

The Connection

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A Virtuous Cycle
Takes Shape

Through the
Private Market Lens

Private Equity in a
Changing Landscape

Challenging Times
Require More Tools



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A Virtuous Cycle Takes Shape

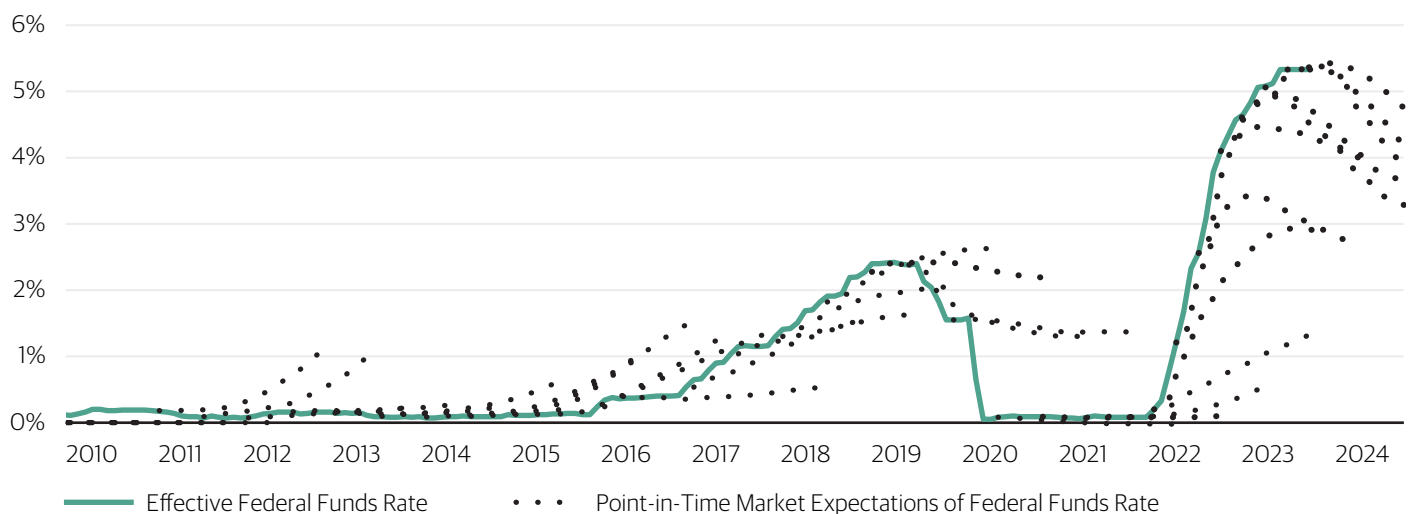


I keep a fun book on my desk: "Wrong: the Biggest Mistakes and Miscalculations Ever Made by People Who Should Have Known Better". I browsed through it recently, seeking reassurance for my 2023 recession call. I take some solace in that last year presented a remarkable tale of economic resilience. Defying the looming shadow of rising interest rates, the economy didn't merely stabilize—it accelerated.

In 2024, the debate about a hard, soft, or non-existent landing should reach a resolution. With real rates (adjusted for inflation) positive for about a year and the depletion of excess savings in household balance sheets, the economy's now feeling the full impact of policies. Indicators such as the yield curve, Institute for Supply Management surveys, and Purchasing Managers Indices point towards a growth slowdown, the extent of which we should understand by the second half.

The market's dovish stance on interest rate policy seems overly optimistic. When the Federal Reserve updated its Summary of Economic Projections, moving from two to three cuts this year, the market priced six. Important to note, the market's track record on interest rates is poor. The "spaghetti chart" shows how market expectations of policy rates and the actual outcomes often diverge significantly. While I expect the Fed to cut rates this year in almost any type of landing, I'm skeptical of six.

Figure 1: Market Expectations of Federal Funds Rate over Time



Source: Bloomberg, Federal Reserve and Blackstone Investment Strategy, as of December 31, 2023. Dotted lines show the path of the federal funds rate implied by fed funds futures contracts extending 24 months into the future.

The market's swift pivot to predicting six cuts can be partly attributed to positive inflation reports. Following the downturn in housing data, we should expect continued weaker inflation figures in the near term. However, December's inflation report shows the path lower is still bumpy.

Note: Based on Joe Zidle's opinions of the current market.

The wage inflation-productivity relationship is a long-time topic of debate. Labor markets might benefit from rising productivity, a complex relationship famously emphasized by former Fed Chair Alan Greenspan. In September 1996, amid media leaks, market pressures and dissent within the Fed, Greenspan convinced the board to delay rate hikes by projecting stronger productivity growth, despite no evidence. According to economist Larry Summers, Greenspan just “intuited” it. This decision prolonged the strength of labor markets and the expansion.¹

To accurately navigate the wage inflation scenario back in the '90s required a bold move from Greenspan and some luck. Today, with an unemployment rate that's 200 basis points lower and hourly wage growth that's 100 basis points higher, the margin of error is smaller. Additionally, home prices are rising again, despite the inflation basket reflecting last year's rent drop. Also, escalating war in the Middle East could disrupt supply chains and push oil prices higher.

When the team and I step back from the constant stream of high-frequency data and market noise, we discern a different yet equally important transition that leads me to believe that 2024 marks the conclusion of the COVID-19-era recovery. The US economy seems to be emerging from the post-Global Financial Crisis (GFC) liquidity trap, a pivotal shift that not only redefines our current economic understanding but also alters our future expectations.

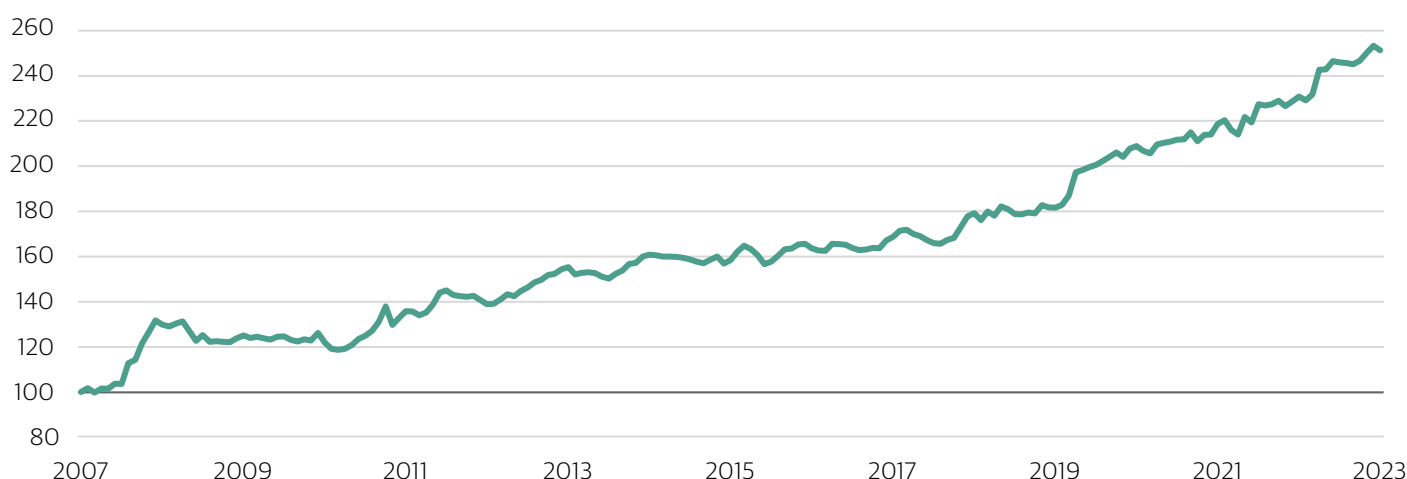
A Liquidity Trap Defined the 2010s

Policymakers implemented measures such as zero interest rates and quantitative easing (QE) to boost demand following the GFC. Yet, unlike past recessions, the economy remained mired in low growth, necessitating ongoing policy support. A significant deleveraging in the financial system and by households meant that although rates were low, the Fed couldn't revive the “animal spirits” of the US economy.

