnson & Johnson	86%	72%	57%	33%
	Moderna	97%	92%	73%	48%
	Pfizer/BioNTech	95%	86%	72%	44%
China	CanSino	66%	62%	48%	32%
	CoronaVac	50%	47%	37%	24%
	Sinopharm	73%	68%	53%	35%

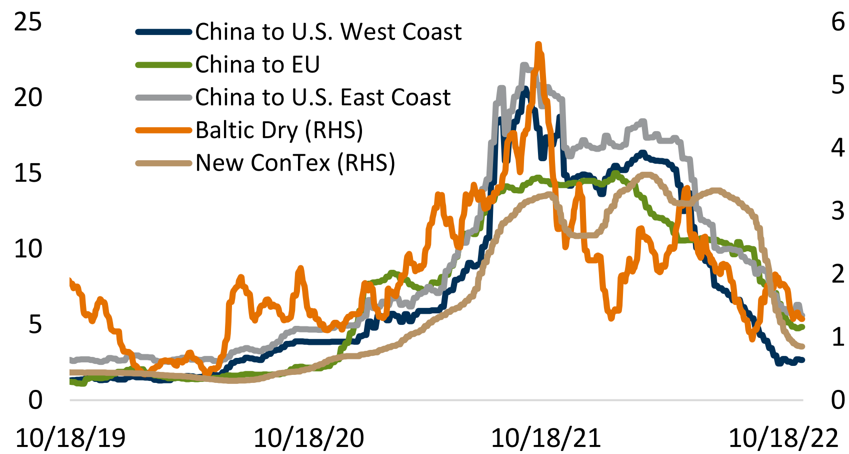
Source: Stifel Investment Strategy via IHME healthdata.org as of February 18, 2022

Market Sight|Lines - Exploring the Data: Supply Chain Pressures May Be Easing

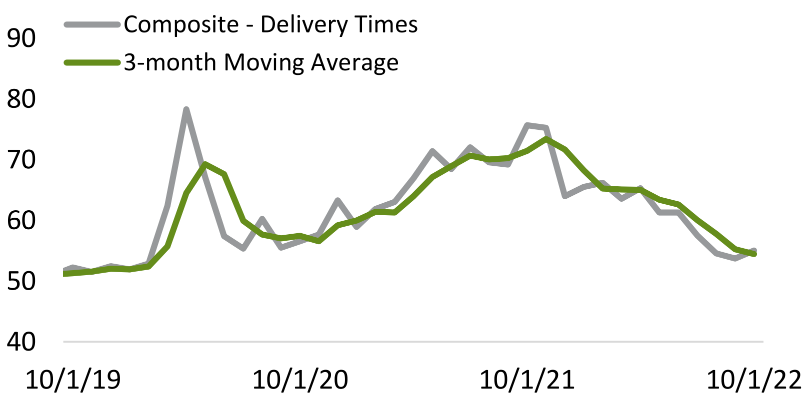
Institute of Supply Management (ISM) – Backlog of Orders



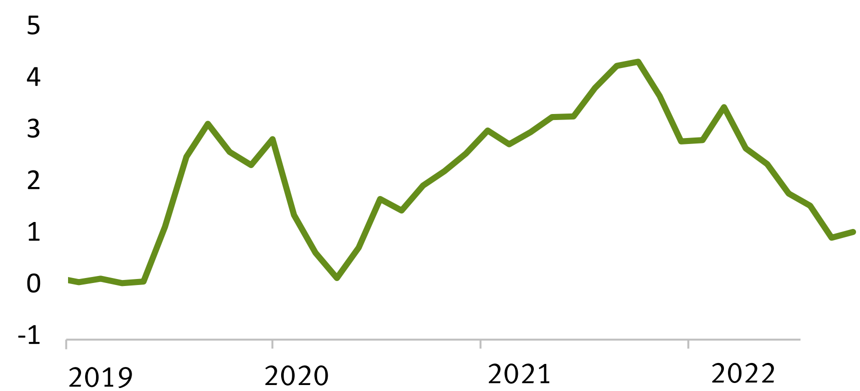
Shipping Costs ($000)



ISM Supplier Deliveries



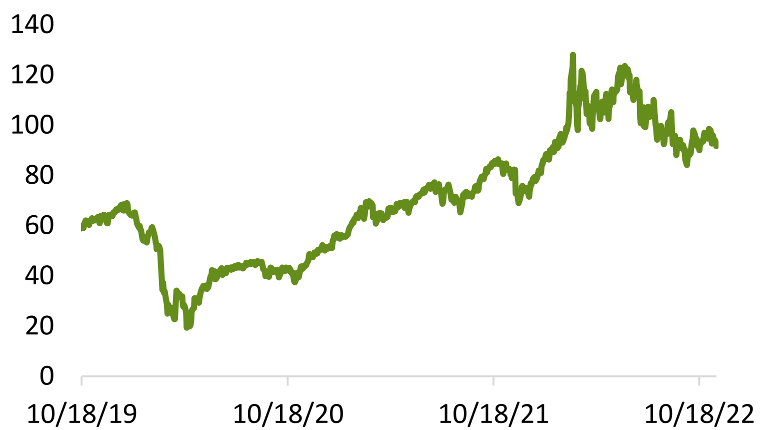
Global Supply Chain Pressure Index



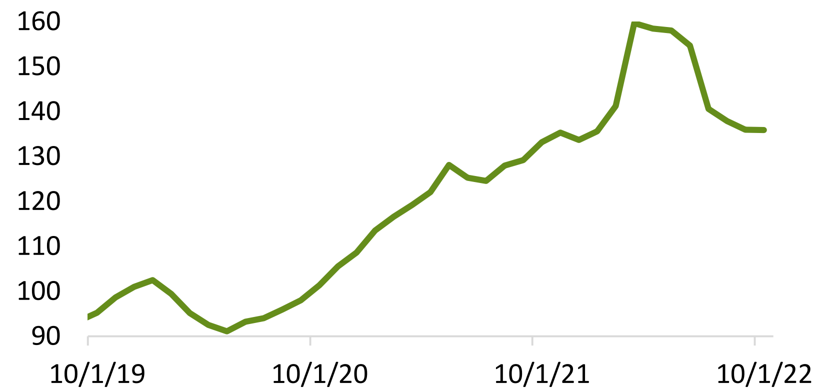
Source: Stifel Investment Strategy data via Bloomberg, as of November 17, 2022

