



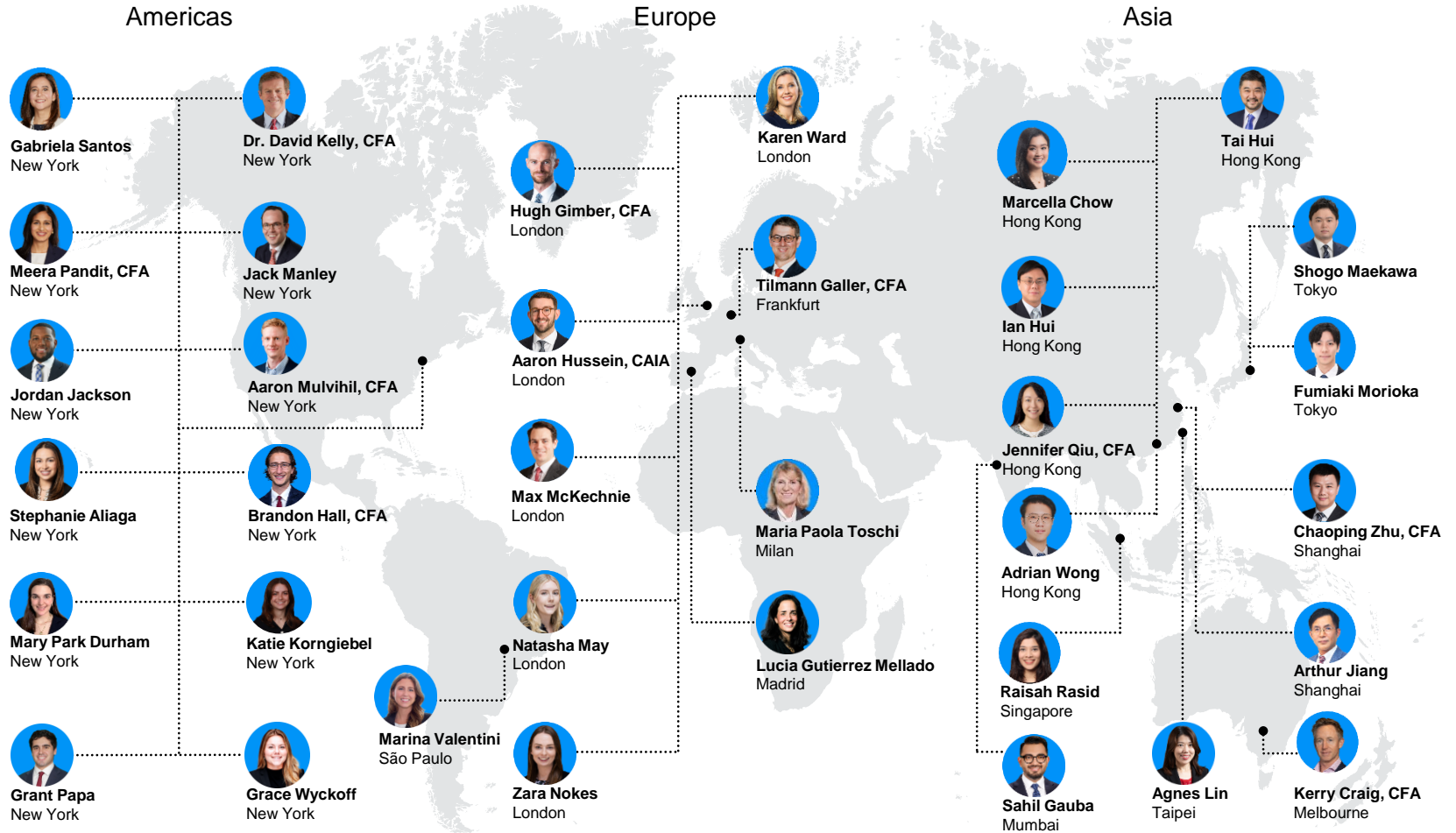
Guide to the Markets[®]

U.S. | 3Q 2025
As of July 31, 2025





Global Market Insights Strategy team





Equities

- 4. S&P 500 index at inflection points
- 5. S&P 500 valuation measures
- 6. P/E ratios and equity returns
- 7. Sources of earnings growth and profit margins
- 8. S&P 500: Index concentration
- 9. Magnificent 7 performance and earnings dynamics
- 10. Value vs. growth: Valuations, earnings and performance
- 11. Valuation dispersion
- 12. Small caps, mid caps and large caps
- 13. Returns and valuations by style
- 14. Returns and valuations by sector
- 15. Bull and bear markets
- 16. Annual returns and intra-year declines

Economy

- 17. Economic growth and the composition of GDP
- 18. Components of GDP growth
- 19. Recession determinants
- 20. U.S. expansions and recessions
- 21. Long-term growth drivers
- 22. Labor demand
- 23. Labor supply
- 24. Unemployment and wages
- 25. Artificial intelligence: Investment and implementation
- 26. Inflation components
- 27. Oil markets
- 28. Dollar drivers
- 29. Tariffs on U.S. imports
- 30. Consumer finances
- 31. Federal finances
- 32. Consumer confidence and the stock market

Fixed Income

- 33. The Fed and interest rates
- 34. Interest rates and inflation
- 35. Fixed income market dynamics
- 36. Fixed income investment universe
- 37. Yield curve
- 38. U.S. Treasury debt dynamics
- 39. Credit market dynamics
- 40. Fixed income yields
- 41. Global fixed income
- 42. Municipal finance
- 43. Fixed income yields and forward returns
- 44. Bond market intermediary capacity and exchange volumes

International

- 45. Global equity markets
- 46. Global equity performance and the U.S. dollar
- 47. Global equity return composition
- 48. Global equity return themes
- 49. Global equity valuations
- 50. Global equity earnings
- 51. Global economic activity momentum
- 52. Foreign ownership of U.S. assets

Alternatives

- 53. Alternatives: Correlations, returns and yields
- 54. Sources of global infrastructure returns
- 55. Real estate correlation to equities
- 56. U.S. public vs. private equity
- 57. Alternatives and manager selection

Investing Principles

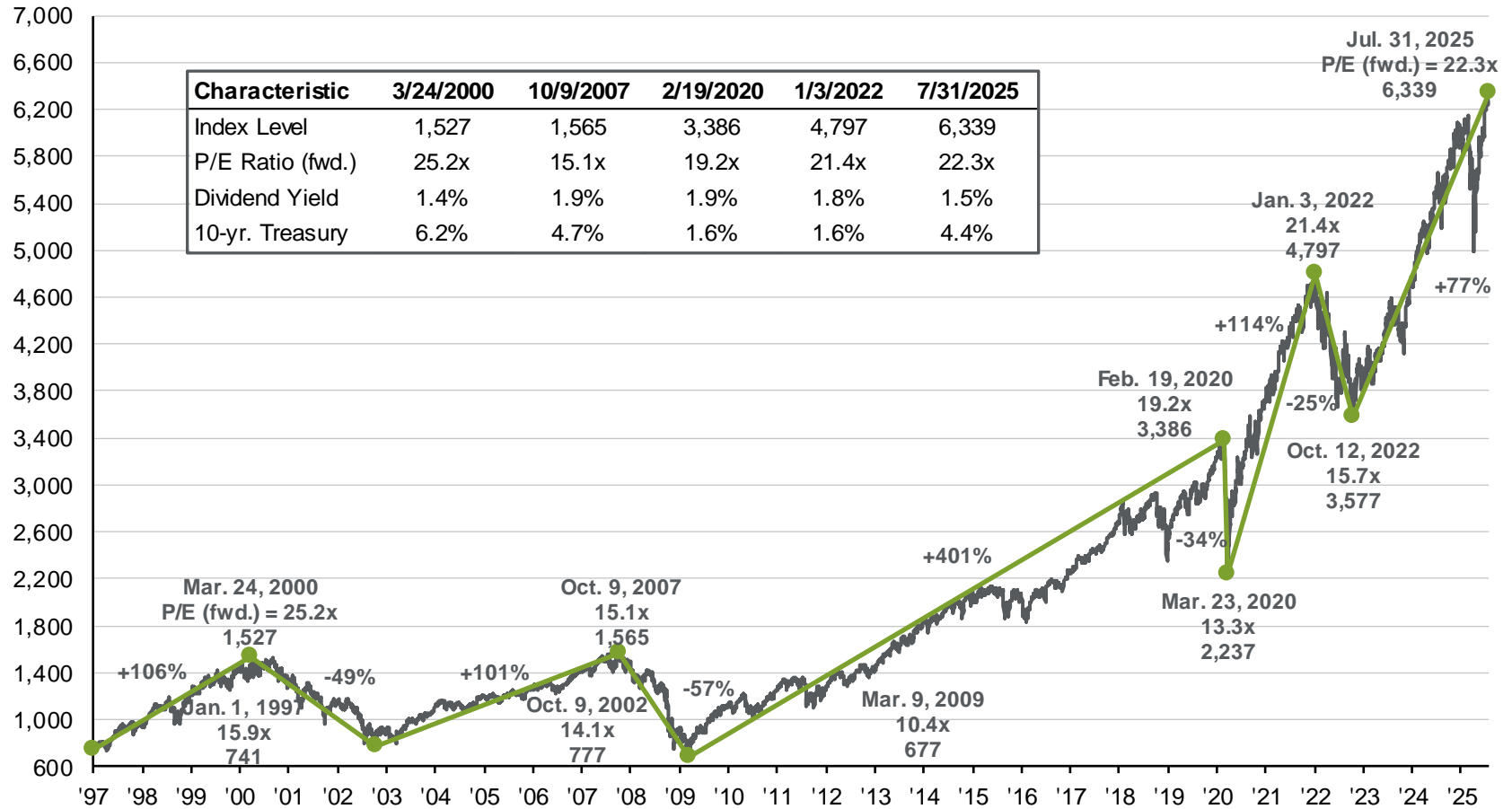
- 58. Asset class returns
- 59. Time, diversification and the volatility of returns
- 60. Risk investing and the power of compounding
- 61. Cash versus a 60/40 portfolio
- 62. Investing at all-time highs
- 63. Manager dispersion
- 64. 60/40 portfolio drift
- 65. 60/40 returns and stock-bond correlation
- 66. Single-stock volatility and equity market returns
- 67. Capital gains by investment vehicle
- 68. Growth and evolution of the ETF market



S&P 500 index at inflection points

Equities

S&P 500 Price Index



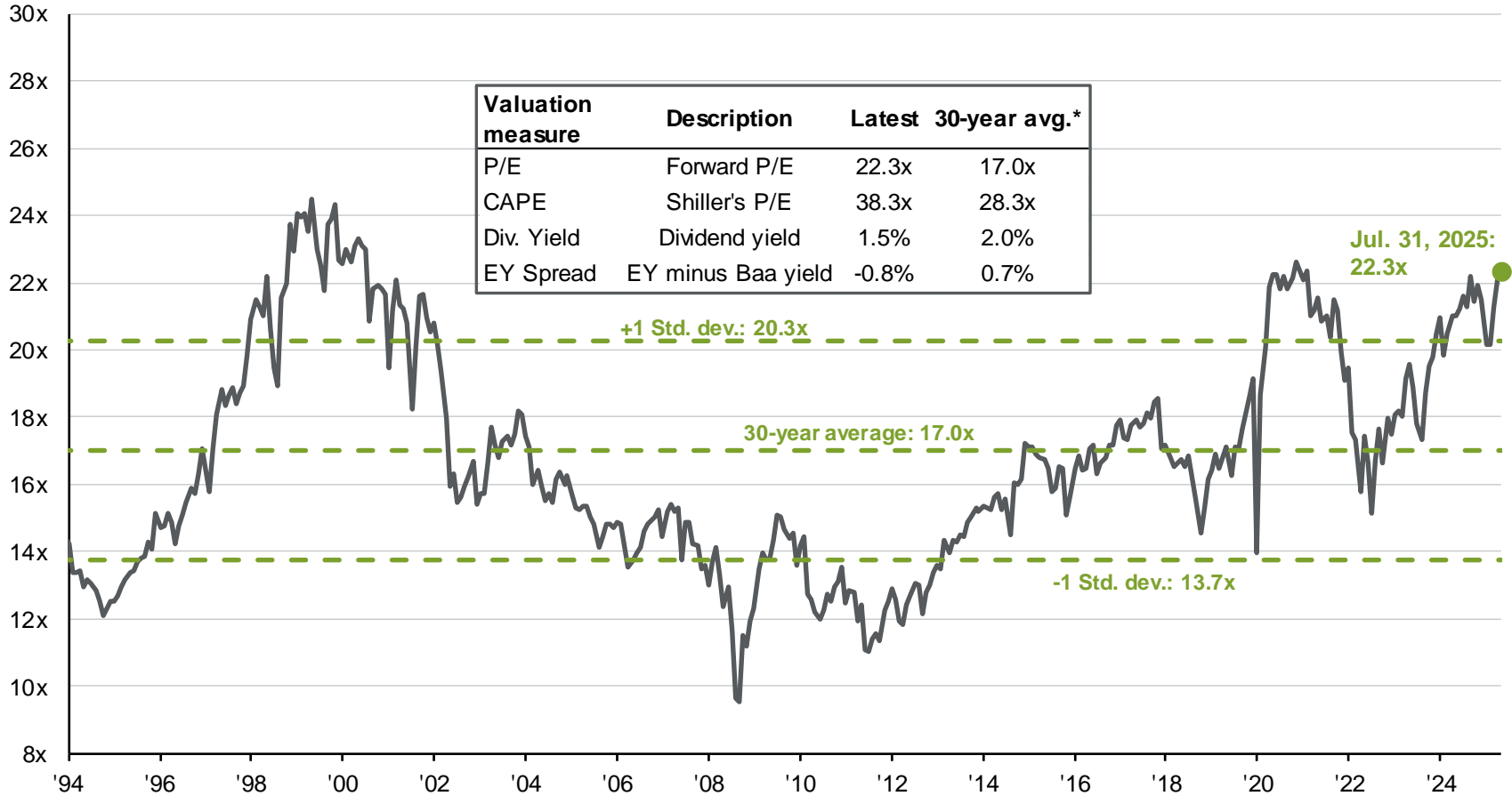
Source: FactSet, Federal Reserve, Refinitiv Datastream, Standard & Poor's, J.P. Morgan Asset Management.
 Dividend yield is calculated as consensus analyst estimates of dividends in the next 12 months, provided by FactSet, divided by the most recent S&P 500 index price. Forward P/E ratio is the most recent S&P 500 index price divided by consensus estimates for earnings in the next 12 months, provided by IBES since January 1997 and FactSet since January 2022. Returns are cumulative and do not include the reinvestment of dividends. Past performance is not indicative of future returns.
 Guide to the Markets – U.S. Data are as of July 31, 2025.



S&P 500 valuation measures

Equities

S&P 500 Index: Forward P/E ratio



Source: Bloomberg, FactSet, Moody's, Refinitiv Datastream, Robert Shiller, Standard & Poor's, J.P. Morgan Asset Management. Forward P/E ratio is the most recent S&P 500 index price divided by consensus analyst estimates for earnings in the next 12 months, provided by IBES since March 1994 and FactSet since January 2022. Shiller's P/E uses trailing 10-years of inflation-adjusted earnings as reported by companies. Dividend yield is calculated as consensus estimates of dividends in the next 12 months, provided by FactSet, divided by the most recent S&P 500 index price. EY minus Baa yield is the forward earnings yield (the inverse of the forward P/E ratio) minus the Bloomberg U.S. corporate Baa yield since December 2008 and interpolated using the Moody's Baa seasoned corporate bond yield for values beforehand. *Average for dividend yield is since August 1995 due to data availability. *Guide to the Markets - U.S.* Data are as of July 31, 2025.

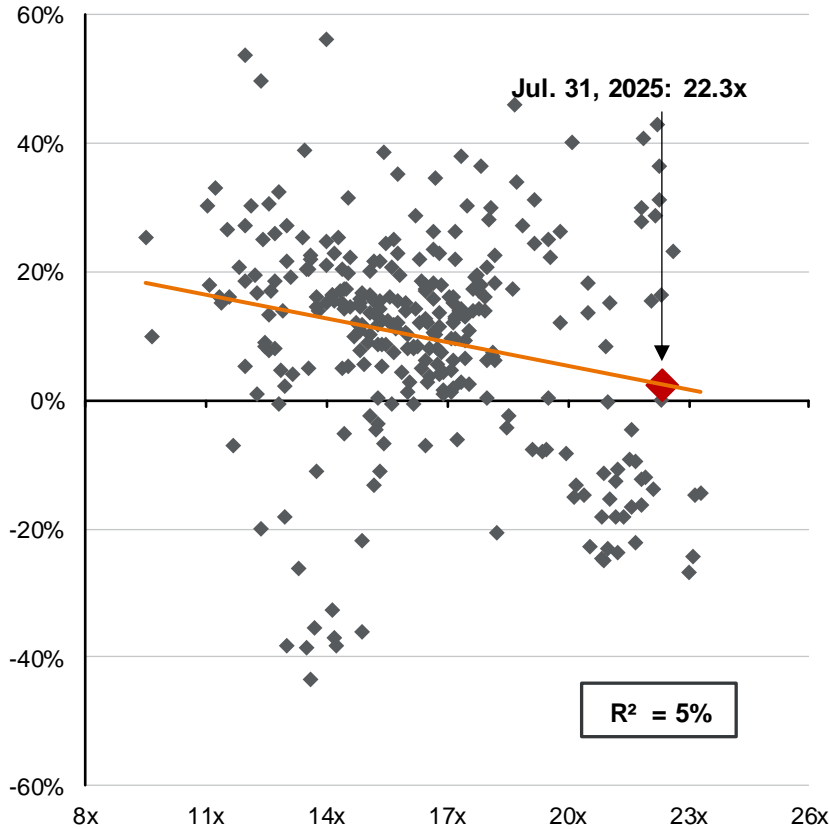


P/E ratios and equity returns

Equities

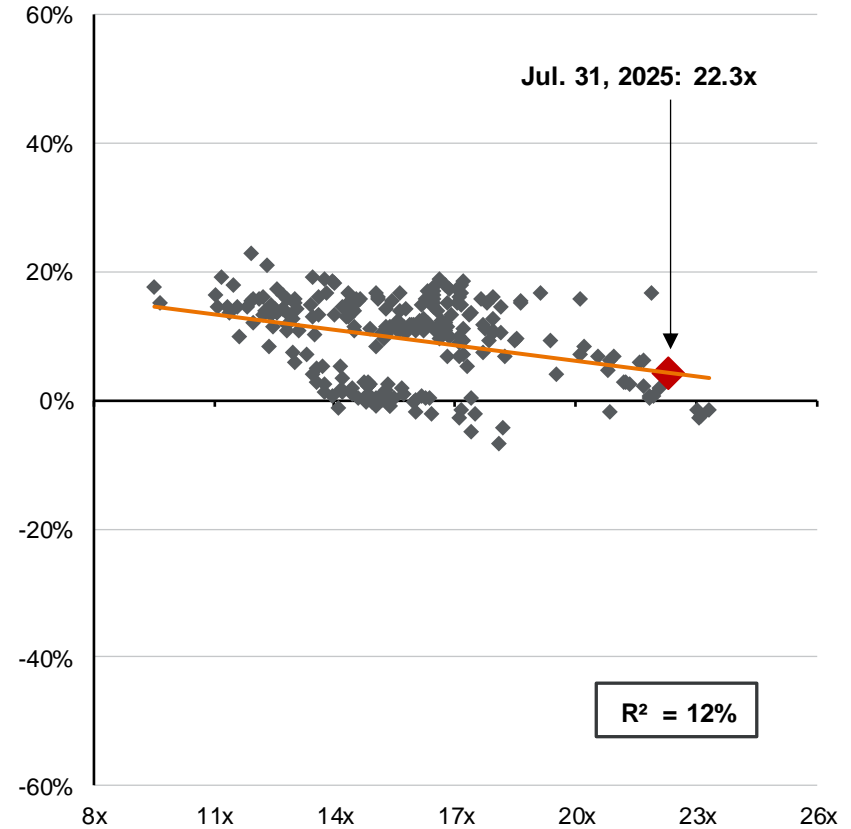
Forward P/E and subsequent 1-yr. returns

S&P 500 Total Return Index



Forward P/E and subsequent 5-yr. annualized returns

S&P 500 Total Return Index



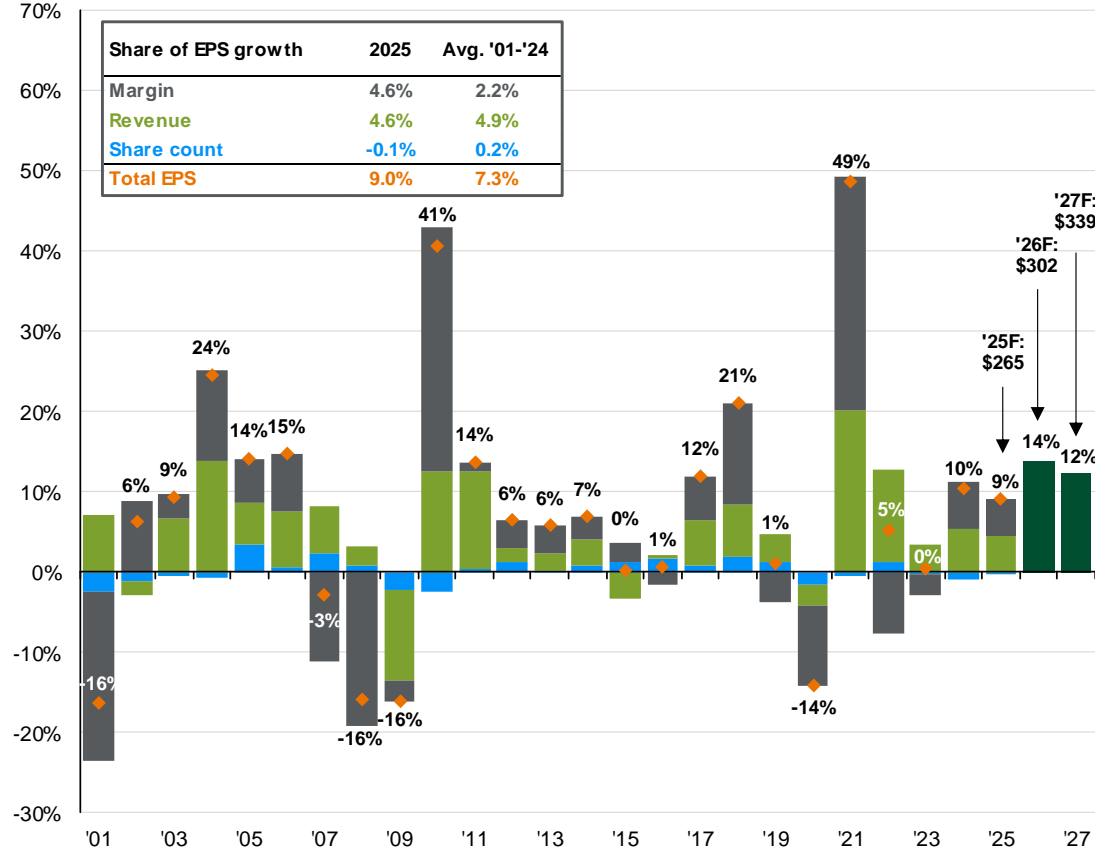
Source: FactSet, Refinitiv Datastream, Standard & Poor's, J.P. Morgan Asset Management. Returns are 12-month and 60-month annualized total returns, measured monthly, beginning 6/30/1999. R^2 represents the percent of total variation in total return that can be explained by forward P/E ratios. The forward P/E ratio is the most recent S&P 500 Index price divided by consensus analyst estimates for earnings in the next 12 months, provided by IBES since May 1999 and FactSet since January 2022. *Guide to the Markets - U.S.* Data are as of July 31, 2025.



Sources of earnings growth and profit margins

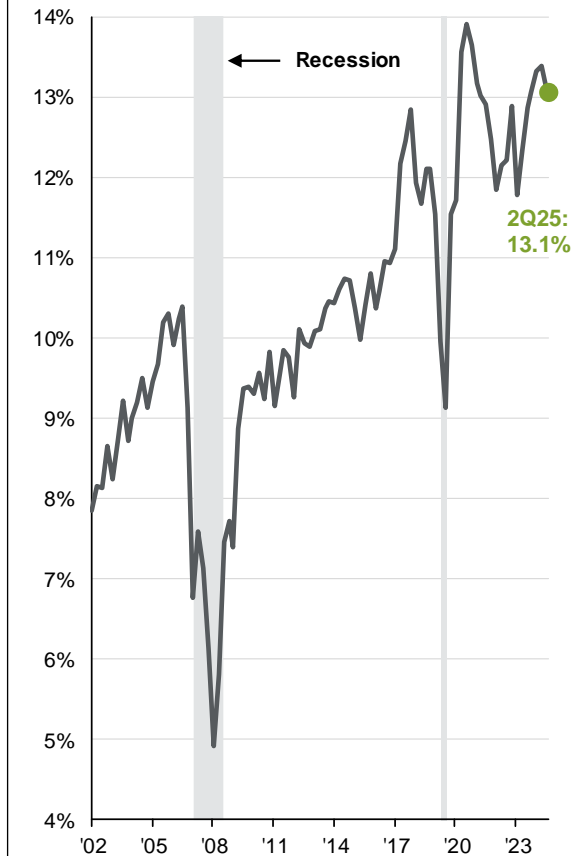
S&P 500 year-over-year EPS growth

Annual growth broken into changes in revenue, profit margin and share count



S&P 500 profit margins

Quarterly earnings/sales



Source: Compustat, FactSet, Standard & Poor's, J.P. Morgan Asset Management.
 Historical EPS values are based on annual earnings per share. Forecasts for 2025, 2026 and 2027 reflect consensus analyst expectations, provided by FactSet. Past performance is not indicative of future returns.
 Guide to the Markets – U.S. Data are as of July 31, 2025.



S&P 500: Index concentration

Equities

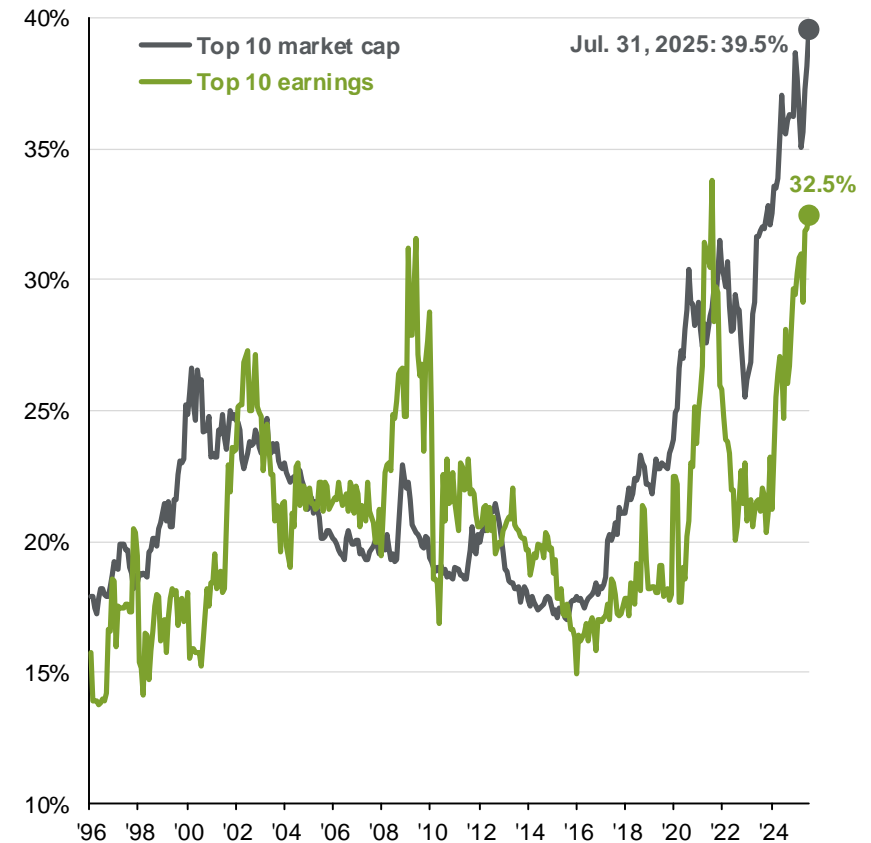
P/E of the top 10 and remaining stocks in the S&P 500

Next 12 months, 1996 - present



Weight of the top 10 stocks in the S&P 500

% of market capitalization, % of last 12 months' earnings



Source: FactSet, Standard & Poor's, J.P. Morgan Asset Management.

The 10 largest S&P 500 companies are based on the beginning of each month. As of 6/30/2025, the top 10 companies in the index were NVDA (7.3%), MSFT (7.0%), AAPL (5.8%), AMZN (3.9%), GOOGL/GOOG (3.5%), META (3.1%), AVGO (2.5%), BRK.B (1.7%), TSLA (1.7%) and JPM (1.5%). The remaining stocks represent the rest of the 490 companies in the S&P 500.

Guide to the Markets - U.S. Data are as of July 31, 2025.



Magnificent 7 performance and earnings dynamics

GTM

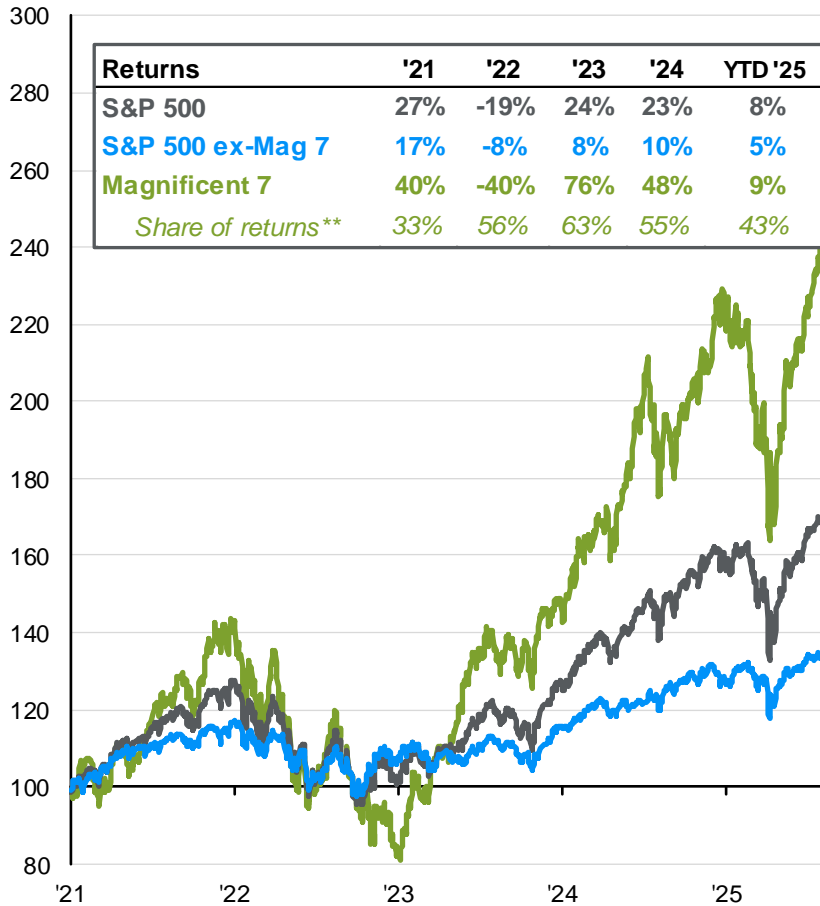
U.S.

9

Equities

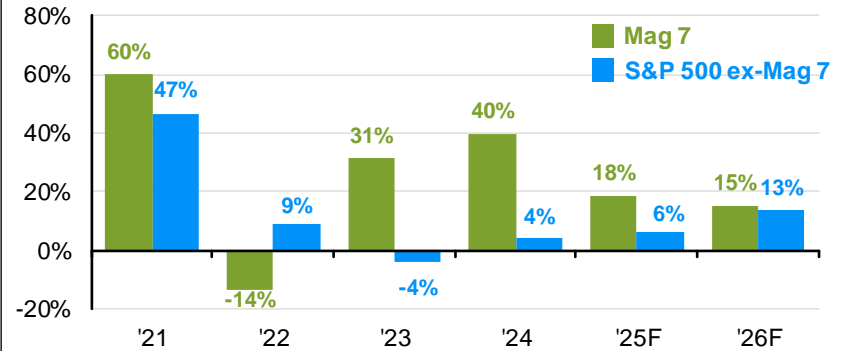
Performance of “Magnificent 7” stocks in S&P 500*

Indexed to 100 on 1/1/2021, price return



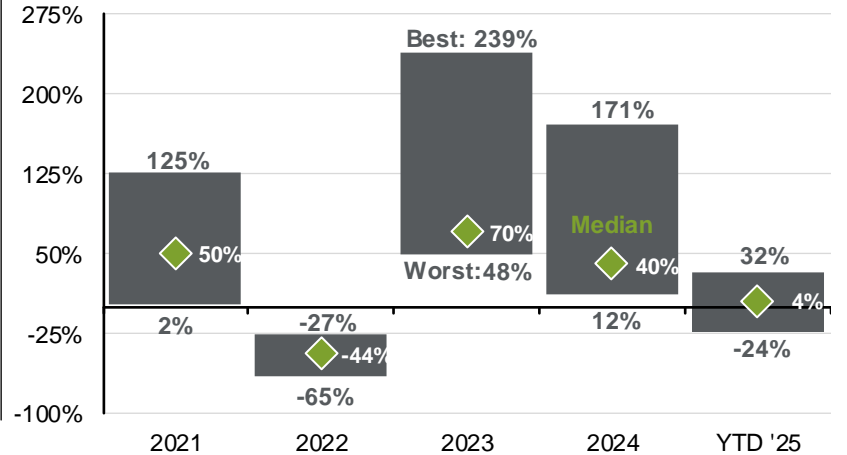
Earnings growth

Year-over-year



Magnificent 7 performance dispersion

Price returns, best, median and worst performing Mag 7 stock by year



Source: FactSet, Standard & Poor's, J.P. Morgan Asset Management.