Years of underinvestment followed as corporations remained haunted by overinvestment in the housing market and related commodities that facilitated the GFC. This underinvestment helped raise the age of fixed assets to almost 23 years old, the oldest in the history of the data going back to 1925.² The unemployment rate moved slowly from its peak near 10% in 2010 to 4% in 2018. With ample labor available, corporations refrained from investing in CapEx and instead employed labor as replacement for aging capital. Growth and productivity fell below long-term trends.

Figure 2: S&P 500 Companies Relative Performance: Top Share Repurchases vs. Top Capital Expenditures

(indexed to 100 on December 31, 2007)



Source: Strategas Research Partners, as of December 31, 2023. Chart represents relative performance of top quintile of S&P 500 firms for share repurchases vs. top quintile of S&P 500 firms for capital expenditures. Constituents for share repurchases are based on the company's dollar value of share repurchases over the trailing 12 months as a percent of average shareholders' equity. Constituents for capital expenditures are rebalanced monthly and based on the year-over-year percent change in capital expenditures.

Note: Based on Joe Zidle's opinions of the current market as of the date appearing in this material.

1. Sebastian Mallaby, "The Man Who Knew", page 495.

2. US Bureau of Economic Analysis, as of December 31, 2015.

Investors favored these CapEx-light firms that took advantage of the low cost of capital to borrow and buy back shares. CapEx-light firms significantly outperformed those that were asset heavy.³ Although rates were low, the Fed was “pushing on a string.” The Fed tried to wean the economy off zero rates. Twice, it planned for balance sheet reductions or modestly raised rates. These efforts met stiff resistance from skeptical investors, epitomized by 2013’s taper tantrum and the year-end 2018 market selloff. Before COVID-19 derailed it, the Fed’s experiment already showed signs of strain, evidenced by four quarters of slowing GDP growth in 2018.

The Pandemic Response Held the Key

The massive fiscal and monetary policy responses to COVID-19 appear to have provided the jolt the economy needed to finally leave the post-GFC weakness behind and escape the liquidity trap. The stimulus spurred substantial spending on goods and services, and, thanks to supply side constraints from crippled supply chains and workers unable or unwilling to re-enter the labor force, pushed inflation to 40-year highs.

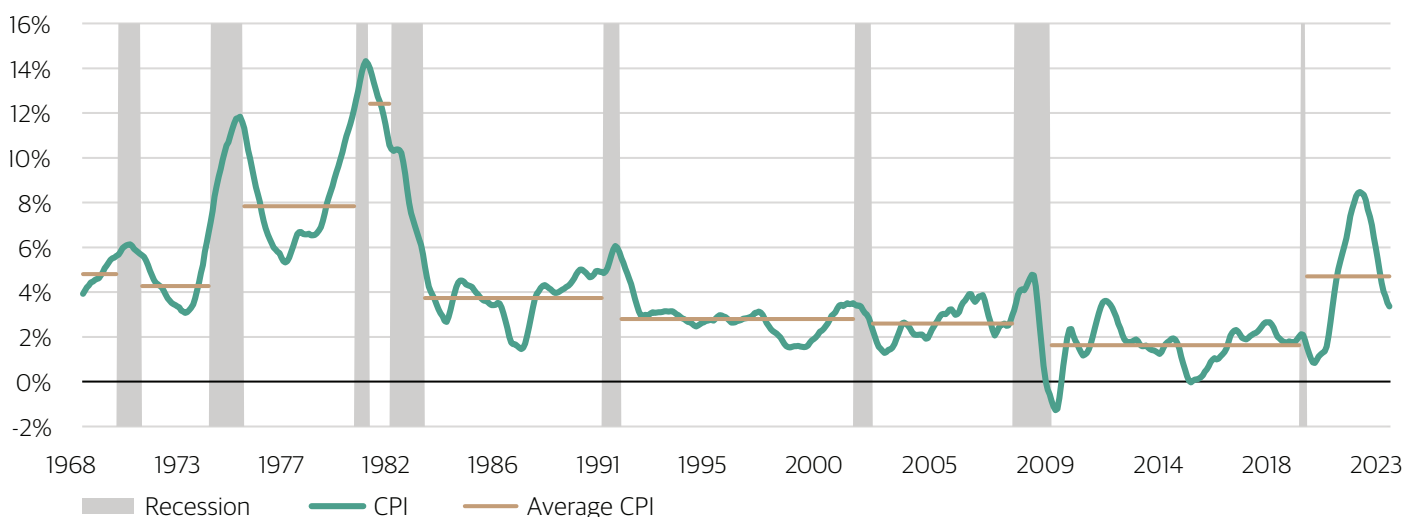
To temper this inflation, policymakers embarked on one of the most highly coordinated tightening cycles in modern central bank history, and thereby also broke the liquidity trap by recreating the policy room to cut rates in the future.

The Virtuous Cycle

Past the economy’s landing and the last of the COVID-19 distortions, towards the end of 2024 we expect an economy that is structurally different, having fully recovered from the post-GFC challenges. And we think there will be a lot for policymakers and investors to like: Labor markets that are tighter on average over the cycle; investment demand from undersupplied sectors such as housing and energy; investment demand for new areas such as onshoring, the energy transition, and the AI-driven digital economy; and a financial sector bolstered by the structural adjustments required after the financial crisis.

This combination is likely to lead to a much more accelerated recovery from any slowdown in economic growth than the tepid pace experienced after the GFC. The next cycle is also likely to come with higher interest rates and inflation on average. We expect inflation over the next cycle to run higher than the previous cycle’s average of 1.7%.

Figure 3: US Consumer Price Index
(percent year-over-year, rolling 6-month average)



Source: US Bureau of Labor Statistics, as of December 31, 2023. Average CPI time periods represent: June 1968–November 1969, December 1970–October 1973, April 1975–December 1979, August 1980–June 1981, December 1982–June 1990, April 1991–February 2001, December 2001–November 2007, July 2009–January 2020, and May 2020–December 2023 (present).

While this environment might be less conducive to multiple expansion than the last cycle, it should be a good environment for nominal growth supporting nominal wages and profits. This growth should drive more durable returns than when multiple

Note: Based on Joe Zidle’s opinions of the current market.

3. See Figure 2.

expansion simply frontloads future returns, like in the last cycle. In the real economy, higher investment should support longer-term productivity growth, making wage gains more durable as well.