Market Sight|Lines - Exploring the Data: Inflation May Be Cooling

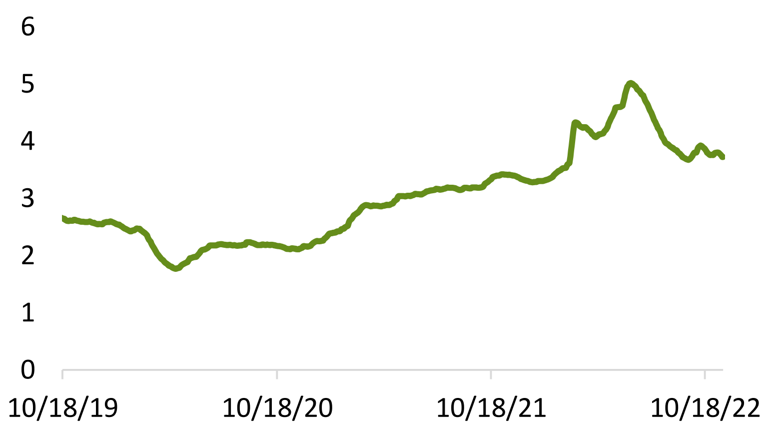
Brent Crude Oil ($/barrel)



FAO Food Price Index



Average Gas Price ($/gallon)



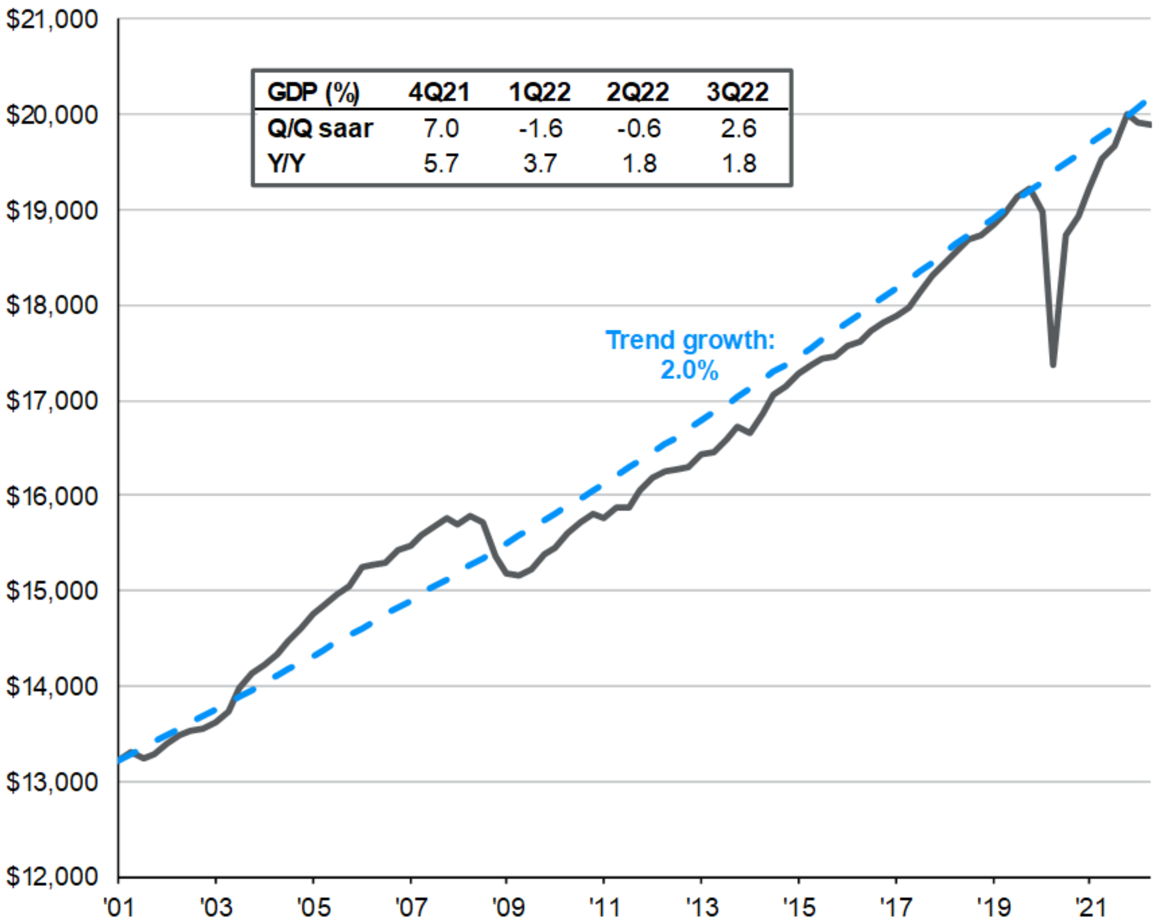
Source: Stifel Investment Strategy data via Bloomberg, as of November 17, 2022

Consumer Price Index (CPI)

	CPI		Core CPI	
	Monthly	Annualized	Monthly	Annualized
2020	0.11%	1.29%	0.13%	1.60%
2021	0.57%	7.10%	0.45%	5.48%
1H22	0.89%	11.16%	0.55%	6.85%
Jul '22	0.00%	0.00%	0.30%	3.66%
Aug '22	0.10%	1.21%	0.60%	7.44%
Sep '22	0.40%	4.91%	0.58%	7.19%
Oct '22	0.40%	4.91%	0.27%	3.29%

Real GDP

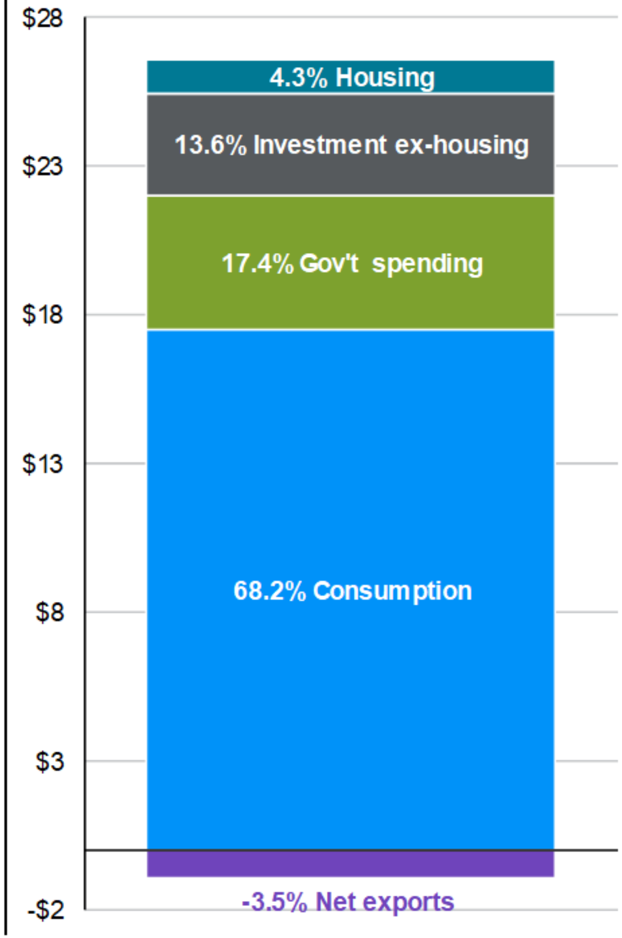
Billions of chained (2012) dollars, seasonally adjusted at annual rates



GDP (%)	4Q21	1Q22	2Q22	3Q22
Q/Q saar	7.0	-1.6	-0.6	2.6
Y/Y	5.7	3.7	1.8	1.8

Components of GDP

3Q22 nominal GDP, USD trillions



Source: BEA, FactSet, J.P. Morgan Asset Management. Values may not sum to 100% due to rounding. Trend growth is measured as the average annual growth rate from business cycle peak 1Q01 to business cycle peak 4Q19. Guide to the Markets – U.S. Data are as of November 16, 2022.

