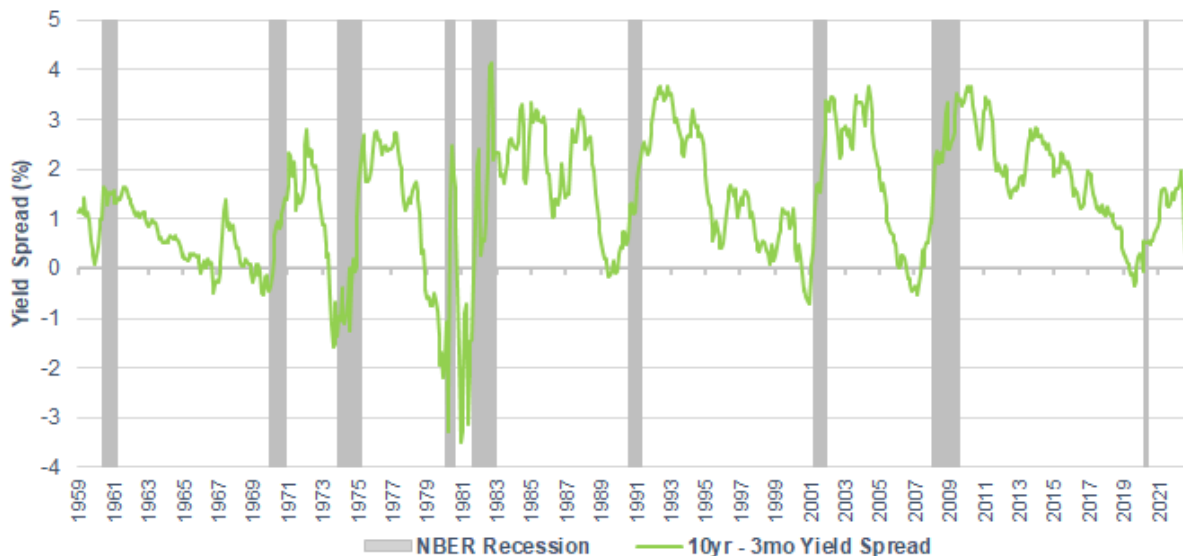


## Perspective on Market Performance in Recessions

Surveys of economists and fund managers, as well as forecasts from economic think tanks, increasingly point to a growing likelihood that the US economy could face economic contraction sometime in the next year. The Conference Board predicted in October of 2022 that there is a 96% probability of recession in the US within the next 12 months<sup>1</sup>. A November 2022 survey by Bank of America indicated that a net 77% of fund managers surveyed anticipated that a global recession is likely over the next year<sup>2</sup>. The bond market seems to agree<sup>3</sup>, as the 10-year to 3-month spread (yield spread between 10-year and 3-month US Treasuries) has been inverted since October 25, 2022 and stands at -0.69 as of November 30<sup>th</sup> as shown in **Figure 1**.

**Figure 1: 10-Year Treasury Minus 3-Month Treasury (Jan 1959 to Nov 2022)**



Source: Federal Reserve Bank of New York. Data is based on monthly averages, except for Nov '22 which is as of Nov 30, 2022.

As we face the increasing probability of a near-term recession, we have observed a few dynamics from past recessionary periods and potential implications that could be important for long-term investors to consider.

### 1. The equity market tends to lead the economy

Economic measurements are real-time at best and most often backward-looking measurements of what has already happened. Equity market investors are forward-looking by nature, attempting to anticipate the future. It makes sense then that equity markets consistently begin to recover before the economy does. A review of