Add it all up, and we believe that the economy could be entering a virtuous cycle where high levels of labor participation, investment and productivity growth sustain each other. That is exactly the opposite of where we were in the early 2010s and reflects 15 years of improving household balance sheets, a re-regulated financial system, years of underinvestment now driving a catch-up CapEx cycle, and a changed technological landscape.

Also changed is the geopolitical landscape. The geopolitics of globalization have shifted from emphasizing efficiency and integration towards resiliency and redundancy. Products that were once deemed tradable, for example, must now be made closer to home, and the battle for supremacy in the industries of the future is heating up fast. These shifts will be front and center on campaign trails as part of a packed electoral calendar in 2024. A full 46% of the global population will have an opportunity to vote across more than 30 democracies, including the three largest (the United States, India, and Indonesia).

The geopolitical stakes are high, but a change in the underlying dynamics of economic relations is hard to see. Whatever collection of leaders we're left with, the hyper globalization of prior years isn't coming back. And the countries and companies that benefit from the regionalization of supply chains and economic autonomy will remain unchanged.

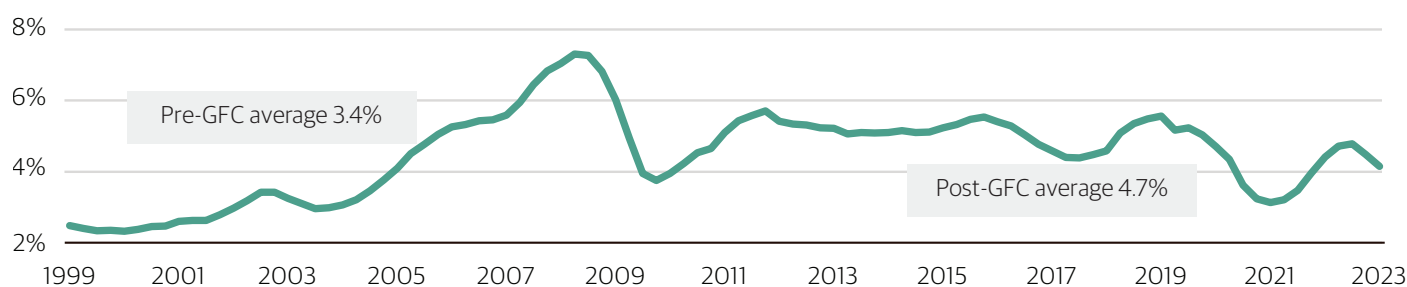
The implications of these shifts will be the characteristics of the next cycle: massive investment across key industries, higher and more volatile inflation as the global economy fragments, and greater power for workers. These are characteristics of a more normal, healthier economy that features the type of investment spending that is required to generate wealth over the longer term. In this scenario, we would expect the real economy to outperform the financial economy.

Good Times for the Economy, a New Ballgame for Investors

Given the expected character of this virtuous cycle, we should not use the last 15 years as the right reference point for structuring portfolios. During QE and zero rates, the 60/40 portfolio benefitted from a negative correlation between stocks and bonds. Profits, dividends, and multiples expanded to produce both the longest and biggest bull market in history. Corporate investment lagged while share buybacks as a percent of the S&P's market cap doubled after the GFC compared to the prior 20-year average.⁴

Figure 4: S&P 500 Share Buyback and Dividend Yield

(percentage of market cap, rolling 4-quarter average)



Source: Standard & Poor's, Macrobond, as of September 30, 2023. Pre-GFC average from September 1999–September 2007. Post-GFC average from September 2009–September 2023 (present).

In the coming cycle, we believe cash flows, profit growth, and active management will provide a larger share of overall portfolio returns than in the era of easy money, low inflation, and multiple expansion. In the medium term, a [higher term premium](#) is likely due to greater uncertainty around rates and inflation, a surge in supply of long-maturity securities, and less Fed intervention.

This environment will create new considerations for portfolio construction. As we discuss in the asset allocation section below, private assets are particularly well suited for this type of environment, yet private investors continue to have much lower allocations to them than their institutional counterparts. In our view, now is the right time for that to change.

Note: Based on Joe Zidle's opinions of the current market.

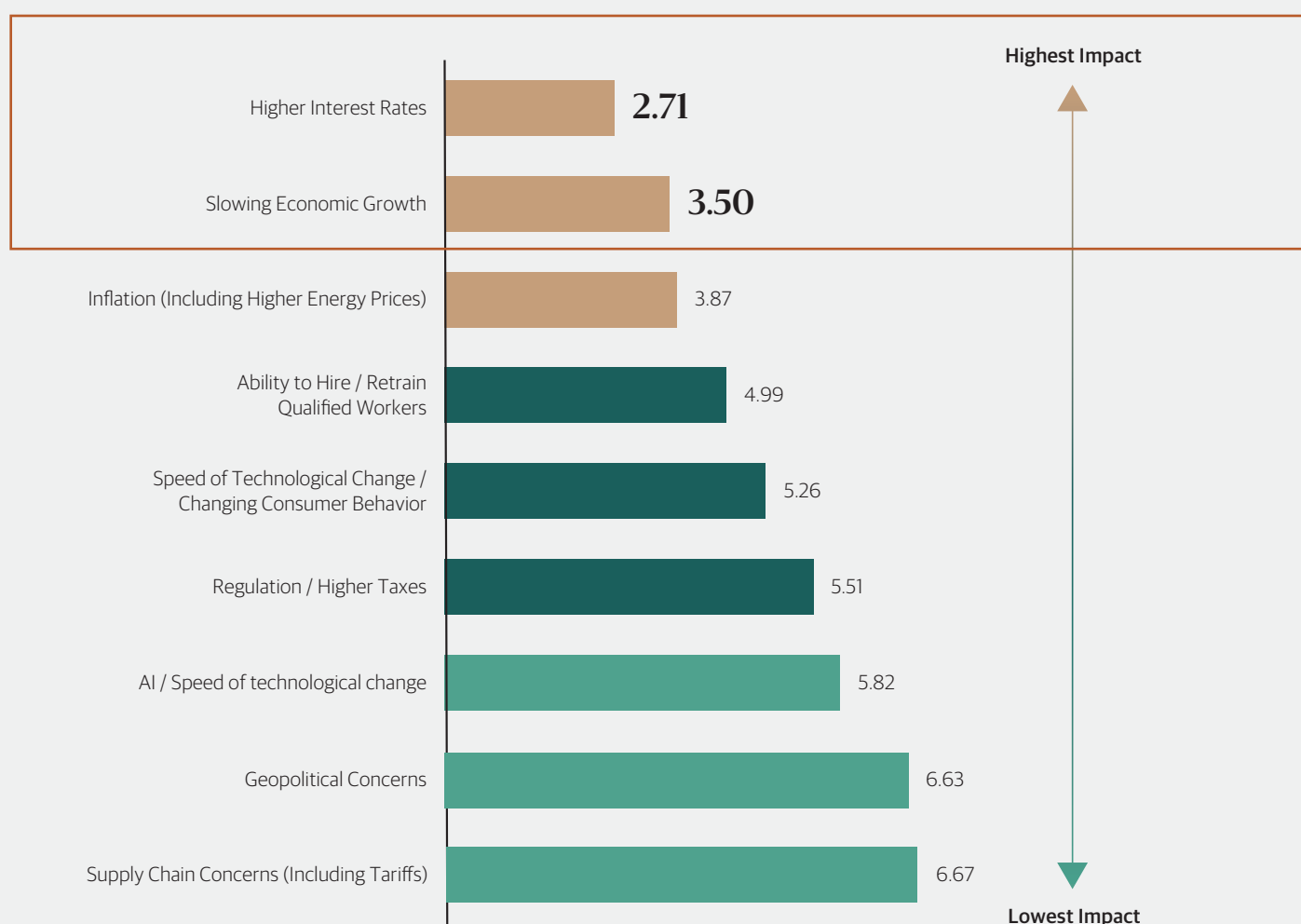
4. [S&P Dow Jones](#).