ECONOMIC GROWTH COLLAPSING

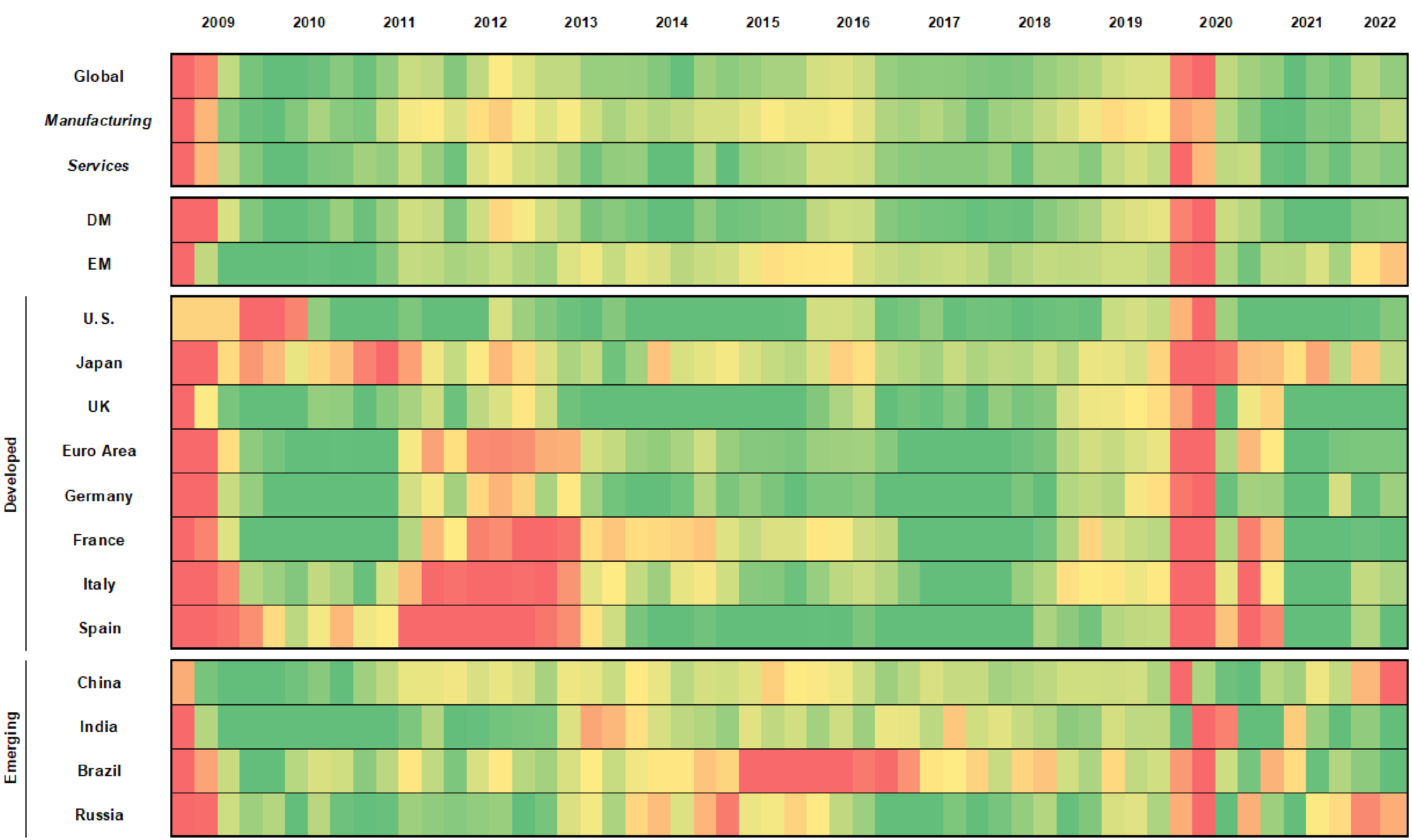
U.S. GDP	Q1 22	Q2 22	Q3 22	Q4 22	Q1 23	Q2 23	Q3 23	Q4 23	2021	2022	2023
Consensus Estimates	-1.6	-0.6	2.6	0.6	-0.1	-0.1	0.6	1.0	5.9	1.8	0.4
Stifel*	1.2	0.5	-1.1	-2.1	-0.8	-1.7	0.3	-0.9	5.3	-0.8	-0.8
Goldman Sachs	1.5	0.7	2.5	1.0	0.6	0.8	1.3	1.3	5.7	1.9	1.0
Capital Economics	1.2	1.2	3.3	0.8	-1.2	-0.7	-0.3	0.2	5.7	1.9	0.0
Strategas	1.0	-0.5	1.0	0.0	-0.5	0.0	1.5	0.5	5.6	1.8	0.4
UBS	1.5	-0.8	1.5	0.9	0.8	-0.9	-1.9	-1.6	5.6	1.9	0.1
Wells Fargo	0.6	0.2	2.9	1.1	0.7	0.1	-2.5	-3.2	5.6	1.9	0.1
Bloomberg Economics	1.2	1.0	2.0	1.0	1.3	0.6	-1.0	-0.8	5.6	1.8	0.7
Barclays	1.5	-0.4	2.0	0.0	-0.5	-1.0	-0.5	0.5	5.6	1.8	-0.1
JPMorgan Chase	1.1	0.7	3.0	1.5	1.0	0.8	0.8	0.5	5.7	1.9	1.1
Bank of America ML	1.0	-1.5	1.0	0.5	-1.5	-1.5	1.5	1.0	5.6	1.8	-0.4
Federal Reserve**									5.5	0.2	1.2

Annualized percent change from prior quarter and year-over-year change are shown for quarterly and yearly periods, respectively.
*Based on Stifel sell-side Economics department estimates. **Percent change from fourth quarter to fourth quarter one year ago.