*Magnificent 7 includes AAPL, AMZN, GOOGL/GOOG, META, MSFT, NVDA and TSLA. Earnings estimates for 2025 and 2026 reflect consensus analyst expectations, provided by FactSet. **Share of returns represent how much each group contributed to the overall return.

Guide to the Markets – U.S. Data are as of July 31, 2025.



Value vs. growth: Valuations, earnings and performance

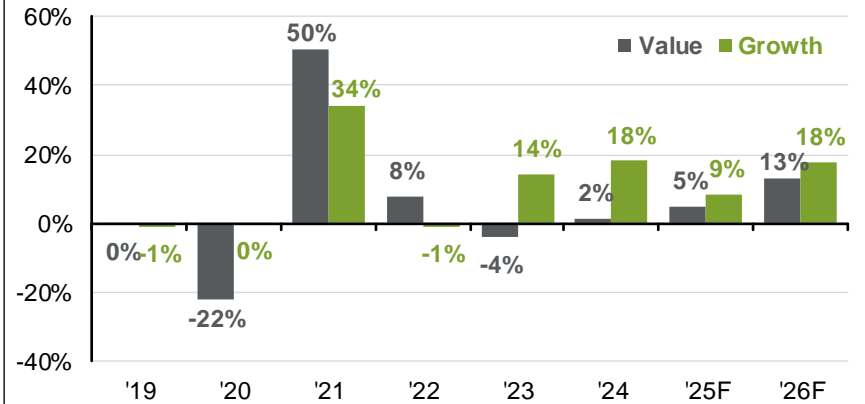
Value vs. growth price-to-earnings discount

Russell 1000 Value vs. Growth, next 12 months



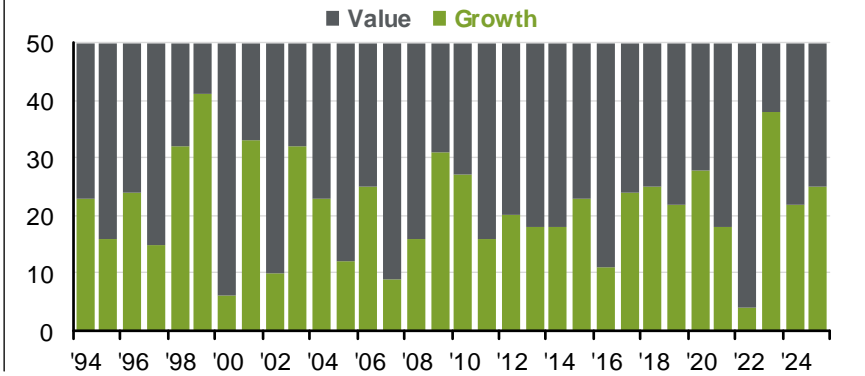
Earnings growth

Year-over-year



Top 50 performing companies in the S&P 500

Number of value and growth companies, 1994 - July 2025



Source: FactSet, FTSE Russell, J.P. Morgan Asset Management.

Growth is represented by the Russell 1000 Growth Index and value is represented by the Russell 1000 Value Index. (Left) Long-term averages are calculated monthly since December 1997. (Top Right) Earnings estimates for 2025 and 2026 reflect consensus analyst expectations, provided by FactSet. (Bottom Right) Graph was made by ranking the S&P 500 constituents by total return on a yearly basis. On average, 29 of the top 50 performing companies are value and 21 are growth.

Guide to the Markets – U.S. Data are as of July 31, 2025.

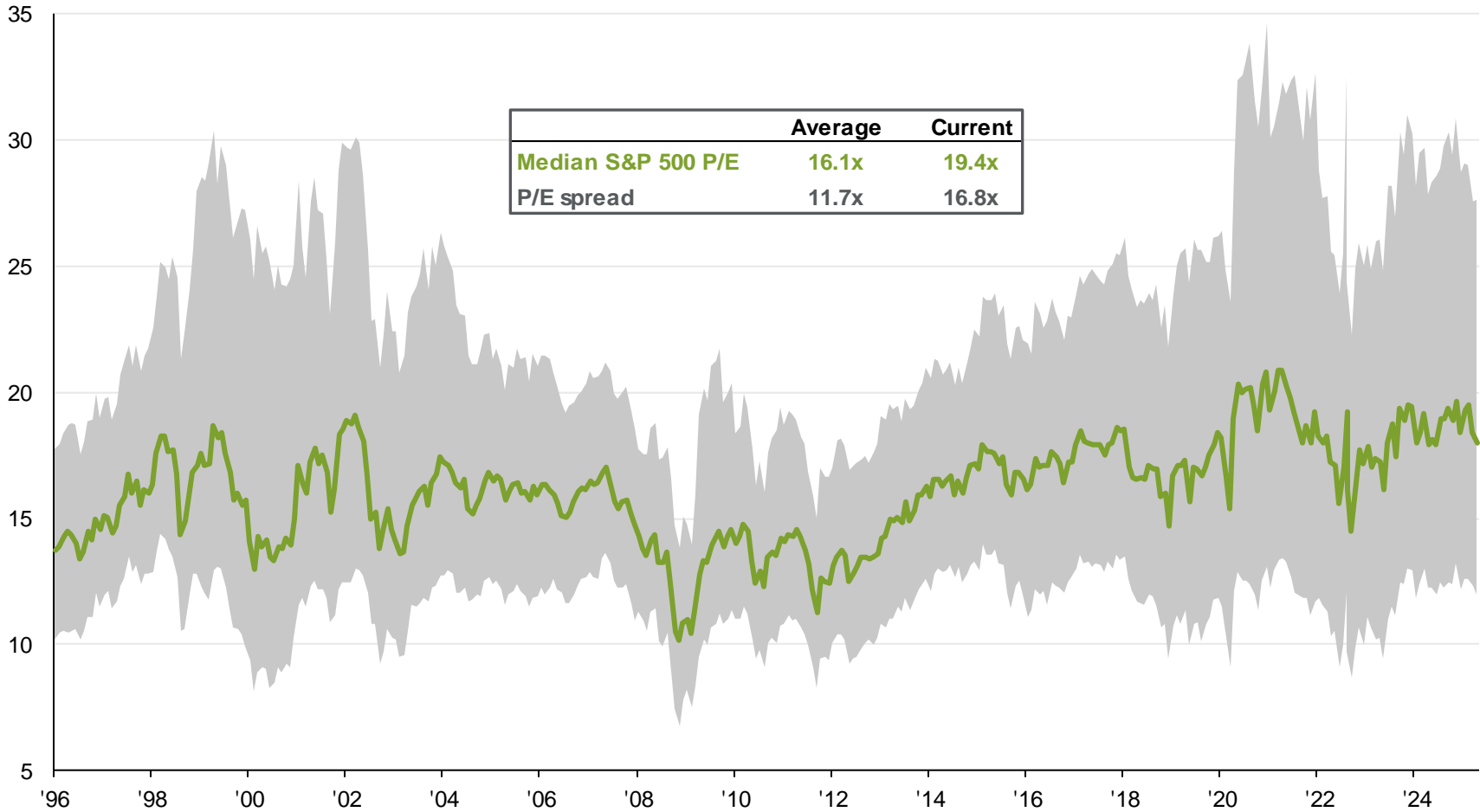


Valuation dispersion

Equities

Valuation dispersion

Dispersion between the forward P/E of S&P 500 stocks in the 20th and 80th percentile



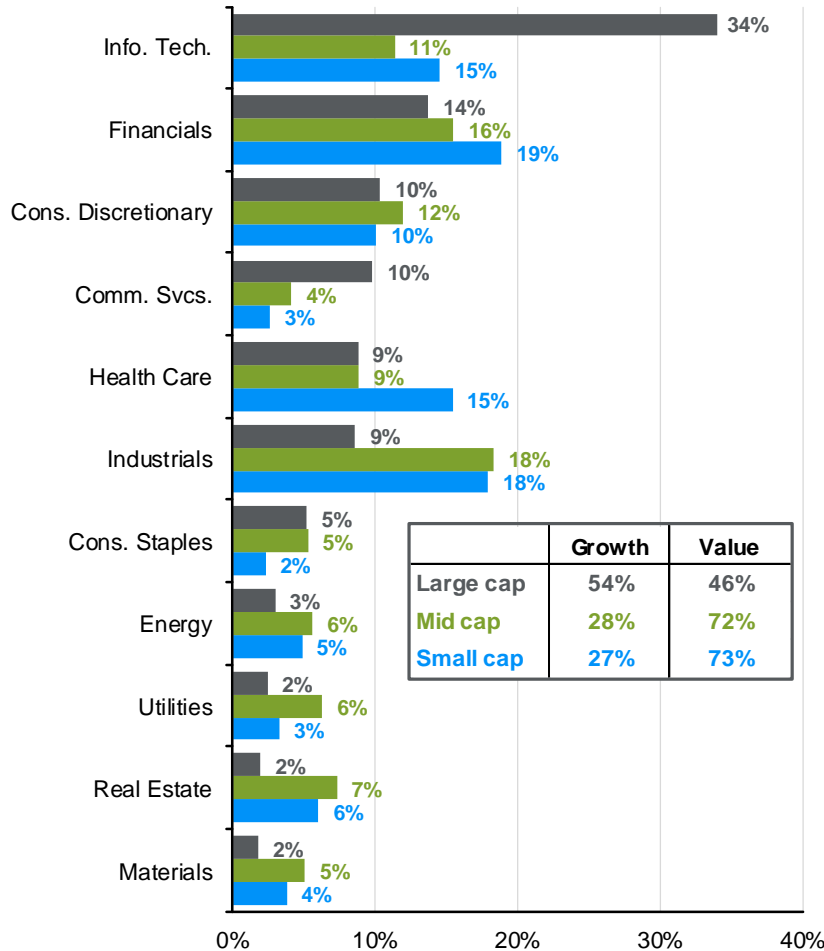
Source: Compustat, FactSet, Standard & Poor's, J.P. Morgan Asset Management. Guide to the Markets – U.S. Data are as of July 31, 2025.



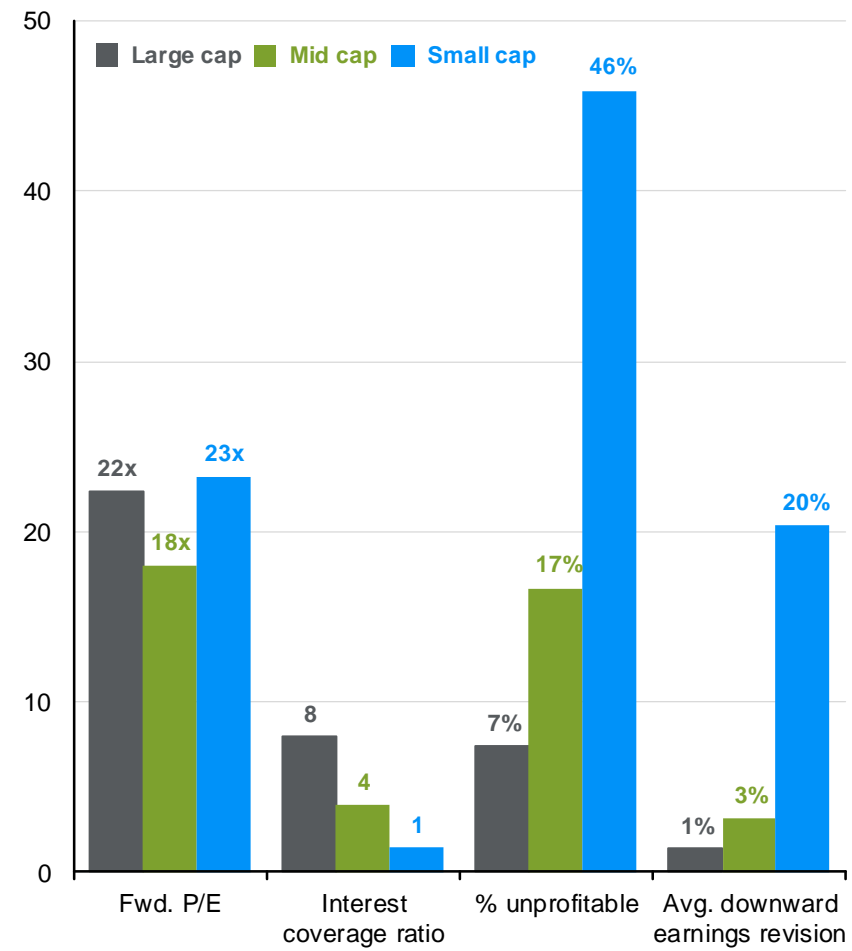
Small caps, mid caps and large caps

Equities

Percent of market capitalization by sector



Valuations, interest coverage and earnings



Source: Compustat, FactSet, FTSE Russell, J.P. Morgan Asset Management.

The S&P 500 is used for large cap, the Russell Mid Cap is used for mid cap and the Russell 2000 is used for small cap. (Right) Interest coverage ratio is calculated by dividing the last 12 months earnings by the interest expense, provided by FactSet. Data for the percent of unprofitable companies are quarterly and as of 1Q25. Downward earnings revisions are calculated as the percent change in EPS from the January 1st consensus analyst estimate, provided by FactSet, to the actual value and are averaged over the years from 2010 through 2024.

Guide to the Markets – U.S. Data are as of July 31, 2025.



Returns and valuations by style

GTM

U.S.

13

	10-year annualized		
	Value	Blend	Growth
Large	9.2%	13.7%	17.1%
Mid	8.6%	10.0%	12.2%
Small	7.2%	7.4%	7.3%

	YTD		
	Value	Blend	Growth
Large	6.6%	8.6%	10.1%
Mid	5.0%	6.8%	12.0%
Small	-1.5%	-0.1%	1.2%

	Since market peak (January 2022)		
	Value	Blend	Growth
Large	25.2%	39.5%	47.4%
Mid	17.6%	19.8%	27.4%
Small	3.1%	2.4%	0.7%

	Since market low (October 2022)		
	Value	Blend	Growth
Large	51.7%	84.7%	116.1%
Mid	46.6%	56.8%	84.0%
Small	29.7%	36.5%	42.9%

	Forward P/E vs. 20-year avg. P/E		
	Value	Blend	Growth
Large	17.0 / 13.9	22.3 / 16.0	30.9 / 19.6
Mid	15.9 / 14.5	18.0 / 16.4	30.3 / 21.1
Small	16.9 / 16.9	23.2 / 22.4	35.2 / 30.4

	Forward P/E as % of 20-year avg. PE		
	Value	Blend	Growth
Large	122.8%	139.2%	157.6%
Mid	109.3%	109.6%	143.3%
Small	100.2%	103.4%	115.7%

Source: FactSet, FTSE Russell, Standard & Poor's, J.P. Morgan Asset Management.

All calculations are cumulative total return, including dividends reinvested for the stated period. Returns are not annualized. Since market peak represents the period from January 3, 2022, to July 31, 2025. Since market low represents the period from October 12, 2022, to July 31, 2025. For all time periods, total return is based on Russell style indices except for the large blend category, which is based on the S&P 500 index. Forward P/E ratio is the most recent S&P 500 index price divided by consensus analyst estimates for earnings in the next 12 months, provided by FactSet. Past performance is not indicative of future returns.

Guide to the Markets – U.S. Data are as of July 31, 2025.



Returns and valuations by sector

GTM U.S. 14

Equities

	Energy	Materials	Financials	Industrials	Cons. Disc.	Tech.	Comm. Services*	Real Estate	Health Care	Cons. Staples	Utilities	S&P 500 Index
S&P weight	3.0%	1.8%	13.8%	8.6%	10.4%	34.0%	9.9%	2.0%	8.8%	5.2%	2.5%	100.0%
Russell Growth weight	0.3%	0.3%	6.4%	5.9%	13.3%	52.5%	11.4%	0.5%	6.6%	2.5%	0.3%	100.0%
Russell Value weight	6.0%	4.1%	22.7%	13.4%	7.9%	10.2%	7.7%	4.2%	11.2%	8.0%	4.6%	100.0%
QTD return	2.9	-0.4	0.0	3.0	2.6	5.2	2.4	-1.2	-3.3	-2.4	4.9	2.2
YTD return	3.7	5.6	9.2	16.1	-1.3	13.7	13.8	1.9	-4.3	3.9	14.8	8.6
Beta to S&P 500	1.1	1.1	1.1	1.1	1.2	1.2	1.1	0.9	0.7	0.6	0.5	1.0
Correl. to Treas. yields	-0.1	-0.6	-0.6	-0.6	-0.3	-0.4	-0.1	-0.8	-0.7	-0.6	-0.5	-0.5
Foreign % of sales	35.6	51.6	28.9	34.1	34.6	55.2	49.1	17.3	32.6	40.6	1.7	41.4
NTM earnings growth	5.2%	13.4%	10.4%	13.4%	7.6%	18.6%	12.2%	3.6%	11.4%	4.4%	8.2%	11.9%
20-yr avg.	8.0%	12.5%	20.5%	13.6%	16.6%	12.1%	12.8%	6.7%	8.2%	7.1%	4.5%	10.9%
Forward P/E ratio	15.1x	19.8x	16.7x	24.7x	28.8x	30.2x	19.7x	17.4x	16.4x	21.5x	18.6x	22.3x
20-yr avg.	13.6x	15.4x	12.8x	16.6x	20.2x	18.4x	18.8x	17.3x	15.1x	17.8x	15.9x	16.0x
Buyback yield	3.8%	1.9%	2.4%	1.3%	1.4%	1.7%	3.3%	-1.4%	1.5%	1.2%	-0.6%	1.9%
20-yr avg.	2.0%	1.1%	0.5%	2.4%	2.5%	3.0%	1.9%	-1.4%	1.9%	1.8%	-0.7%	1.9%
Dividend yield	3.6%	2.0%	1.8%	1.5%	1.9%	0.7%	1.0%	3.8%	2.4%	2.7%	2.9%	1.5%
20-yr avg.	2.9%	2.3%	2.4%	2.2%	1.7%	1.2%	1.1%*	3.7%	2.0%	2.9%	3.8%	2.1%

Source: FactSet, FTSE Russell, Standard & Poor's, J.P. Morgan Asset Management.

All calculations are cumulative total return, not annualized, including dividends for the stated period. Correlation to Treasury yields are trailing 2-year monthly correlations between S&P 500 sector price returns and 10-year Treasury yield movements. Next 12 months (NTM) earnings growth is the percent change in next 12 months consensus analyst earnings estimates compared to last 12 months earnings, provided by FactSet. For the energy sector, the 20-yr NTM earnings growth number is a median not an average given extreme outliers. Forward P/E ratio is the most recent S&P 500 index price divided by consensus estimates for earnings in the next 12 months, provided by FactSet. Buyback yield is net of share issuance and is calculated as last 12 months net buybacks divided by market cap. Dividend yield is calculated as the next 12 months consensus dividend, provided by FactSet, divided by most recent price. Beta calculations are based on 10-years of monthly price returns for the S&P 500 and its sub-indices. *Communication Services (formerly Telecom) averages and beta are based on 5-years of data. Past performance is not indicative of future returns.
Guide to the Markets – U.S. Data are as of July 31, 2025.

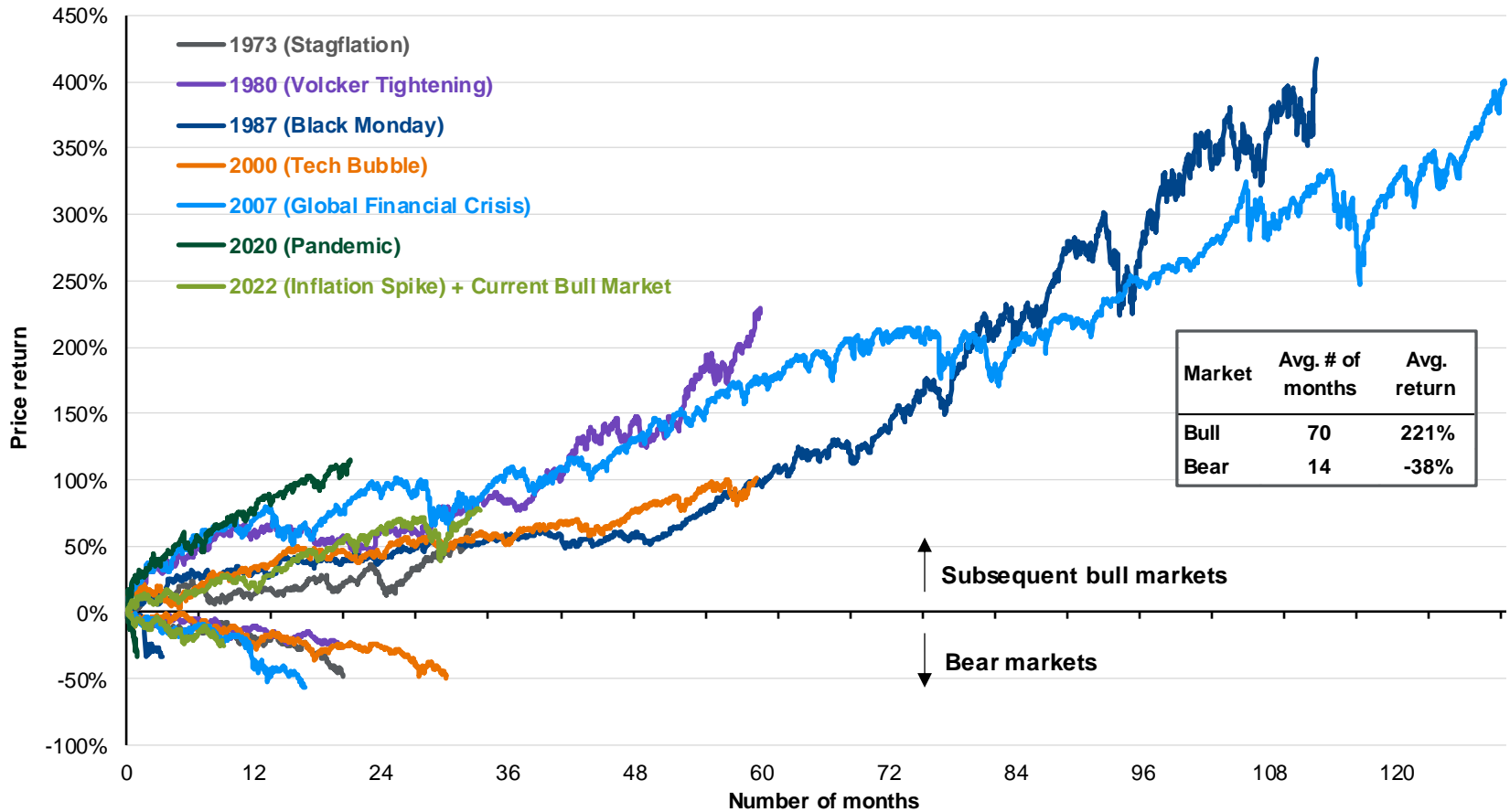


Bull and bear markets

Equities

Length and severity of bear and subsequent bull markets

Number of months, S&P 500 price return



Source: FactSet, Standard & Poor's, J.P. Morgan Asset Management. Bear markets are defined as a 20% drawdown from the prior peak and measured from peak to bottom. Bull markets are measured from the bottom of the prior bear market to the peak. *Guide to the Markets - U.S.* Data are as of July 31, 2025.

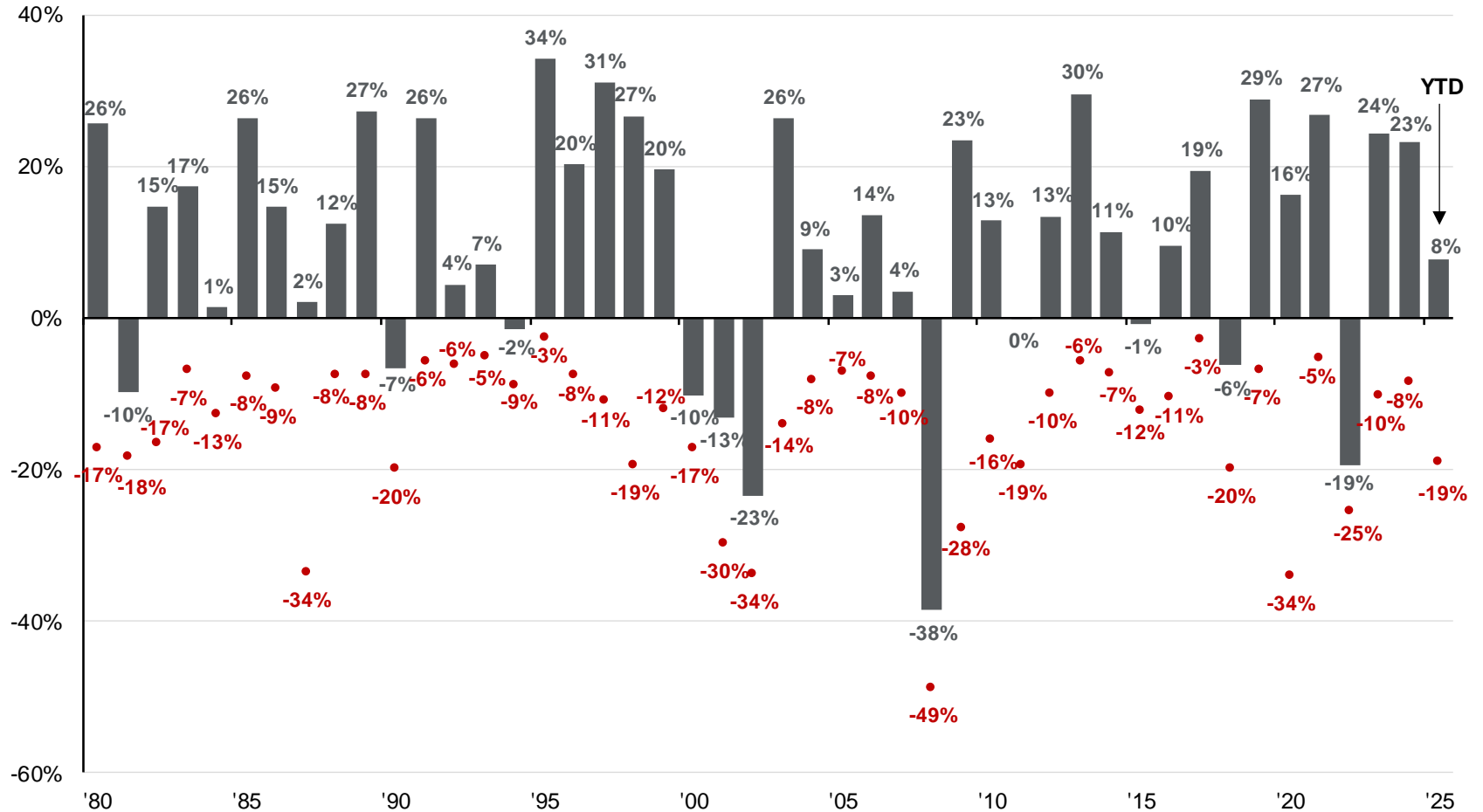


Annual returns and intra-year declines

Equities

S&P 500 intra-year declines vs. calendar year returns

Despite average intra-year drops of 14.1%, annual returns were positive in 34 of 45 years



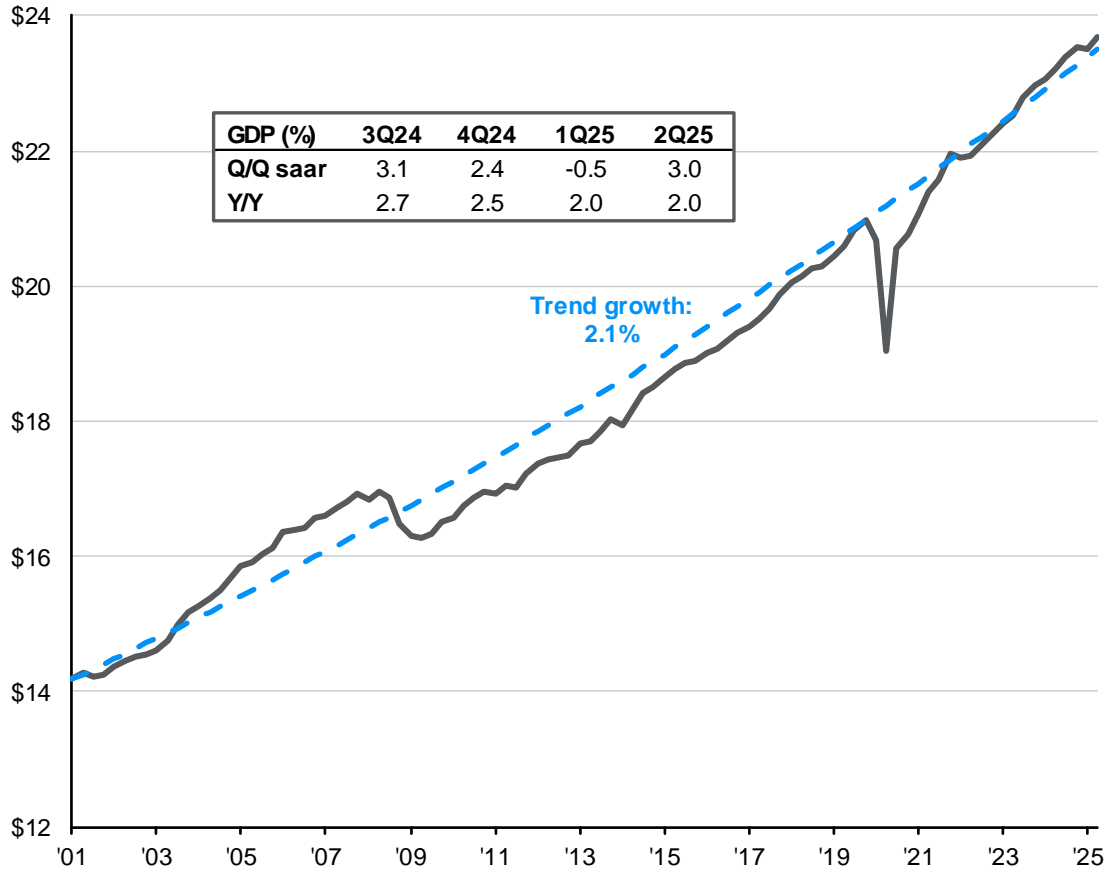
Source: FactSet, Standard & Poor's, J.P. Morgan Asset Management.
 Returns are based on price index only and do not include dividends. Intra-year drops refers to the largest peak-to-trough decline during the year.
 Returns shown are calendar year returns from 1980 to 2024, over which the average annual return was 10.6%. For illustrative purposes only.
 Guide to the Markets – U.S. Data are as of July 31, 2025.



Economic growth and the composition of GDP

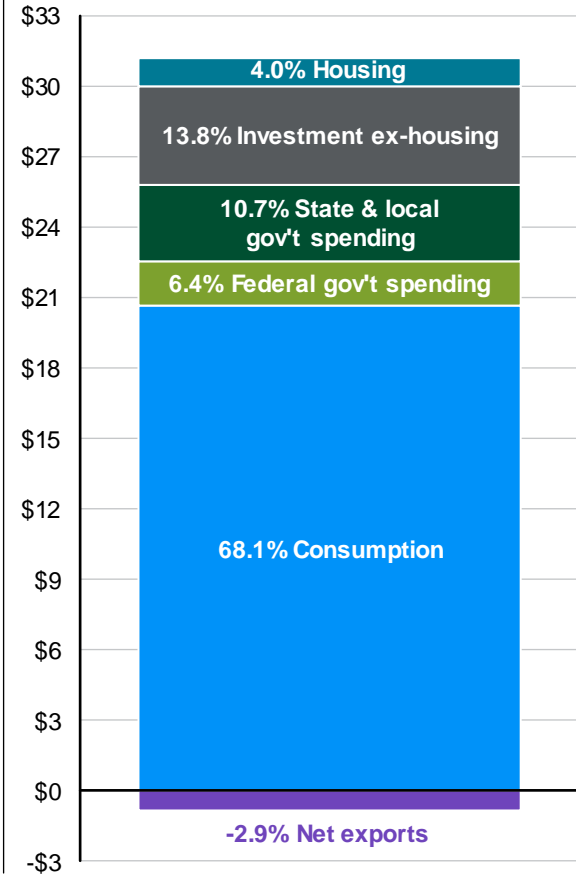
Real GDP

Trillions of chained (2017) dollars, seasonally adjusted at annual rates



Components of GDP

2Q25 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 July 31, 2025.

