

Capital Market Outlook

February 13, 2023

All data, projections and opinions are as of the date of this report and subject to change.

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Macro Strategy—How Golden Is the Cross?: The 50-day moving average of the S&P 500 Index moved above its 200-day moving average in what technical analysts call the “golden cross.” On average, the cross appears to be a positive sign for one-year forward returns. But the macro backdrop matters. Forward returns were negative in golden cross years when the U.S. was in the back half of the business cycle and the profits cycle was peaking or deteriorating. This was the case in 1957, 1965, 1969, 1986 and 1999. We assess the U.S. economy is currently late cycle, and the profits cycle is deteriorating.

And there are a few bullish economic narratives that we are also skeptical of. 1) Hard data are not out of sync with bearish soft data, in our view. Real consumer spending on goods contracted for three straight quarters to end 2022. Since 1959, that has only happened in or around recessions. 2) Financial conditions continue to tighten, in our view. While mortgage rates have declined, the broader liquidity backdrop is deteriorating as evidenced by the money supply and much tighter lending standards in the Senior Loan Officer Survey. 3) Business investment spending (CAPEX) may indeed get some support from reshoring and fiscal stimulus implementation, but we think cyclical indicators are flashing red. 4) Productivity growth is cyclical, and productivity in the nonfinancial corporate sector is contracting at the fastest pace on record, consistent with recessions.

For investors, the cyclical macro backdrop prevents us from getting more excited about the golden cross. We think the economic data warrant maintaining a high-quality bias across Fixed Income and Equities and think a neutral weighting to Equities overall is appropriate.

Market View—Eyes Wide Open: Long Defense Due to Unfolding Super Cycle in Global Armaments: As Russia’s invasion of Ukraine nears its one-year anniversary, we are reminded that the peace dividend is spent—a significant fact not only for the U.S. but for many countries in Europe and Asia who lived comfortably and cheaply under the U.S. security umbrella.

With that in mind, and even as asset prices have gained support early in the year, the protracted conflict and heightened geopolitical risks serve as a wild card to asset prices and the global economic outlook.

Thought of the Week—Golden Cross, Golden Bull?: Bulls are roaring as a closely watched technical indicator flashes green. The golden cross achieved by the S&P 500 in the last few weeks has led investors to wonder whether the bear market has veered and if a new bull market may be charging forward. It is not irrational for investors to take this technical signal bullishly given that the S&P 500 tends to see positive forward returns, but there are notable exceptions to consider, namely the 1940s.

MACRO STRATEGY ►

Jonathan W. Kozy
Managing Director and Senior Macro Strategy Analyst

MARKET VIEW ►

Joseph P. Quinlan
Managing Director and Head of CIO Market Strategy

Lauren J. Sanfilippo
Director and Senior Investment Strategy Analyst

THOUGHT OF THE WEEK ►

Kirsten Cabacungan
Vice President and Investment Strategist

MARKETS IN REVIEW ►

Data as of 2/13/2023,
and subject to change

Portfolio Considerations

Overall, we are neutral Equities and Fixed Income due to our base case of a grind-it-out environment in 2023 but we see opportunities in total return sectors, dividend payers, high quality overall, and better opportunities in Small-caps and non-U.S. Equities later in the year. We maintain a preference for high quality bonds as nominal and real rates are some of the most attractive in over a decade, while the economy is deteriorating later in the economic cycle and recessionary signals increase. In addition, the inclusion of Alternative Investments,* for qualified investors, to help mitigate risk and/or potentially enhance portfolio returns should also increase in importance in 2023, in or opinion.

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* Many products that pursue Alternative Investment strategies are available only to qualified investors.

How Golden Is the Cross?

Jonathan W. Kozy, Managing Director and Senior Macro Strategy Analyst

The 50-day moving average of the S&P 500 Index moved above its 200-day moving average in what technical analysts call the “golden cross.” The historically bullish signal coalesced with a dominant macro narrative that suggested hard economic data are not corroborating soft data, financial conditions are easing with Federal Reserve (Fed) dovishness, business investment spending will support growth and productivity is turning a corner. Job growth also stopped slowing. The golden cross may be bullish on average, but a positive technical setup for U.S. Equities is facing a formidable challenge from business cycle dynamics. Below we challenge the expectation for “average” returns following a golden cross and present a different view of a few popular economic narratives. Overall, we remain cautious on risk assets and would maintain a high-quality bias across Fixed Income and Equities. We believe a neutral Equity weighting is still appropriate.