Source: Stifel Investment Strategy data via Bloomberg, as of November 17, 2022. Federal Reserve estimates are as of September 21, 2022. Figures in grey areas under "Consensus Estimates" represent reported results.

ECONOMIC GROWTH COLLAPSING

Global Composite (manufacturing & services combined) Purchasing Managers' Index, quarterly



	2022 Sep	2022 Oct
Global	49.6	49.0
Manufacturing	49.8	49.4
Services	50.0	49.2
DM	49.3	48.5
EM	50.1	49.8
U.S.	49.5	48.2
Japan	51.0	51.8
UK	49.1	48.2
Euro Area	48.1	47.3
Germany	45.7	45.1
France	51.2	50.2
Italy	47.6	45.8
Spain	48.4	48.0
China	48.5	48.3
India	55.1	55.5
Brazil	51.9	53.4
Russia	51.5	45.8

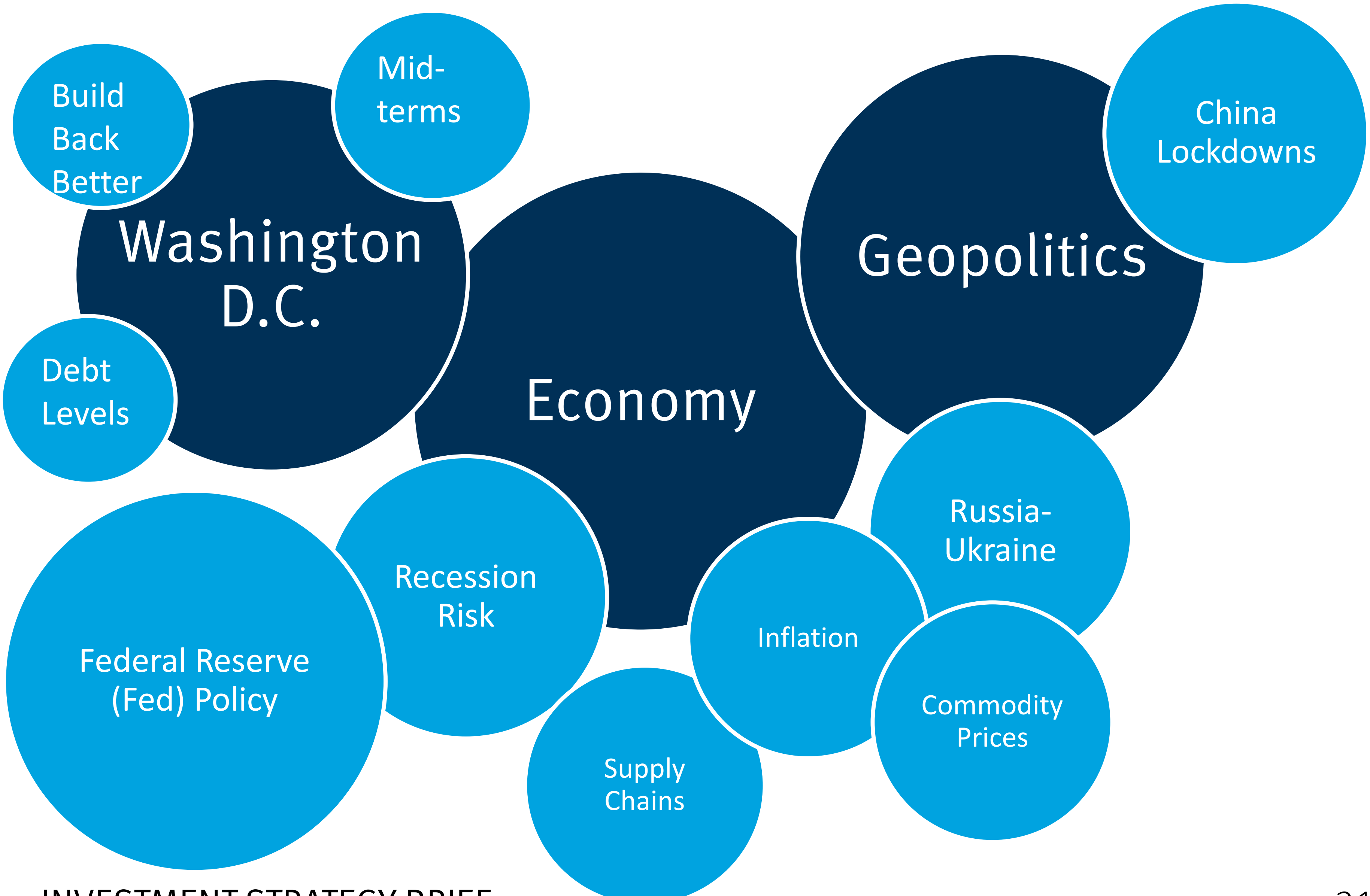
Source: Standard & Poor's, J.P. Morgan Asset Management. The Composite PMI includes both manufacturing and services sub-indices. Heatmap colors are based on PMI relative to the 50 level, which indicates acceleration or deceleration of the sector, for the time period shown. Heatmap is based on quarterly averages, with the exception of the two most recent figures, which are single month readings. Data for the U.S. are back-tested and filled in from December 2007 to September 2009 due to lack of existing PMI figures. DM and EM represent developed markets and emerging markets, respectively. Guide to the Markets – U.S. Data are as of November 16, 2022.

MOVING CLOSER TO RECESSION

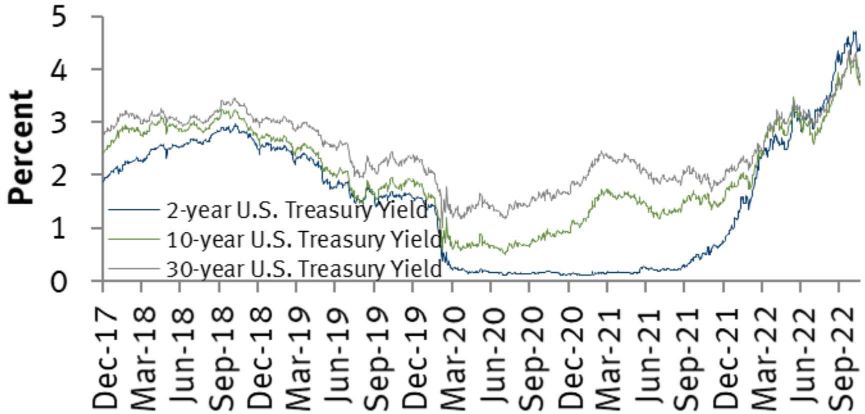
EARLY Acceleration in economic growth	MID Positive, but moderating growth	LATE Growth rate slows to trend or below-trend	RECESSION Growth contracts
Lower consumer spending	Recovering consumer spending	Strong consumer spending	Falling consumer spending
Credit creation low	Credit creation rising	Credit creation rising faster	Credit creation declining
Company profits recovering	Company profits peaking	Company profits under pressure	Company profits contracting
Fiscal/monetary policy accommodative	Fiscal/monetary policy shifting to neutral	Fiscal/monetary policy contractionary	Fiscal/monetary policy easing