Through the Private Market Lens

Blackstone's global portfolio spans more than 230 companies employing over 700,000 people. Each quarter, led by **Prakash Melwani, CIO of Corporate Private Equity**, we survey a sample of these companies' CEOs on the current business environment and what they see on the horizon. Explore a few key findings from our Q4 survey of 83 Blackstone portfolio company CEOs (56 US CEOs).

CEOs are most concerned with higher interest rates and slowing growth

Macro Issues⁵



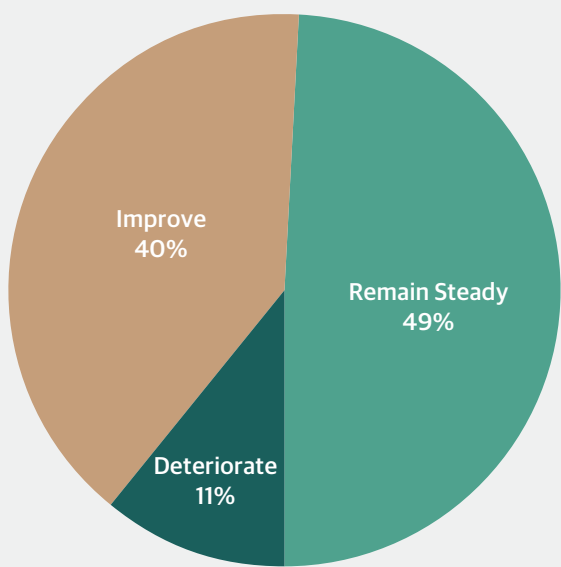
The Blackstone CEO survey referred to herein is a survey of a subset of portfolio company CEOs. For 4Q23, the survey reflects responses from 83 Blackstone portfolio company CEOs (56 US CEOs) largely within Blackstone's private equity, real estate and credit businesses (the "CEO Survey"). Note that survey composition varies from quarter to quarter. The CEO Survey was initiated on December 5, 2023 and closed December 22, 2023. Quarter-over-quarter presentations reflect data only for companies who responded to the survey question in both quarters, which may result in a smaller subset of portfolio companies CEOs represented in such presentation than the overall CEO Survey. The responding portfolio companies are not necessarily a representative sample of companies across Blackstone's portfolio and the views expressed do not necessarily reflect the views of Blackstone. The views expressed reflect the responding CEOs' views as of the date of their responses, and Blackstone does not undertake any responsibility to advise you of any changes in such views. References to "CEO" or "CEOs" herein refer to respondents to the Q42023 Blackstone CEO survey. Note: See "Important Disclosures" for additional information about the survey and the views expressed within.

5. The numbers shown are the average ranking among CEO respondents on a scale of 1 to 9 with 1 indicating the most risk among macro issues. A total number of 83 Blackstone portfolio company CEOs (56 US CEOs) responded to the survey.

But while growth is slowing, CEOs don't see the economy tipping to a recession

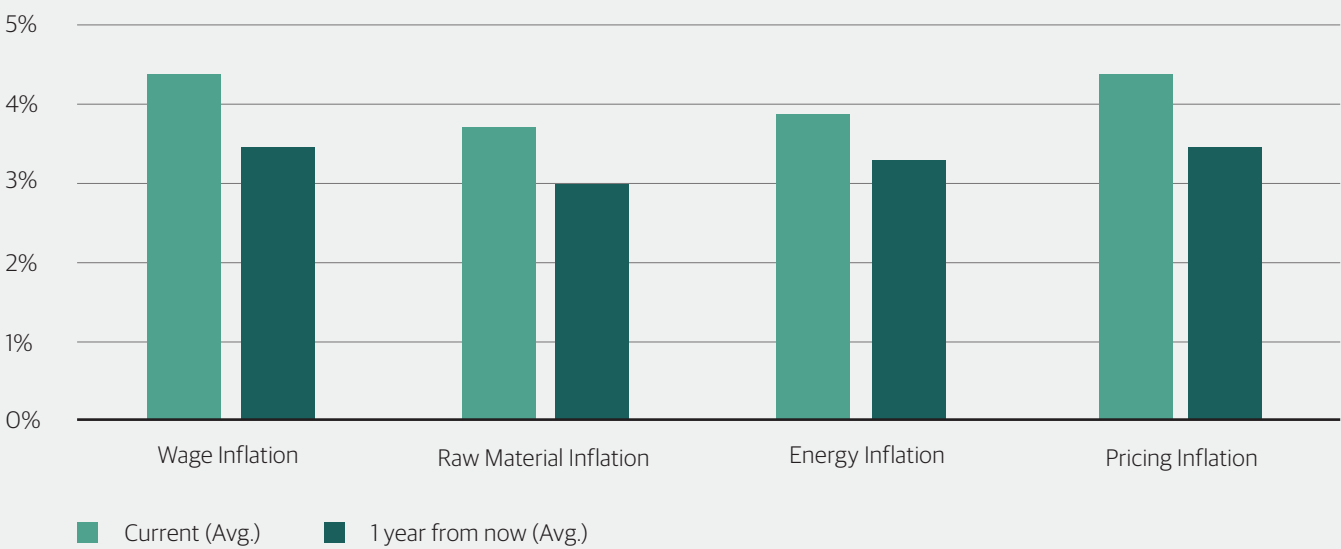
Only 32% of CEOs think there will be a recession (US companies only).

CEOs Think That Business Conditions over the Next Six Months Will:



CEOs see inflation and costs coming down...