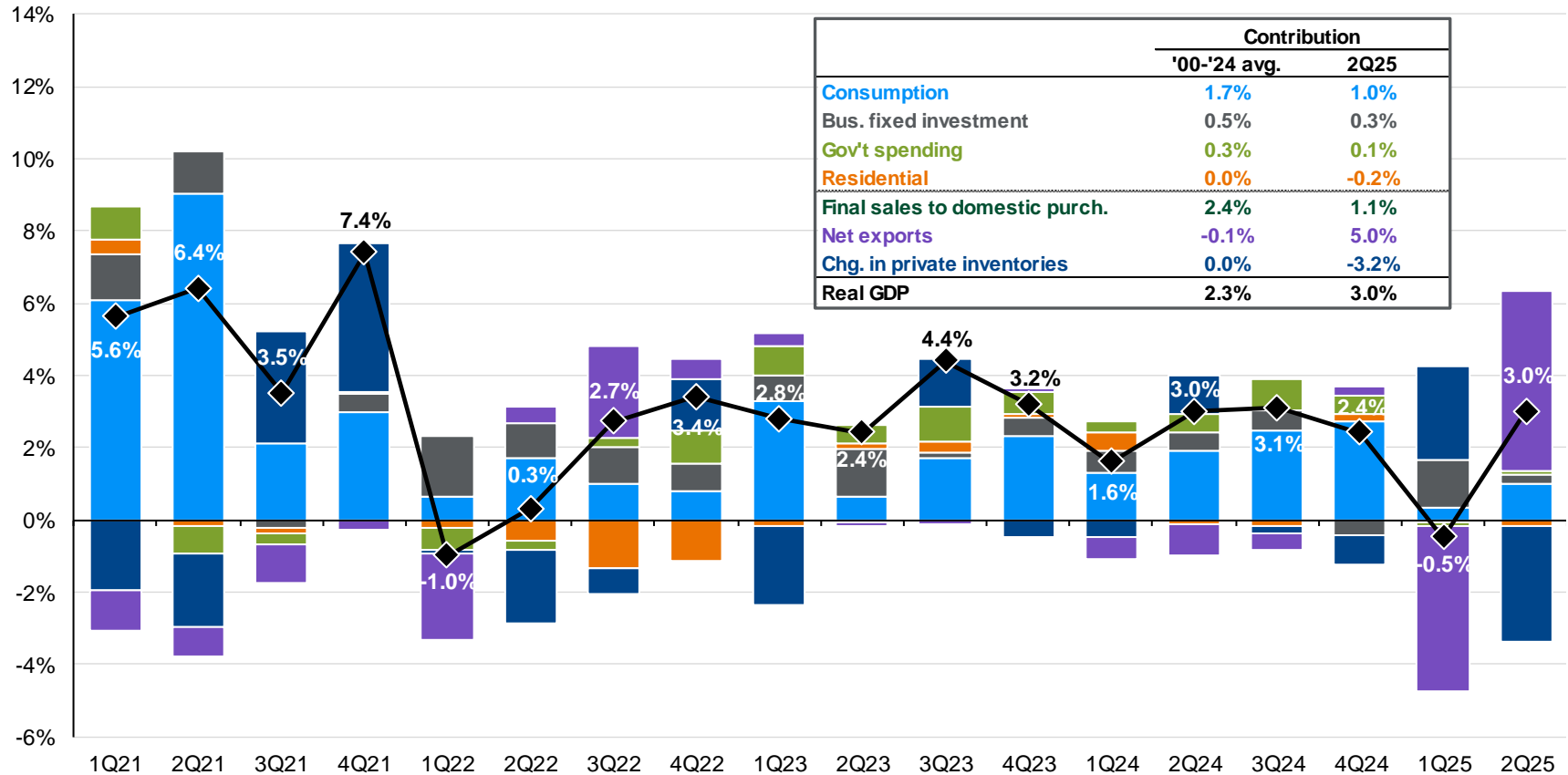


Components of GDP growth

Economy

Contributors to real GDP growth

Quarter-over-quarter, seasonally adjusted annualized rate



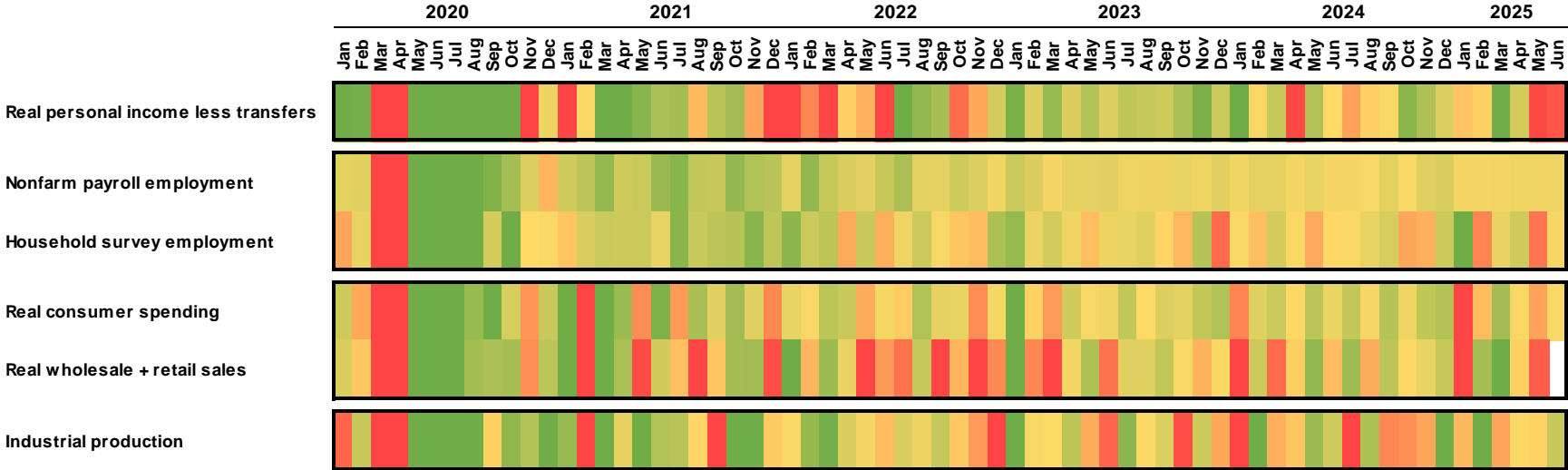
Source: BEA, FactSet, J.P. Morgan Asset Management. Guide to the Markets – U.S. Data are as of July 31, 2025.



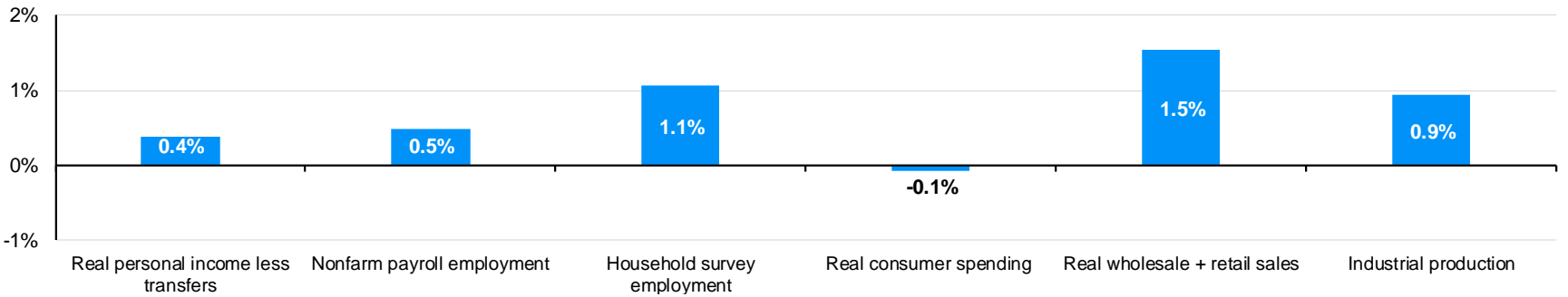
Recession determinants

Variables used by the NBER in making recession determination*

% change month-over-month



% change, last six months



Source: BEA, BLS, Census Bureau, NBER, J.P. Morgan Asset Management. Heatmap shading based on data back to 2020, 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. 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 which 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." Six-month percent change is calculated from the latest month's data, which may differ by indicator.

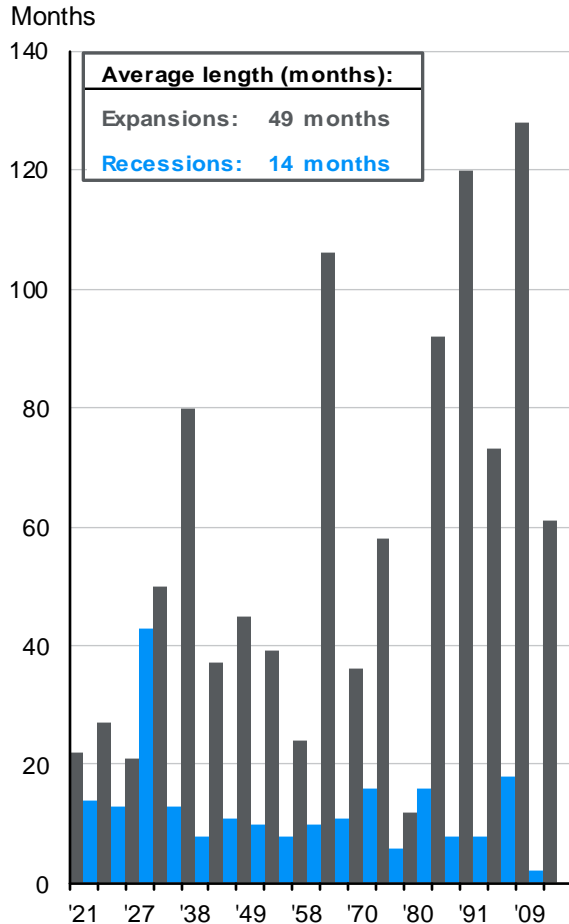
Guide to the Markets - U.S. Data areas of July 31, 2025.



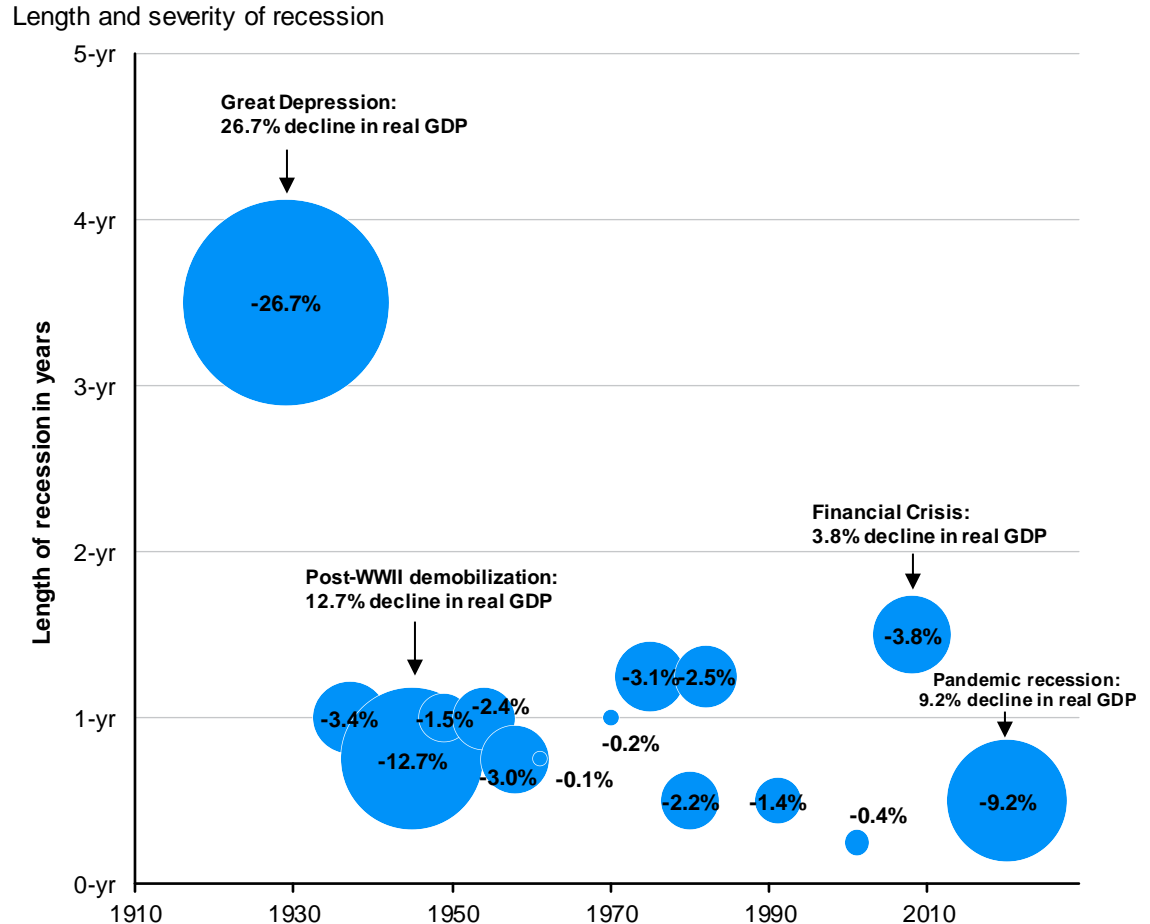
U.S. expansions and recessions

Economy

Length of expansions and recessions



The Great Depression and post-war recessions



Source: BEA, NBER, J.P. Morgan Asset Management.

(Left) Chart assumes the current expansion lasted until at least July 2025. (Right) Bubble size reflects the severity of the recession, which is calculated as the decline in real GDP from the peak quarter to the trough quarter except in the case of the Great Depression, where it is calculated from the peak year (1929) to the trough year (1933), due to a lack of available quarterly data. Data for length of economic expansions and recessions obtained from the National Bureau of Economic Research (NBER). Past performance is not a reliable indicator of current and future results. *Guide to the Markets – U.S.* Data are as of July 31, 2025.

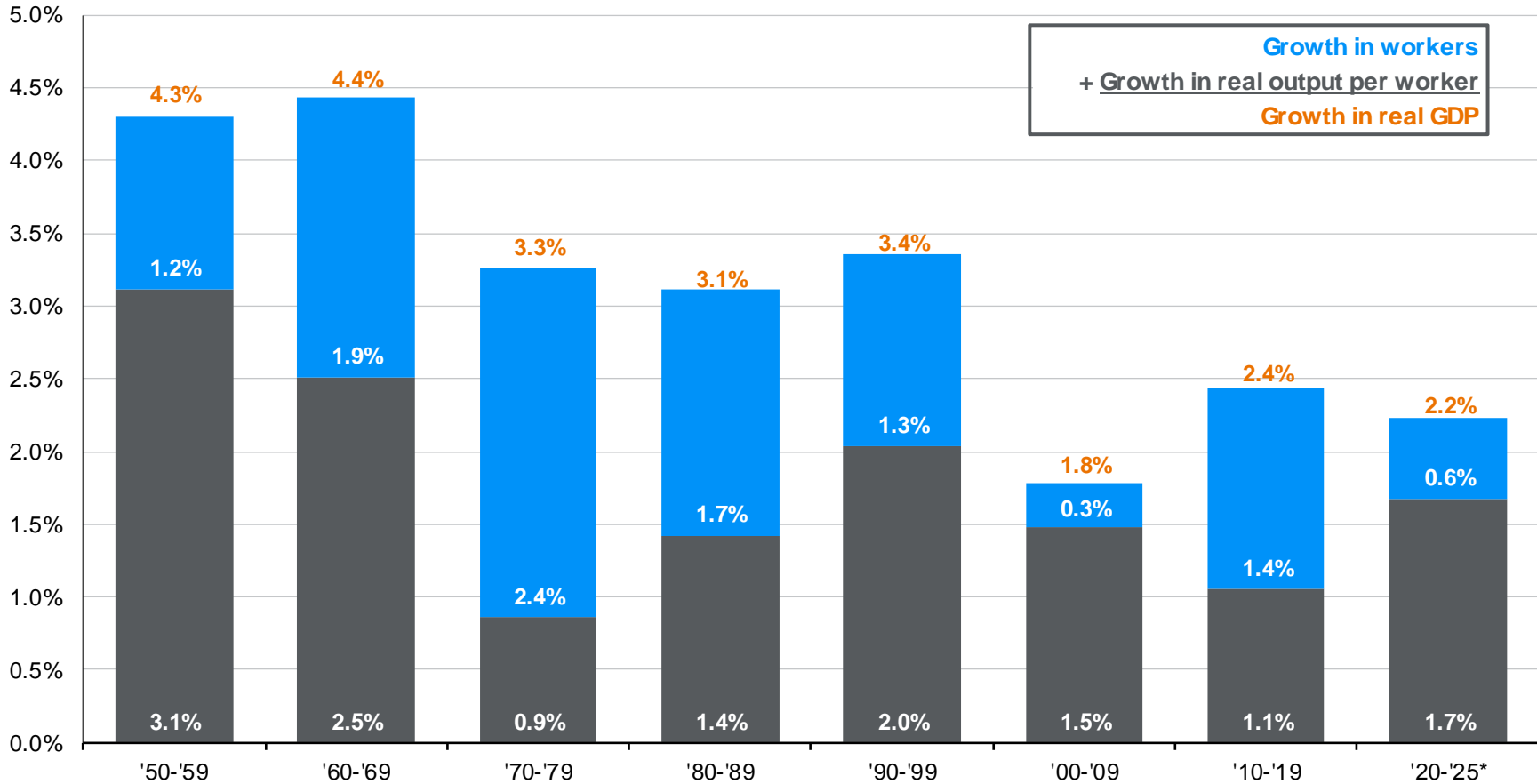


Long-term growth drivers

Economy

Drivers of GDP growth

Average year-over-year % change



Source: BEA, BLS, FactSet, J.P. Morgan Asset Management.

GDP drivers are calculated as the average annualized growth in the 10 years ending in the fourth quarter of each decade. *The latest period reflects 4Q19 to 2Q25.

Guide to the Markets – U.S. Data are as of July 31, 2025.



Labor demand

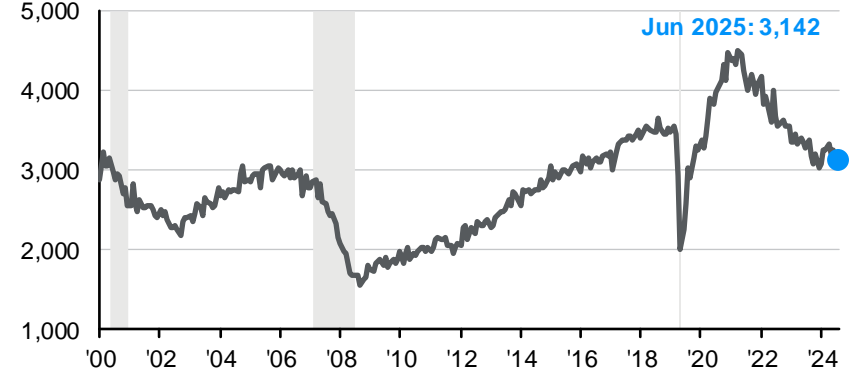
JOLTS job openings*

Total job openings, thousands, seasonally adjusted



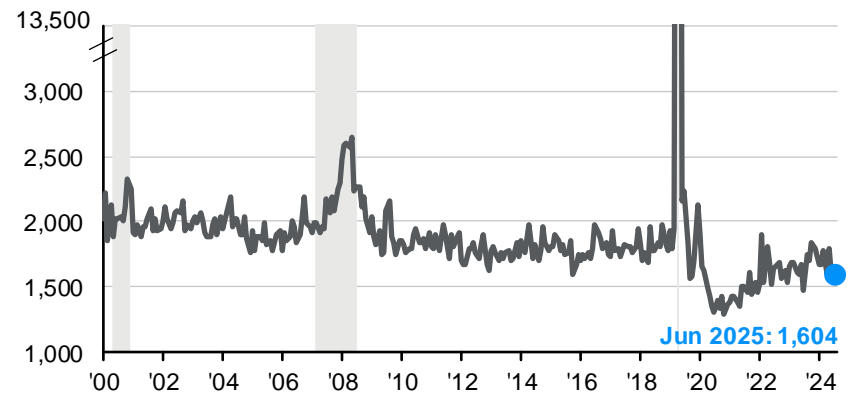
JOLTS quits

Total nonfarm quits, thousands, seasonally adjusted



JOLTS layoffs

Total nonfarm layoffs, thousands, seasonally adjusted



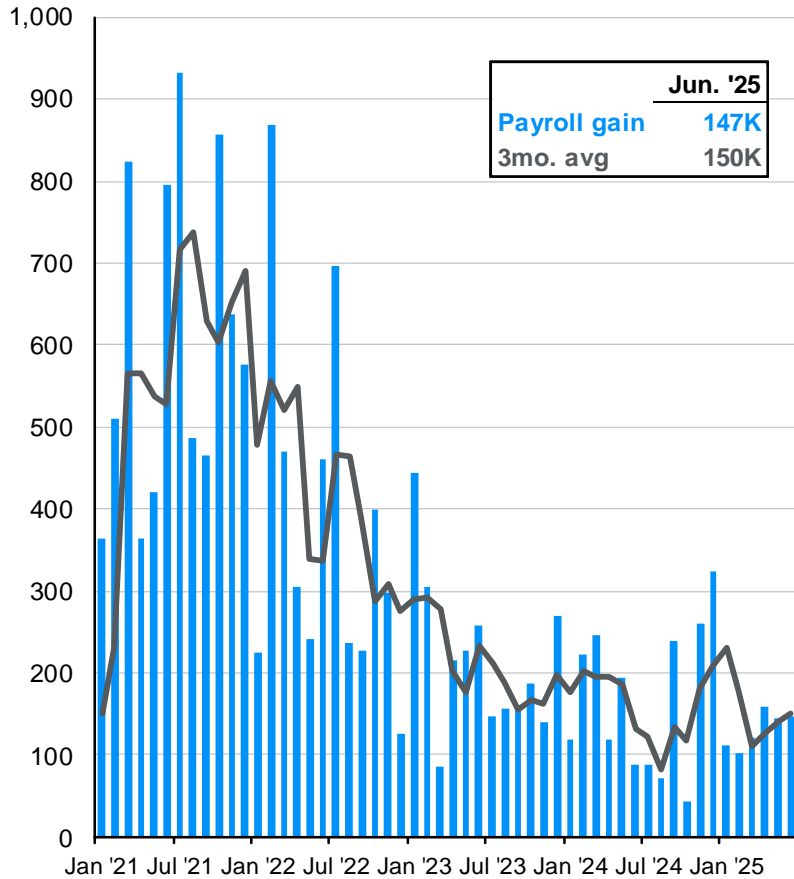
Source: U.S. Department of Labor, J.P. Morgan Asset Management. *JOLTS job openings from February 1974 to November 2000 are J.P. Morgan Asset Management estimates. Guide to the Markets – U.S. Data are as of July 31, 2025.



Labor supply

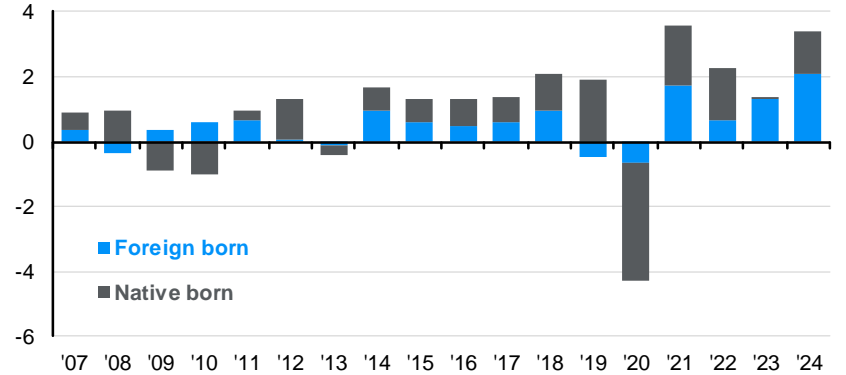
Nonfarm payroll gains

Month-over-month change and 3mo. moving average, SA



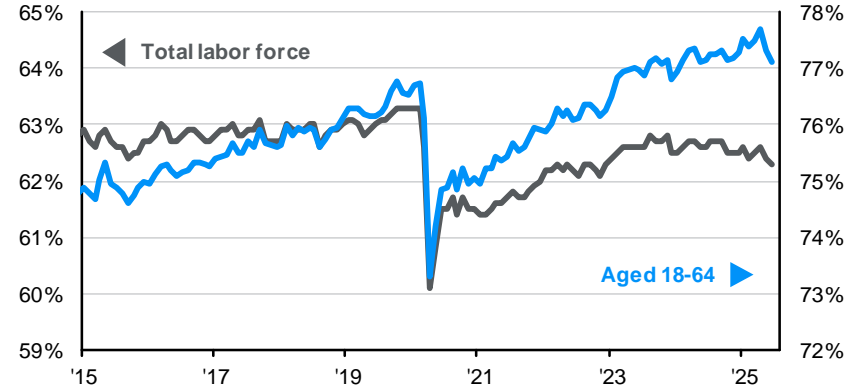
Labor force growth, native and immigrant contribution

Year-over-year change as of January, aged 16+, millions*



Labor force participation

% of civilian noninstitutional population, SA



Source: BLS, FactSet, J.P. Morgan Asset Management.

Labor force data are sourced from the Current Population Survey, also known as the household survey, conducted by the BLS. *Year-over-year change in the labor force calculated from January of each year. For example, the 2024 figures are calculated by subtracting the size of the labor force as of 1/31/2024 from the size of the labor force as of 1/31/2025.

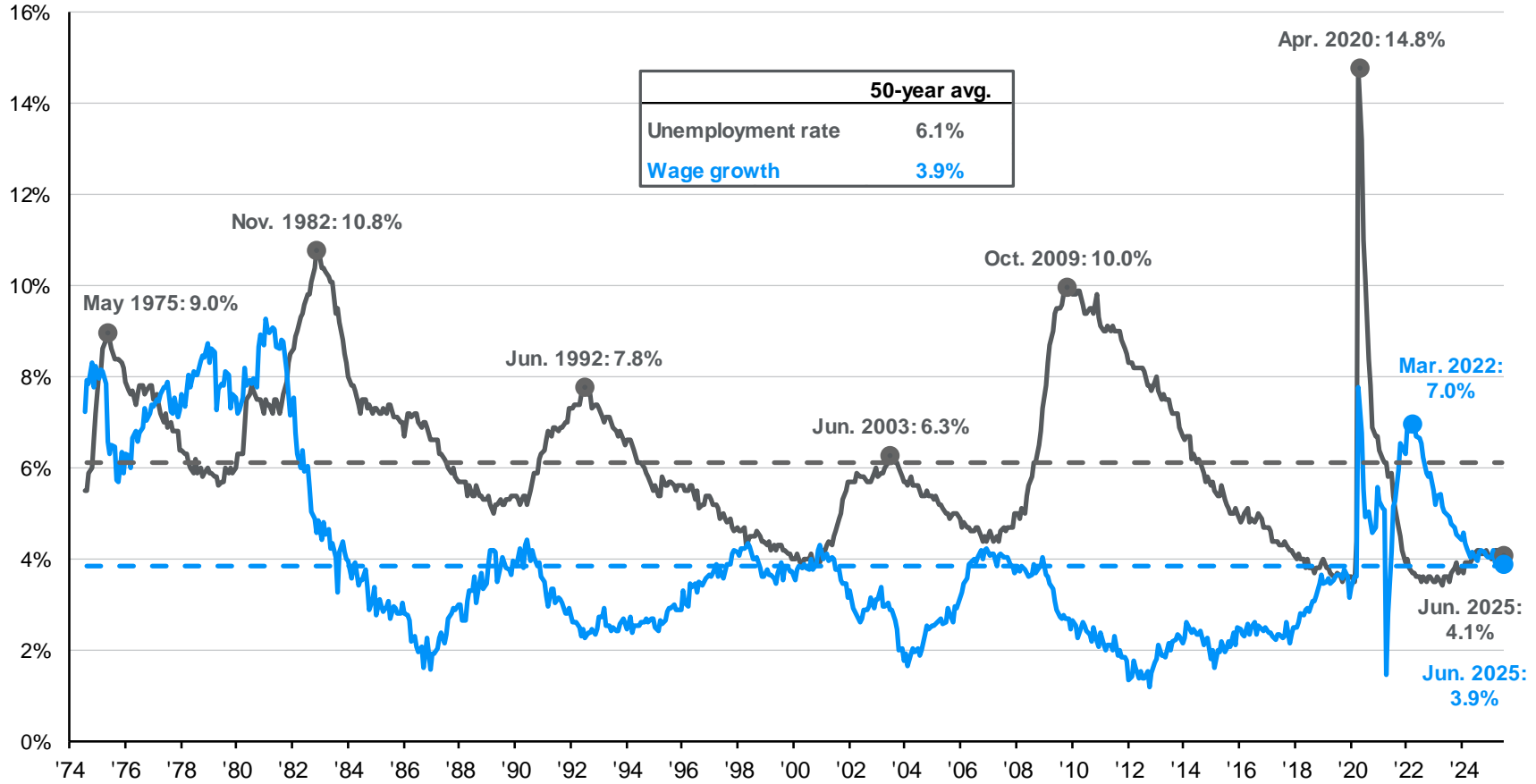
Guide to the Markets – U.S. Data are as of July 31, 2025.



Unemployment and wages

Civilian unemployment rate and year-over-year wage growth

Private production and non-supervisory workers, seasonally adjusted, percent



Source: BLS, FactSet, J.P. Morgan Asset Management. Private production and non-supervisory jobs represent just over 80% of total private nonfarm jobs.
Guide to the Markets – U.S. Data are as of July 31, 2025.

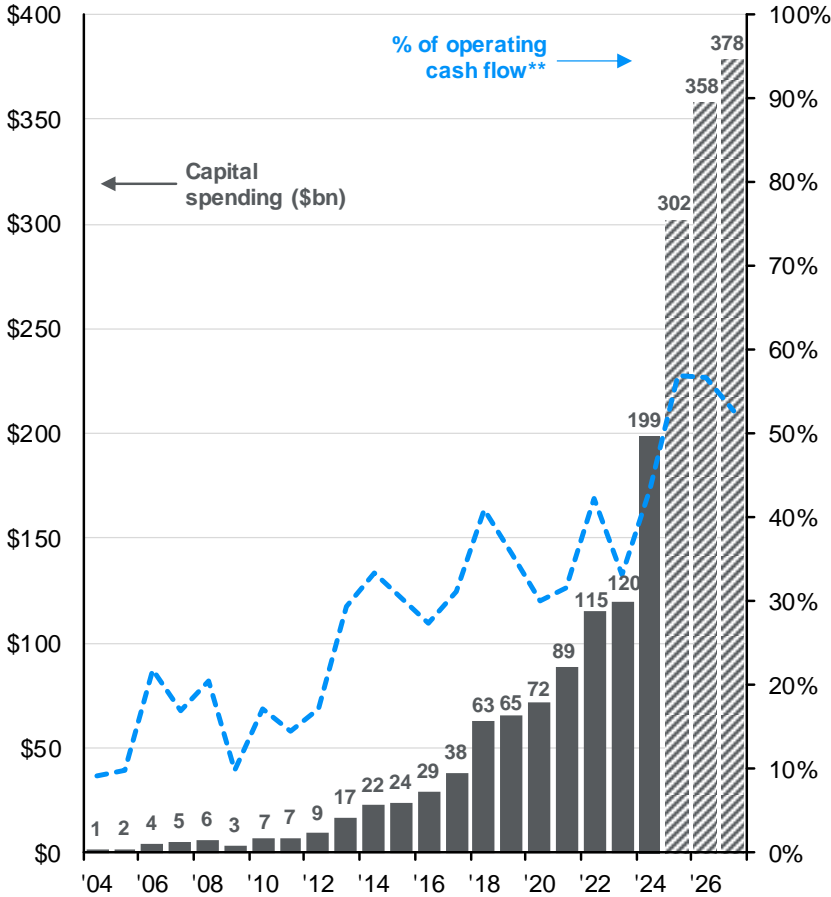


Artificial Intelligence: Investment and implementation

Economy

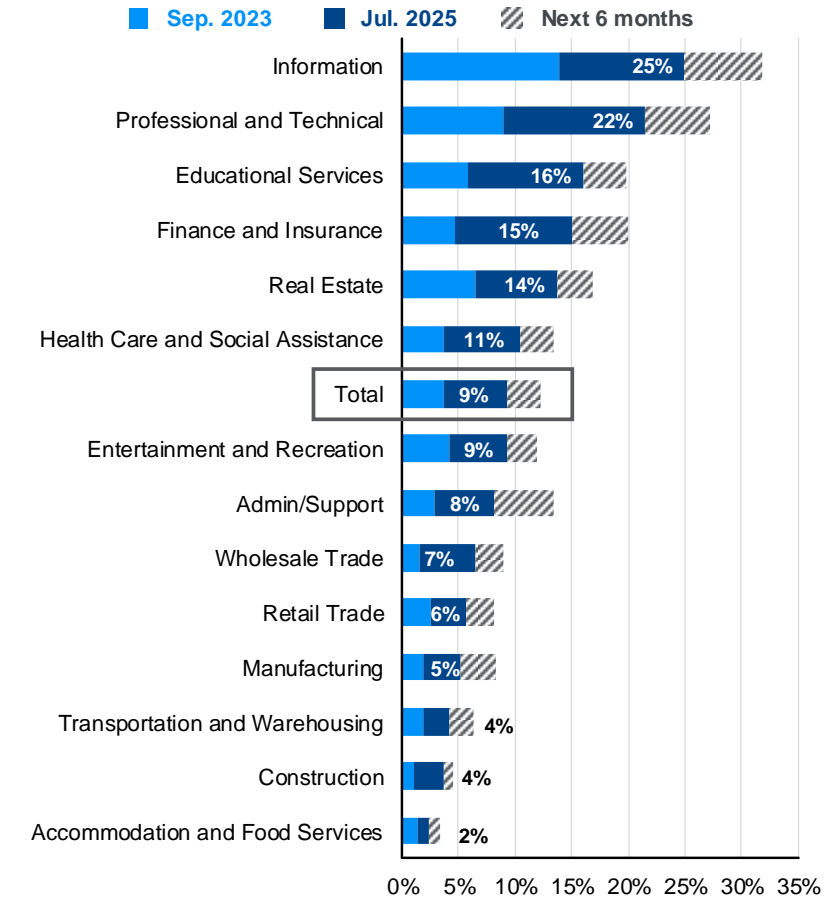
Capex from the major AI hyperscalers*

Alphabet, Amazon (AWS), Meta, Microsoft



Businesses using AI to produce goods and services

% of all firms reporting use of AI applications



Source: J.P. Morgan Asset Management; (Left) Bloomberg; (Right) Census Business Trends and Outlook Survey (AI Supplement). Data for 2025, 2026 and 2027 reflect consensus estimates. Capex shown is company total, except for Amazon, which reflects an estimate for AWS spend (2004 to 2012 are J.P. Morgan Asset Management estimates and 2012 to current are Bloomberg consensus estimates). *Hyperscalers are the large cloud computing companies that own and operate data centers with horizontally linked servers that, along with cooling and data storage capabilities, enable them to house and operate AI workloads. **Reflects cash flow before capital expenditures in contrast to free cash flow, which subtracts out capital expenditures.