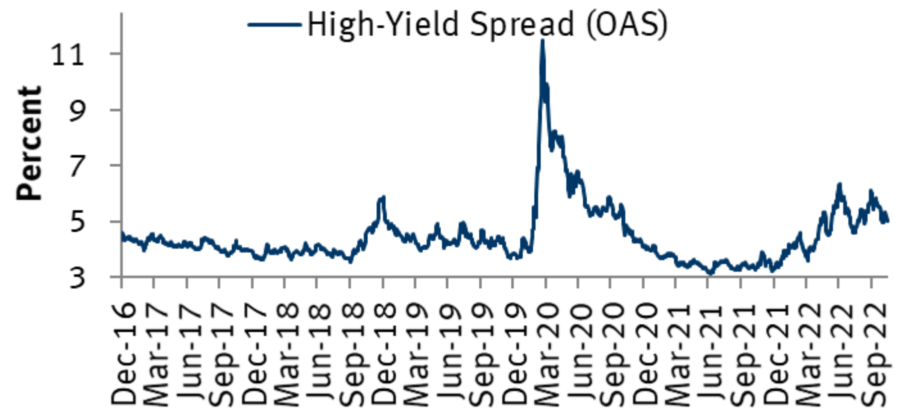
Markets

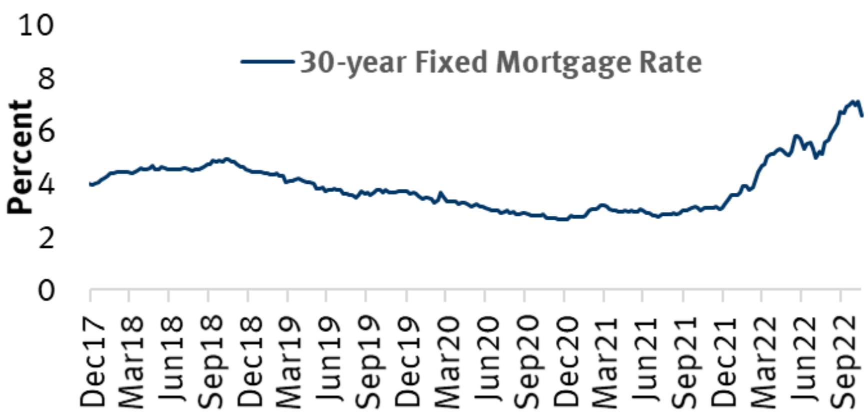
SOURCES OF VOLATILITY

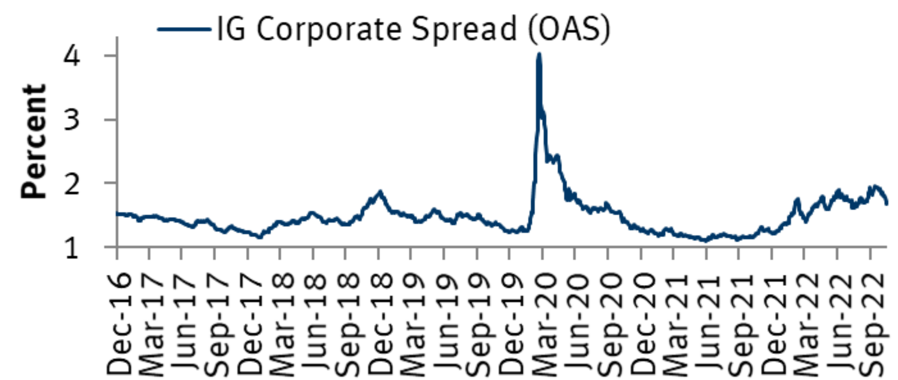


Rates and Spreads





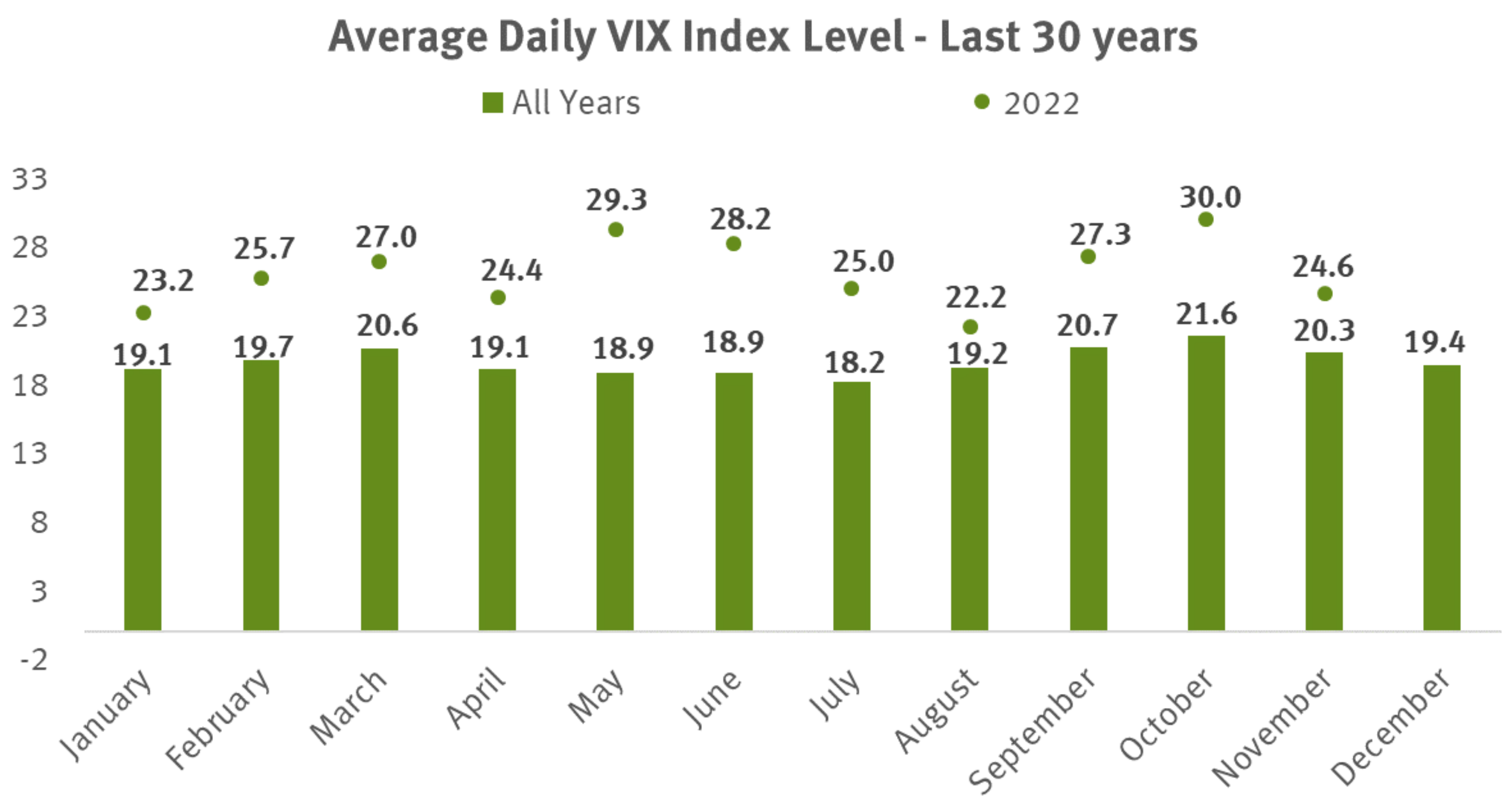




OAS Spread is the measurement of the spread of a fixed-income security rate and the risk-free rate of return, which is adjusted to take into account an embedded option

Source: Stifel Investment Strategy data via Bloomberg, as of November 17, 2022 (intra-day)

2022 A VOLATILE YEAR



Source: Stifel Investment Strategy data via Bloomberg, as of November 17, 2022 (intra day)

A HAWKISH SHIFT LIKE NO OTHER?

First Fed Rate Hike	Last Fed Rate Hike	S&P 500 Return	Months to Recession
Feb-72	May-74	-7.4%	20
Nov-76	Mar-80	30.3%	37
Aug-80	Dec-80	12.1%	11