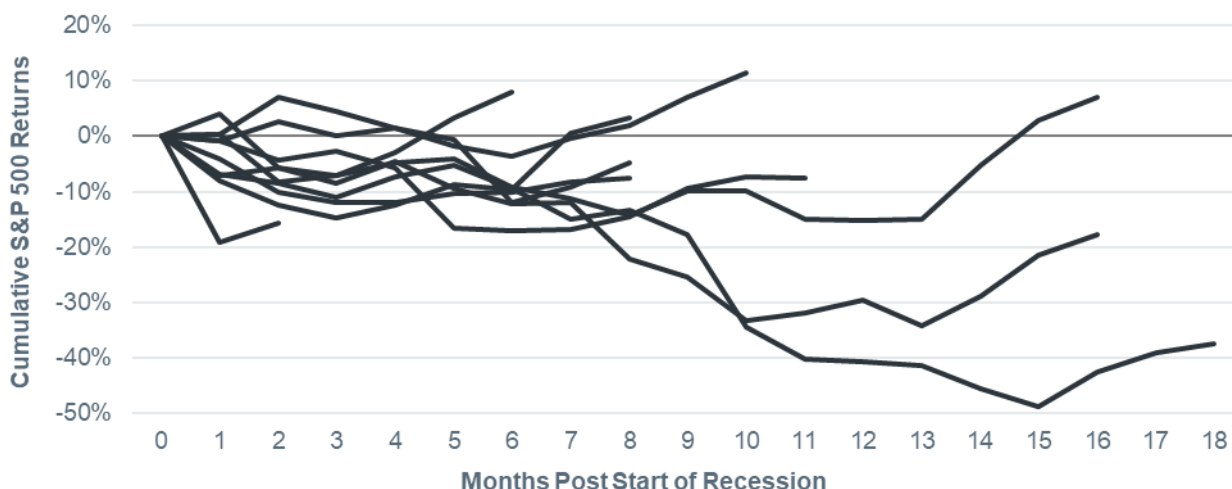
<sup>1</sup>The Conference Board. "Probability of US Recession Spikes to 96%." October 05, 2022, <https://www.conference-board.org/research/economy-strategy-finance-charts/CoW-Recession-Probability>

<sup>2</sup>Browning, Candace. Weekly Market Recap. November 20, 2022, <https://business.bofa.com/en-us/content/market-strategies-insights/weekly-market-recap-report.html>

<sup>3</sup>Every recession over the past 50+ years has been preceded by an inversion in the US Treasury yield curve as measured by the interest rate differential between 3 month and 10-year Treasuries.

the last 10 US recessions<sup>4</sup> dating back over the past 65 years supports this notion (**Figure 2**). Equity markets have bottomed and started their recovery before the end of a recession in all 10 periods indicated. In 4 of the 10 recessions, the S&P 500 actually posted a positive cumulative return during the official recession period.

**Figure 2: Cumulative S&P 500 Index Returns During Previous 10 Recessions (1957 to Present)**



Source: National Bureau of Economic Reporting and S&P Dow Jones Indices.

## 2. The current inflation dynamic likely means that the next recession might be materially different from the past three recessions.

Today's investor with 25 years of market experience has invested through three recessions (2001, 2008, and 2020). Inflation levels at the start of each of these recessions averaged 3%<sup>5</sup> and the highest starting level at the beginning of these recessions was 3.9% in January 2008. An investor today with 35 years of market experience might recall that inflation was a bit higher—5.5%—at the beginning of the 1990 recession. Only the most experienced investors, with careers spanning at least 41 years will have invested through a recession that occurred with inflation levels similar to current readings (the August 1981 recession was accompanied by a 9.9% YoY CPI reading).

The inflationary dynamic in which a recession begins has significant implications for the response available to policymakers—most notably central bankers such as the US Federal Reserve Board (the Fed). If the economy is a car going down the road, the Fed is the driver regulating the speed via brake or gas pedals. If prices are rising too much too quickly (inflationary environment), the Fed will need to apply the brakes as they are now, tightening monetary policy through increasing the Federal Funds Rate (“fund rate”) and shrinking their balance sheet. As one of the key priorities of the Fed is price stability, they will not have the luxury of easing policy (stepping on the gas) if the economy is contracting and they are still working to control inflation.

<sup>4</sup>Recession periods are as determined by the National Bureau of Economic Reporting “NBER.”

<sup>5</sup>As measured by year-over-year CPI percentage change at start of official recession period.