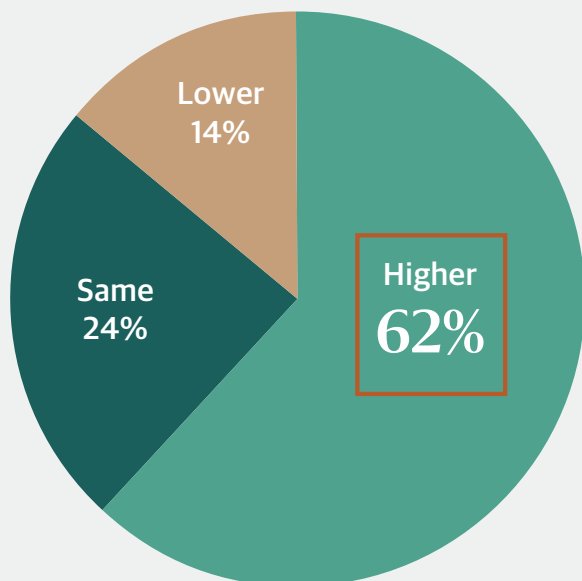
Measures of Inflation



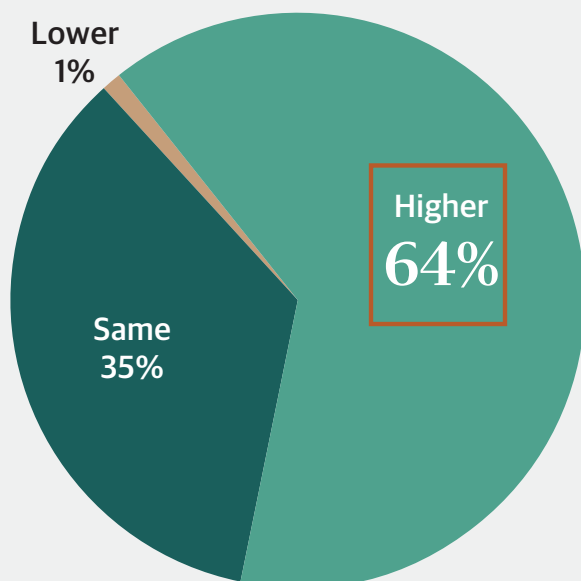
Note: See "Important Disclosures" for additional information about the survey and the views expressed within.

...which is expected to help support margins

Do You Expect Operating Margins in 2024 to Be Higher or Lower Than in 2023?



Do You Expect Operating Margins in 2025 to Be Higher or Lower Than in 2024?



The labor market is easing

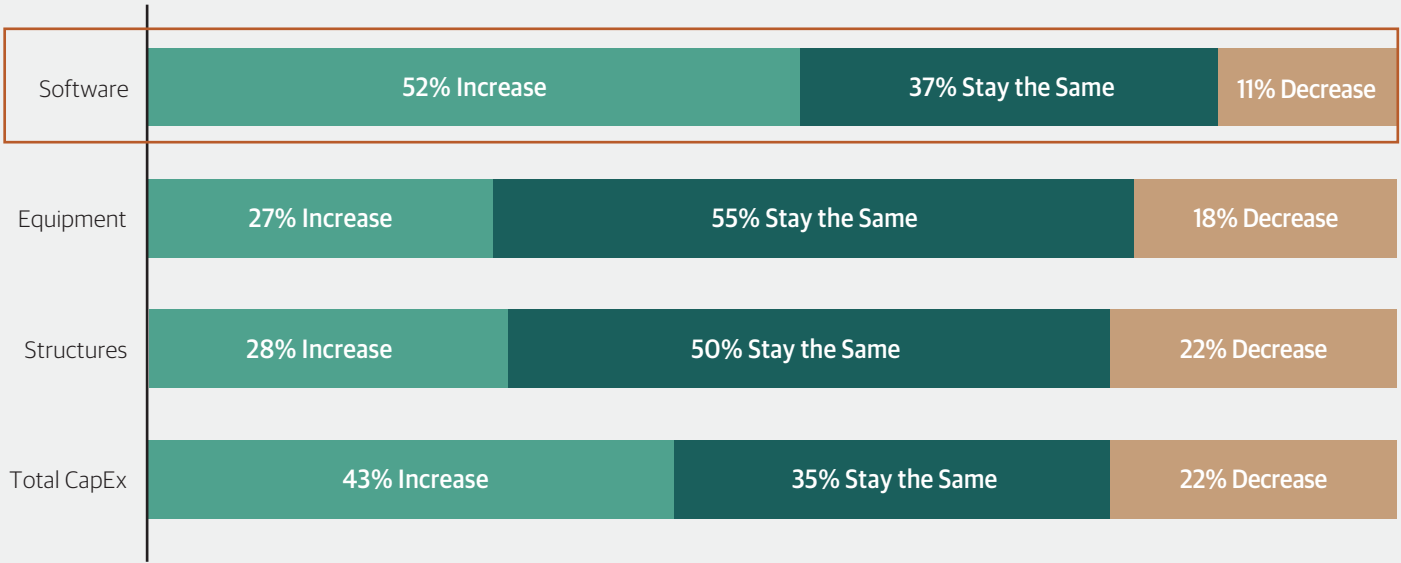
49% of CEOs find it challenging to hire workers.

43% of CEOs report the number of open job positions will be higher, relative to past 6 months.

Note: See "Important Disclosures" for additional information about the survey and the views expressed within.

CapEx especially on software is expected to increase

Compared to 2023, Do You Expect Your 2024 CapEx for the Following Expenditures to:



Note: See "Important Disclosures" for additional information about the survey and the views expressed within.

Forward-Looking Statements. This content may contain forward-looking statements within the meaning of Section 27A of the Securities Act of 1933, as amended, and Section 21E of the Securities Exchange Act of 1934, as amended. You can identify these forward-looking statements by the use of words such as "outlook," "indicator," "believes," "expects," "potential," "continues," "may," "will," "should," "seeks," "approximately," "predicts," "intends," "plans," "scheduled," "estimates," "anticipates," "opportunity," "leads," "forecast" or the negative version of these words or other comparable words. Such forward-looking statements are subject to various risks and uncertainties. Accordingly, there are or will be important factors that could cause actual outcomes or results to differ materially from those indicated in these statements. These factors include but are not limited to those described under the section entitled "Risk Factors" in Blackstone Inc.'s Annual Report on Form 10-K for the year ended December 31, 2022, as such factors may be updated from time to time in our periodic filings with the United States Securities and Exchange Commission ("SEC"), which are accessible on the SEC's website at www.sec.gov. These factors should not be construed as exhaustive and should be read in conjunction with the other cautionary statements that are included in our other periodic filings. The forward-looking statements speak only as of the date hereof, and we undertake no obligation to publicly update or review any forward-looking statement, whether as a result of new information, future developments or otherwise.

CEO Sentiment Survey Includes input from 83 Blackstone portfolio company CEOs (56 US CEOs). Survey initiated December 5, 2023, and closed December 22, 2023.

Private Equity in a Changing Landscape



Joseph Baratta
Global Head of Blackstone
Private Equity



Christopher James
Chief Operating Officer,
Blackstone Tactical Opportunities
Chairperson, Blackstone Private
Equity Strategies (BXPE)

We believe private equity should be part of every investor's portfolio. The opportunity set in private equity is especially attractive in this higher cost of capital market environment. However, manager selection is crucial, as it will take more than optimizing capital structures and riding an appreciating equity market to generate returns in what we expect to be more volatile conditions. In our view, managers with enduring competitive advantages, whether through sourcing, value creation or scale, can help investors differentiate their portfolios.

Blackstone's Investment Approach

The deep reservoir of data and intelligence that is available to us at Blackstone informs our pursuit of high-conviction investment themes with secular tailwinds behind them. Themes such as digital infrastructure, life sciences and the energy transition cut across many of our businesses, not only private equity, allowing us to harness our diverse capabilities and expertise to invest at scale. For example, our executed transactions across digital infrastructure include the development of new hyperscale data centers, high-quality wireless sites and an artificial intelligence compute operator.

Our focus is high-quality businesses that are growing faster than inflation or GDP, which supports the earnings growth that is critical to driving attractive returns in this environment. Moreover, the relatively larger scale

that we invest at presents less competition, resulting in better terms and valuations. Our scale also enables us to invest in bigger, more resilient companies.