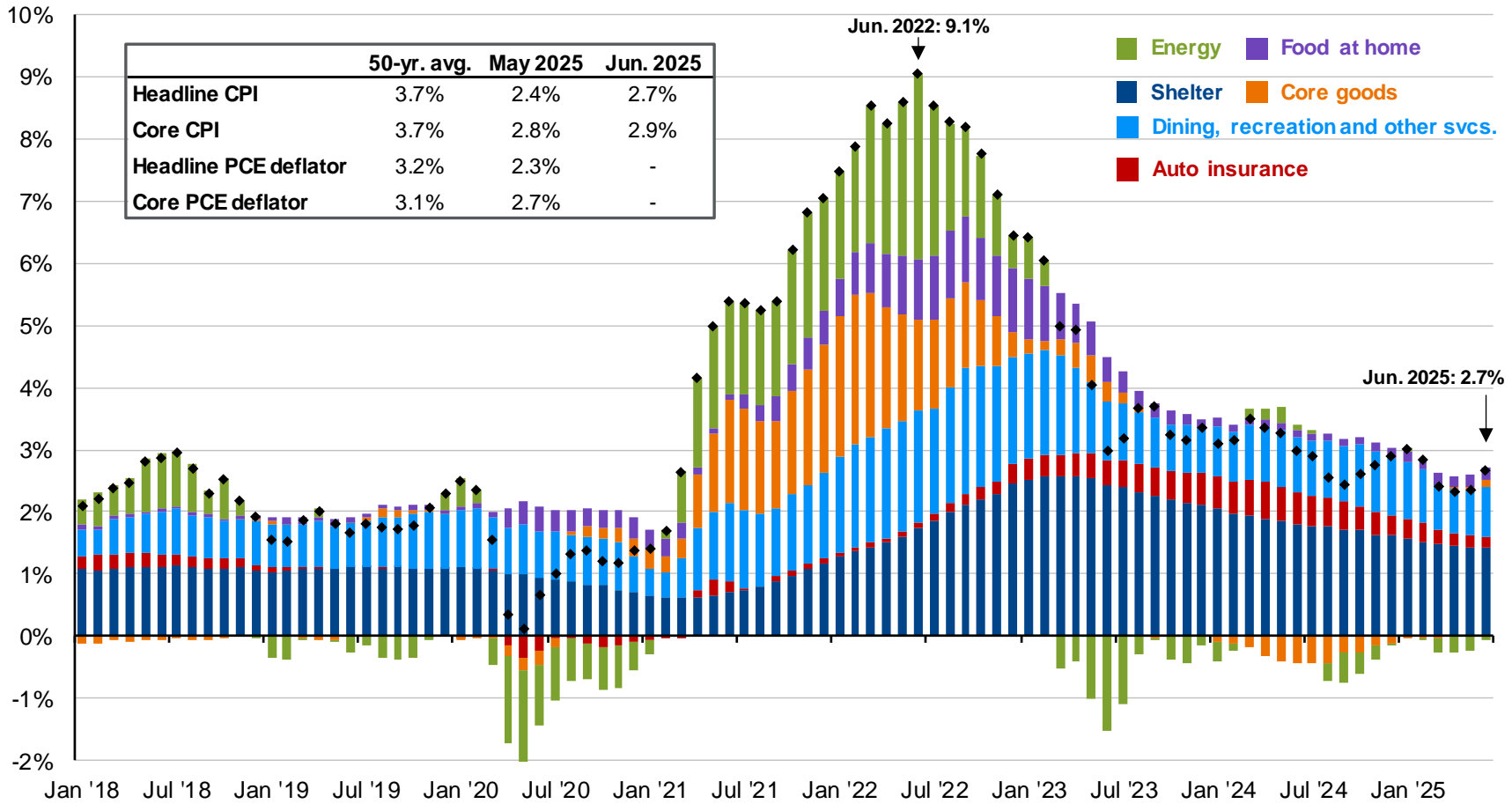
Guide to the Markets – U.S. Data are as of July 31, 2025.



Inflation components

Contributors to headline CPI inflation

Contribution to y/y % change in CPI, non-seasonally adjusted



Source: BLS, FactSet, J.P. Morgan Asset Management. Contributions mirror the BLS methodology on Table 7 of the CPI report. Values may not sum to headline CPI figures due to rounding and underlying calculations. "Shelter" includes owners' equivalent rent, rent of primary residence and home insurance. "Food at home" includes alcoholic beverages. Guide to the Markets - U.S. Data are as of July 31, 2025.



Oil markets

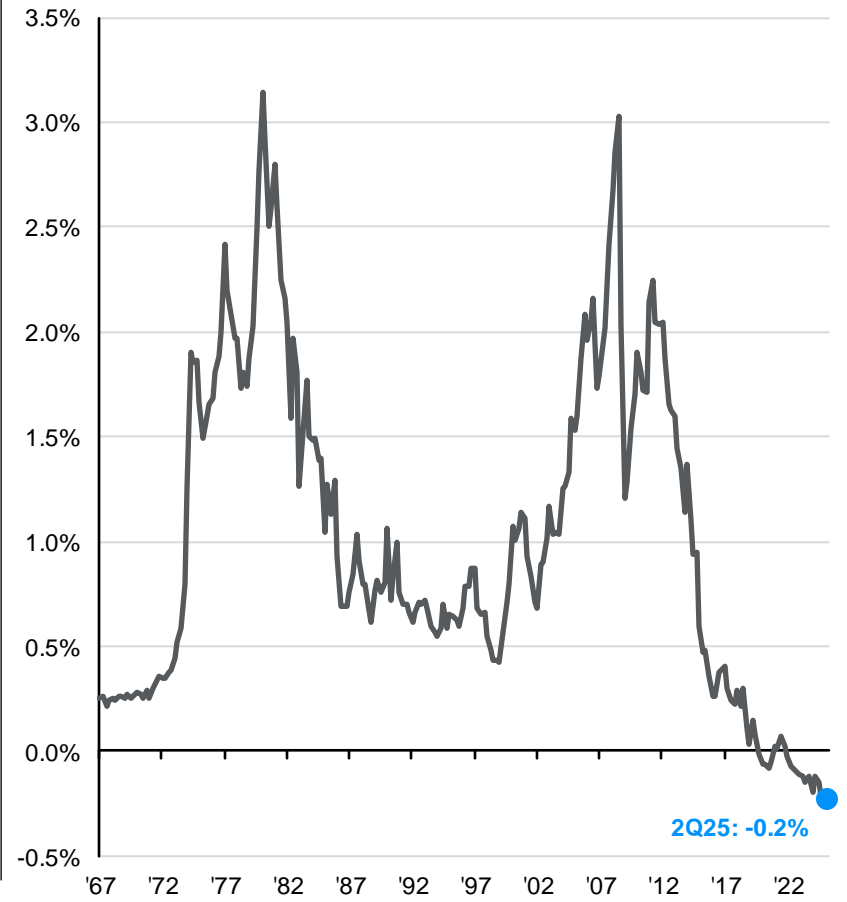
Price of oil

WTI crude, nominal prices, USD/barrel



U.S. net oil imports

% of nominal GDP, quarterly



Source: BEA, FactSet, J.P. Morgan Asset Management.
 WTI crude prices are continuous contract NYM prices in USD. Net oil imports as a share of nominal GDP calculated using seasonally adjusted data reported at annual rates.
 Guide to the Markets – U.S. Data are as of July 31, 2025.

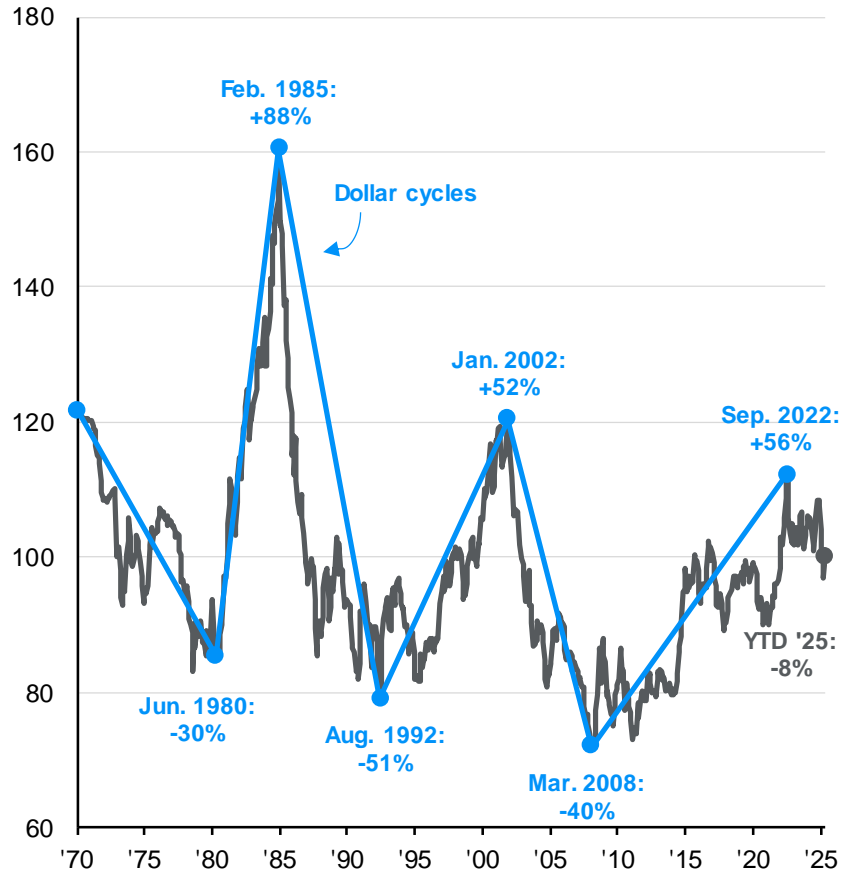


Dollar drivers

Economy

The U.S. dollar

DXY Index, level



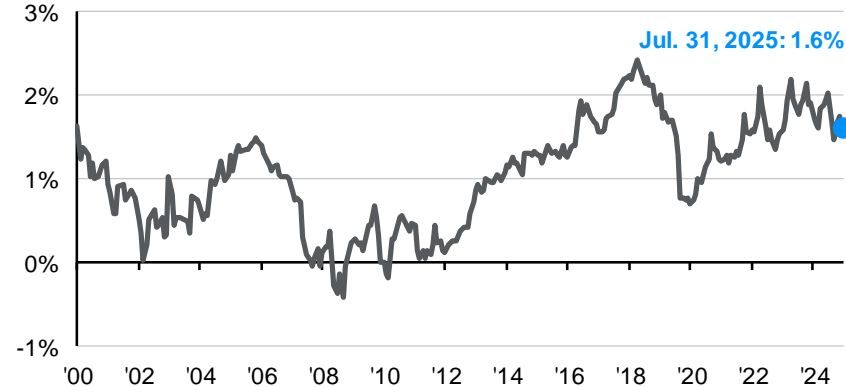
The U.S. trade balance

Current account balance, % of GDP



Developed markets interest rate differentials

Difference between U.S. and international 10-year yields*



Source: Bloomberg, FactSet, J.P. Morgan Asset Management; (Left) ICE; (Top right) BEA; (Bottom right) BIS. Currencies in the DXY Index are: British pound, Canadian dollar, euro, Japanese yen, Swedish krona and Swiss franc. *Interest rate differential is the difference between the 10-year U.S. Treasury yield and a basket of the 10-year yields of each major trading partner (Australia, Canada, eurozone, Japan, Sweden, Switzerland and UK). Weights in the basket are calculated using the 10-year average of total government bonds outstanding in each region. *Guide to the Markets – U.S.* Data are as of July 31, 2025.

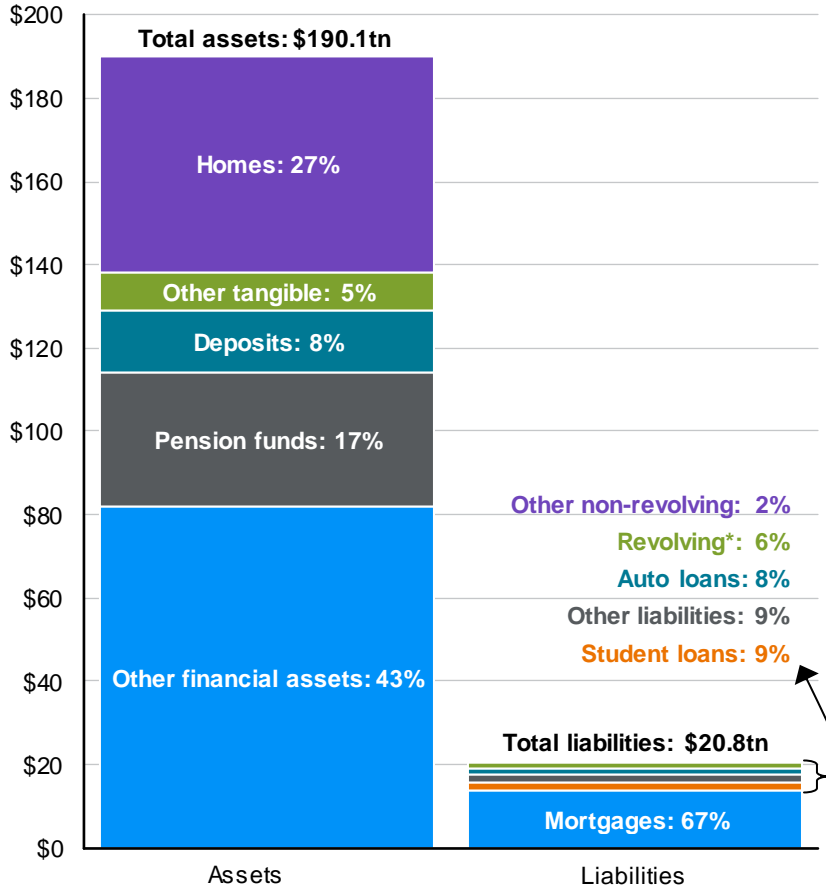


Consumer finances

Economy

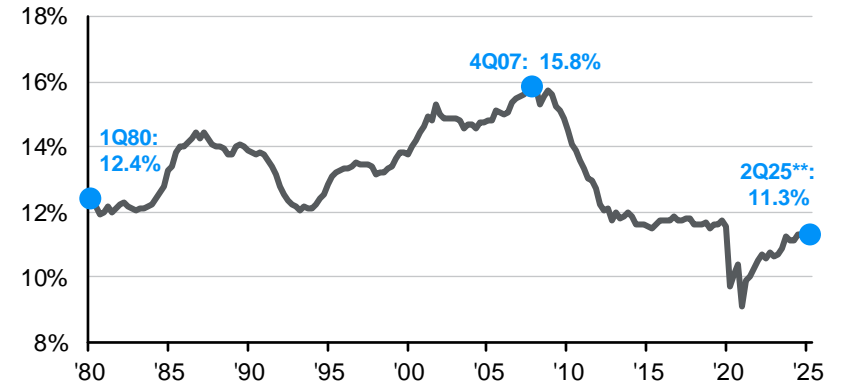
Consumer balance sheet

1Q25, USD trillions, not seasonally adjusted



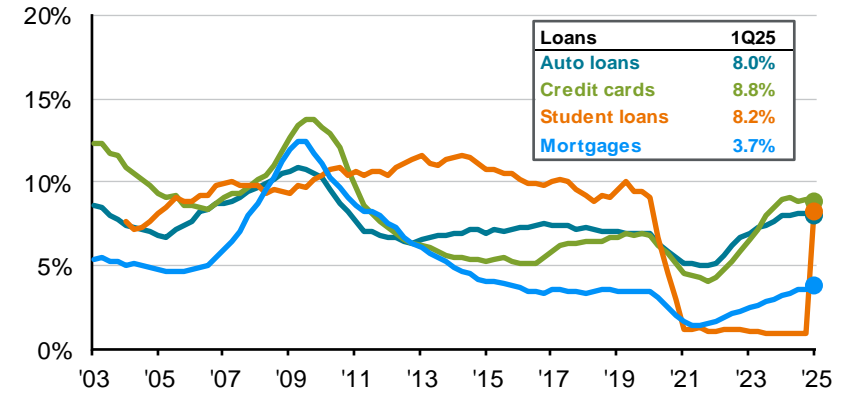
Household debt service ratio

Debt payments as % of disposable personal income, SA



Flows into early delinquencies

% of balance delinquent 30+ days



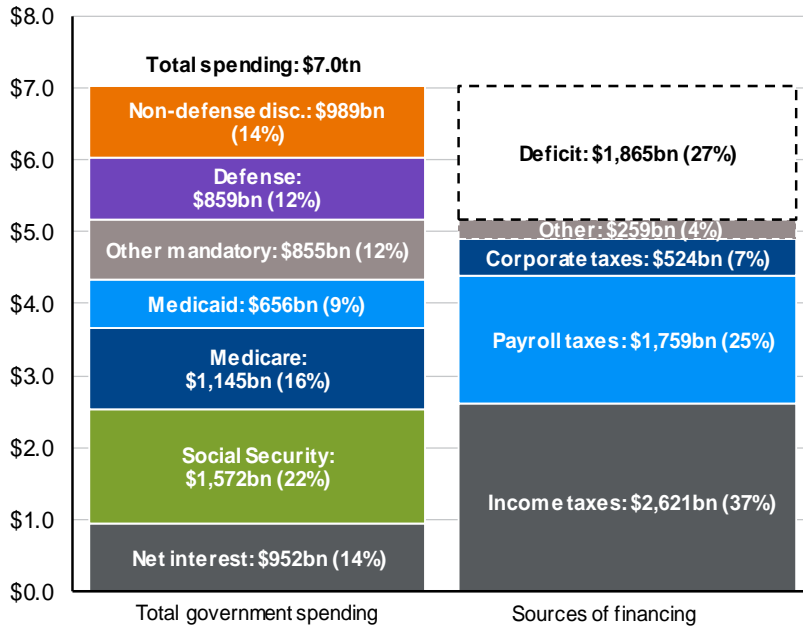
Source: FactSet, FRB, J.P. Morgan Asset Management; (Top and bottom right) BEA. Data include households and nonprofit organizations. SA – seasonally adjusted. *Revolving includes credit cards. Values may not sum to 100% due to rounding. **2Q25 figures for debt service ratio are J.P. Morgan Asset Management estimates. Household debt service ratio data from 1Q80 to 4Q04 are J.P. Morgan Asset Management estimates. Due to the moratorium on delinquent student loan payments being reported to credit bureaus, missed federal student loan payments were not reported until 4Q24. *Guide to the Markets – U.S.* Data are as of July 31, 2025.



Federal finances

The 2025 federal budget

USD trillions

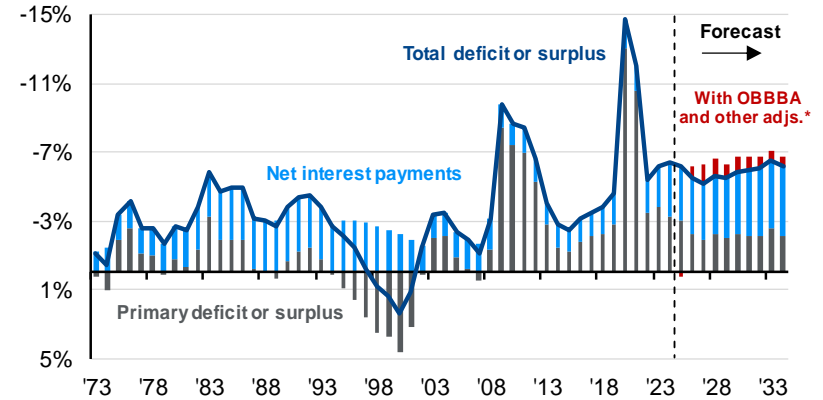


CBO's Baseline economic assumptions

	2025	'26-'27	'28-'29	'30-'35
Real GDP growth	2.2%	1.8%	1.8%	1.8%
10-year Treasury	4.1%	3.9%	3.9%	3.8%
Headline inflation (CPI)	2.3%	2.4%	2.3%	2.2%
Unemployment	4.2%	4.4%	4.4%	4.4%

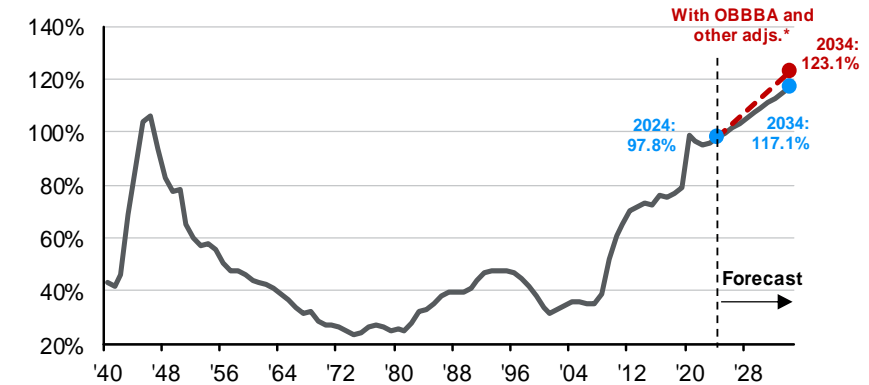
Federal deficit and net interest payments

% of GDP, 1973-2034, CBO Baseline Forecast



Federal net debt (accumulated deficits)

% of GDP, 1940-2034, CBO Baseline Forecast, end of fiscal year



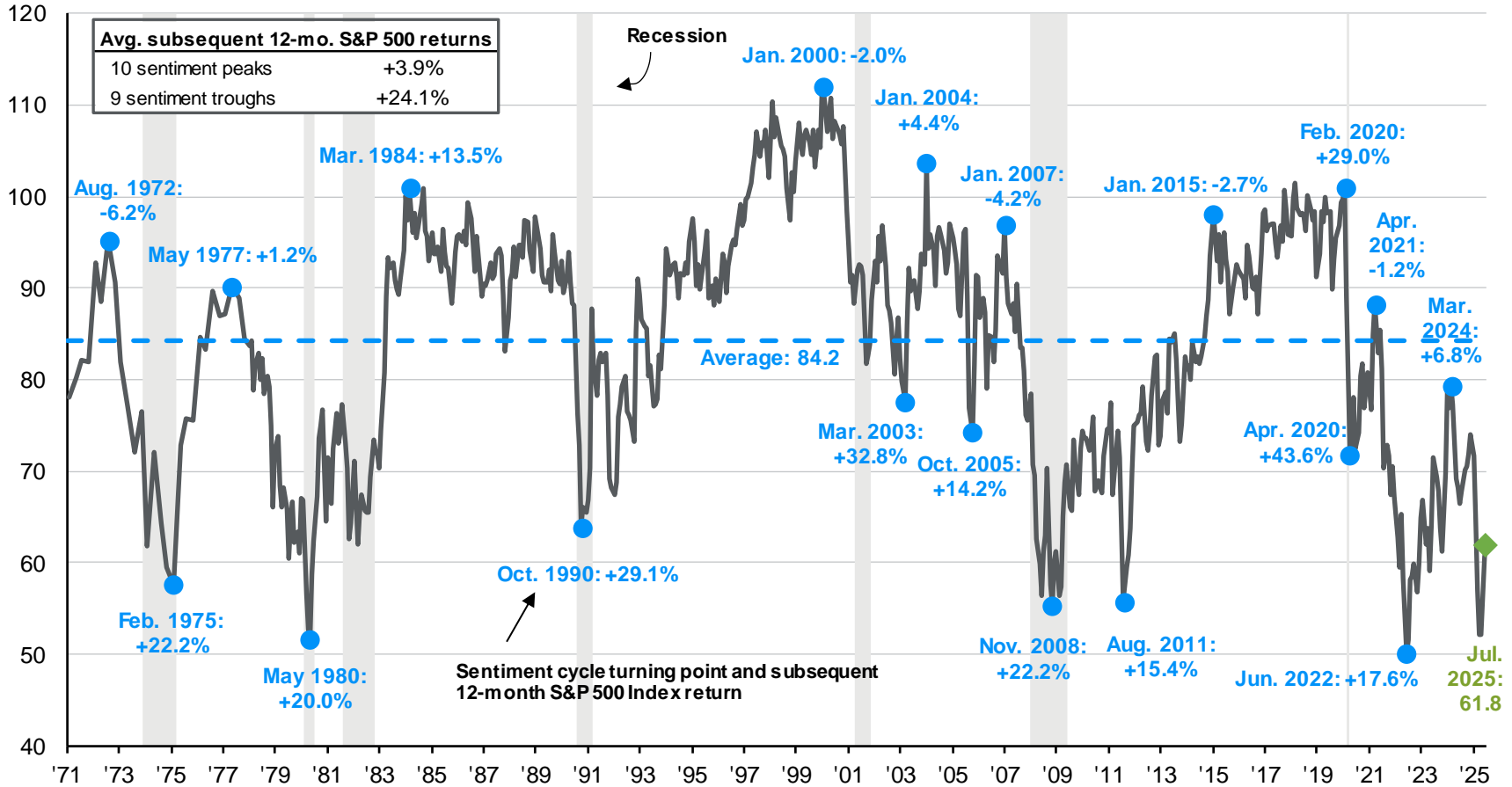
Source: CBO, J.P. Morgan Asset Management; (Left) Numbers may not sum to 100% due to rounding; (Top and bottom right) BEA, Treasury Department. Estimates are from the Congressional Budget Office (CBO) January 2025 An Update to the Budget Outlook: 2025 to 2035. "Other" spending includes, but is not limited to, health insurance subsidies, income security and federal civilian and military retirement. Years shown are fiscal years. OBBB refers to the "One Big Beautiful Bill Act." *Adjusted by JPMAM to include estimates from the CBO July 2025 report "Estimated Budgetary Effects of Public Law 119-21, to Provide for Reconciliation Pursuant to Title II of H. Con. Res. 14, Relative to CBO's January 2025 Baseline." Figures are also adjusted to include JPMAM estimates of tariff revenues and the estimated cost of extending expiring tax cuts beyond 2028, based on CBO estimates prepared for the version of the OBBB proposed by the House of Representatives on May 22, 2025. Forecasts are not a reliable indicator of future performance. Forecasts, projections and other forward-looking statements are based upon current beliefs and expectations. They are for illustrative purposes only and serve as an indication of what may occur. Given the inherent uncertainties and risks associated with forecasts, projections or other forward-looking statements, actual events, results or performance may differ materially from those reflected or contemplated. Guide to the Markets – U.S. Data are as of July 31, 2025.



Consumer confidence and the stock market

Economy

Consumer Sentiment Index and subsequent 12-month S&P 500 returns



Source: FactSet, Standard & Poor's, University of Michigan, J.P. Morgan Asset Management. Peak is defined as the highest index value before a series of lower lows, while a trough is defined as the lowest index value before a series of higher highs. Subsequent 12-month S&P 500 returns are price returns only starting from the end of the month and excluding dividends. Past performance is not a reliable indicator of current and future results. Guide to the Markets – U.S. Data are as of July 31, 2025.

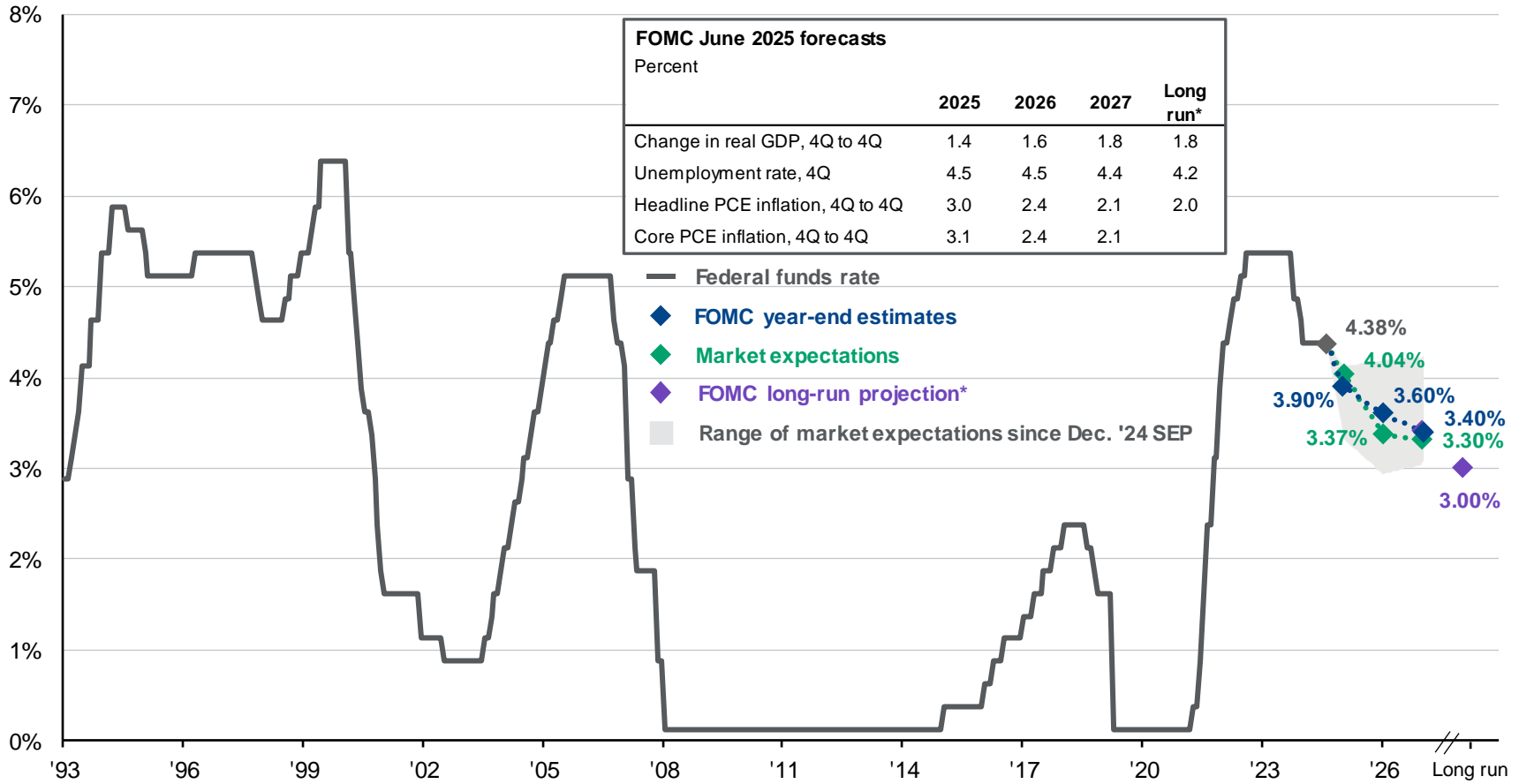


The Fed and interest rates

Fixed Income

Federal funds rate expectations

FOMC and market expectations for the federal funds rate



Source: Bloomberg, FactSet, Federal Reserve, J.P. Morgan Asset Management

Market expectations are based off of USD Overnight Index Swaps. *Long-run projections are the rates of growth, unemployment and inflation to which a policymaker expects the economy to converge over the next five to six years in absence of further shocks and under appropriate monetary policy. Forecasts, projections and other forward-looking statements are based upon current beliefs and expectations. They are for illustrative purposes only and serve as an indication of what may occur. Given the inherent uncertainties and risks associated with forecasts, projections or other forward-looking statements, actual events, results or performance may differ materially from those reflected or contemplated.

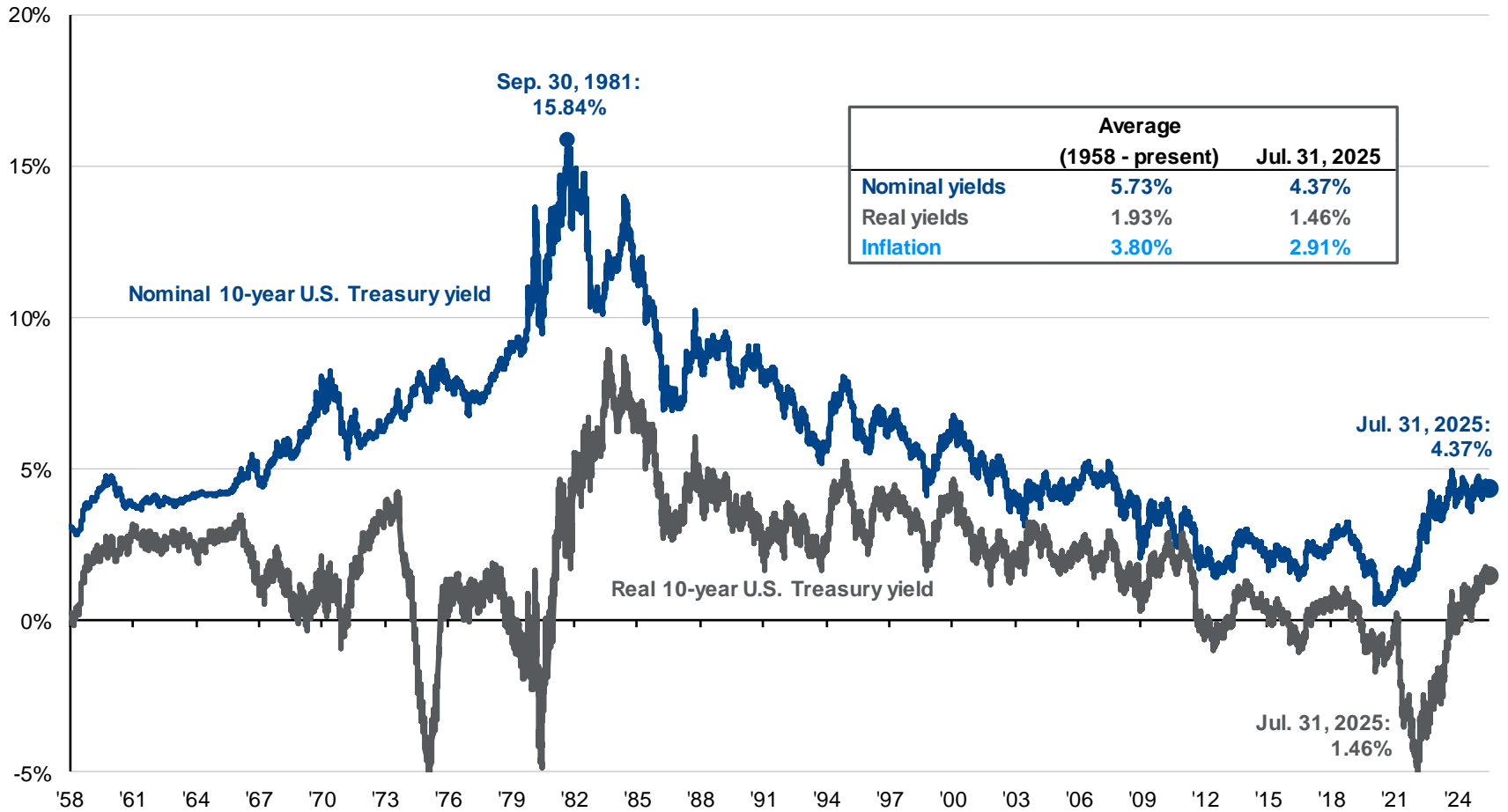
Guide to the Markets – U.S. Data are as of July 31, 2025.