The profits cycle may be a golden cross spoiler. As our Thought of the Week points out, on average, the golden cross is positive for future equity returns. But more granular analysis shows a clear pattern related to the economywide profits cycle. Specifically, S&P 500 golden cross events that generated negative 260-day returns occurred mid-or-late cycle when economywide profits growth was peaking or deteriorating. This was the case in 1957, 1965, 1969, 1986 and 1999. We think this is where we are in the cycle right now—heading into a recession with a deteriorating profits cycle. The stronger the labor market is, the more pressure there is on profit margins as both real growth and inflation slow. BofA Global Research continues to believe 2023 earnings estimates have room to decline.

Both hard and soft economic data are deteriorating. Soft data like the Institute for Supply Management (ISM) Manufacturing Index suggest the U.S. economy is already contracting, consistent with the regional Fed manufacturing survey data that tell the same story. But it’s not just soft/survey data that are weak. Real retail sales peaked in March 2021. Over the three months through December, real retail sales contracted at a 6% annual rate. Real consumer spending on goods is also under pressure, and negative year-over-year (YoY) growth in goods spending rarely occurs outside recessions. The level of real spending on goods is also well above the long-term trend with some potential for normalization. On the business investment front, real nondefense capital goods orders excluding aircraft have managed just a 0.2% annualized gain in the last three months. Overall, we assess that real orders of core capital goods look frothy. In housing, both housing starts and permits are steadily declining with permits falling for three consecutive months. Ironically, it’s the soft data, the homebuilder confidence survey data that showed signs of stabilizing in January, while hard housing activity data are contracting.

We would also challenge the narrative that financial conditions are easing. The recent Equity rally was accompanied by a weaker dollar, declining long-term interest rates, including mortgage rates, and equity and macro bulls grabbed on to the narrative of easing financial conditions. Aggregate measures of financial conditions like the Goldman Sachs Financial Conditions Index also showed a small improvement. We think the narrative is exaggerated.

The San Francisco Fed’s proxy fed funds rate, designed to consider both the fed funds rate and broader financial conditions, is rising after subtracting headline personal consumption expenditure inflation. By this metric real interest rates have been positive and rising for seven straight months. Higher real interest rates indicate tighter conditions.

The Fed’s Senior Loan Officer Survey suggests tighter lending standards for both firms and consumers. Similarly, the percent of small businesses reporting that credit is harder to get is rising, according to the most recent National Federation of Independent Business (NFIB) survey. The index bottomed at 1% over a year ago but has been rising recently hit 7%, above the average for the last three business cycles and near a level that is associated with recessions.