Apr-83	Aug-84	8.0%	86
Dec-86	Sep-87	30.5%	43
Mar-88	Feb-89	15.1%	27
Feb-94	Feb-95	0.7%	85
Jun-99	May-00	9.7%	21
Jun-04	Jun-06	16.2%	42
Dec-15	Dec-18	30.5%	50
	Median	**13.6%**	**40**
	Average	**14.6%**	**42**
Mar-22	**?**	**-8.2%**	**?**

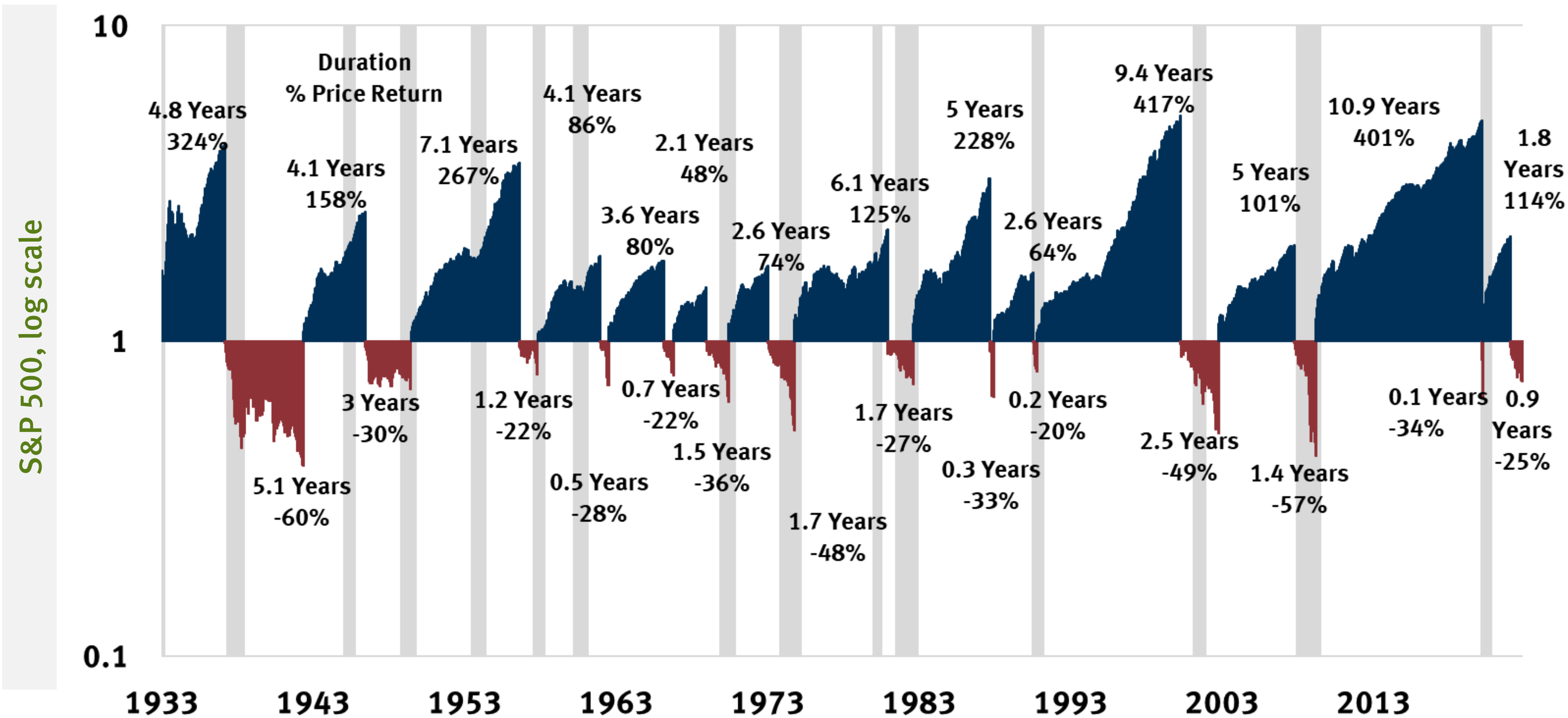
Source: Stifel Investment Strategy data via Bloomberg, as of November 16, 2022

RETESTING BEAR MARKET LOWS

Index	2021 1st Half	2021 2nd Half	2021 Full Year	2022 YTD
S&P 500 Index	15.2%	11.7%	28.7%	-15.8%
Russell 1000 Value	17.0%	6.9%	25.1%	-6.6%
Russell 1000 Growth	13.0%	12.9%	27.6%	-25.4%
NYSE FANG+ Index	15.2%	2.1%	17.7%	-36.9%
Russell 2000 Index	17.5%	-2.3%	14.8%	-16.5%
MSCI EAFE Index	8.8%	2.2%	11.3%	-15.6%
MSCI EM Index	7.4%	-9.3%	-2.5%	-20.6%
Bloomberg U.S. Aggregate	-1.6%	0.1%	-1.5%	-13.2%