Opportunities in Today's Environment

Sourcing proprietary opportunities by partnering with management teams remains a priority. Our long-standing, trusted relationships with these larger companies often lead to corporate carve-out opportunities. Carve-outs entail acquiring a controlling stake in one of the company's businesses, often an area management considers non-core. We take over the business and, in partnership with a management team, seek to create value through focused operating intervention to drive transformational growth.

Beyond corporate carve-outs, we have recently brought our advantages in sourcing, underwriting, and business

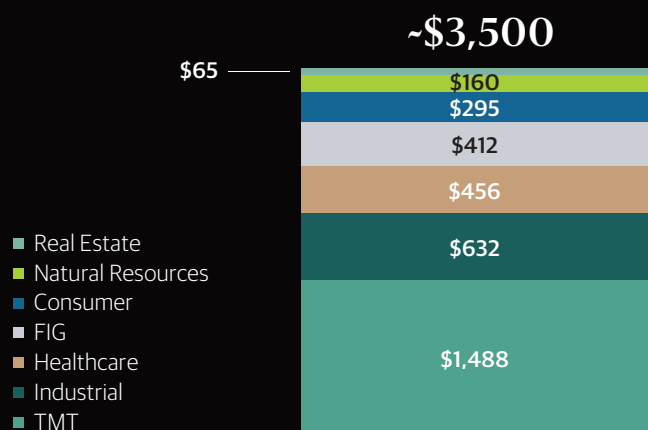
transformation to public-to-private and founder-led transactions.

Private equity sponsor-backed businesses seeking liquidity is another opportunity. PE firms hold investments totaling \$3.5 trillion, many of which were made in the past four years at high multiples, notably in Technology and Healthcare. IPO and secondary PE exits will likely remain challenging in the near term, and the availability of exit options must be priced into new deals. PE funds typically have defined terms and cannot hold investments indefinitely.

As a result, we expect sponsors to seek alternative means to deliver liquidity. In this context, sponsors with hybrid or minority equity capital solutions, such as our opportunistic strategy, may be attractive. We believe seller expectations, especially those of firms needing exits, will adjust over the next several years and provide a highly attractive vintage of investments.

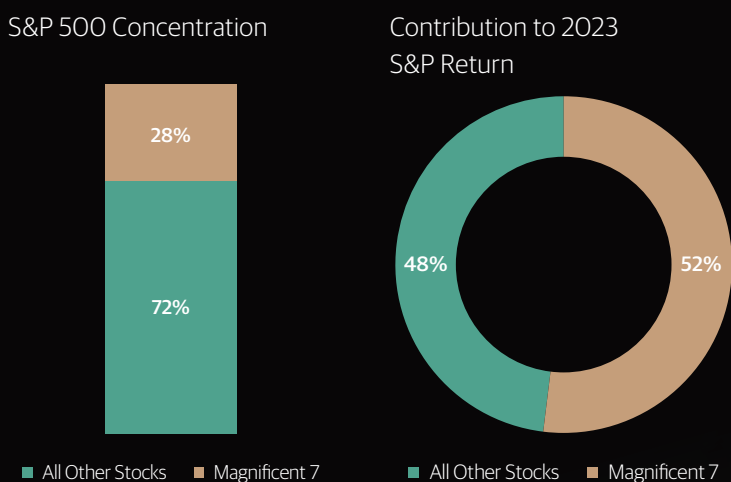
Note: Based on Blackstone's views and beliefs. The above should not be construed as research or investment advice. There is no guarantee that any Blackstone product or strategy will achieve its aims or objectives. Diversification does not ensure a profit or protect against losses.

Figure 5: Current PE Portfolio Total Enterprise Value
(\$ in billions)



Source: Goldman Sachs. Companies with estimated EV above \$1 billion. As of August 31, 2023.

Figure 6: S&P 500 Concentration and 2023 Return Contribution



Source: Bloomberg, as of December 31, 2023.

Private Equity as a Portfolio Diversifier

Private equity can offer more, and sometimes better, avenues for differentiated sourcing and alpha generation than public markets. The return attribution for the S&P 500 has never been more concentrated than it is today—the Magnificent 7 delivered 50% of the S&P’s 2023 return.⁶ Also, investment in public equity means exposure to factors unrelated to fundamentals, such as momentum, while minimizing others, such as value. This concentration also increases the impact of idiosyncratic, single-name risk.

Private equity offers access to sectors, industries and regions that are more representative of the growing economy. It has consistently outperformed public markets. For the past 15 years, private equity has achieved 12% net annualized returns vs. the global public equity market’s 6%.⁷ Importantly, this outperformance shows private equity’s resilience in both rising and falling interest rate environments. With the economy still growing and businesses still in need of capital, we expect this resilience to persist.

Note: **Past performance does not predict future returns.** There is no guarantee that any product or strategy will achieve its aims or objectives. Diversification does not ensure a profit or protect against losses.

- See Figure 6.
- Private equity based on the Cambridge Private Equity Index and the MSCI ACWI (as a modified public market equivalent) as of June 30, 2023. “Private Equity” is represented by the pooled returns of the blended Cambridge Private Equity Index, which comprises buyout funds, secondary funds, and growth equity funds. “Public Equities” are represented by the Cambridge Modified Public Market Equivalent (“PME”) analysis of the MSCI ACWI Index. PME methodology replicates the date and amount of cash flows from Cambridge Private Equity Index capital calls or distributions in a public market index (i.e., MSCI ACWI). The methodology developed by Cambridge Associates seeks to provide a consistent means to effect a performance comparison between a private investment and public alternative. Public market comparables referenced herein are included for informational purposes only and there can be no assurance that other parties would select the same companies as illustrative comparisons for the same purpose. There are significant differences between private investments and public companies, including liquidity and the use of leverage among other things, and such companies may have different market capitalizations and invest in different sectors. Investors should attach qualified consideration to historical data concerning such comparisons. Furthermore, investors generally cannot invest directly in an index, and index returns do not reflect the impact of fees and expenses (which will diminish returns) that investors would experience if invested through a private vehicle.

Challenging Times Require More Tools

Anders Nielsen | Managing Director, Private Wealth Solutions

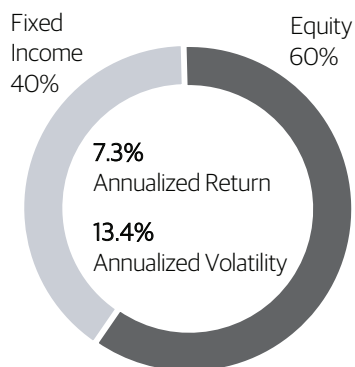
The global macro environment remains unusually uncertain. As discussed in the macro section, we're likely to get a resolution to the hard vs. soft landing debate by the summer. Looking beyond that, we believe the next cycle will include higher average and more volatile inflation and rates than we have been used to since the GFC.

As a result, the diversification benefits offered by a traditional 60/40 portfolio are likely to be lower, as are returns from passive investments due to less support for valuation multiples. Dynamics like these make returns from active approaches more important.