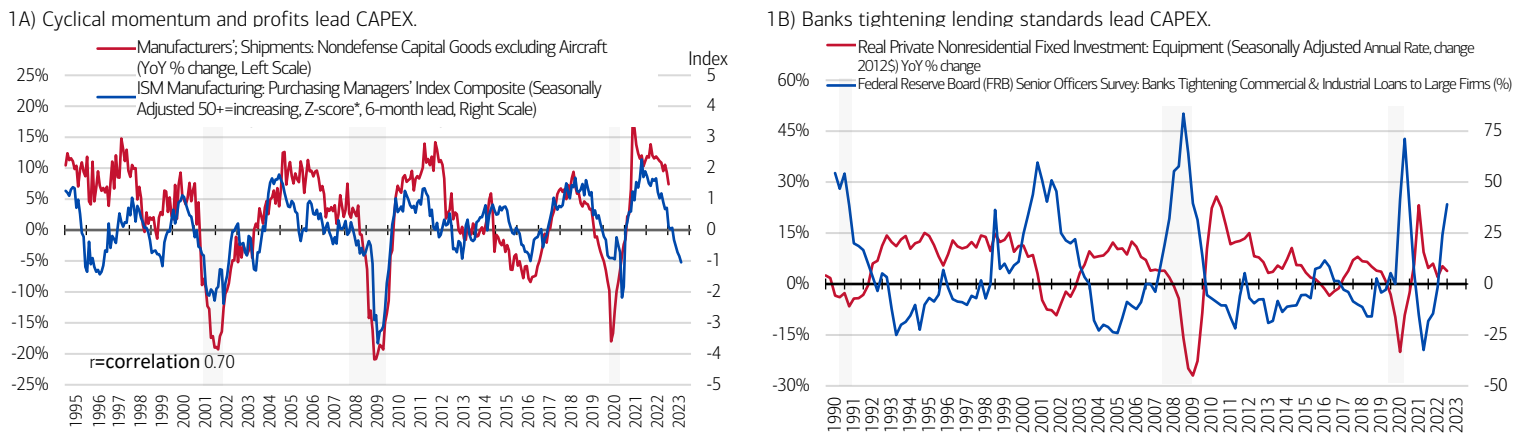
Investment Implications

We remain cautious on risk assets and would maintain a high-quality bias across Fixed Income and Equities. We believe a neutral Equity weighting is still appropriate.

Lastly, broader measures of money supply are consistent with a deteriorating liquidity backdrop. The monetary tide is going out, and leading indicators of credit conditions, like the Conference Board's leading credit index, are sniffing this out and rising.

Could deglobalization, reshoring and fiscal stimulus help CAPEX keep the U.S. economy out of a recession? Cyclically, the prospects look weak, on balance. Banks are tightening lending standards, the profits cycle is deteriorating, and survey data of demand like the ISM Manufacturing Index are not promising. As Exhibit 1 shows, both the ISM and lending standards lead CAPEX. Like the other investment sectors, business investment plays an outsized role at turning points in the business cycle because structures and equipment are expensive.

Exhibit 1: CAPEX Under Pressure.



Gray area represents recession periods. *Z-score= is the number of standard deviations from the mean value of the reference population. Sources: (Left Chart) Census Bureau; ISM. Data as of February 2, 2023. (Right Chart) Bureau of Economic Analysis; FRB. Data as of February 6, 2023.

There are positive forces at work that could moderate any CAPEX downturn. Global growth is picking up. And fiscal stimulus implementation is indeed substantial. The economics of national security will certainly be tested through this business investment (CAPEX) spending cycle. CAPEX may not save the day, but we could get a bigger rebound on the other side of cyclical downturn.

The National Bureau of Economic Research (NBER) used jobs data as a key input to determining if the economy is in a recession, but productivity is also cyclical, and nonfinancial corporate sector productivity is the weakest of the postwar period, according to the most recent Bureau of Economic Analysis (BEA) data. Why does this matter? Productivity has a cyclical pattern. It falls in recessions as top-line growth slows, but firms hang on to labor for too long. Sound familiar? The rebound coming out of the recession is very strong because firms have cut labor during the recession and are “lean and mean” about the time growth, and profits are rebounding, leading to a surge in productivity. The recent collapse in productivity is very consistent with recessionary periods. Real economic growth and inflation are slowing, but firms are late to the game to protect margins. This will likely come through cuts to labor, CAPEX or both.

Economists don't measure productivity. It is a residual figure. But it makes sense that productivity is weak because top-line growth is slowing, final sales to consumers and businesses are slowing, and yet firms continue to hire in aggregate. There appears to be a reluctance for firms to fire workers, perhaps as a result of the “money illusion” associated with higher inflation. For example, small businesses in the NFIB survey are indicating strong hiring intentions at the same time they are giving recessionary responses to the question on expectations of real sales.

A key point is that while a less hawkish Fed and a technical golden cross seem bullish for Equities, the macro context matters. With this in mind, we are holding tight with a cautionary tone on risk assets.

Eyes Wide Open: Long Defense Due to Unfolding Super Cycle in Global Armaments

Joseph P. Quinlan, Managing Director and Head of CIO Market Strategy

Lauren J. Sanfilippo, Director and Senior Investment Strategy Analyst

"I fear the world is not sleepwalking into a wider war. I fear it is doing so with its eyes wide open".