Source: Stifel Investment Strategy data via Bloomberg, as of November 16, 2022

BULL AND BEAR MARKETS SINCE 1932



Source: Stifel Investment Strategy data via Bloomberg, Strategas Research Partners, as of November 17, 2022 (Intra-day)

Dynamic leanings

144 ASSET ALLOCATION MODELS FOR YOUR SELECTION

6
Risk Profiles

Conservative | Moderately Conservative | Moderate | Moderate Growth | Moderately Aggressive | Aggressive

2
Time Frames

- Strategic (Long Term)
- Dynamic (Near Term)

3
Levels of Liquidity

- Tier 1
- Tier 2
- Tier 3

2
Equity Choices

- U.S. Focused
- Global

2
Fixed Income Choices

- Tax Sensitive
- Taxable

Underweight | Neutral | Overweight

EQUITY

ASSET CLASS	CURRENT: Underweight	CURRENT: Neutral	CURRENT: Overweight	COMMENTS
U.S. Equity vs. Non-U.S. Equity		■		Non-U.S. equity valuations remain attractive relative to the U.S., but we are not compelled to remain overweight given the economic and geopolitical risks stemming from the war in Ukraine and China's zero-COVID policy.
U.S. Large Cap vs. U.S. Small Cap		■		We suggest a neutral allocation to small cap companies relative to large caps as higher rates, a shortage of labor, and higher cost pressures pose a challenge for smaller companies, which, while generally more nimble, tend to be more domestically oriented.
U.S. Large Value vs. U. S. Large Growth		■		We believe investors should have an allocation to both value and growth styles, with a preference for companies with stable profits and solid financial metrics. Rising rates and higher inflation are conditions that typically benefit the value style while the backdrop of a slowing economy typically favors growth stocks.
Non-U.S. Developed Markets vs. Emerging Markets		■		We are neutral within non-U.S. equity between developed and emerging markets, as we find the risks to be balanced between both. Our team is closely following the developments in Europe and China, and we are prepared to act swiftly as we receive further clarity on the macroeconomic outlook.
Europe vs. Japan		■		We are increasingly positive on the corporate governance reform in Japan that is likely to enhance shareholder value in the medium-to-long term. Given the highly uncertain environment, we elected to maintain our neutral leaning for the time being.

Underweight | Neutral | Overweight

	ASSET CLASS	CURRENT: Underweight	CURRENT: Neutral	CURRENT: Overweight	COMMENTS
FIXED INCOME	**U.S. Investment Grade vs. U.S. High Yield**		■		Within fixed income, we had been overweight of U.S. high yield relative to U.S. investment grade with the use of active management for almost 24 months. Strong commodity prices have helped many companies shore up their balance sheets. We have moved back to neutral relative to our strategic asset allocation given the rising risk of recession and limited upside potential in the near term.
FIXED INCOME	Corporates Government/Agency MBS		■		We recommend a diversified approach to the full spectrum of investment-grade fixed income.
FIXED INCOME	**Duration**		■		We don't expect longer-tenure interest rates to rise much higher from here. We view duration as a diversifier in a multiasset class portfolio and remain neutral to the overall market.
ALTERNATIVES	**Private Assets**		■		For investors interested in alternative investments and able to handle illiquidity, exposure to some combination of private equity, private debt, and/or private real estate can be considered as part of a diversified portfolio.
ALTERNATIVES	**Hedge Funds**		■		For investors interested in alternative investments and able to handle less liquidity who have conviction about manager skill, exposure to hedge funds can be a helpful part of a diversified portfolio. This is especially true in volatile, low-return environments.

Finding Our Guidance

See our publications at Stifelinsights.com

Helpful links to our economic/market analysis and corresponding investment guidance.

- *Sight|Lines* is a weekly note for clients, along with a video summary and a podcast on Spotify, Apple, Omny, and Google.
- Stifel Bits is designed for clients and prospects who might appreciate a breezy, lighthearted approach to our insights.
- Market Pulse is shared when the S&P 500 Index moves up or down 2%.
- The monthly *Investment Strategy Brief* video series shares our update on the current economic and market environment. The podcast: Spotify, Apple, Omny, and Google.
- The weekly, monthly, and quarterly *Market Perspectives* provide a recap of the most recent period's global market results.
- The monthly Favorite 15 shares our favorite 15 slides for the month.
- *Stifel's Allocation Insights* provides our dynamic asset allocation leanings quarterly.
- The *Stifel 2022 Outlook Report and Video:* provide our annual outlook and related articles.
- Stifel's Approach to Asset Allocation summarizes our asset allocation approach and provides a catalogue of various recommended asset mix models.
- The *Stifel Financial ID* video series provides an overview of our work in behavioral finance and the related *Stifel Financial ID* model.
- In *Conversations Podcast*, Stifel's Chief Investment Officer, Michael O'Keeffe, sits down with leaders at Stifel and in the finance industry to have thought-provoking conversations related to the finance industry. Episodes are released monthly.

Past performance is no guarantee of future results.

Index returns include the reinvestment of dividends but do not include adjustments for brokerage, custodian, and advisory fees.

Indices are unmanaged, do not reflect fees and expenses, and are not available for direct investment.

Past performance does not guarantee future results. Investing involves risk, including the possible loss of principal. Asset allocation and diversification do not ensure a profit or protection against loss.

Alternative Investments or Non-Traditional Assets – Alternative investments may include, but are not limited to: Real Estate Investment Trusts (REITs), Commodities, Futures, Hedge Funds, Venture Capital, Limited Partnerships, etc.

Real Estate – When investing in real estate companies, property values can fall due to environmental, economic, or other reasons, and changes in interest rates can negatively impact the performance.

Commodities and Futures – The risk of loss in trading commodities and futures can be substantial. You should therefore carefully consider whether such trading is suitable for you in light of your financial condition. The high degree of leverage that is often obtainable in commodity trading can work against you as well as for you. The use of leverage can lead to large losses as well as gains.

Hedge Funds – *Investors should be aware that hedge funds often engage in leverage, short-selling, arbitrage, hedging, derivatives, and other speculative investment practices that may increase investment loss. Hedge funds can be highly illiquid, are not required to provide periodic pricing or valuation information to investors, and often charge high fees that can erode performance. Additionally, they may involve complex tax structures and delays in distributing tax information. While hedge funds may appear similar to mutual funds, they are not necessarily subject to the same regulatory requirements as mutual funds.*

Venture Capital – Venture capital investments involve substantial risks. The risks associated with investing in companies in the start-up or expansion stages of development are greater than those of companies in later stages, because the companies' business concepts generally are unproven and the companies have little or no track record.