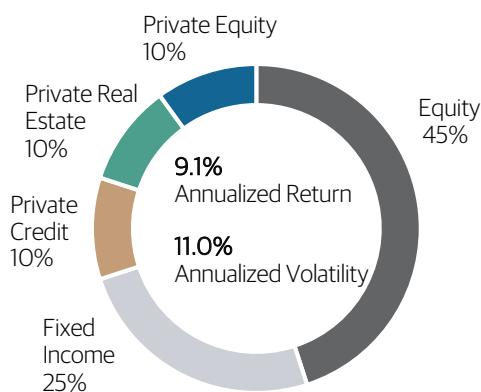
Private assets can feature prominently in that effort. Figure 7 shows the historical performance of a benchmark 60/40 portfolio and a portfolio where 30% of the public market exposure is replaced with 10% private equity, 10% real estate, and 10% private credit. The average annual return of the portfolio with private market exposure has been 1.8% higher, while realized volatility has been lower. However, a typical allocation for a high net-worth individual to private markets is in the low single digits on average, vs. more than 20% for pension funds and 50% for endowments.⁸ Many investors don't own any of these assets.

Figure 7: Private Market Allocations in a Traditional 60/40 Portfolio Context
(2018-2023)

60/40 Portfolio



With 30% Private Markets Allocation



Source: Bloomberg, Morningstar, Cambridge Associates, NCREIF, Cliffwater, as of March 31, 2023. As commonly used in the industry, the 60/40 portfolio is 60% allocated to the S&P 500 Index and 40% is allocated to the Bloomberg US Aggregate Bond index. Private Credit is represented by the Cliffwater Direct Lending Index. Private Real Estate is represented by the NFI-ODCE Index. Private Equity is represented by the Cambridge Associates US Private Equity Index. There can be no assurance that any Blackstone fund or investment will achieve its objectives or avoid substantial losses, or that alternative investments will generate higher returns than other investments. Annualized returns and volatility are calculated based on the quarterly returns over the 5-year period from April 2018 to March 2023. The information herein is provided for educational purposes only and should not be construed as financial or investment advice, nor should any information in this document be relied on when making an investment decision. Opinions expressed reflect the current opinions of Blackstone as of the date hereof and are based on Blackstone's opinions of the current market environment, which is subject to change. Past performance does not predict future returns.

We believe that private assets are best incorporated as a permanent part of a strategic asset allocation rather than as a tool for more tactical asset allocation. Liquidity for private assets is lower, which makes it harder to shift weights tactically. Also, cyclical price shifts tend to be more extreme in public markets, and thus are better captured with changes to public market exposures. Where private markets excel is gradual accumulation and growth of cash flows, a feature best harvested through a strategic allocation.

Note: **Past performance does not predict future returns.** Diversification does not ensure a profit or protect against losses. The above should not be construed as research or investment advice.

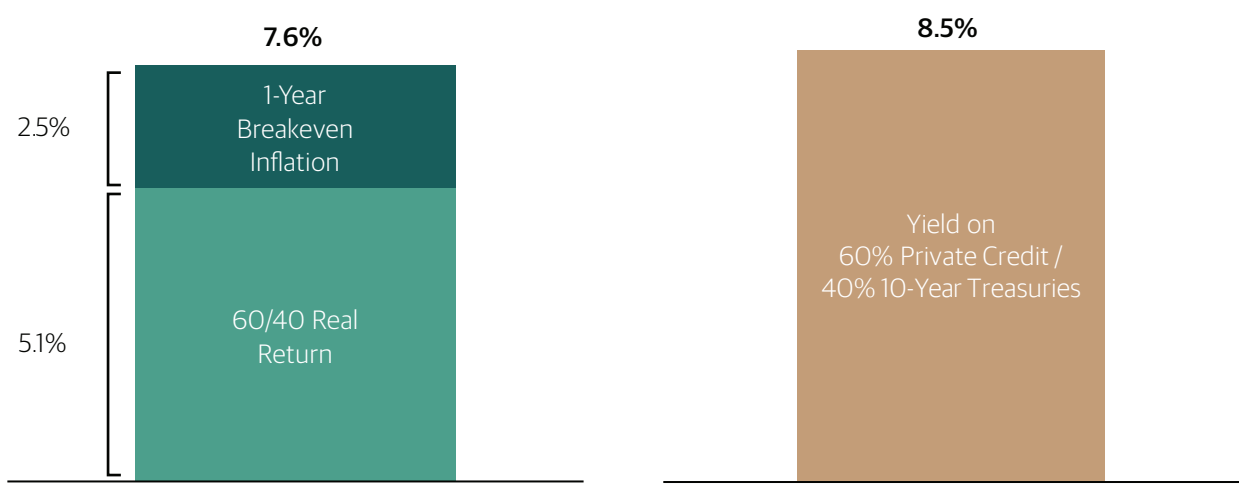
8. Thinking Ahead Institute. "Global Pension Assets Study," 2023; National Association of College and University Business Officers. "2023 NACUBO-TIAA Study of Endowments," 2023; For Individual Investors, Bain & Company. "Global Private Equity Report," 2023. For Endowments, the alternative assets allocation is for Public College, University or System only represented by allocations to Alternative Strategies (includes marketable alternatives (hedge funds), private equity, private venture capital, and real assets). Averages provided are dollar-weighted.

A natural question is whether the current macro uncertainty makes it a bad time to implement a more robust strategic asset allocation to private assets. We argue the opposite. Challenging times like these make the value of strategically adding arrows to an investor’s quiver higher than usual, and we think each of the major private asset classes have unique features that can make them particularly helpful in the current environment.

Private credit has the potential to offer high yield. Equities and investment grade and high yield credit currently offer little compensation for macro risks, in the sense that they offer low risk premia. The opportunity to move up in the capital structure while generating an attractive yield is a core feature of private credit.

As a simple illustration of the potential, Figure 8 shows that the current estimated yield on a simple portfolio that allocates 60% to US private credit and 40% to 10-year Treasuries is higher than the long-run historical real return on a 60/40 portfolio adjusted for the current inflation environment. Default risk is embedded in the private credit yield but, with good managers, we believe that risk is well compensated for at current yield levels.

Figure 8: Return on Traditional 60/40 Portfolio vs. 60% Private Credit and 40% 10-Year Treasuries