Antonio Guterres, Secretary General of the United Nations

After handily outperforming the broader S&P 500 Index in 2022, Large-cap defense stocks have lagged this year, with profit-taking and concerns of U.S. defense cuts weighing on the sector. Year-to-date, the aerospace and defense S&P 500 subsector is flat for the year, as the broader S&P 500 Index has advanced 6.5%.

Notwithstanding this underperformance, however, and the taking the long view, we remain constructive on Large-cap U.S. defense plays because the world, simply stated, remains messy and disorderly, with no end in sight when it comes to percolating geopolitical hotspots. The spectacle of a Chinese military balloon being shot down off the coast of South Carolina is a graphic reminder of the fluid and unpredictable world we inhabit. Investors ignore these dynamics at their own peril.

It didn't used to be this way. Indeed, over the latter two decades of the 20th century, the world was largely at peace with itself. The globe's top cop, the U.S. military, not only kept order but also kept critical global sea lanes open, underwriting globalization and the unfettered crossborder flows of global commerce. It wasn't that long ago that the U.S. enjoyed no near-term rivals for global power and influence, and the world basically beat to the tune of America's rules-based, market-friendly order.

Investors, in return, were rewarded with a peace dividend—which took the form of greater global integration and linkages, that helped boost the profits of U.S. multinationals; declining U.S. budget deficits as military spending decreased; and lower taxes and inflationary pressures as part of the flow-through effects. The peace dividends were significant not only for the U.S. but also for many other regions of the world like Europe and Japan, who lived comfortably and cheaply under the U.S. security umbrella.

Times have changed, however. The favorable economic and budgetary effects of lower global military spending are behind us. Russia's invasion of Ukraine and China's growing military might have upended the global calculation, a seismic shift that should not be lost on investors. The Cold War of the 2020s means a ramping up of global military outlays, with annual global defense spending topping \$2 trillion for the first time in 2021. Leading the charge is the U.S., whose defense budget totaled a record high of \$858 billion fiscal year 2023; meanwhile, after supplying Ukraine with various arms and military capabilities over the past year, just restocking America's depleted stockpiles of munitions augurs for higher-than-expected spending over the balance of this decade (Exhibit 2).

Abroad, various nations in Europe (Poland, Germany and France, for instance) and Asia (Japan) are also on track for record military outlays in the immediate years ahead. Ditto for China, whose military expenditures in 2021 (\$293 billion) was nearly 30 times the level of 1990 (roughly \$10 billion), according to figures from the World Bank.

Speaking of China, the possibility of a coming conflict over Taiwan was yet again recently underscored by comments from U.S. general Michael Minihan, head of the Air Force's Air Mobility Command. Per the General: "I hope I am wrong. My gut tells me we will fight in 2025."¹ The blunt assessment only serves to highlight the fact that the peace dividend long enjoyed by the global financial markets is a thing of the past.

Investment Implications

There's a bull market in defense spending from a global standpoint as countries commit more to military budgets with various nations in Europe (Poland, Germany and France, for instance) and Asia (Japan) on track for record military outlays in the immediate years ahead. Here in the U.S., and as a byproduct of supplying Ukraine, a necessary restock of depleted arms and military capabilities to U.S. stockpiles is additive to defense from an investment perspective.

¹ See "U.S. general warns troops that war with China is possible in two years," *Washington Post*, January 27, 2023.

Exhibit 2: The United States has committed \$30 billion in security assistance to Ukraine, including \$29.3 billion since Russia invaded Ukraine on February 24, 2022.