Interest rates and inflation

Fixed Income

Nominal and real U.S. 10-year Treasury yields



Source: BLS, FactSet, Federal Reserve, J.P. Morgan Asset Management. Real 10-year Treasury yields are calculated as the daily Treasury yield less year-over-year core CPI inflation for that month. For the current month, we use the prior month's core CPI figures until the latest data are available. *Guide to the Markets – U.S.* Data are as of July 31, 2025.



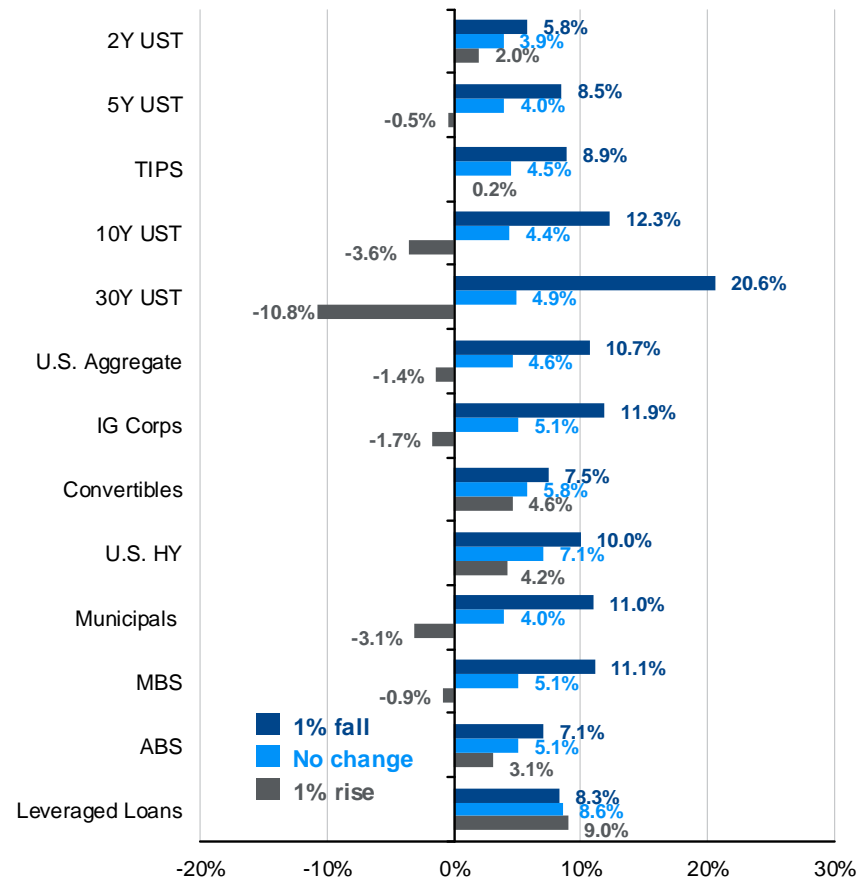
Fixed income market dynamics

Fixed Income

U.S. Treasuries	Yield		Return			
	7/31/2025	12/31/2024	2025	Avg. Maturity	Correlation to 10-year	Correlation to S&P 500
2-Year	3.94%	4.25%	2.61%	2 years	0.74	0.02
5-Year	3.96%	4.38%	4.34%	5	0.94	0.00
TIPS	1.74%	2.13%	4.79%	7.2	0.74	0.35
10-Year	4.37%	4.58%	4.36%	10	1.00	-0.04
30-Year	4.89%	4.78%	0.83%	30	0.93	-0.08
Sector						
U.S. Aggregate	4.64%	4.91%	3.75%	8.3	0.90	0.27
IG Corps	5.07%	5.33%	4.24%	10.4	0.70	0.48
Convertibles	5.84%	6.13%	9.67%	-	-0.01	0.86
U.S. HY	7.08%	7.49%	5.04%	4.7	0.11	0.79
Municipals	3.98%	3.74%	-0.55%	13.3	0.74	0.27
MBS	5.07%	5.27%	3.81%	7.9	0.82	0.28
ABS	5.09%	5.38%	3.32%	2.2	0.41	0.26
Leveraged Loans	8.67%	8.68%	3.68%	4.6	-0.21	0.61

Fixed income returns in different interest rate scenarios

Total return, assumes a parallel shift in the yield curve



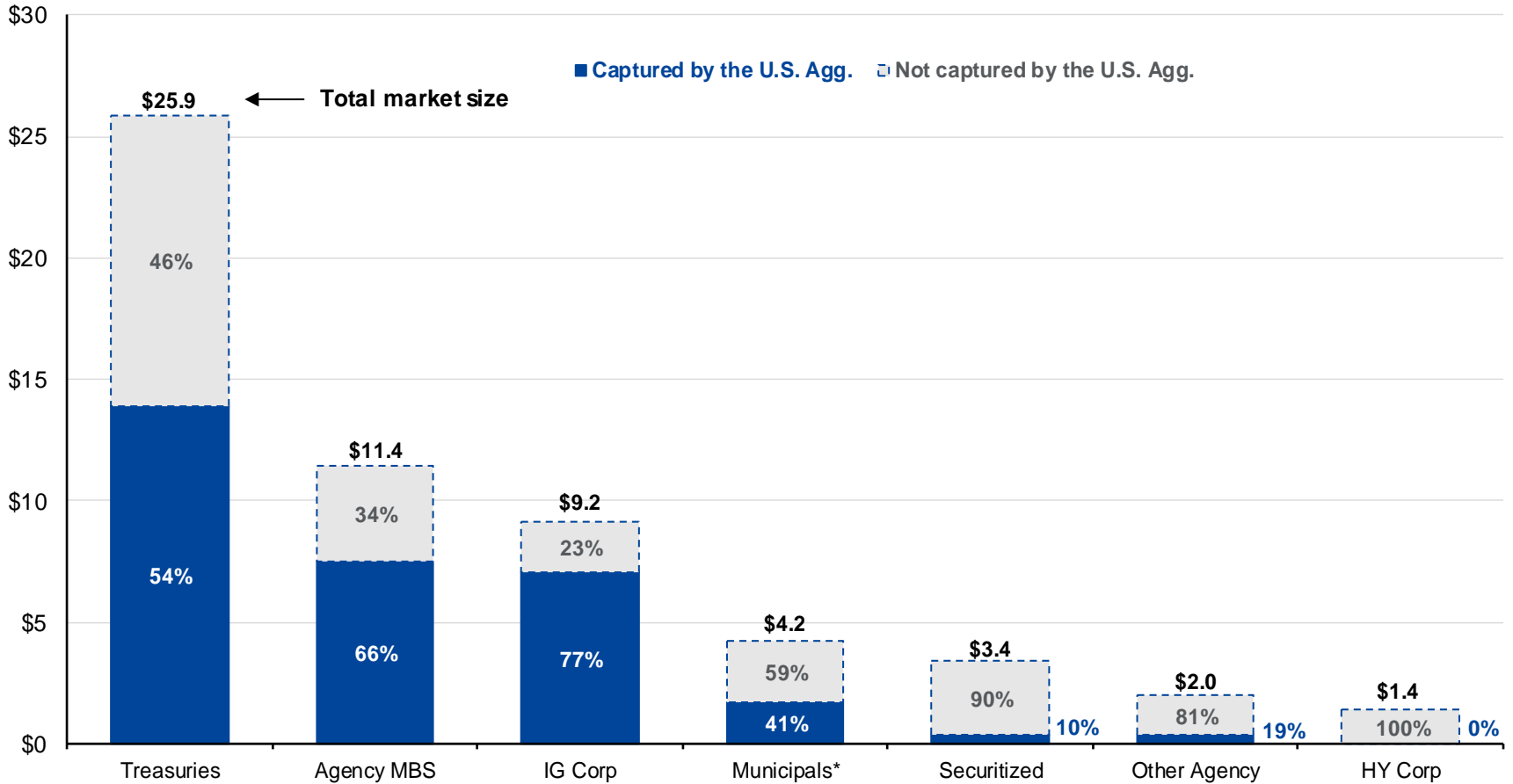
Source: Bloomberg, FactSet, Federal Reserve Bank of Cleveland, Standard & Poor's, U.S. Treasury, J.P. Morgan Asset Management. Sectors shown above are provided by Bloomberg unless otherwise noted and are represented by – U.S. Aggregate; MBS: U.S. Aggregate Securitized - MBS; ABS: J.P. Morgan ABS Index; IG Corporates: U.S. Corporates; Municipals: Muni Bond; High Yield: Corporate High Yield; Leveraged Loans: J.P. Morgan Leveraged Loan Index; TIPS: Treasury Inflation-Protected Securities; Convertibles: U.S. Convertibles Composite. Convertibles yield is as of most recent month-end and is based on U.S. portion of Bloomberg Global Convertibles Index. Yield and return information based on bellwethers for Treasury securities. Yields shown for TIPS are real yields. TIPS returns consider the impact that inflation could have on returns by assuming the Cleveland Fed's 1-year inflation expectation forecasts are realized. Sector yields reflect yield-to-worst. Leveraged loan yields reflect the yield to 3Y takeout. Correlations are based on 15-years of monthly returns for all sectors. ABS returns prior to June 2012 are sourced from Bloomberg. Past performance is not indicative of future results.
 Guide to the Markets – U.S. Data are as of July 31, 2025.



Fixed income investment universe

Fixed income investable market vs. the Bloomberg U.S. Aggregate Index*

USD trillions, 1Q25



Fixed Income

Source: Bank of America, Bloomberg, SIFMA, J.P. Morgan Asset Management.

The investable universe for Treasuries, municipals and other agency securities are sourced from SIFMA and reflect par value outstanding. The investable universe for agency MBS, CMBS, CMOs, CLOs, CDOs, ABS, investment grade corporates and high yield corporates are sourced from Bank of America and reflect market value outstanding. Treasuries include outstanding bills, bonds and notes. Agency MBS includes MBS, CMBS, and CMOs. Securitized includes ABS, CLOs, CDOs, non-agency CMBS and non-agency RMBS. Sector classifications for constituents in the Bloomberg U.S. Aggregate are based on classifications provided by Bloomberg. *Due to the exclusion of tax-free municipals from the Bloomberg U.S. Aggregate, municipals index representation is based on the Bloomberg Municipal Bond Index.

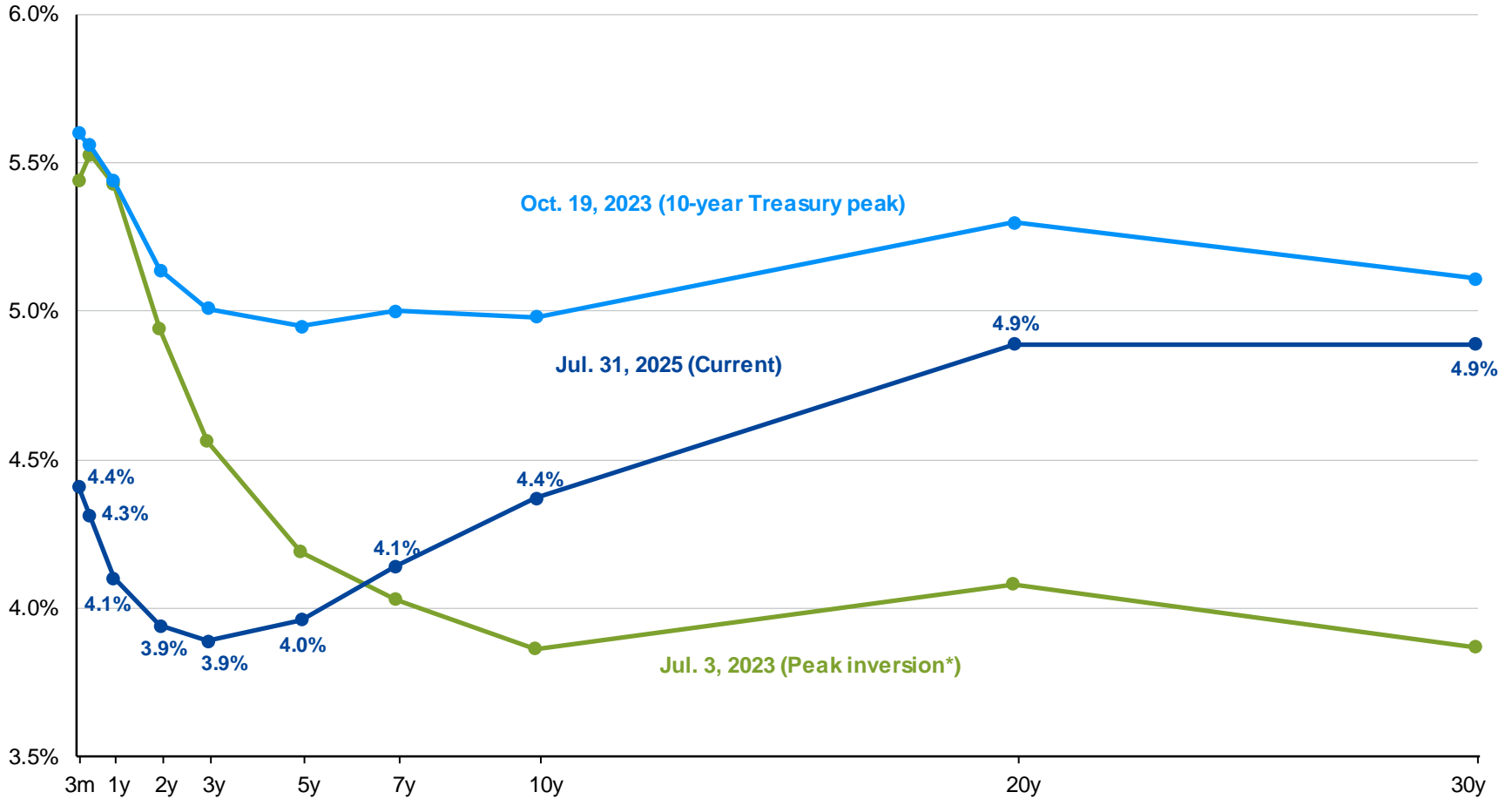
Guide to the Markets – U.S. Data are as of July 31, 2025.



Yield curve

Fixed Income

U.S. Treasury yield curve



Source: FactSet, Federal Reserve, J.P. Morgan Asset Management. Analysis references data back to 2020. *Peak inversion is measured by the spread between the yield on a 10-year Treasury and 2-year Treasury.
 Guide to the Markets – U.S. Data are as of July 31, 2025.

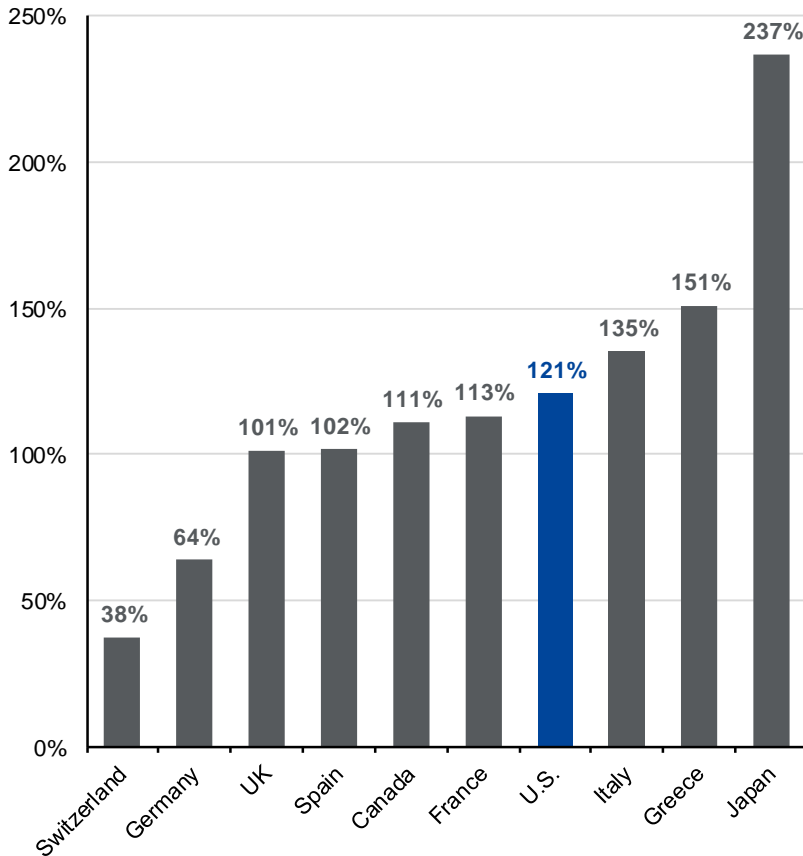


U.S. Treasury debt dynamics

Fixed Income

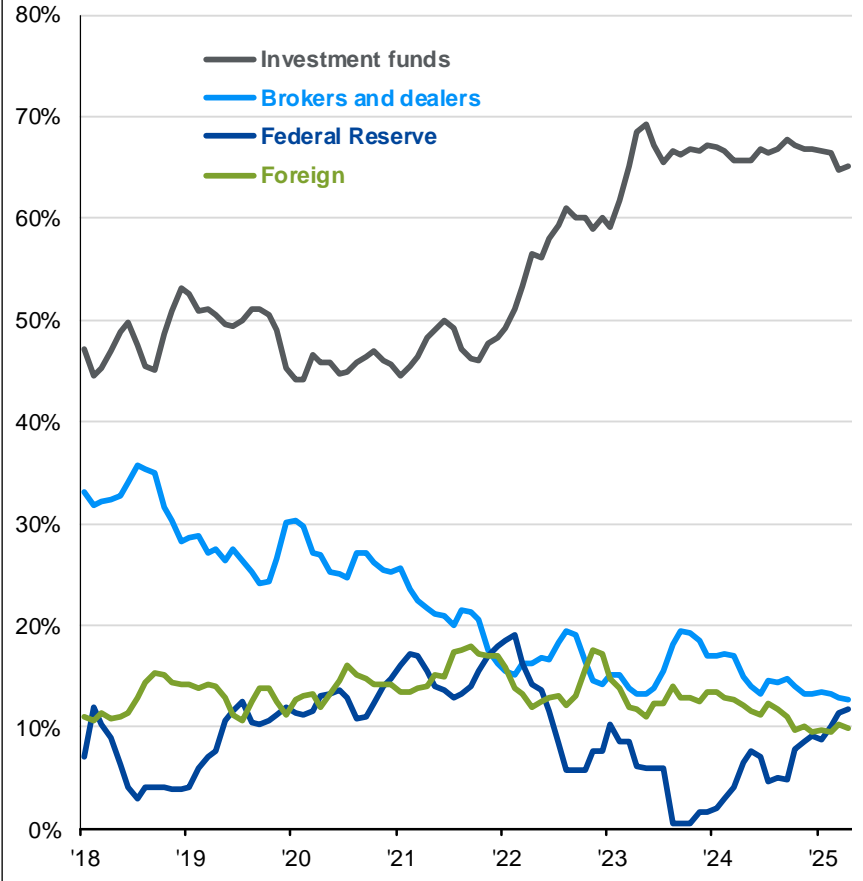
Developed market debt by country

Gross government debt as a % of GDP, 2024



U.S. Treasury bonds by investor type

% of total bond auction allotment awarded by investor type, 3-mo. moving average



Source: Bloomberg, FactSet, J.P. Morgan Asset Management; (Left) WEO; (Right) U.S. Treasury Department.
 (Left) General government gross debt includes all liabilities that require payment of interest and/or principal by the debtor to the creditor at some future date. Net debt refers to gross debt minus its financial assets held in the form of debt instruments. (Right) Data reflect auctions for 2-, 3-, 5-, 7- and 10-year notes as well as 20- and 30-year bonds. Brokers and dealers include primary dealers, other commercial bank dealer departments and other non-bank dealers and brokers. Figures may not round to 100% due to the exclusion of some smaller categories.
 Guide to the Markets – U.S. Data are as of July 31, 2025.

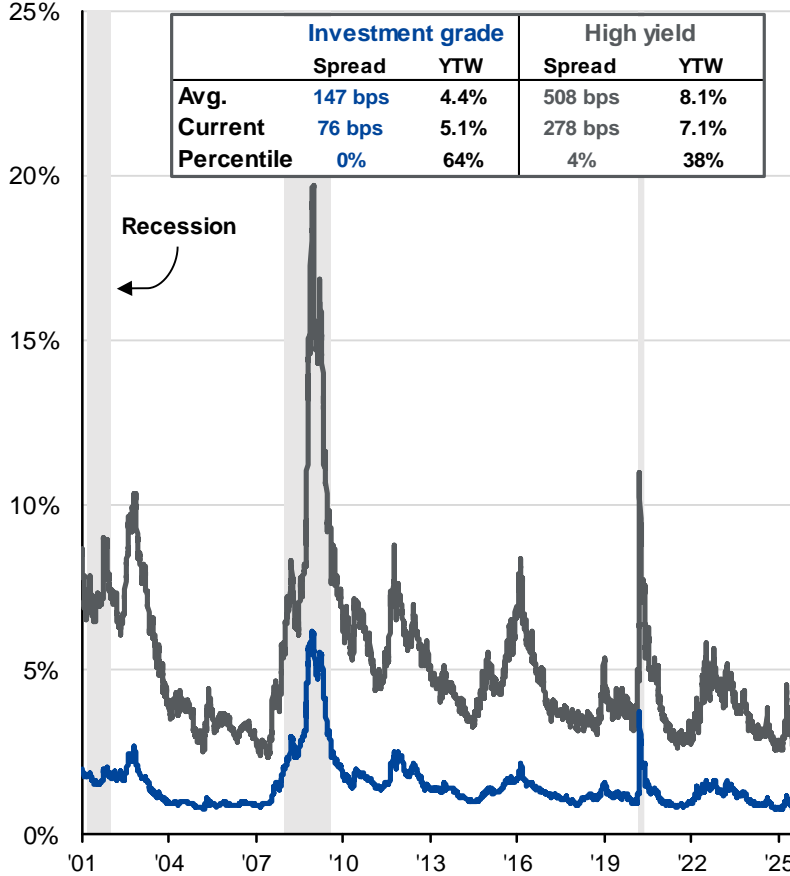


Credit market dynamics

Fixed Income

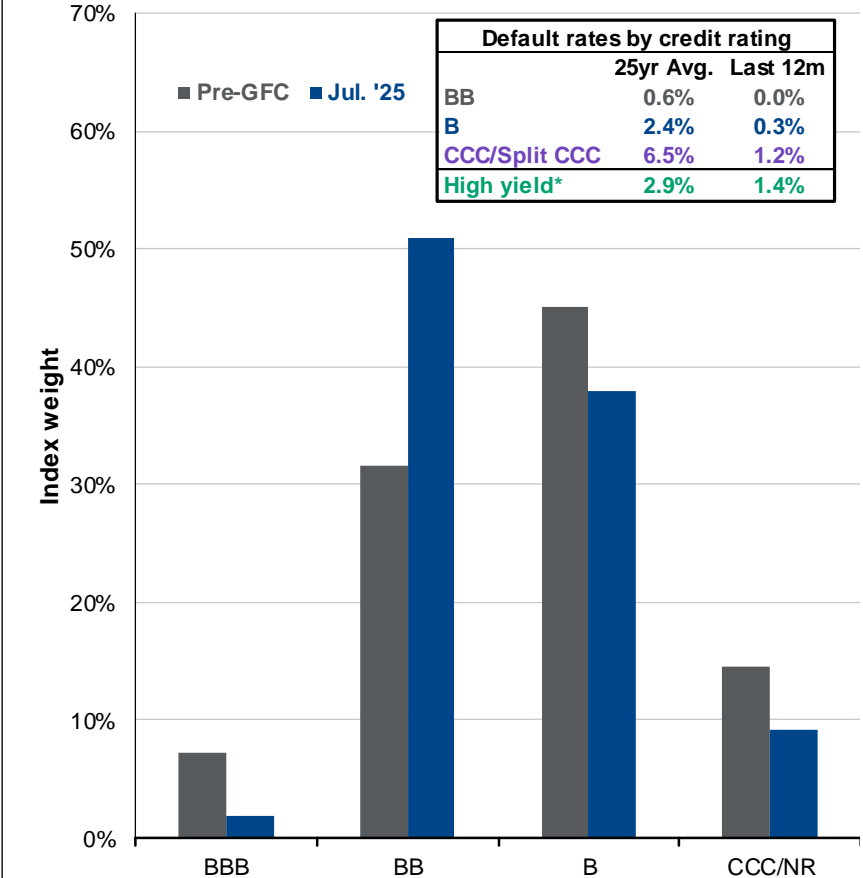
Corporate credit spreads

Option-adjusted spread, 2001 - present



Credit rating and default rates in U.S. high yield

%, J.P. Morgan Domestic High Yield Index



Source: Bloomberg, J.P. Morgan Research, J.P. Morgan Asset Management.
 (Left) U.S. Investment Grade: Bloomberg U.S. Corporate Investment Grade Index; U.S. High Yield: Bloomberg U.S. Aggregate Corporate High Yield Index. (Right) Last 12-month default rates are as of most recent month for which data are available. Default rates shown by crediting rating do not include distressed exchanges and are grouped by rating 12 months prior to default. Bond ratings include split ratings. "NR" stands for not rated. Pre-GFC reflects data as of December 2007. *Aggregate high yield default rate data do include distressed exchanges.
 Guide to the Markets – U.S. Data are as of July 31, 2025.

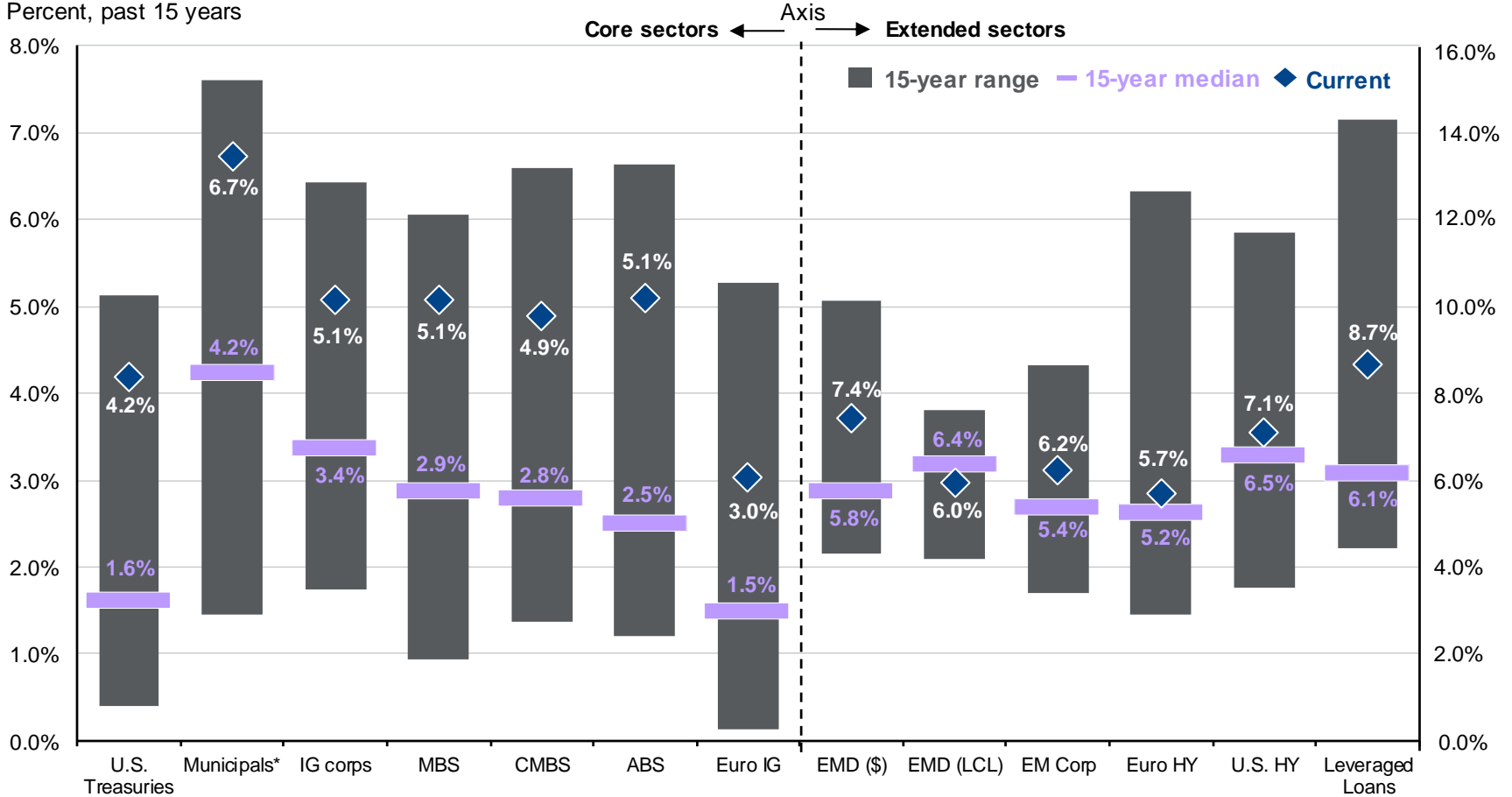


Fixed income yields

Fixed Income

Yield-to-worst across fixed income sectors

Percent, past 15 years



Source: Bloomberg, FactSet, J.P. Morgan Credit Research, J.P. Morgan Asset Management. Indices used are Bloomberg except for ABS, emerging market debt and leveraged loans: ABS: J.P. Morgan ABS Index; CMBS: Bloomberg Investment Grade CMBS Index; EMD (USD): J.P. Morgan EMIGLOBAL Diversified Index; EMD (LCL): J.P. Morgan GBI-EM Global Diversified Index; EM Corp.: J.P. Morgan CEMBI Broad Diversified; Leveraged Loans: JPM Leveraged Loan Index; Euro IG: Bloomberg Euro Aggregate Corporate Index; Euro HY: Bloomberg Pan-European High Yield Index. Yield-to-worst is the lowest possible yield that can be received on a bond apart from the company defaulting and considers factors like call provisions, prepayments and other features that may affect the bonds' cash flows. ABS data begins in 2012. *All sectors shown are yield-to-worst except for Municipals, which is based on the tax-equivalent yield-to-worst assuming a top-income tax bracket rate of 37% plus a Medicare tax rate of 3.8%. Guide to the Markets – U.S. Data are as of July 31, 2025.