Limited Partnerships – Generally, limited partnership investments are suitable only for a narrow class of relatively sophisticated investors. Limited partnership investments may be speculative in nature and be subject to resale restrictions or illiquidity. An investment is appropriate only for investors who have the capacity to absorb a loss of some or all of their investment.

Bonds – When investing in bonds, it is important to note that as interest rates rise, bond prices will fall. High-yield bonds have greater credit risk than higher quality bonds.

Duration – Duration is a measure of the sensitivity of the price -- the value of principal -- of a fixed-income investment to a change in interest rates. Duration is expressed as a number of years.

Standard Deviation – Standard deviation is a measure of the dispersion of a set of data from its mean. It is calculated as the square root of variance by determining the variation between each data point relative to the mean. If the data points are further from the mean, there is higher deviation within the data set.

International and Emerging Markets – There are special considerations associated with international investing, including the risk of currency fluctuations and political and economic events. Investing in emerging markets may involve greater risk and volatility than investing in more developed countries.

Private Equity – *Private equity funds are not appropriate for all investors. Investors should be aware that private equity funds may contain speculative investment practices that can lead to a loss of the entire investment. Private equity funds may invest in entities in which no secondary market exists and, as such, may be highly illiquid. The funds are not required to provide periodic pricing or valuation information to investors and often charge high fees that can erode performance. Additionally, they may involve complex tax structures and delays in distributing tax information.*

Short Positions – The investor should note that when a short position moves in an unfavorable way, the losses are theoretically unlimited. The broker will demand more collateral and the manager might have to close out that short position at an inopportune time to limit any further losses.

Small Company Securities – Small company securities are typically more volatile and carry additional risks, since smaller companies generally are not as well established as larger companies.

Bloomberg U.S. Treasury Bills 1-3 Months Index includes all publicly issued zero-coupon U.S. Treasury Bills that have a remaining maturity of less than three months and more than one month, are rated investment grade, and have $250 million or more of outstanding face value.

Bloomberg U.S. Corporate IG Index is an unmanaged index considered representative of fixed-rate investment-grade taxable bond debt.

Bloomberg U.S. Aggregate Corporate Index is an unmanaged index considered representative of fixed-rate investment-grade taxable bond debt.

Bloomberg U.S. Corporate High Yield is an unmanaged index considered representative of fixed-rate, noninvestment-grade debt.

Bloomberg U.S. Government Bond Index is an unmanaged index considered representative of fixed-rate, investment-grade US Government debt.

Bloomberg Global Aggregate This index provides a broad-based measure of the global investment-grade, fixed-rate debt market.

DXY Index is a measure of the value of the U.S. dollar relative to the value of a basket of currencies of the majority of the U.S.'s most significant trading partners.

S&P 500 Index is a capitalization-weighted index of 500 stocks. The index is designed to measure performance of the broad domestic economy through changes in the aggregate market value of 500 stocks representing all major industries.

Russell 1000 Index represents approximately 1,000 of the largest companies in the U.S. equity markets, the Russell 1000 is a subset of the Russell 3000 Index. The Russell 1000 (maintained by the Russell Investment Group) comprises over 90% of the total market capitalization of all listed U.S. stocks and is considered a bellwether index for large cap investing.

Russell 2000 Index measures the performance of the 2,000 smallest companies in the Russell 3000 index.

MSCI EAFE Index captures large and mid cap representation across Developed Markets countries around the world, excluding the U.S. and Canada. With 914 constituents, the index covers approximately 85% of the free float-adjusted market capitalization in each country.

MSCI Emerging Markets (EM) Index captures large and mid cap representation across 23 Emerging Markets (EM) countries. With 837 constituents, the index covers approximately 85% of the free float-adjusted market capitalization in each country.

Morgan Stanley Market implied pace of hikes index (MSPOKE) is the number of Fed rate hikes in the 12 months following the first rate hike implied by the Eurodollar interest rate futures market.

The MSCI World Index is a free float-adjusted market capitalization-weighted index that is designed to measure the equity market performance of developed markets.

Wilshire 5000 Index is a market-capitalization-weighted index of the market value of all stocks actively traded in the United States.

VIX Index shows the market's expectation of 30-day volatility. It is constructed using the implied volatilities of a wide range of S&P 500 index options.

EURO STOXX 50 is a stock index of Eurozone stocks designed by STOXX, an index provider owned by Deutsche Börse Group. According to STOXX, its goal is "to provide a blue-chip representation of Supersector leaders in the Eurozone

Cash & Cash Equivalent is represented by the Bloomberg U.S. Treasury 3-6 months Bill Index, comprised of treasury bills issued by the U.S. government with less than one year to maturity.

U.S. Government Bonds is represented by the Bloomberg U.S. Government Bond Index, comprised of the U.S. Treasury and U.S. Agency indexes.

U.S. Corp IG Bonds is represented by the Bloomberg U.S. Corporate Bond Index, comprised of the investment grade, fixed-rate, taxable corporate bond market.

High-Yield Bonds is represented by the Bloomberg U.S. Corporate High Yield Bond Index, comprised of U.S. Dollar denominated, high-yield, fixed-rate corporate bond market securities.

U.S. LC (Large Cap) equities is represented by Russell 1000 Index, comprised of 1,000 of the largest U.S. securities based on a combination of their market cap and current index membership.

U.S. SC (Small Cap) equities is represented by the Russell 2000 Index, comprised of 2,000 of the smallest U.S. securities based on a combination of their market cap and current index membership.

Developed International Equities is represented by the MSCI EAFE Index, comprised of equity securities that belong to markets outside of the U.S. and Canada.

Emerging Markets Equities is represented by the MSCI EM Index, comprised of equity securities that belong to emerging markets.

Moderate Bench stands for moderate benchmark portfolio return which is a blended portfolio of stocks (60% weight, represented by MSCI AC World Index) and bonds (40% weight, represented by Bloomberg U.S. Agg Gov/Credit).

MSCI AC World Index is comprised of equity securities belonging to 23 developed markets and 24 emerging markets countries.

Bloomberg U.S. Government/Credit Bond Index is comprised investment grade, dollar-denominated, fixed-rate Treasuries, government-related and corporate securities.

KBW Restoration Index is composed of 13 high-frequency economic indicators. These indicators include those with longer histories (initial jobless claims, MBA mortgage applications, and steel production) along with newly developed gauges tracking mobility, dining reservations, and airport traffic, among others. KBW set each of the 13 indicators to 100 as of the end of February 2020, the official end of the longest economic cycle in U.S. history, and update the Index each week.

NYSE FANG+ Index is an equal-dollar weighted index designed to track the performance of highly-traded growth stocks of technology and tech-enabled companies in the technology, media & communications and consumer discretionary sectors such as Facebook, Apple, Amazon, Netflix, and Alphabet's Google.