- Over 1,600 Stinger anti-aircraft systems;
- Over 8,000 Javelin anti-armor systems;
- Over 52,000 other anti-armor systems and munitions;
- Over 700 Switchblade Tactical Unmanned Aerial Systems;
- 160 155 millimeter (mm) Howitzers and over 1,000,000 155mm artillery rounds;
- Over 6,000 precision-guided 155mm artillery rounds;
- Over 10,000 155mm rounds of Remote Anti-Armor Mine (RAAM) Systems;
- 100,000 rounds of 125mm tank ammunition;
- 45,000 152mm artillery rounds; 20,000 122 mm artillery rounds
- 50,000 122mm GRAD rockets;
- 72 105mm Howitzers and 370,000 105mm artillery rounds;
- 298 Tactical Vehicles to tow weapons;
- 34 Tactical Vehicles to recover equipment;
- 30 ammunition support vehicles;
- 38 High Mobility Artillery Rocket Systems and ammunition;
- 30 120mm mortar systems and over 175,000 120mm mortar rounds;
- 10 82mm mortar systems; 10 60 mm mortar systems
- Over 2,500 Tube-Launched, Optically-Tracked, Wire-Guided missiles;
- 545,000 rounds of 25mm ammunition; 120mm ammunition;
- Precision-guided rockets; One Patriot air defense battery and munitions;
- Ten Command Post vehicles; 90 Stryker Armored Personnel Carriers;
- Eight National Advanced Surface-to-Air Missile Systems (NASAMS);
- Two HAWK air defense firing units and munitions;
- RIM-7 missiles for air defense; 12 Avenger air defense systems;
- Anti-aircraft guns and ammunition;
- Equipment to integrate Western with Ukraine's air defense systems;
- Equipment to sustain Ukraine's existing air defense capabilities;
- High-speed Anti-radiation missiles (HARMS);
- Precision aerial munitions; 4,000 Zuni aircraft rockets; 20 Mi-17 helicopters
- 31 Abrams tanks; 45 T-72B tanks;
- 109 Bradley infantry fighting vehicles;
- Over 1,700 High Mobility Multipurpose Wheeled Vehicles (HMMWVs);
- 300 M113 Armored Personnel Carriers; 250 M1117 Armored Security Vehicles;
- Over 500 Mine Resistant Ambush Protected Vehicles (MRAPs);
- Six armored utility trucks; Mine clearing equipment and systems;
- Over 13,000 grenade launchers and small arms;
- Over 100,000,000 rounds of small arms ammunition;
- Over 75,000 sets of body armor and helmets;
- Approximately 1,800 Phoenix Ghost Tactical Unmanned Aerial Systems;
- Laser-guided rocket systems;
- Puma Unmanned Aerial Systems;
- 15 Scan Eagle Unmanned Aerial Systems;
- Two radars for Unmanned Aerial Systems;
- 44 trucks and 88 trailers to transport heavy equipment;
- Unmanned Coastal Defense Vessels;
- Over 70 counter-artillery and counter-mortar radars; 20 multi-mission radars
- Counter-Unmanned Aerial Systems and equipment; Counter air defense capability
- 14 air surveillance radars;
- Two harpoon coastal defense systems;
- 58 coastal and riverine patrol boats;
- M18A1 Claymore anti-personnel munitions;
- C-4 explosives, demolition munitions and equipment for obstacle clearing;
- Obstacle emplacement equipment;
- Tactical secure communications systems; Four satellite communications antennas
- Satellite communication (SATCOM) terminals and services;
- Thousands of night vision devices, thermal imagery systems and laser rangefinders;
- Commercial satellite imagery services;
- Explosive ordnance disposal equipment and protective gear;
- Chemical, Biological, Radiological, Nuclear protective equipment;
- 100 armored medical treatment vehicles;
- Over 350 generators;
- Medical supplies such as first aid kits, bandages, monitors, and other equipment;
- Electronic jamming equipment;
- Field equipment, cold weather gear, and spare parts;
- Funding for training, maintenance, and sustainment.
- Over 100 light tactical vehicles;

Source: U.S. Department of Defense. Data as of February 7, 2023.

Equally as blunt were the recent remarks from the United Nations Secretary General Antonio Guterres. Speaking to the escalating nature of the conflict, one of the world's top diplomats said the following: "I fear the world is not sleepwalking into a wider war. I fear it is doing so with its eyes wide open." The inference being that the Ukraine-Russian conflict isn't just between two neighbors. Rather, its broadened out to include the U.S., Europe and various Asian states backing Ukraine versus China, Iran and others supporting Russia. This represents a combustible configuration that could upend global growth and torpedo global earnings (by the same token, some type of ceasefire or peace framework could be hugely bullish/supportive of global growth and earnings).