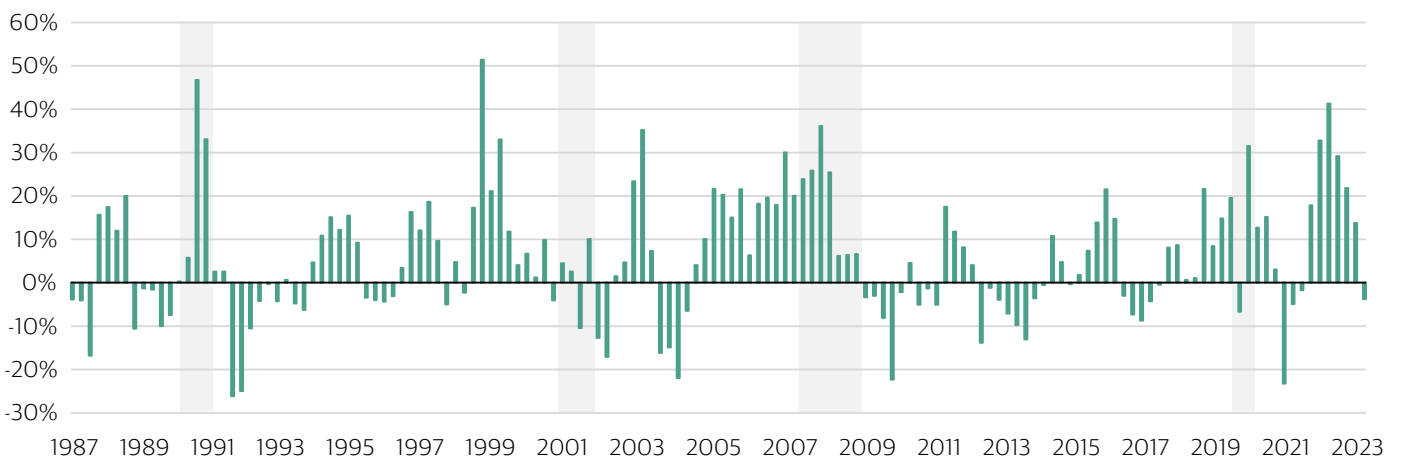
Source: Blackstone Investment Strategy Calculations, Lincoln International Private Market Database (September 30, 2023) and Bloomberg, as of January 19, 2024 (traditional 60/40 portfolio real return, as of December 31, 2023). Traditional 60/40 portfolio calculations are based on total return data for the S&P 500 and Bloomberg US Treasury Index. © 2024 Lincoln Partners Advisors LLC. All rights reserved. Third-party use is at user’s own risk.



Note: The above should not be construed as research or investment advice.

Private equity has outperformed in downturns. Historically, private equity outperforms public equity, which Figure 9 illustrates via the rolling 12-month performance of the Cambridge Associates Private Buyout Benchmark vs. the Russell 2000 mPME. Notable is that private equity’s outperformance spiked during every recession.

Figure 9: Relative Performance of Private Equity vs. Russell 2000 mPME



Source: Blackstone Investment Strategy Calculations, Cambridge Associates and Bloomberg, as of June 30, 2023. Russell 2000 performance is shown as Modified Public Market Equivalent (mPME) which is a public market equivalent methodology developed in-house by Cambridge Associates. The methodology provides a consistent means to effect a performance comparison between a private investment and public alternative. The relative performance is measured as a ratio of returns over 12 months rolling period. Grey shaded areas represent NBER defined recessions.

A skeptic might say that this outperformance is due to smoother private equity returns not reflecting the nadir of the cycle in the same way as public equities. However, Figure 10 shows a longer window starting a year before the recession and ending a year after it. Private equity outperformed in three out of four recessions, and on average across the recessions. The only exception was the brief, and in many ways unusual, COVID-19 recession.

Another way to view the portfolio benefits of private equity is the table presented on the right-hand side of Figure 10. On average, its outperformance is strongest over three-year windows, while the Russell 2000 is at its worst.

Figure 10: Relative Private Equity Returns during Recessions and Public Market Performances

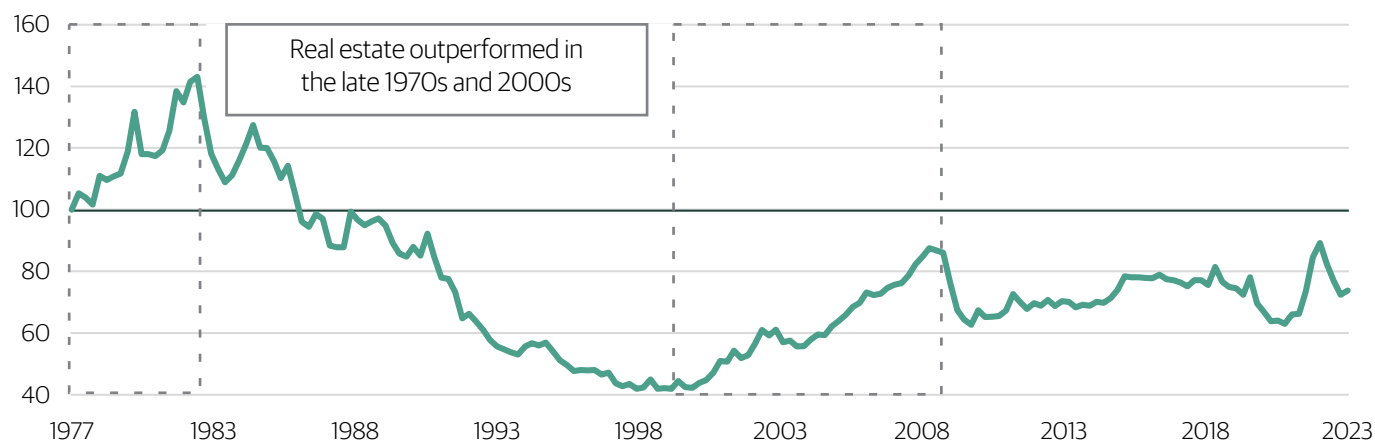
Annualized Private Equity Performance Relative to Russell 2000 (%)		Average Private Equity Performance Relative to Russell 2000 (%)	
Recession		Russell 2000 Returns	
Early 90s	2.8	-100% to 0%	8.3
Tech Bubble	5.4	0% to 5%	8.2
GFC	4.6	5% to 10%	5.3
COVID-19	-3.6	10% to 15%	5.1
Average	2.3	15% to 100%	0.9

Source: Blackstone Investment Strategy Calculations, Cambridge Associates and Bloomberg, as of June 30, 2023. We calculate the relative performance as a ratio and annualize it assuming continuous compounding. The table to the left looks at the following periods: “Early 90s” recession figures are based on calculations from September 1989 to December 1991; “Tech Bubble” figures are based on calculations from March 2000 to September 2002; “Great Financial Crisis” figures are based on calculations from December 2006 to March 2010; “COVID-19” figures are based on calculations from December 2018 to March 2021. The table to the right looks at rolling 3-year periods measured at a quarterly frequency sorted by the annualized total return on the Russell 2000 measured over the same rolling 3-year windows.

Note: **Past performance does not predict future returns.** There is no guarantee that any product or strategy will achieve its aims or objectives.

Real estate has historically offered inflation protection. Figure 11 shows the long run relative performance of the NCREIF Property Index of private market real estate vs. a stock/bond portfolio with similar volatility. There are two substantial stretches of real estate outperformance: the late 1970s and the 2000s. Both periods featured global supply side pressures for commodities more akin to what we expect over the next cycle than the environments with strongly declining interest rates that the US economy experienced from 1982 to the late 1990s and after the GFC.

Figure 11: Private Real Estate vs. Stock/Bond Portfolio with Equivalent Volatility



Source: Blackstone Investment Strategy calculations, Bloomberg and Standard & Poor's as of December 31, 2023. Real estate performance calculations are based on data for the NCREIF Property Index. Risk-adjusted stock/bond portfolio is based on 53% S&P 500 and 47% Bloomberg US Aggregate Bond Index, with quarterly rebalancing. The portfolio weight in equities is chosen so the risk-adjusted stock/bond portfolio has the same 3-year volatility as the NCREIF Property Index.

On a more fundamental level, we expect the undersupply of housing and some types of commercial real estate, such as last-mile logistics and data centers, to contribute to a reemergence of inflationary pressures in the next cycle. That undersupply should make this type of real estate particularly well suited to hedge against inflation.⁹

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9. There is no assurance that any fund or product will effectively hedge inflation.

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