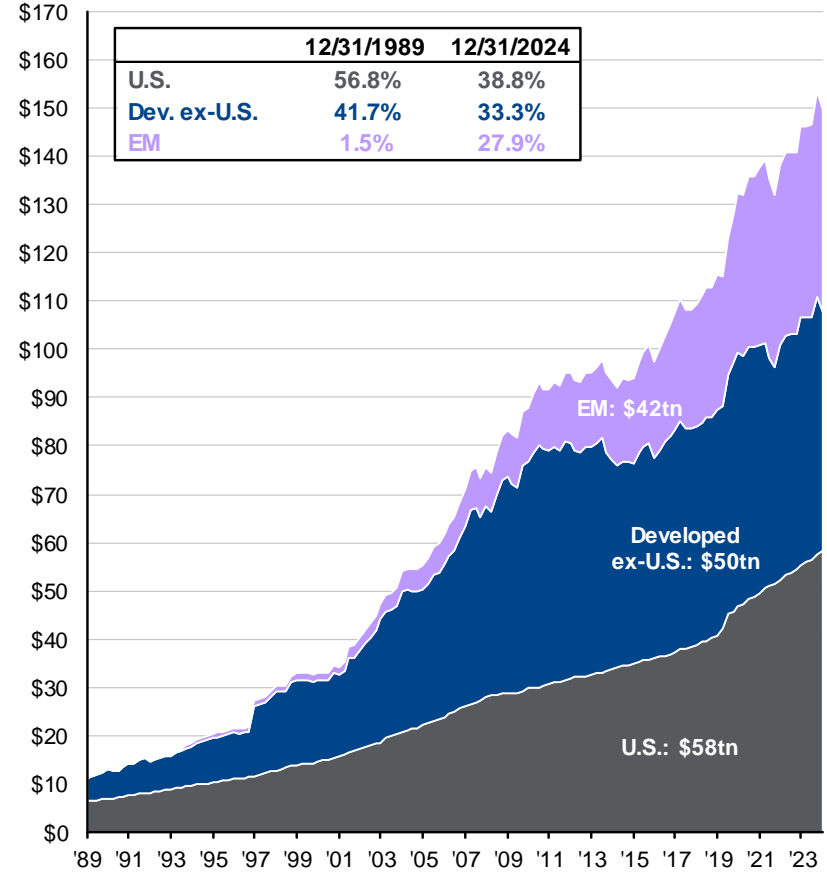
Global fixed income

Fixed Income

Aggregates	Local yield		USD yield		2025 Return		Duration	Correlation to U.S. 10yr
	7/31/2025	12/31/2024	7/31/2025	Local	USD			
U.S.	4.64%	4.91%	-	3.75%	3.75%	6.0 years	0.93	
Gbl. ex-U.S.	2.87%	2.85%	-	-	6.90%	6.8	0.70	
Canada	3.74%	3.75%	5.47%	0.89%	4.95%	6.6	0.56	
Japan	1.63%	1.26%	5.18%	-3.40%	0.88%	8.5	0.70	
Germany	2.71%	2.70%	5.02%	-0.41%	10.07%	6.0	0.66	
UK	4.49%	4.66%	4.55%	2.28%	8.07%	7.6	0.60	
Italy	3.01%	3.11%	5.32%	1.97%	12.71%	6.2	0.53	
China	1.73%	1.64%	4.48%	0.70%	2.18%	6.1 years	0.51	
Sector								
Euro Corp.	3.04%	3.18%	5.35%	2.34%	13.12%	4.4	0.45	
Euro HY	5.71%	6.03%	8.02%	3.46%	14.36%	3.3	0.05	
EMD (USD)	7.44%	7.86%	-	-	6.98%	6.1	0.40	
EMD (LCL)	5.96%	6.39%	-	6.26%	11.42%	5.3	0.31	
EM Corp.	6.23%	6.56%	-	-	4.98%	5.0	0.31	

Global bond market

USD trillions



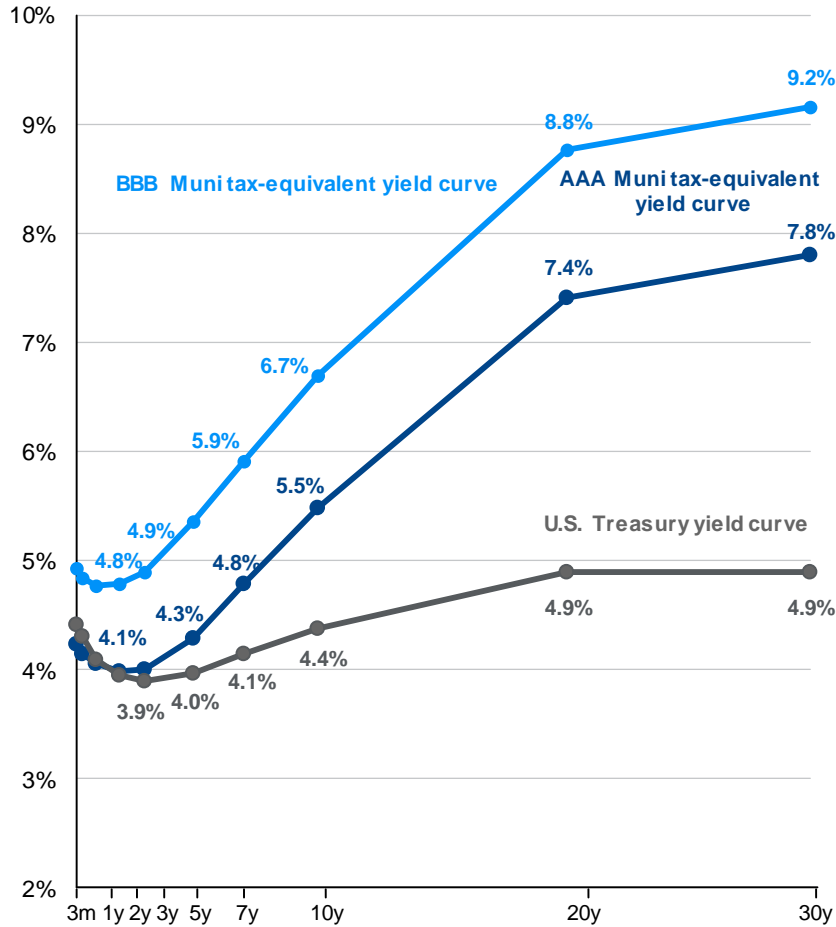
Source: J.P. Morgan Asset Management; (Left) Bloomberg, FactSet; (Right) BIS.

Fixed income sectors shown above are provided by Bloomberg and are represented by the global aggregate for each country except where noted. EMD sectors are represented by the J.P. Morgan EMBIG Diversified Index (USD), the J.P. Morgan GBI EM Global Diversified Index (LCL) and the J.P. Morgan CEMBI Broad Diversified Index (Corp). European Corporates are represented by the Bloomberg Euro Aggregate Corporate Index and the Bloomberg Pan-European High Yield Index. Sector yields reflect yield-to-worst. Correlations are based on 10-years of monthly returns for all sectors. Past performance is not indicative of future results. Countries included in the emerging market debt calculation are those represented in the J.P. Morgan EMB Index suite for which the BIS has data. Global bond market regional breakdown may not sum to 100% due to rounding. USD yield shows the total effective yield a U.S. based investor could expect after accounting for the hedging premium. Hedging premiums are calculated taking the spread between the 3-month SOFR rate and the 3-month short term lending rates in local market referenced (e.g. 3-month Euribor is used for European economies) and do not include transactional fees that can reduce effective yield.

Guide to the Markets – U.S. Data are as of July 31, 2025.

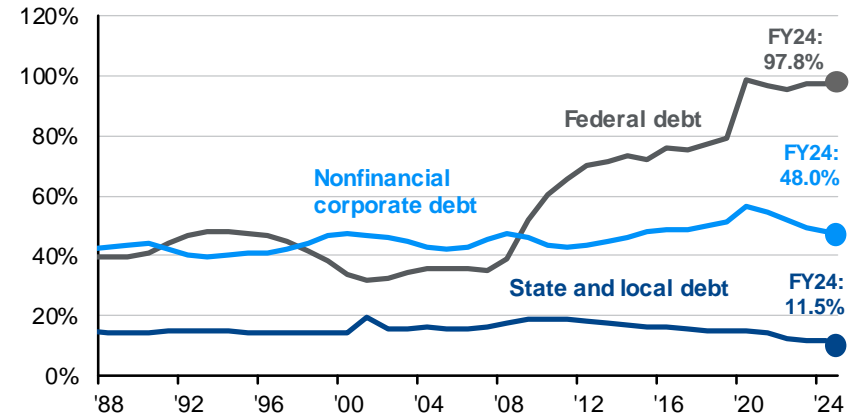


Muni tax-equivalent and Treasury yield curves



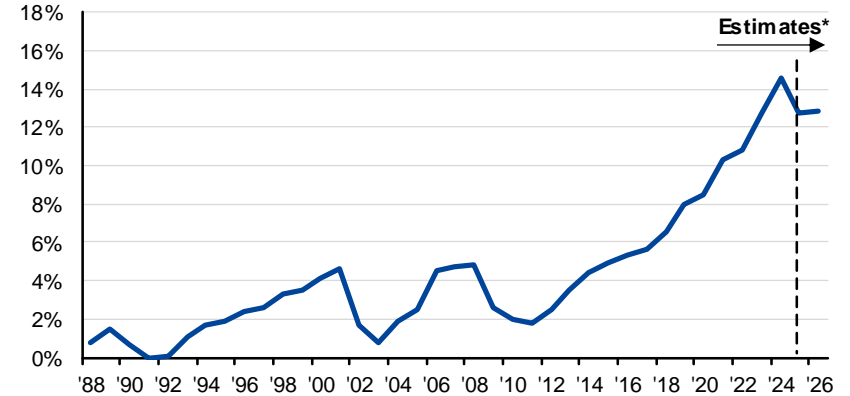
State and local, federal and corporate debt

% of GDP, 1988-2024, end of fiscal year



State Rainy Day Fund balances

Median savings balances as a % of total spending, 1988-2026, fiscal year



Source: J.P. Morgan Asset Management; (Left) Bloomberg, FactSet, Federal Reserve, S&P Global; (Top right) Census Bureau, Congressional Budget Office (CBO), Federal Reserve; (Bottom right) NASBO Fiscal Survey of States Spring 2025. Municipal tax-equivalent yields are calculated based on municipal bond curves for each credit rating according to S&P Global and assume a top-income tax bracket rate of 37% plus a Medicare tax rate of 3.8% for a total tax rate of 40.8%. State and local debt are based on the Census Bureau's Annual Survey of State and Local Government Finances. A rainy day fund, also known as a budget stabilization fund or reserve fund, is a collection of funds that local governments use to prepare for financial emergencies and future stability. *Estimates are sourced from NASBO's Spring 2025 Fiscal Survey of States. Figures for FY 2025 are estimates while figures for FY 2026 are projected based on governors' recommended budgets. Guide to the Markets – U.S. Data are as of July 31, 2025.



Fixed income yields and forward returns

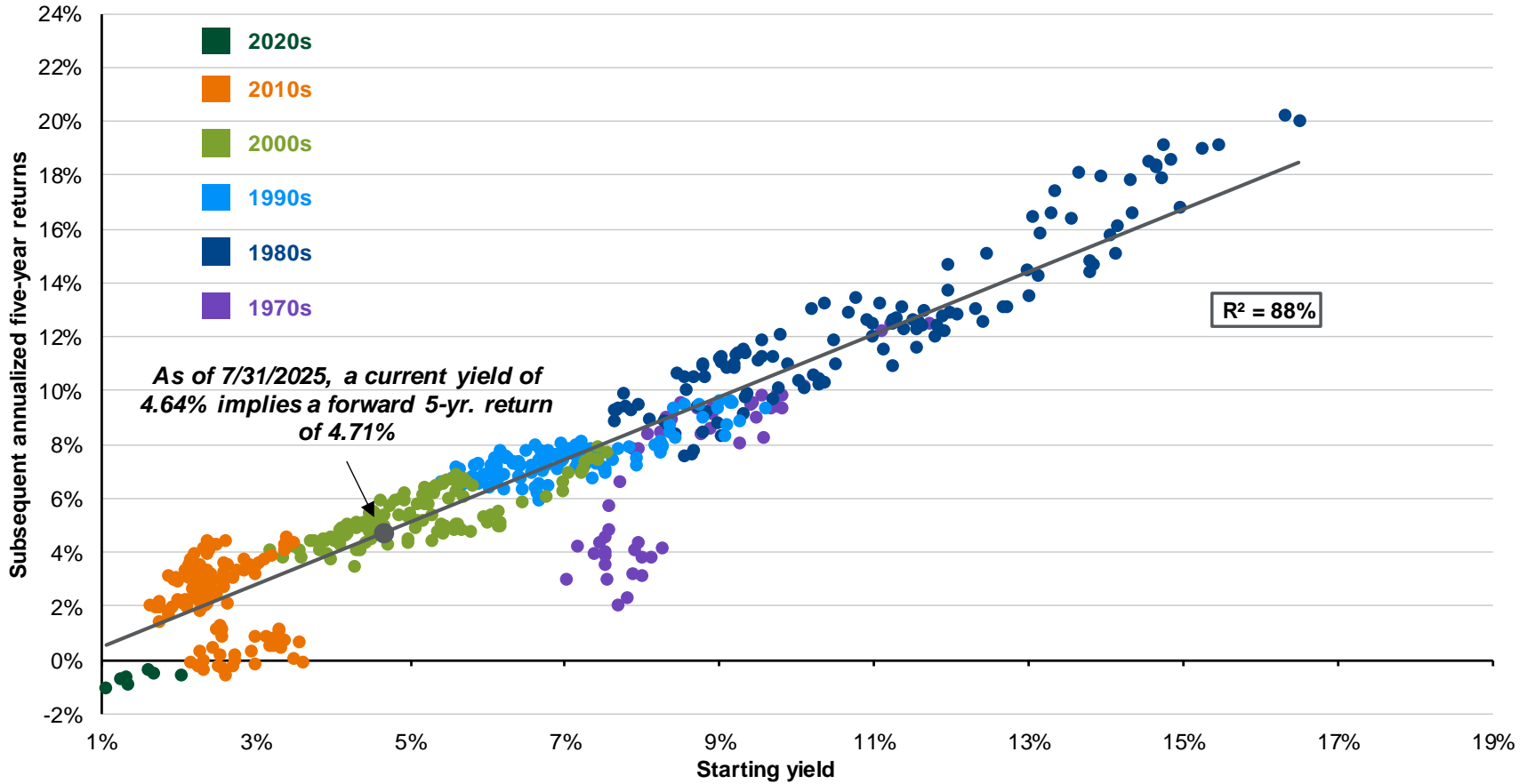
GTM

U.S.

43

Yield-to-worst and subsequent 5-year annualized returns

Bloomberg U.S. Aggregate Total Return Index



Fixed Income

Source: Bloomberg, FactSet, J.P. Morgan Asset Management.

Returns are 60-month annualized total returns, measured monthly, beginning 1/31/1976. R² represents the percent of total variation in total returns that can be explained by yields at the start of each period.

Guide to the Markets – U.S. Data are as of July 31, 2025.



Bond market intermediary capacity and exchange volumes

GTM

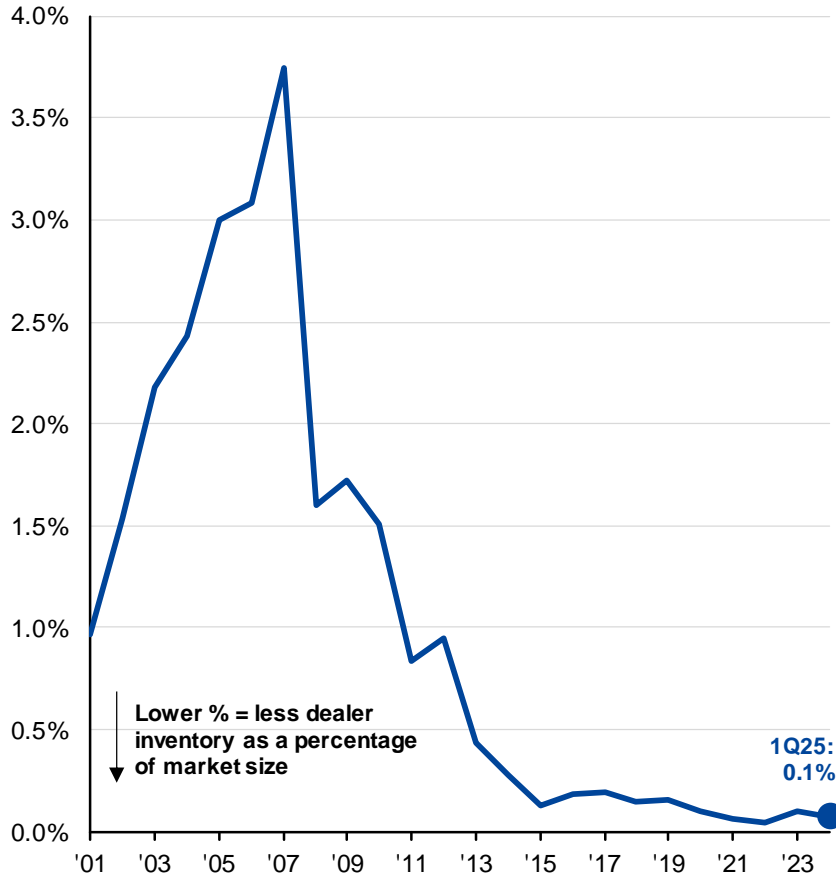
U.S.

44

Fixed Income

Primary dealer inventories

% of total U.S. corporate debt outstanding

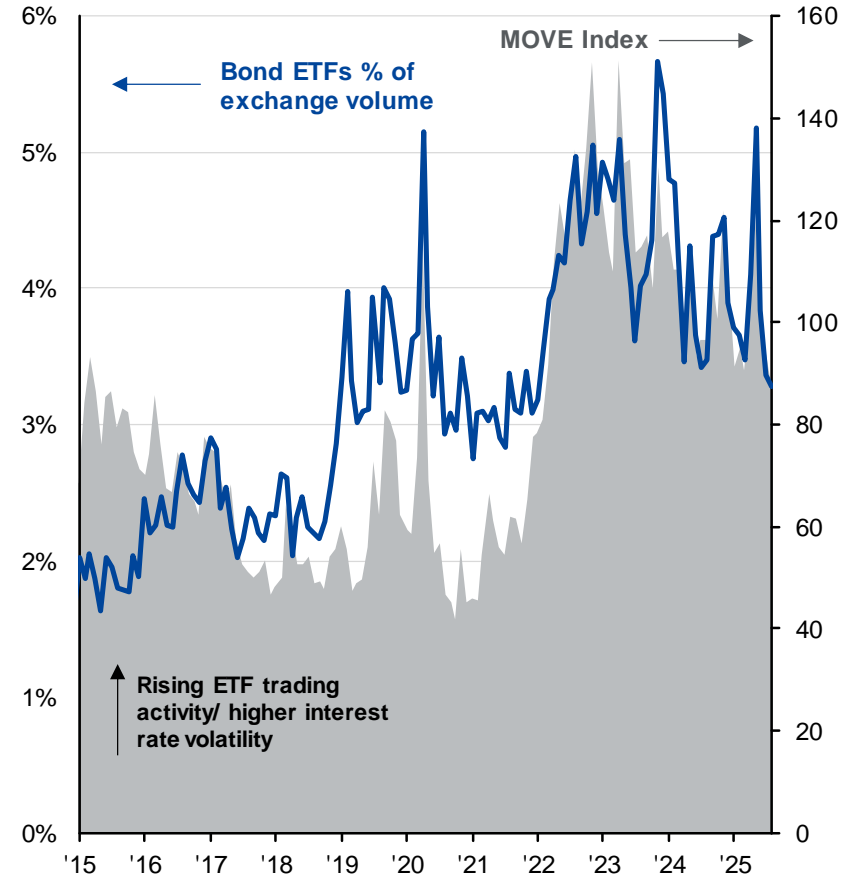


Lower % = less dealer inventory as a percentage of market size

1Q25: 0.1%

Fixed income ETFs and the MOVE Index

Fixed income ETFs share of exchange volume



Bond ETFs % of exchange volume

MOVE Index

Rising ETF trading activity/ higher interest rate volatility

Source: J.P. Morgan Asset Management; (Left) Federal Reserve Bank of New York, SIFMA; (Right) Barclays, Bloomberg. (Left) Total debt outstanding data sourced from SIFMA. U.S. corporate debt outstanding includes money market debt. (Right) Total exchange volume reflects data collected from stocks traded on the New York Stock Exchange, the NASDAQ, the NYSE American Exchange and regional stock exchanges.

Guide to the Markets – U.S. Data are as of July 31, 2025.

J.P.Morgan
ASSET MANAGEMENT

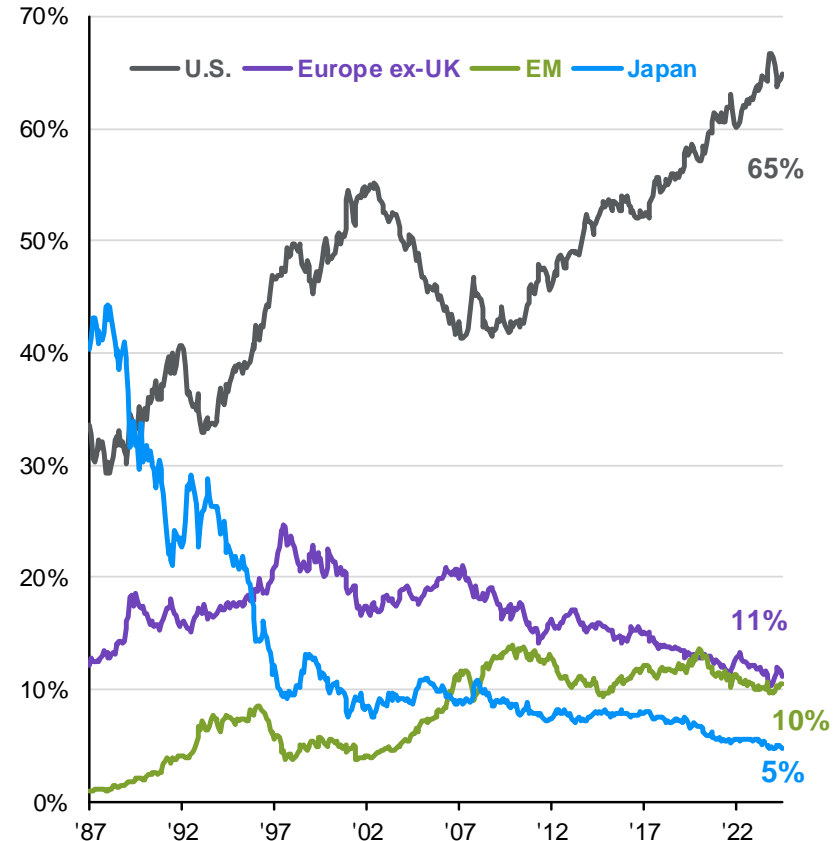


Global equity markets

Returns	YTD 2025		2024		15-years Ann.
	Local	USD	Local	USD	
Regions					
U.S. (S&P 500)	-	8.6%	-	25.0%	14.5%
AC World ex-U.S.	11.4%	18.0%	13.2%	6.1%	6.5%
EAFE	9.8%	18.3%	11.8%	4.3%	7.3%
Eurozone	14.7%	26.7%	10.3%	3.4%	7.6%
Emerging markets	14.9%	17.9%	13.7%	8.1%	4.4%
Selected Countries					
Japan	5.7%	10.4%	21.2%	8.7%	6.9%
UK	13.8%	20.3%	9.5%	7.5%	6.5%
France	8.5%	19.9%	1.8%	-4.6%	7.9%
Canada	11.8%	16.3%	23.0%	12.7%	6.9%
Germany	20.1%	32.7%	18.4%	11.0%	8.2%
China	23.9%	23.1%	19.8%	19.7%	4.1%
Taiwan	6.2%	16.6%	44.3%	35.1%	13.5%
India	3.6%	1.2%	15.7%	12.4%	6.7%
Brazil	10.7%	20.6%	-11.4%	-29.5%	-1.0%

Share of global market capitalization

% weight in MSCI All Country World, USD, monthly



Source: FactSet, MSCI, Standard & Poor's, J.P. Morgan Asset Management. (Left) All return values are MSCI Total Return Index (Gross) data. 15-year history based on USD returns. 15-year annualized return figures are calculated using a rolling 12-month period ending with the previous month-end. Please see disclosure page for index definitions. Past performance is not a reliable indicator of current and future results. *Guide to the Markets – U.S.* Data are as of July 31, 2025.

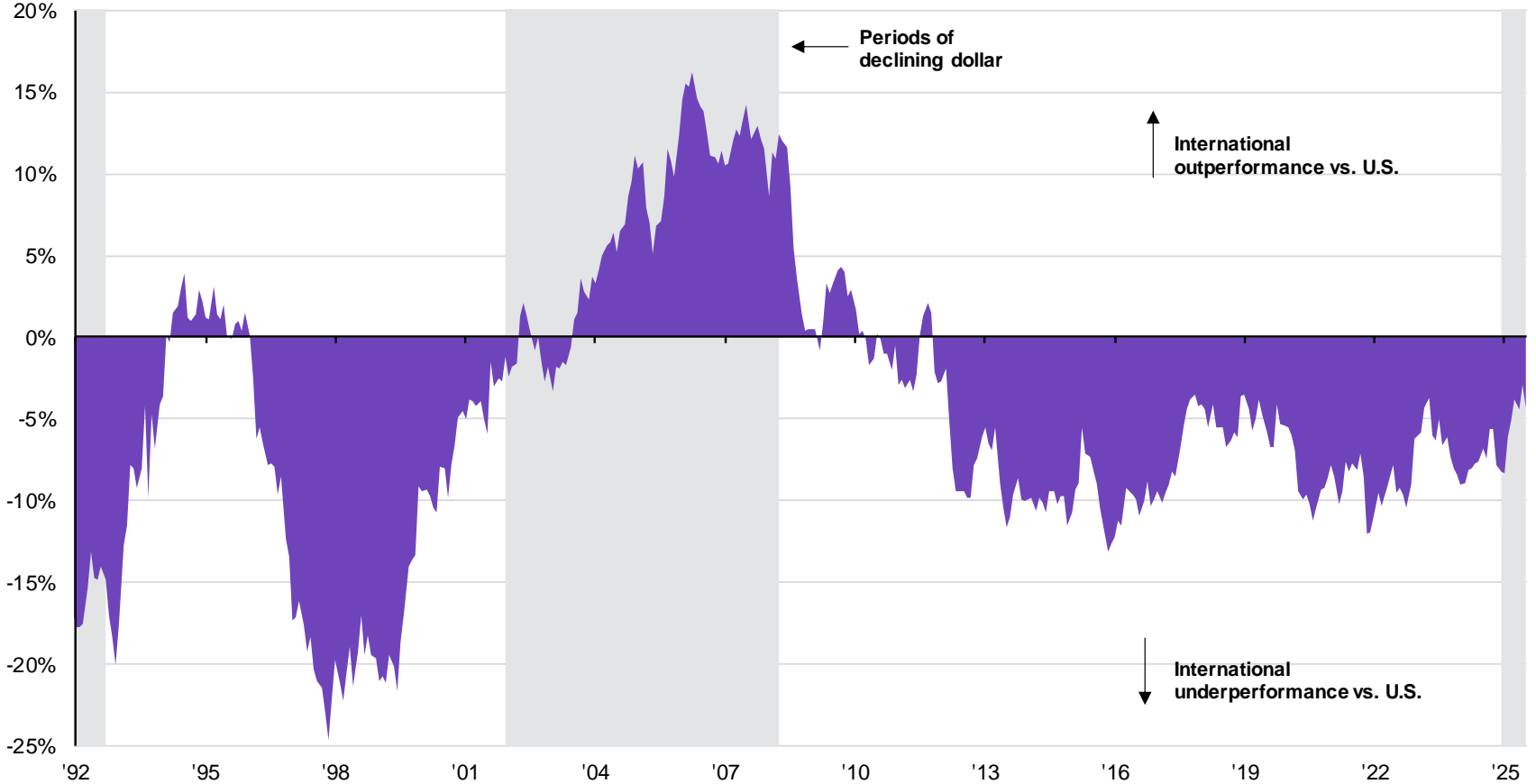


Global equity performance and the U.S. dollar

Cycles of international outperformance and the U.S. dollar

International out/underperformance versus U.S., MSCI AC World ex-U.S., S&P 500, total return, USD, rolling 3-yrs. ann.

International



Source: FactSet, MSCI, Standard & Poor's, J.P. Morgan Asset Management. Past performance is not a reliable indicator of current and future results.
Guide to the Markets – U.S. Data are as of July 31, 2025.

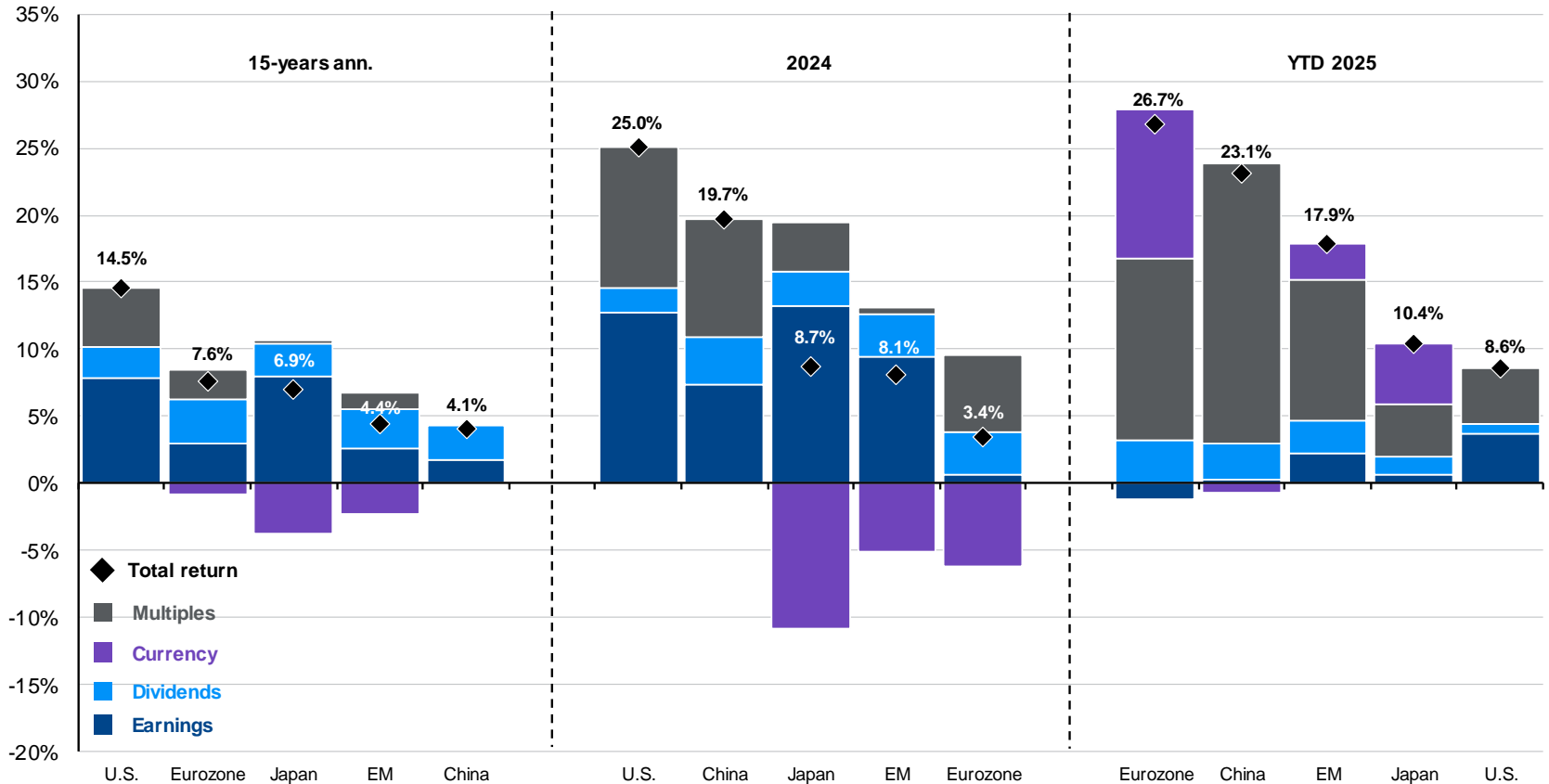


Global equity return composition

International

Sources of global equity returns*

Total return, USD



Source: FactSet, MSCI, Standard & Poor's, J.P. Morgan Asset Management.
 15-years ann. is a rolling 15-year period ending with the previous month-end. All return values are MSCI Gross Index data, except the U.S., which is the S&P 500. *Multiple expansion is based on the forward P/E ratio, and EPS growth outlook is based on NTMA earnings estimates. Chart is for illustrative purposes only. Past performance is not indicative of future results.
 Guide to the Markets – U.S. Data are as of July 31, 2025.

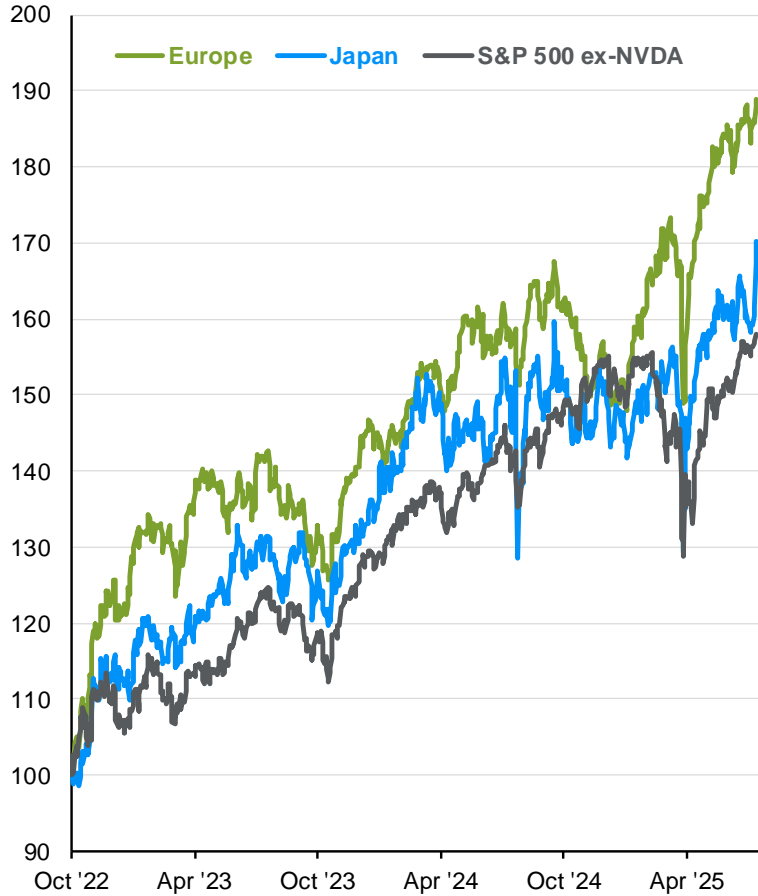


Global equity return themes

International

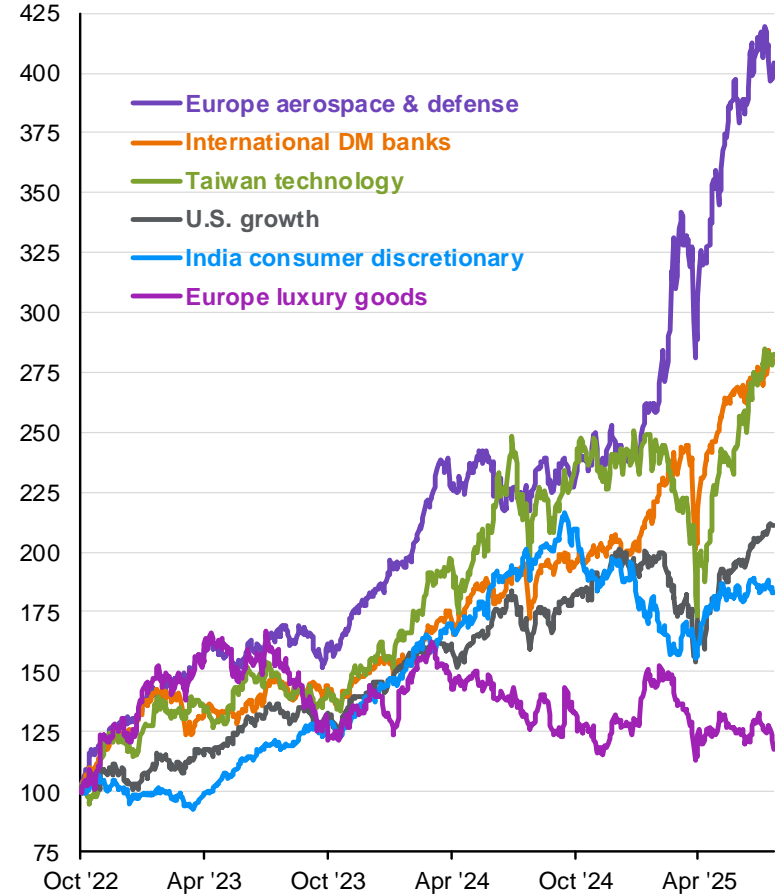
Regional performance since 2022

Oct. 12, 2022 = 100, total return, USD



Major global investment themes

Oct. 12, 2022 = 100, total return, USD



Source: FactSet, MSCI, Standard & Poor's, J.P. Morgan Asset Management. 10/12/2022 was the market bottom for U.S. equities. (Right) Russell. Each country/sector/industry is represented by its respective MSCI index except U.S. growth, which is represented by the Russell 1000 Growth Index. International DM banks = MSCI EAFE / Banks Index. *Guide to the Markets – U.S.* Data are as of July 31, 2025.