Suffice it to say that the Ukraine conflict remains a key known unknown—a wild card that could have an outsized influence on asset prices over the medium term. In an era more fraught by geopolitical risks, we have remained constructive on Large-cap U.S. defense contractors. While global Equities have gained support early in the year, investors should have their eyes wide open to overhanging geopolitical risks and position portfolios accordingly.

Golden Cross, Golden Bull?

Kirsten Cabacungan, Vice President and Investment Strategist

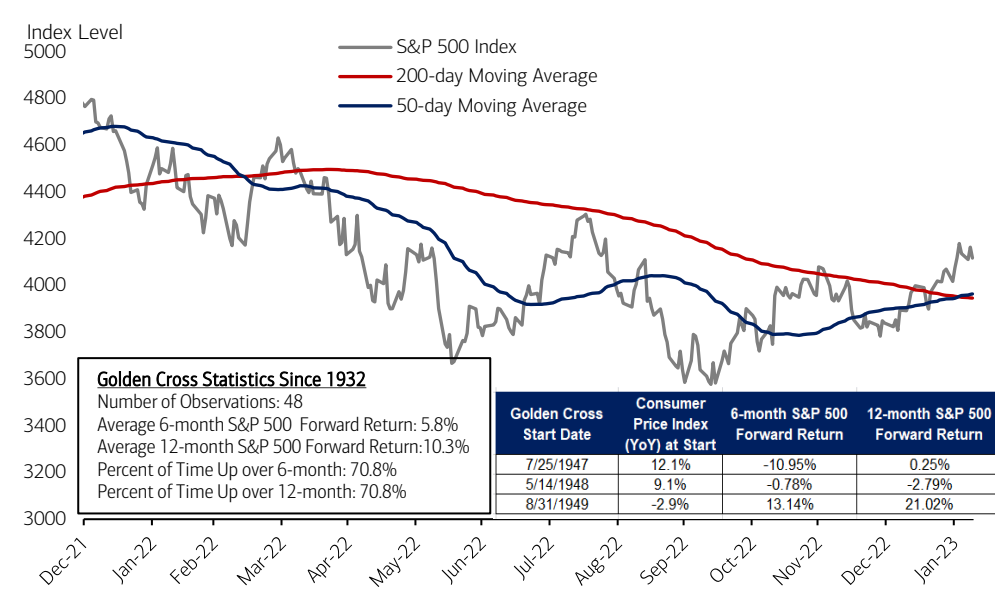
Bulls are roaring as a closely watched technical indicator flashes green. As recapped above in *How Golden Is the Cross?*, the S&P 500 achieved a golden cross where its 50-day moving average moved above its 200-day moving average, suggesting there may be momentum building behind an uptrend in equities. It's led investors to wonder whether the bear market has veered and whether a new bull market may be charging forward. There's no question that equity markets have seen a strong rally in the last few months. The S&P 500 rallied in January, gaining 6.2%, marking its strongest start to the year since 2019, and the index is up roughly 15.1% from its interim low established in October 2022. Market breadth has also widened out with 71.1% of S&P 500 constituents above their 200-day moving average.² The golden cross only adds to equity market optimism. In fact, the S&P 500 has gained on average 5.8% and 10.3% in the six- and 12-month periods following a golden cross and has seen positive returns 70.8% of the time for both forward return periods based on data since 1932 (Exhibit 3).²

Based on these trends, it is not irrational for investors to take this technical signal bullishly, but there are notable exceptions to consider. During the 1940s, for example, money supply growth surged two standard deviations above its historical trend, similar to what happened in the last few years, and inflation accelerated. The predictive power of the golden crosses that occurred in 1947 and 1948, amid elevated inflation, was weaker as equities ended down or flat in the subsequent six- and 12-month periods. It was not until 1949 when inflation bottomed that the signal appeared to work again. The upshot is that while the latest market development may kindle more bullish sentiment, the fundamental backdrop needs to improve for stability to be found. While inflation measures appear to be in a downward trend, certain stickier inflation components have kept the Fed in a hawkish mode. The uncertainty over the magnitude of the effect of aggressive policy tightening on earnings suggests further possible Equity volatility ahead.