**Figure 3** below shows historical evidence of the aforementioned dynamic between starting inflationary levels, Fed policy, and resulting equity market performance. Drawing comparisons between the five recessions characterized by starting inflation exceeding 5% (“high” inflation in **red** below) and the four recessions with the starting CPI less than 5%<sup>6</sup> (“lower” inflation in **light blue**), we can make the following observations:

- The average recession **lasted longer** during the “high” inflation period vs the “lower” inflation period—11.4 months vs. 7 months, accordingly.
- The average recession during the “high” inflation period was characterized by **steeper market losses** with max S&P 500 Index drawdown averaging -17.7% vs. average max drawdown of -11.7% during the recessions occurring in the “lower” inflation periods.

Focusing on the multiple recessions of the 1970s and 1980s that were characterized by stubbornly high inflation, we can also see the **increased frequency of recessions** that have occurred (there were four recessions in just 12 years while there were only six across the other 53 years in this study period).

Also, it is worth noting that recessions deep enough to cause deflation (price declines) appear (albeit with a very small sample size—the 2008 great financial crisis) to be even longer with deeper equity market declines.

**Figure 3: Recession Statistics**

| Start Date                 | Length Months | YoY CPI% at T-0 | Max YoY CPI% | Min YoY CPI% | Drawdown From T-0 | Cumulative Return |
|----------------------------|---------------|-----------------|--------------|--------------|-------------------|-------------------|
| 9/30/1957                  | 8             | 2.9             | 3.4          | 2.8          | -12.0%            | -7.6%             |
| 5/31/1960                  | 10            | 1.6             | 1.6          | 0.9          | -3.6%             | 11.6%             |
| 1/31/1970                  | 11            | 5.9             | 5.9          | 5.0          | -17.0%            | -7.5%             |
| 12/31/1973                 | 16            | 8.4             | 11.2         | 8.4          | -34.2%            | -17.9%            |
| 2/29/1980                  | 6             | 13.0            | 13.5         | 12.1         | -7.1%             | 8.0%              |
| 8/31/1981                  | 16            | 9.9             | 9.9          | 4.1          | -15.3%            | 7.0%              |
| 8/31/1990                  | 8             | 5.5             | 6.0          | 4.6          | -14.7%            | 3.4%              |
| 4/30/2001                  | 8             | 3.0             | 3.0          | 1.7          | -11.9%            | -4.7%             |
| 1/31/2008                  | 18            | 3.9             | 5.5          | -2.0         | -48.8%            | -37.4%            |
| 3/31/2020                  | 2             | 1.2             | 1.2          | 0.3          | -19.1%            | -15.7%            |
| <b>Averages</b>            |               |                 |              |              |                   |                   |
| T-0 Inflation > 5%         | 11.4          | 8.5             | 9.3          | 6.8          | -17.7%            | -1.4%             |
| T-0 Inflation <5%, Min >0% | 7.0           | 2.2             | 2.3          | 1.4          | -11.7%            | -4.1%             |
| Min < 0% (Deflation)       | 18.0          | 3.9             | 5.5          | -2.0         | -48.8%            | -37.4%            |

Source: RVK calculations, based on data from S&P Dow Jones Indices and FRED, Federal Reserve Bank of St. Louis.

### 3. Implications for investors

The Fed is faced with a difficult task—they need to make sure they do enough to tighten policy to bring about price stability and maintain their credibility with investors so they can manage inflation. They are also dealing with lagging information on the impact of actions they have already taken and want to avoid overdoing it such that it brings about conditions that lead to a deep recessionary cycle. Whether or not they will be successful at finding the right balance to navigate this is unknown, as is the timing, depth, and length of the next recession

<sup>6</sup>Inflation levels remained above zero during the “lower” inflation period.



and market outcomes. Given how different the inflation dynamic today is from the past three recessions, it is likely that a recession in the near term might be much different from the recent recessions that most of today's market participants have experienced.

With the potential for vastly different outcomes, we believe diversification—specifically meaningful thematic diversification to assets that can perform across both rising/falling growth and rising/falling inflation—is potentially more valuable now than it has been for some time. A rebalancing discipline remains a powerful tool for investors to make the most of market volatility, especially as we have noted that equity markets will tend to recover in advance of economic conditions. Given the increased potential for stubbornly high inflation to create longer, deeper, and more frequent recessions and associated market drawdowns and recoveries, it may be worth revisiting portfolio diversification and rebalancing policies to prepare for what could potentially be a different experience than most current investors have navigated.

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