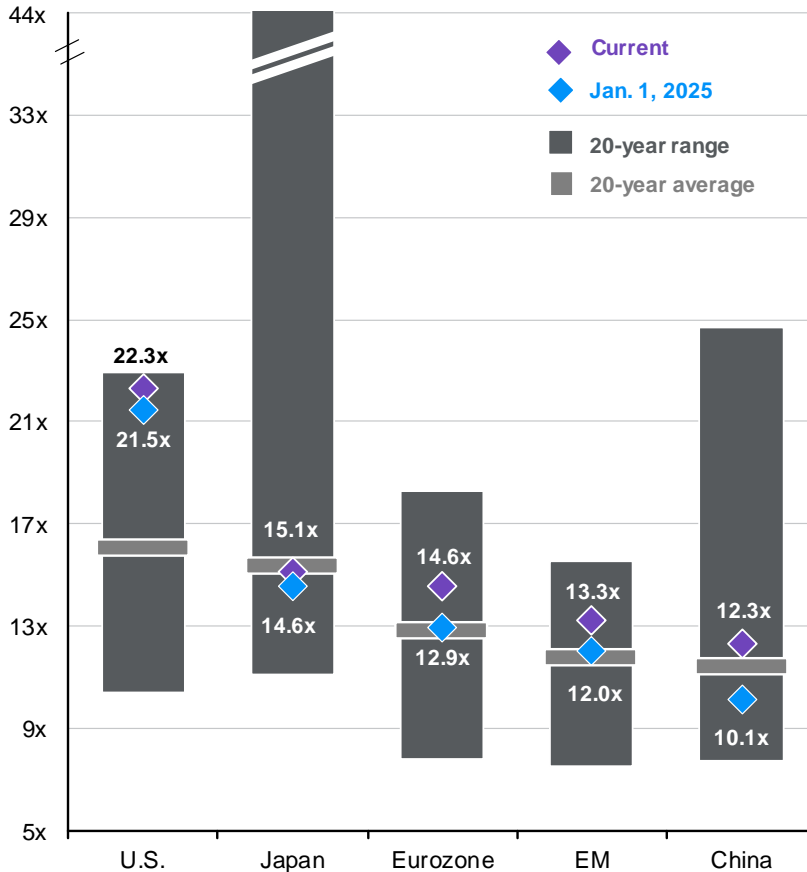


Global equity valuations

International

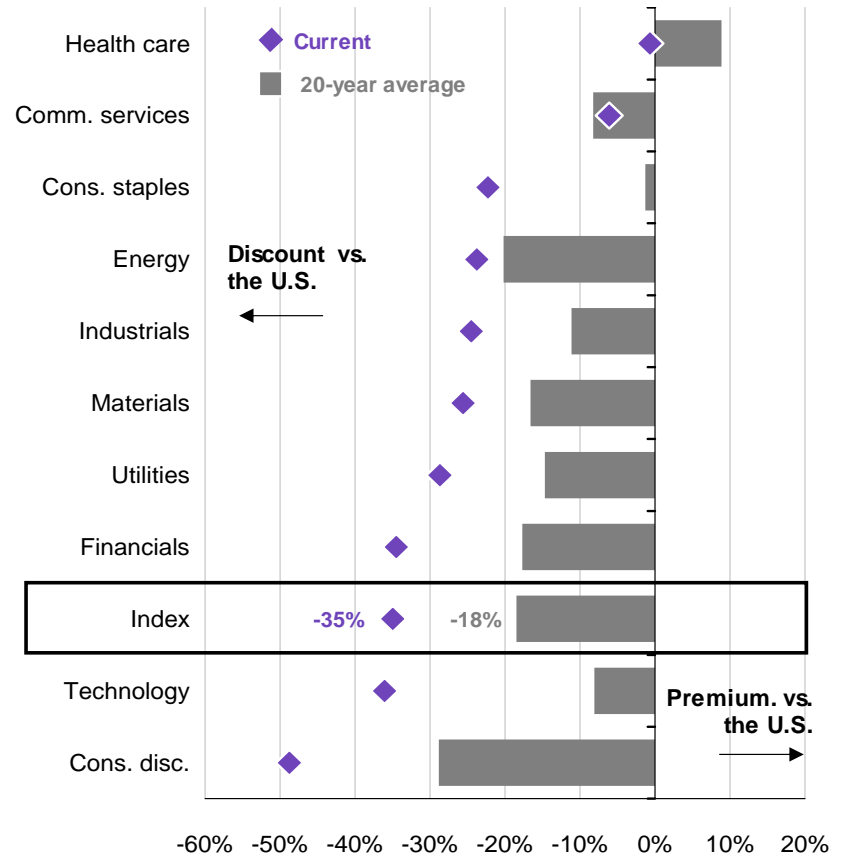
Valuations by country/region

Price-to-earnings, next 12 months



Relative valuations by sector

Price-to-earnings, next 12 months, MSCI ACWI ex-U.S. divided by S&P 500



Source: FactSet, MSCI, Standard & Poor's, J.P. Morgan Asset Management. Countries are represented by their respective MSCI country index except for the U.S., which is represented by the S&P 500. Guide to the Markets – U.S. Data are as of July 31, 2025.

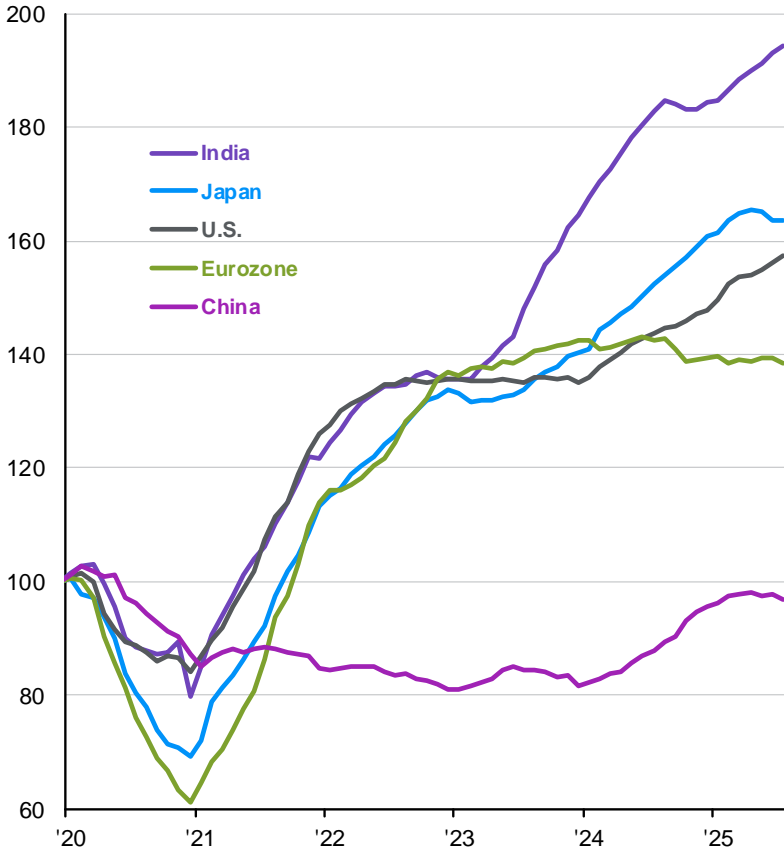


Global equity earnings

International

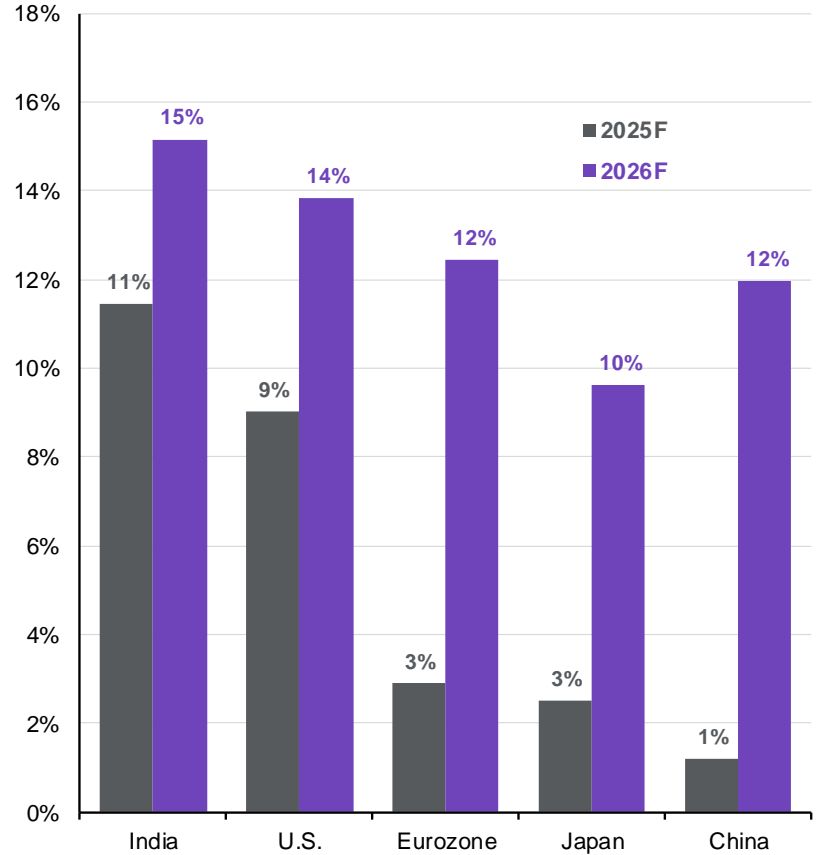
Earnings growth

Jan. 2020 = 100, last 12 months, local currency



Earnings growth expectations

2025 and 2026 EPS growth estimates, consensus, local currency

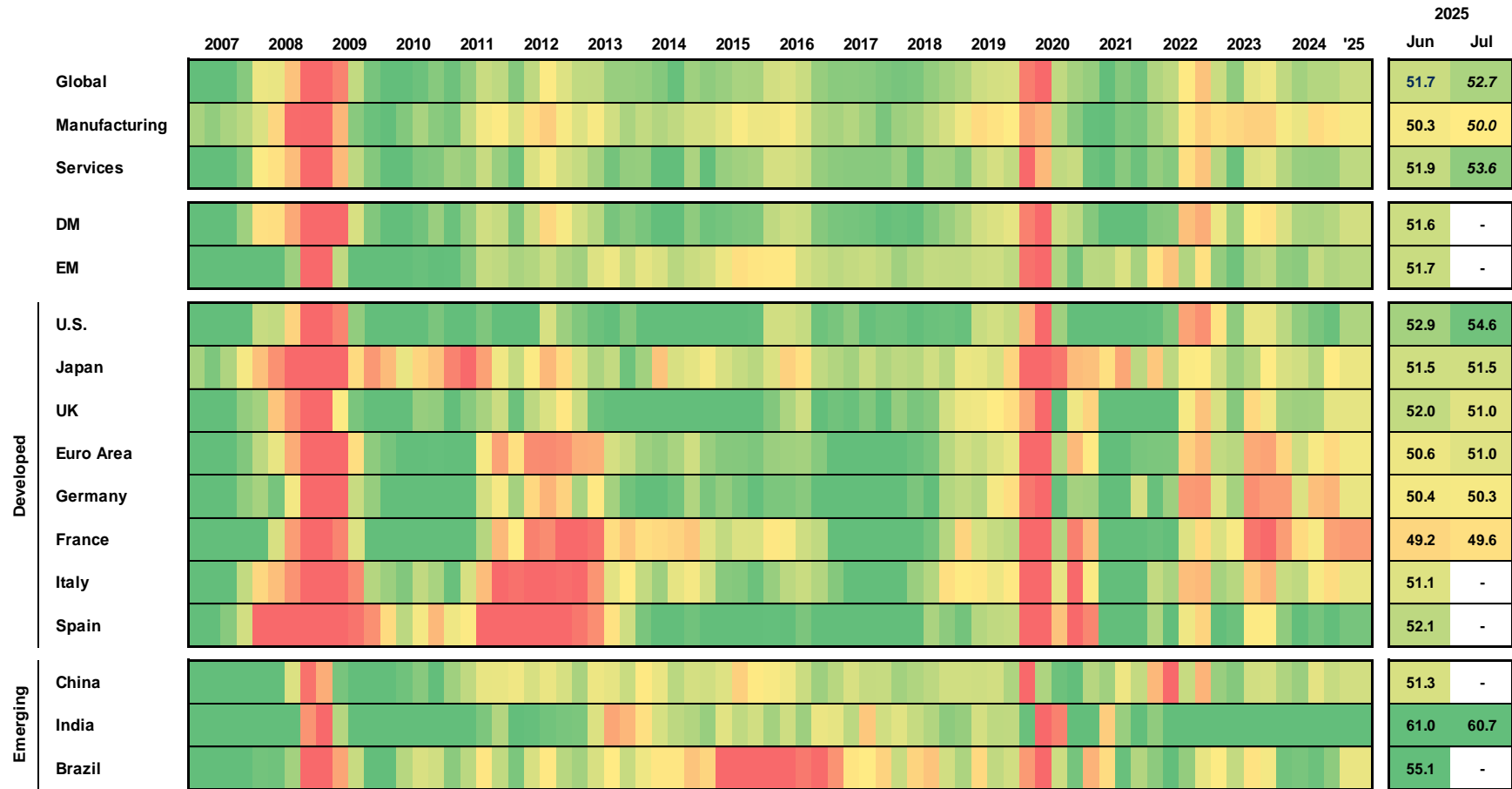


Source: FactSet, MSCI, Standard & Poor's, J.P. Morgan Asset Management. Countries are represented by their respective MSCI country index except for the U.S., which is represented by the S&P 500. Past performance is not a reliable indicator of current and future results. Guide to the Markets – U.S. Data are as of July 31, 2025.



Global economic activity momentum

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



International

Developed

Emerging

Source: J.P. Morgan Economic Research, Standard & Poor's, J.P. Morgan Asset Management. Italicized figures are estimates by 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 period shown. Heatmap is based on quarterly averages, except for the two most recent figures, which are single month readings. Data for the U.S. are back-tested and filled in for 2007-2009. Data for Japan are back-tested and filled in for the first two quarters of 2007. DM and EM represent developed markets and emerging markets, respectively. *Guide to the Markets – U.S.* Data are as of July 31, 2025.

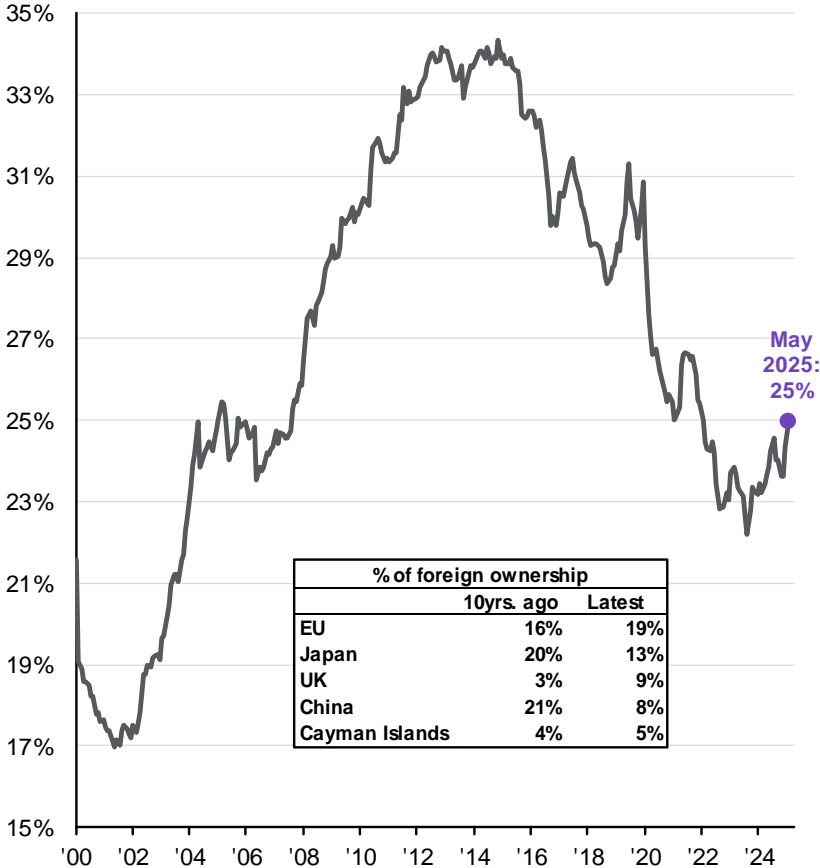


Foreign ownership of U.S. assets

International

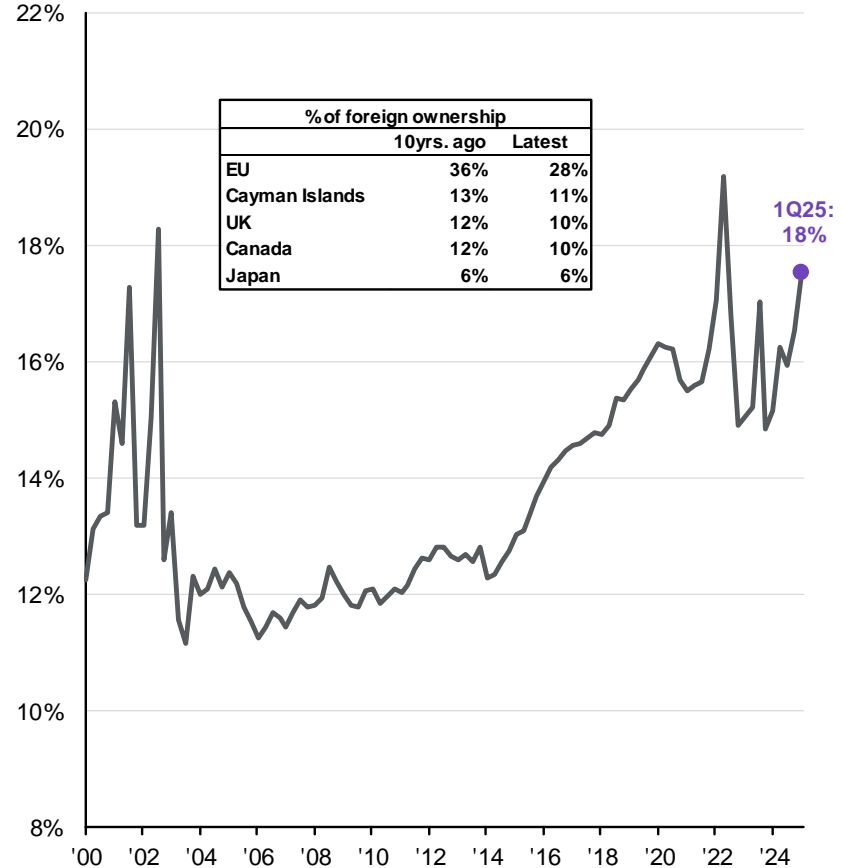
Foreign Treasury holdings

% of total U.S. Treasuries outstanding, monthly



Foreign U.S. equity holdings

% of total U.S. corporate equity, market value, quarterly



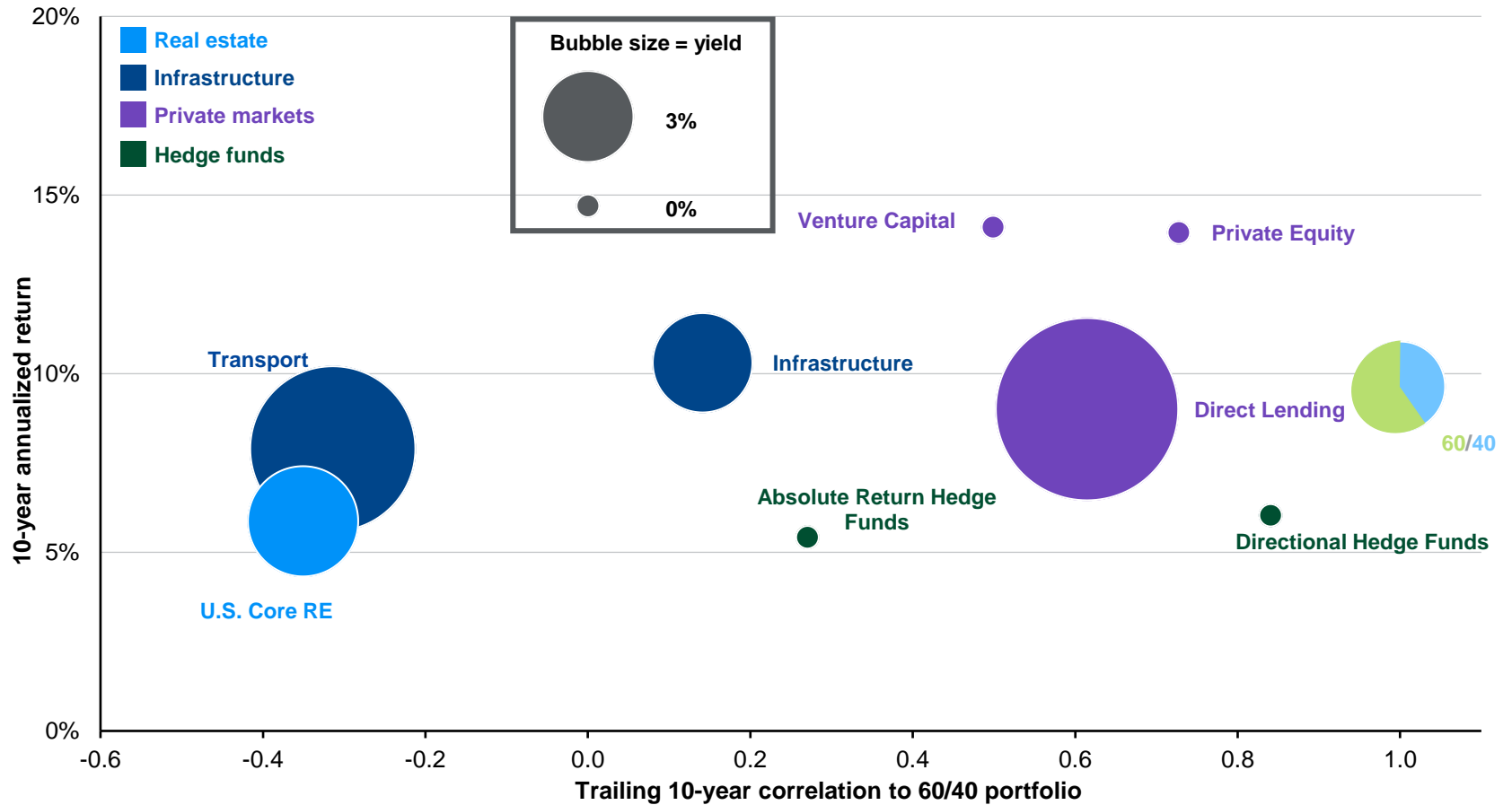
Source: Bloomberg, Federal Reserve, U.S. Department of Treasury, J.P. Morgan Asset Management. The top five holders listed in the tables are based on the latest data. May not represent the top five holders 10 years ago. (Left) Latest represents the latest monthly data on an approximate two-month lag based on data availability. (Right) Total foreign equity holdings as a percentage of total U.S. corporate equity data (market value) are published quarterly and are shown in the graph. Data found in the table are based on monthly data from the Treasury International Capital (TIC) system, which is a U.S. government reporting system that collects data on cross-border capital flows and positions.
 Guide to the Markets – U.S. Data are as of July 31, 2025.



Alternatives: Correlations, returns and yields

Correlations, returns and yields

10-year correlations and 10-year annualized total returns, 1Q15 – 4Q24



Alternatives

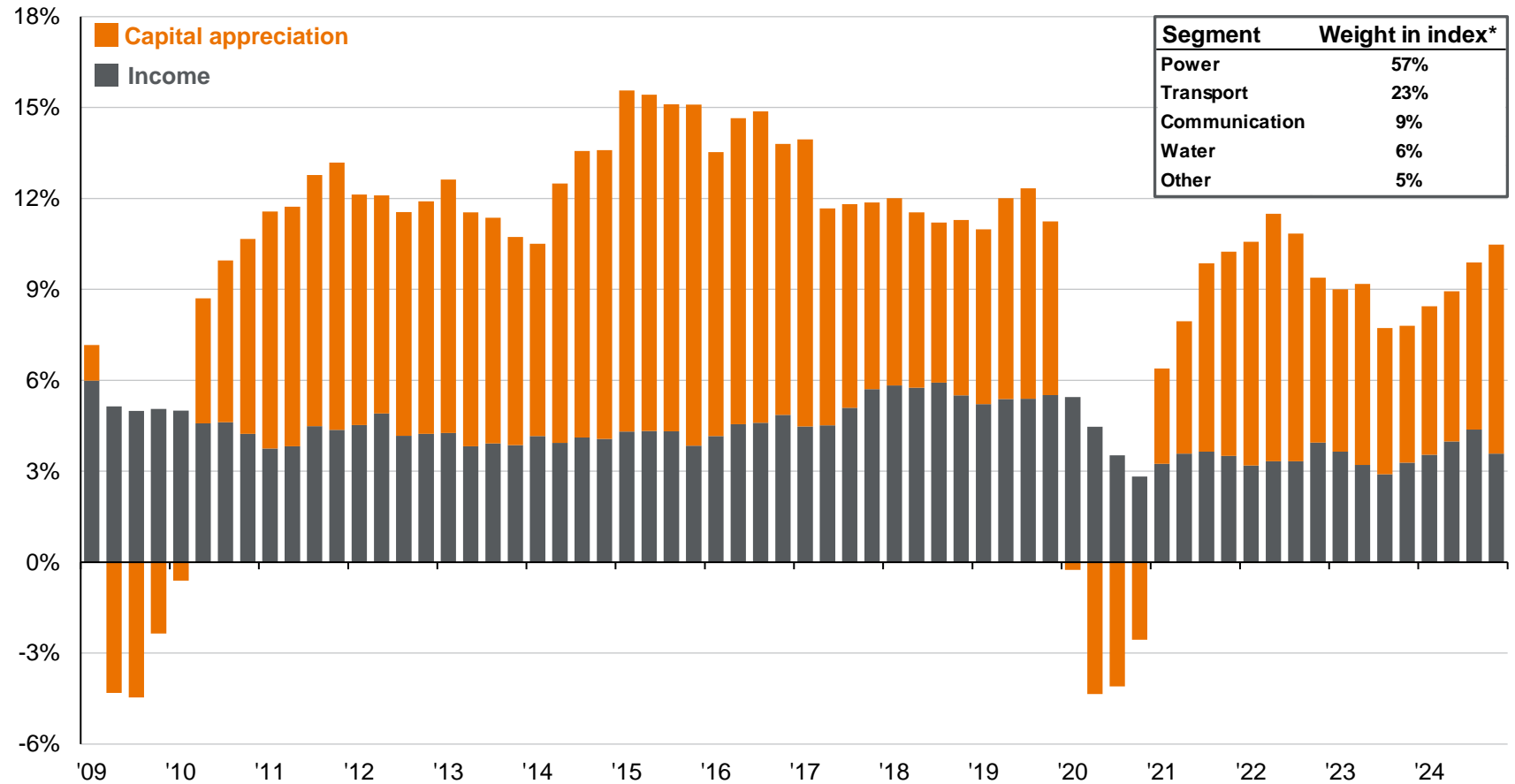
Source: Burgiss, Clarkson, Cliffwater, Drewry Maritime Consultants, FactSet, MSCI, NCREIF, PivotalPath, J.P. Morgan Asset Management. Correlations are based on quarterly returns over the time period indicated. A 60/40 portfolio is comprised of 60% stocks and 40% bonds. Stocks are represented by the S&P 500 Total Return Index. Bonds are represented by the Bloomberg U.S. Aggregate Total Return Index. 10-year annualized returns are calculated based on the time period indicated. "Absolute Return Hedge Funds" represent asset-weighted returns from the PivotalPath Global Macro and Relative Value indices. "Directional Hedge Funds" represent asset-weighted returns from the PivotalPath Credit, Equity Diversified and Event Driven indices. Direct Lending uses yields from the Cliffwater Direct Lending Index. All other indices and data used for alternative asset class returns and yields are as described on pages 12 and 16 of the *Guide to Alternatives*. Yields are based on latest available data as described on page 12 of the *Guide to Alternatives*. Transportation returns are shown on an unlevered basis and returns can be enhanced by adding leverage. Past performance is not a reliable indicator of current and future results. This slide comes from our *Guide to Alternatives*. *Guide to the Markets – U.S.* Data are as of July 31, 2025.



Sources of global infrastructure returns

Global core infrastructure returns

1Q09-4Q24, rolling 4-quarter returns from income and capital appreciation



Alternatives

Source: MSCI, J.P. Morgan Asset Management.

Infrastructure returns represented by the MSCI Global Private Quarterly Infrastructure Asset Index. Data show rolling one-year returns from income and capital appreciation. *Weights are based on enterprise value. Alternative investments carry more risk than traditional investments and are recommended only for long-term investment. Some alternative investments may be highly leveraged and rely on speculative investments that can magnify the potential for loss or gain. Diversification does not guarantee investment returns or eliminate the risk of loss. Past performance is not a reliable indicator of current and future results.

This slide comes from our *Guide to Alternatives*.
Guide to the Markets – U.S. Data are as of July 31, 2025.

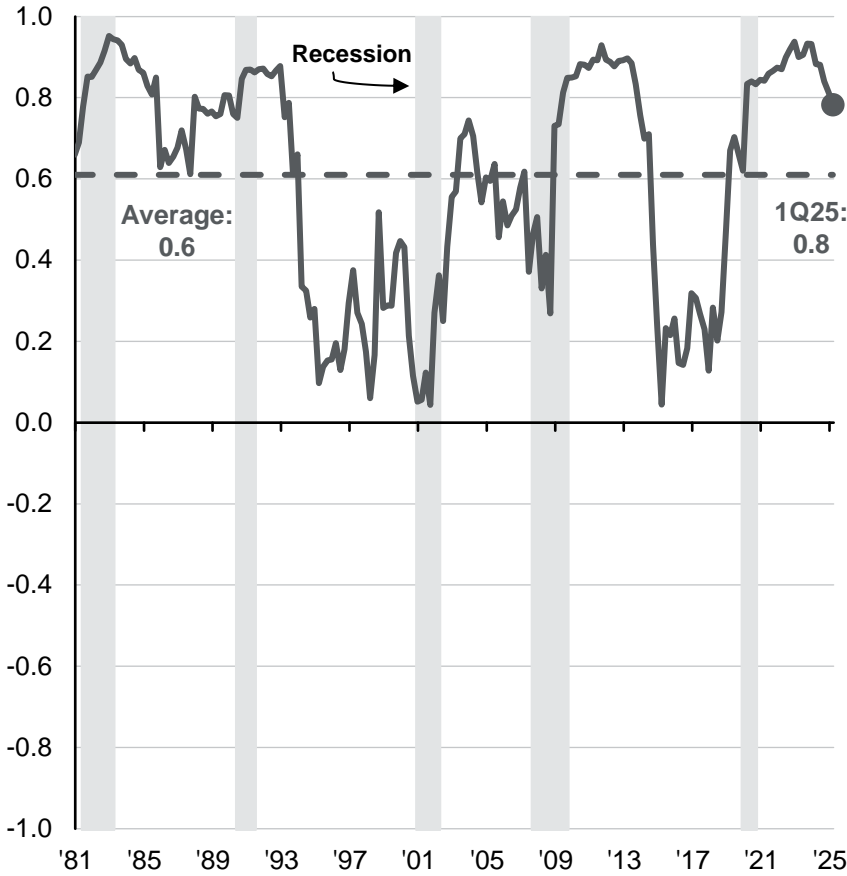


Real estate correlation to equities

Alternatives

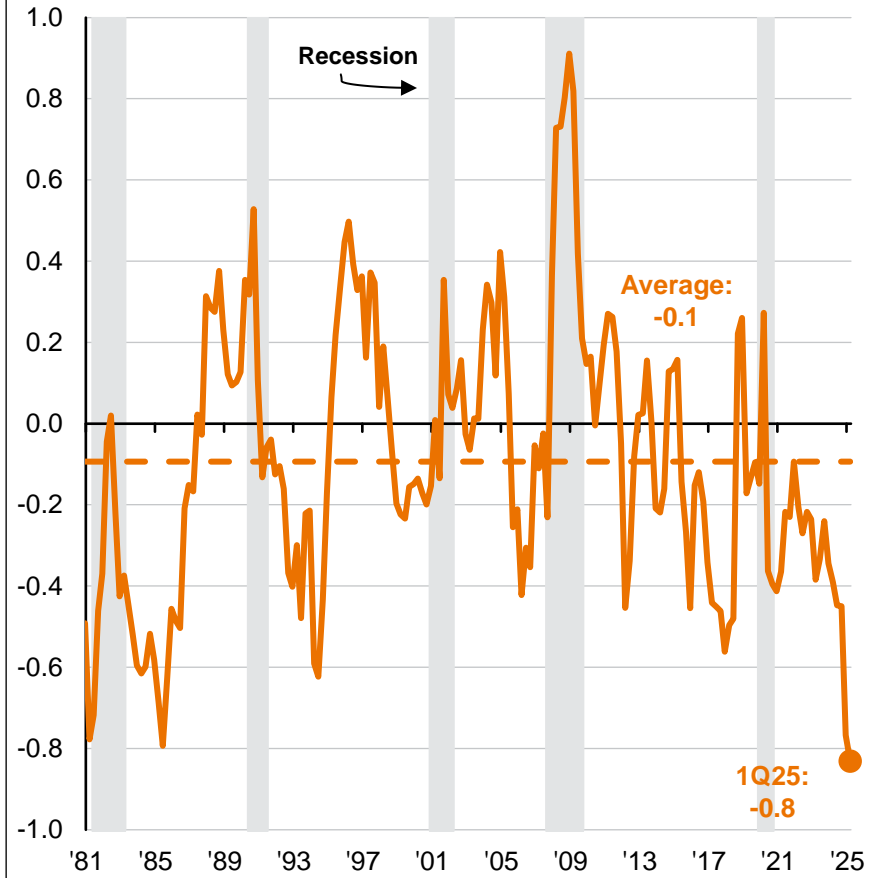
U.S. REITs correlation to S&P 500

12-quarter rolling, total return, 1Q81 – 1Q25



Direct real estate correlation to S&P 500

12-quarter rolling, total return, 1Q81 – 1Q25



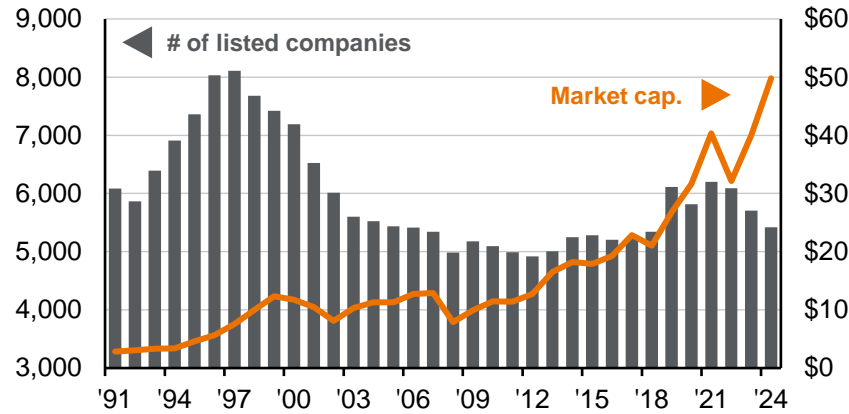
Source: FactSet, NAREIT, NCREIF, Standard & Poor's, J.P. Morgan Asset Management. The S&P 500 is represented by the S&P 500 total return index. Indices do not include fees or operating expenses and are not available for actual investment. Past performance is not a reliable indicator of current and future results. This slide comes from our *Guide to Alternatives*. *Guide to the Markets – U.S.* Data are as of July 31, 2025.