Investment Implications

Despite bullish technical signals, uncertainty surrounding the fundamental backdrop remains. Thus, we remain neutral on both Equities and Fixed Income and expect a “grind-it-out” environment to persist in the next several months until there is more clarity about the magnitude of a recession and earnings downturn.

Exhibit 3: The S&P 500 Hit a Golden Cross.



Source: Bloomberg. Data as of February 8, 2023. Past performance is no guarantee of future results.

² Bloomberg. Data as of February 8, 2023.

Equities

	Total Return in USD (%)			
	Current	WTD	MTD	YTD
DJIA	33,869.27	-0.1	-0.6	2.3
NASDAQ	11,718.12	-2.4	1.2	12.1
S&P 500	4,090.46	-1.1	0.4	6.7
S&P 400 Mid Cap	2,639.30	-2.5	-0.5	8.7
Russell 2000	1,918.81	-3.3	-0.6	9.0
MSCI World	2,783.91	-1.3	0.0	7.1
MSCI EAFE	2,085.32	-1.6	-0.7	7.3
MSCI Emerging Markets	1,013.67	-2.4	-1.7	6.0

Fixed Income†

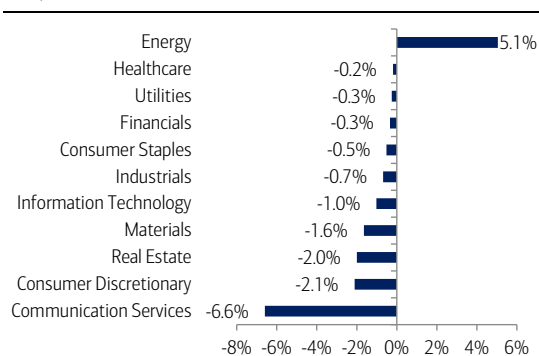
	Total Return in USD (%)			
	Current	WTD	MTD	YTD
Corporate & Government	4.56	-1.44	-1.54	1.43
Agencies	4.61	-0.62	-0.80	0.69
Municipals	3.22	-0.55	-0.44	2.42
U.S. Investment Grade Credit	4.56	-1.43	-1.48	1.55
International	5.23	-1.82	-1.75	2.19
High Yield	8.38	-1.78	-0.70	3.09
90 Day Yield	4.73	4.64	4.64	4.34
2 Year Yield	4.52	4.29	4.20	4.43
10 Year Yield	3.73	3.52	3.51	3.87
30 Year Yield	3.82	3.61	3.63	3.96

Commodities & Currencies

	Total Return in USD (%)			
	Current	WTD	MTD	YTD
Commodities				
Bloomberg Commodity	238.15	1.6	-2.7	-3.1
WTI Crude \$/Barrel††	79.72	8.6	1.1	-0.7
Gold Spot \$/Ounce††	1865.57	0.0	-3.3	2.3

	Total Return in USD (%)			
	Current	Prior Week End	Prior Month End	2022 Year End
Currencies				
EUR/USD	1.07	1.08	1.09	1.07
USD/JPY	131.36	131.19	130.09	131.12
USD/CNH	6.82	6.81	6.76	6.92

S&P Sector Returns



Sources: Bloomberg; Factset. Total Returns from the period of 2/6/2023 to 2/10/2023. †Bloomberg Barclays Indices. ††Spot price returns. All data as of the 2/10/2023 close. Data would differ if a different time period was displayed. Short-term performance shown to illustrate more recent trend. **Past performance is no guarantee of future results.**

Economic Forecasts (as of 2/10/2023)

	Q4 2022A	2022A	Q1 2023E	Q2 2023E	Q3 2023E	Q4 2023E	2023E
Real global GDP (% y/y annualized)	-	3.4*	-	-	-	-	2.6
Real U.S. GDP (% q/q annualized)	2.9	2.1	1.0	0.5	-1.0	-2.0	1.0
CPI inflation (% y/y)	7.1	8.0	5.4	3.6	3.1	2.9	3.7
Core CPI inflation (% y/y)	6.0	6.1	5.3	4.6	3.7	3.1	4.1
Unemployment rate (%)	3.6	3.6	3.4	3.3	3.6	4.1	3.6
Fed funds rate, end period (%)	4.33	4.33	4.88	5.13	5.13	5.13	5.13

The forecasts in the table above are the base line view from BofA Global Research. The Global Wealth & Investment Management (GWIM) Investment Strategy Committee (ISC) may make adjustments to this view over the course of the year and can express upside/downside to these forecasts. Historical data is sourced from Bloomberg, FactSet, and Haver Analytics. **There can be no assurance that the forecasts will be achieved. Economic or financial forecasts are inherently limited and should not be relied on as indicators of future investment performance.**

A = Actual. E/* = Estimate.

Sources: BofA Global Research; GWIM ISC as of February 10, 2023.

Asset Class Weightings (as of 2/9/2023)

Asset Class	CIO View		
	Underweight	Neutral	Overweight
Global Equities	● ● ●	● ● ●	● ● ●
U.S. Large Cap Growth	● ● ●	● ● ●	● ● ●
U.S. Large Cap Value	● ● ●	● ● ●	● ● ●
U.S. Small Cap Growth	● ● ●	● ● ●	● ● ●
U.S. Small Cap Value	● ● ●	● ● ●	● ● ●
International Developed	● ● ●	● ● ●	● ● ●
Emerging Markets	● ● ●	● ● ●	● ● ●
Global Fixed Income	● ● ●	● ● ●	● ● ●
U.S. Governments	● ● ●	● ● ●	● ● ●
U.S. Mortgages	● ● ●	● ● ●	● ● ●
U.S. Corporates	● ● ●	● ● ●	● ● ●
High Yield	● ● ●	● ● ●	● ● ●
U.S. Investment Grade Tax Exempt	● ● ●	● ● ●	● ● ●
U.S. High Yield Tax Exempt	● ● ●	● ● ●	● ● ●
International Fixed Income	● ● ●	● ● ●	● ● ●
Alternative Investments*			
Hedge Funds			
Private Equity			
Real Assets			
Cash			

CIO Equity Sector Views

Sector	CIO View		
	Underweight	Neutral	Overweight
Healthcare	● ● ●	● ● ●	● ● ●
Energy	● ● ●	● ● ●	● ● ●
Financials	● ● ●	● ● ●	● ● ●
Utilities	● ● ●	● ● ●	● ● ●
Consumer Staples	● ● ●	● ● ●	● ● ●
Industrials	● ● ●	● ● ●	● ● ●
Real Estate	● ● ●	● ● ●	● ● ●
Information Technology	● ● ●	● ● ●	● ● ●
Materials	● ● ●	● ● ●	● ● ●
Consumer Discretionary	● ● ●	● ● ●	● ● ●
Communication Services	● ● ●	● ● ●	● ● ●

*Many products that pursue Alternative Investment strategies, specifically Private Equity and Hedge Funds, are available only to qualified investors. CIO asset class views are relative to the CIO Strategic Asset Allocation (SAA) of a multi-asset portfolio. Source: Chief Investment Office as of February 9, 2023. All sector and asset allocation recommendations must be considered in the context of an individual investor's goals, time horizon, liquidity needs and risk tolerance. Not all recommendations will be in the best interest of all investors.

Index Definitions

Securities indexes assume reinvestment of all distributions and interest payments. Indexes are unmanaged and do not take into account fees or expenses. It is not possible to invest directly in an index. Indexes are all based in U.S. dollars.

S&P 500 Index includes a representative sample of 500 leading companies in leading industries of the U.S. economy. Although the index focuses on the large-cap segment of the market, with approximately 75% coverage of U.S. equities, it is also an ideal proxy for the total market.

Supply Management (ISM) manufacturing index is a composite index that gives equal weighting to new orders, production, employment, supplier deliveries, and inventories.

Goldman Sachs Financial Conditions Index is defined as a weighted average of riskless interest rates, the exchange rate, equity valuations, and credit spreads, with weights that correspond to the direct impact of each variable on GDP.

Conference Board's leading credit index is an American economic leading indicator intended to forecast future economic activity.

ISM Manufacturing: Purchasing Managers' Index Composite is a monthly indicator of U.S. economic activity based on a survey of purchasing managers at more than 300 manufacturing firms.

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