U.S. public vs. private equity

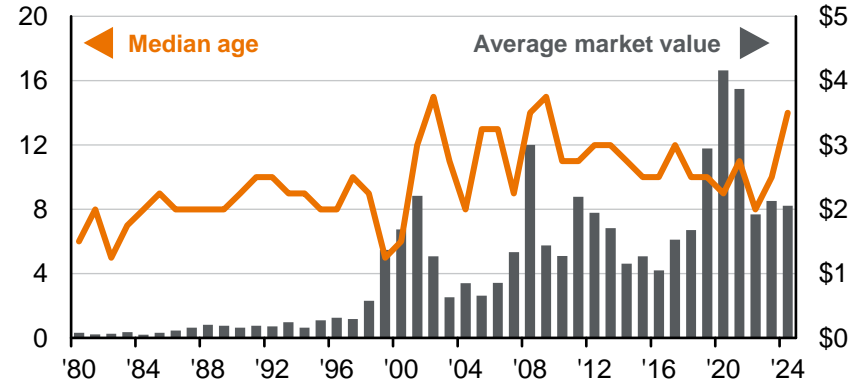
Number of listed U.S. companies* and market cap.

Number, S&P 500 market capitalization in USD trillions



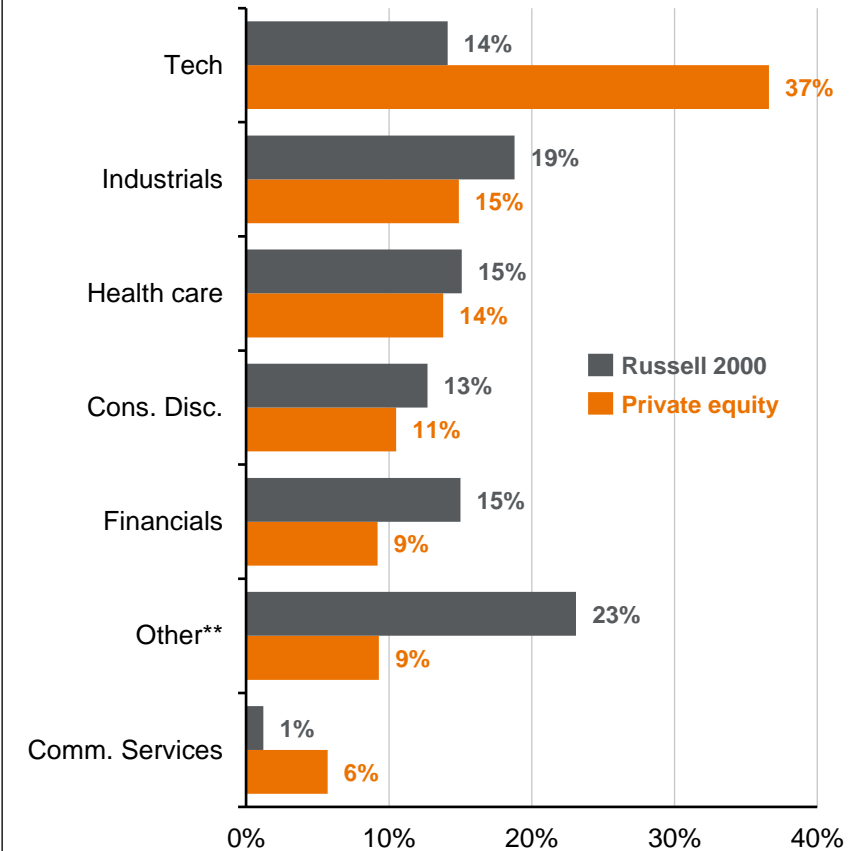
Median age and average market value at IPO

Years, USD billions



Private equity vs. small cap sector weights

2Q24



Sources: Cambridge Associates, FactSet, FTSE Russell, Jay Ritter, University of Florida, World Federation of Exchanges, J.P. Morgan Asset Management. (Top left) *Number of listed U.S. companies is represented by the sum of number of companies listed on the NYSE and the NASDAQ. (Bottom left) Average market value is calculated by dividing the total market value at first closing price by the total number of IPOs for each period. The sample is IPOs with an offer price of at least \$5, excluding ADRs, unit offers, closed-end funds, REITs, natural resource limited partnerships, small best efforts offers, banks and S&Ls and stocks not listed on CRSP (CRSP includes Amex, NYSE and NASDAQ stocks). (Right) Private equity weights are from the Cambridge Associates LLC U.S. Private Equity Index. **Other includes real estate, utilities and energy. Percentages may not sum due to rounding. Sector weights are as of 2Q24. This slide comes from our *Guide to Alternatives*. *Guide to the Markets – U.S.* Data are as of July 31, 2025.

Alternatives

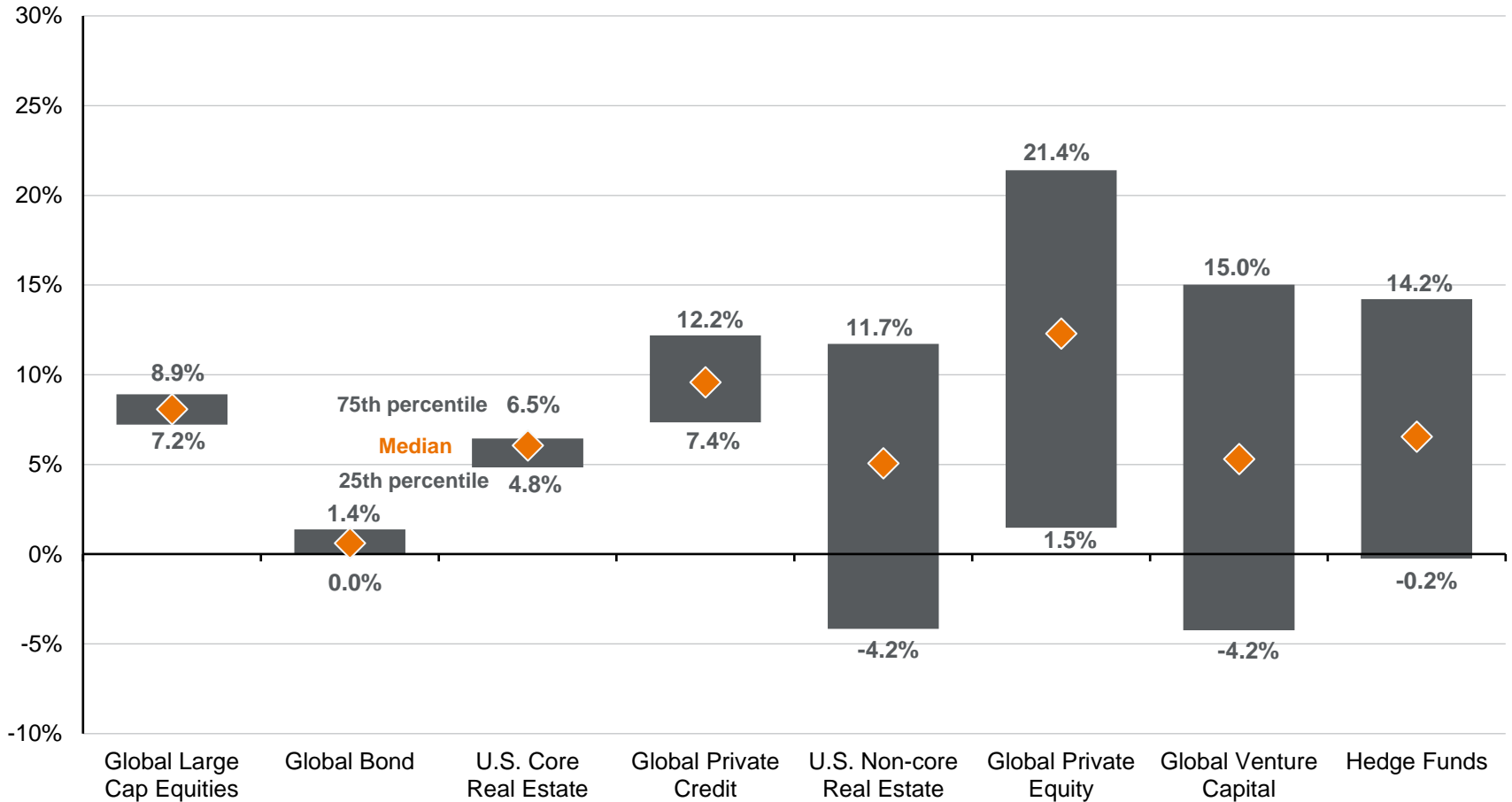


Alternatives and manager selection

Alternatives

Public and private manager dispersion

Based on returns from 1Q15 – 1Q25*



Source: Burgiss, Morningstar, NCREIF, Pitchbook | LCD, PivotalPath, J.P. Morgan Asset Management.

Global Large Cap Equities and Global Bond are based on the Morningstar Global Large Stock Blend and Global Bond (not hedged) categories, respectively. U.S. Core Real Estate is based on the NCREIF Fund Index – ODCE. Global Private Credit is represented by Pitchbook | LCD fund data. U.S. Non-core Real Estate, Global Private Equity and Global Venture Capital are based on indices from the MSCI Private Capital Universe. Hedge Funds are based on the PivotalPath index. *Manager dispersion is based on annual returns over the 10-year period indicated for: Global Large Cap Equities, Global Bond, U.S. Core Real Estate and Hedge Funds. Manager dispersion is based on the 10-year internal rate of return (IRR) ending 4Q24 for: Global Private Credit, U.S. Non-core Real Estate, Global Private Equity and Global Venture Capital. Past performance is not a reliable indicator of current and future results.

This slide comes from our *Guide to Alternatives, Guide to the Markets – U.S.* Data are as of July 31, 2025.



Asset class returns

2010-2024		2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024	YTD
Ann.	Vol.																
Large Cap	Small Cap	REITs	REITs	REITs	Small Cap	REITs	REITs	Small Cap	EM Equity	Cash	Large Cap	Small Cap	REITs	Comdty.	Large Cap	Large Cap	DM Equity
13.9%	20.6%	27.9%	8.3%	19.7%	38.8%	28.0%	2.8%	21.3%	37.8%	1.8%	31.5%	20.0%	41.3%	16.1%	26.3%	25.0%	18.3%
Small Cap	EM Equity	Small Cap	Fixed Income	High Yield	Large Cap	Large Cap	Large Cap	High Yield	DM Equity	Fixed Income	REITs	EM Equity	Large Cap	Cash	DM Equity	Small Cap	EM Equity
10.3%	17.9%	26.9%	7.8%	19.6%	32.4%	13.7%	1.4%	14.3%	25.6%	0.0%	28.7%	18.7%	28.7%	1.5%	18.9%	11.5%	17.9%
REITs	REITs	EM Equity	High Yield	EM Equity	DM Equity	Fixed Income	Fixed Income	Large Cap	Large Cap	REITs	Small Cap	Large Cap	Comdty.	High Yield	Small Cap	Asset Alloc.	Large Cap
9.4%	16.8%	19.2%	3.1%	18.6%	23.3%	6.0%	0.5%	12.0%	21.8%	-4.0%	25.5%	18.4%	27.1%	-12.7%	16.9%	10.0%	8.6%
Asset Alloc.	DM Equity	Comdty.	Large Cap	DM Equity	Asset Alloc.	Asset Alloc.	Cash	Comdty.	Small Cap	High Yield	DM Equity	Asset Alloc.	Small Cap	Fixed Income	Asset Alloc.	High Yield	Asset Alloc.
7.2%	16.5%	16.8%	2.1%	17.9%	14.9%	5.2%	0.0%	11.8%	14.6%	-4.1%	22.7%	10.6%	14.8%	-13.0%	14.1%	9.2%	7.5%
High Yield	Comdty.	Large Cap	Cash	Small Cap	High Yield	Small Cap	DM Equity	EM Equity	Asset Alloc.	Large Cap	Asset Alloc.	DM Equity	Asset Alloc.	Asset Alloc.	High Yield	EM Equity	High Yield
5.9%	16.1%	15.1%	0.1%	16.3%	7.3%	4.9%	-0.4%	11.6%	14.6%	-4.4%	19.5%	8.3%	13.5%	-13.9%	14.0%	8.1%	7.2%
DM Equity	Large Cap	High Yield	Asset Alloc.	Large Cap	REITs	Cash	Asset Alloc.	REITs	High Yield	Asset Alloc.	EM Equity	Fixed Income	DM Equity	DM Equity	REITs	Comdty.	Comdty.
5.7%	15.1%	14.8%	-0.7%	16.0%	2.9%	0.0%	-2.0%	8.6%	10.4%	-5.8%	18.9%	7.5%	11.8%	-14.0%	11.4%	5.4%	5.0%
EM Equity	Asset Alloc.	Asset Alloc.	Small Cap	Asset Alloc.	Cash	High Yield	High Yield	Asset Alloc.	REITs	Small Cap	High Yield	High Yield	High Yield	Large Cap	EM Equity	Cash	Fixed Income
3.4%	10.4%	13.3%	-4.2%	12.2%	0.0%	0.0%	-2.7%	8.3%	8.7%	-11.0%	12.6%	7.0%	1.0%	-18.1%	10.3%	5.3%	3.7%
Fixed Income	High Yield	DM Equity	DM Equity	Fixed Income	Fixed Income	EM Equity	Small Cap	Fixed Income	Fixed Income	Comdty.	Fixed Income	Cash	Cash	EM Equity	Fixed Income	REITs	Cash
2.4%	9.4%	8.2%	-11.7%	4.2%	-2.0%	-1.8%	-4.4%	2.6%	3.5%	-11.2%	8.7%	0.5%	0.0%	-19.7%	5.5%	4.9%	2.5%
Cash	Fixed Income	Fixed Income	Comdty.	Cash	EM Equity	DM Equity	EM Equity	DM Equity	Comdty.	DM Equity	Comdty.	Comdty.	Fixed Income	Small Cap	Cash	DM Equity	REITs
1.2%	4.7%	6.5%	-13.3%	0.1%	-2.3%	-4.5%	-14.6%	1.5%	1.7%	-13.4%	7.7%	-3.1%	-1.5%	-20.4%	5.1%	4.3%	0.7%
Comdty.	Cash	Cash	EM Equity	Comdty.	Comdty.	Comdty.	Comdty.	Cash	Cash	EM Equity	Cash	REITs	EM Equity	REITs	Comdty.	Fixed Income	Small Cap
-1.0%	0.9%	0.1%	-18.2%	-1.1%	-9.5%	-17.0%	-24.7%	0.3%	0.8%	-14.2%	2.2%	-5.1%	-2.2%	-24.9%	-7.9%	1.3%	-0.1%

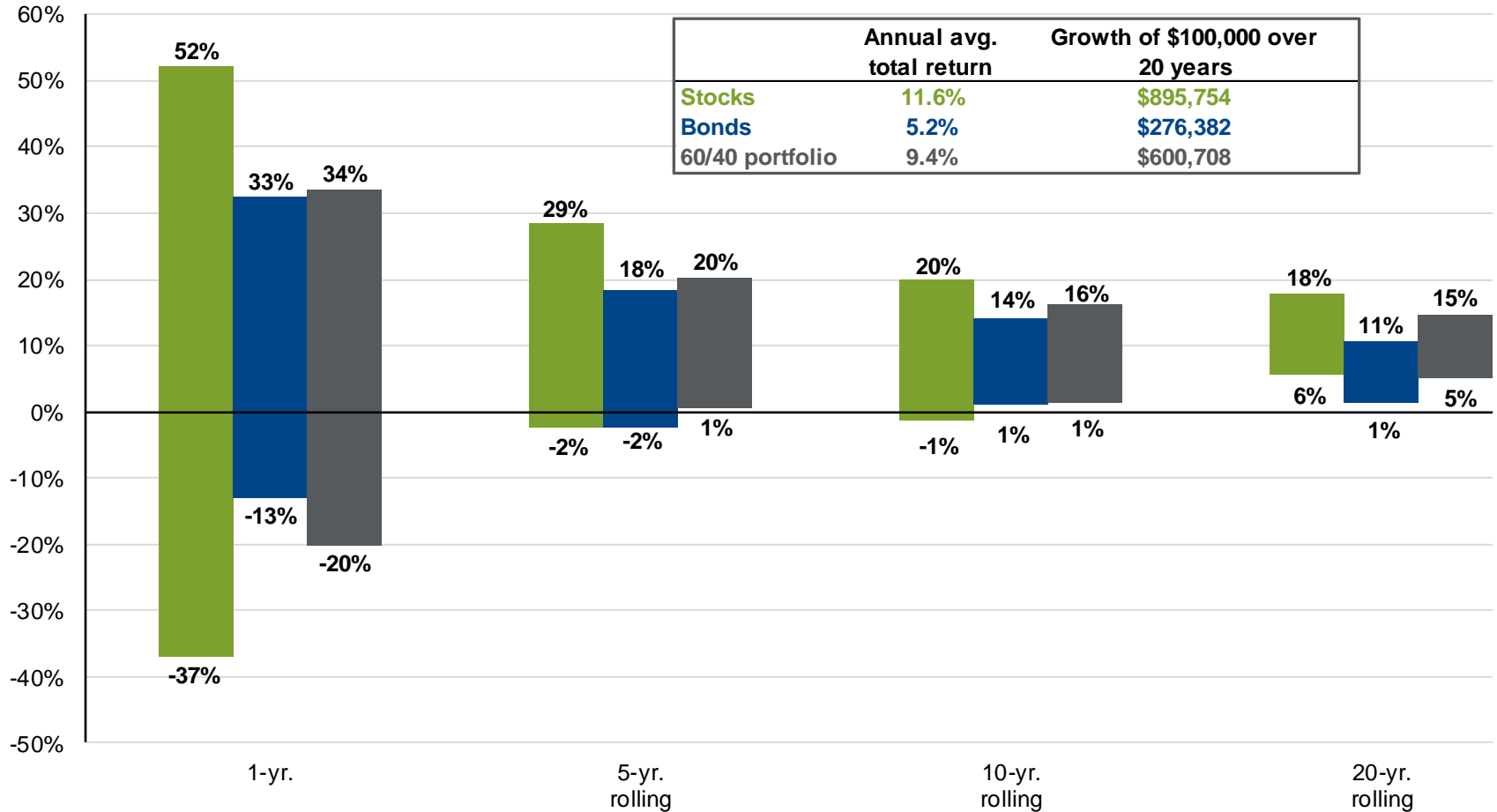
Source: Bloomberg, FactSet, MSCI, NAREIT, Russell, Standard & Poor's, J.P. Morgan Asset Management.
 Large Cap: S&P 500, Small Cap: Russell 2000, EM Equity: MSCI EME, DM Equity: MSCI EAFE, Comdty: Bloomberg Commodity Index, High Yield: Bloomberg Global HY Index, Fixed Income: Bloomberg U.S. Aggregate, REITs: NAREIT Equity REIT Index, Cash: Bloomberg 1-3m Treasury. The "Asset Allocation" portfolio is for illustrative purposes only and assumes annual rebalancing with the following weights: 25% in the S&P 500, 10% in the Russell 2000, 15% in the MSCI EAFE, 5% in the MSCI EME, 25% in the Bloomberg U.S. Aggregate, 5% in the Bloomberg 1-3m Treasury, 5% in the Bloomberg Global High Yield Index, 5% in the Bloomberg Commodity Index, and 5% in the NAREIT Equity REIT Index. Annualized (Ann.) return and volatility (Vol.) represents the period from 12/31/2009 to 12/31/2024. Please see the disclosure page at the end for index definitions. All data represent total return for stated period. Past performance is not indicative of future returns.
 Guide to the Markets - U.S. Data are as of July 31, 2025.



Time, diversification and the volatility of returns

Range of stock, bond and blended total returns

Annual total returns, 1950–2024



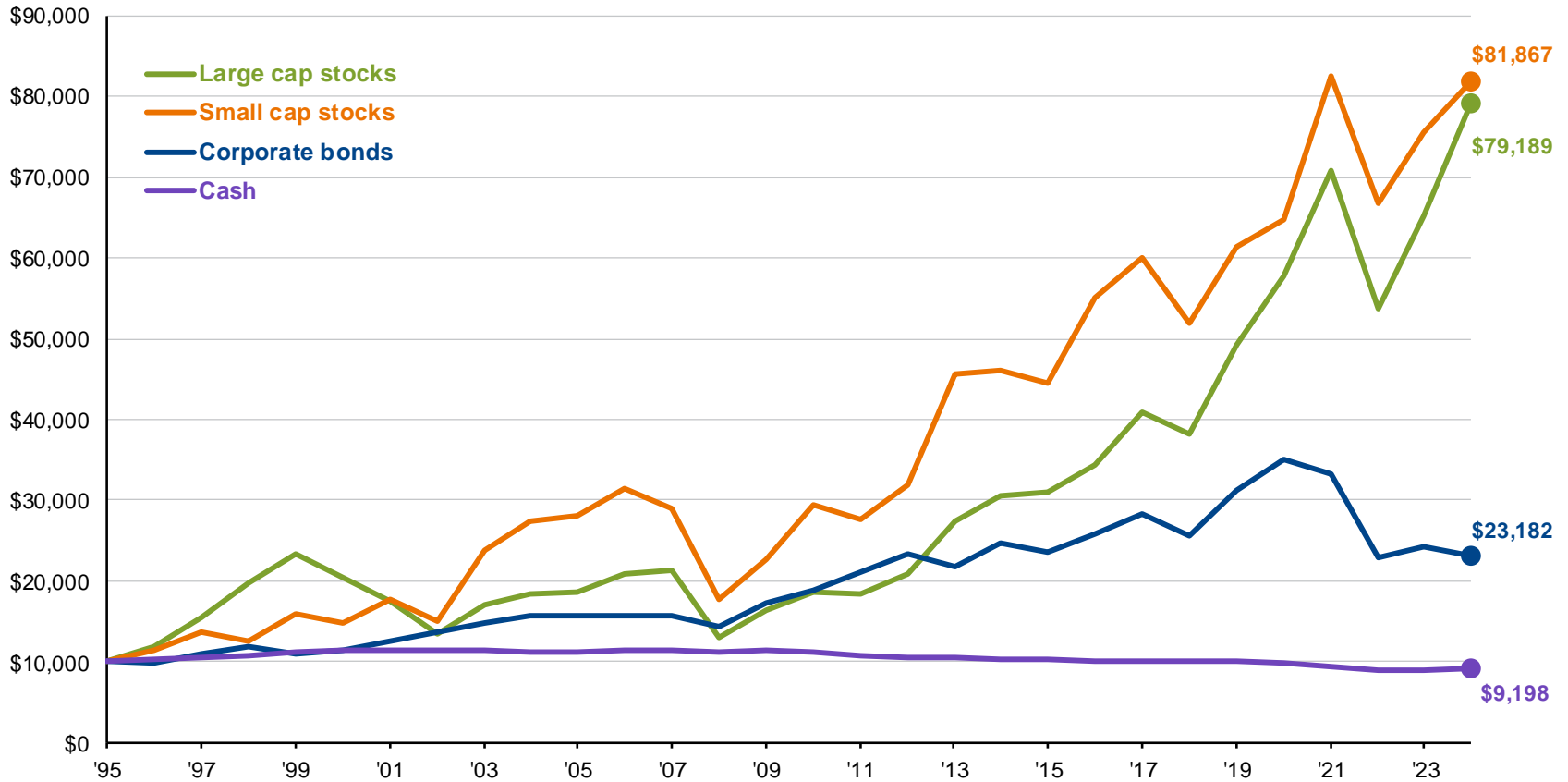
Source: Bloomberg, FactSet, Federal Reserve, Standard & Poor's, Strategas/Ibbotson, J.P. Morgan Asset Management. Returns shown are based on calendar year returns from 1950 to 2024. Stocks: S&P 500; Bonds: Strategas/Ibbotson for periods prior to 1976 and the Bloomberg Aggregate thereafter. Growth of \$100,000 is based on annual average total returns from 1950 to 2024. Guide to the Markets – U.S. Data are as of July 31, 2025.



Risk investing and the power of compounding

Change in purchasing power by investment in major asset class

Growth of \$10,000, adjusted for inflation, from 1994-2024, annual returns



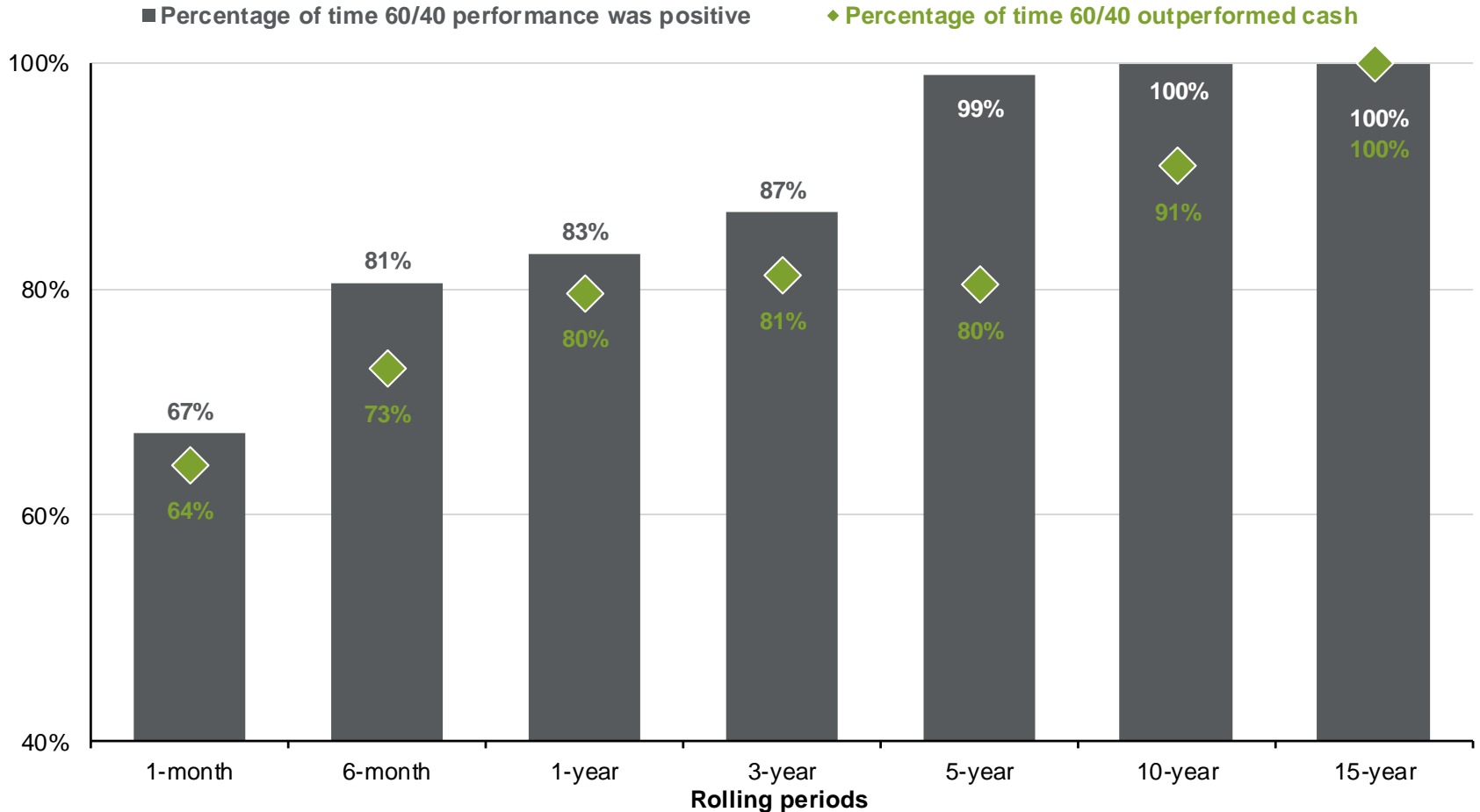
Source: Bloomberg, Bureau of Labor Statistics, Ibbotson, J.P. Morgan Asset Management.
 Large cap stocks: IA SBBT Large Cap TR Index; Small cap stocks: IA SBBT Small Cap TR Index; Corporate bonds: Bloomberg Long U.S. Corporate Index; Cash: IA SBBT T-bill Index. All returns are inflation-adjusted total returns, using annual average headline CPI inflation.
 Guide to the Markets – U.S. Data are as of July 31, 2025.



Cash versus a 60/40 portfolio

Percentage of time 60/40 returns were positive or outperformed cash

Rolling monthly basis, 1995-2024



Source: Bloomberg, FactSet, Standard and Poor's, J.P. Morgan Asset Management.

A 60/40 portfolio is 60% invested in the S&P 500 Total Return Index and 40% invested in the Bloomberg U.S. Aggregate Total Return Index. Cash is the Bloomberg U.S. 30-day Treasury Bill index.

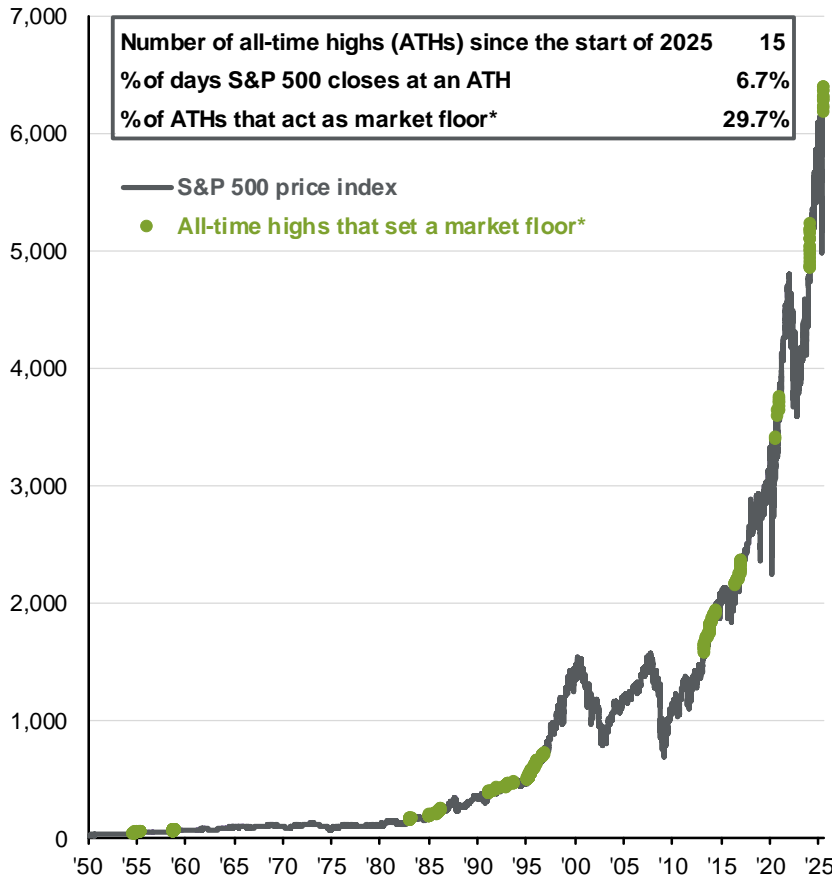
Guide to the Markets – U.S. Data are as of July 31, 2025.



Investing at all-time highs

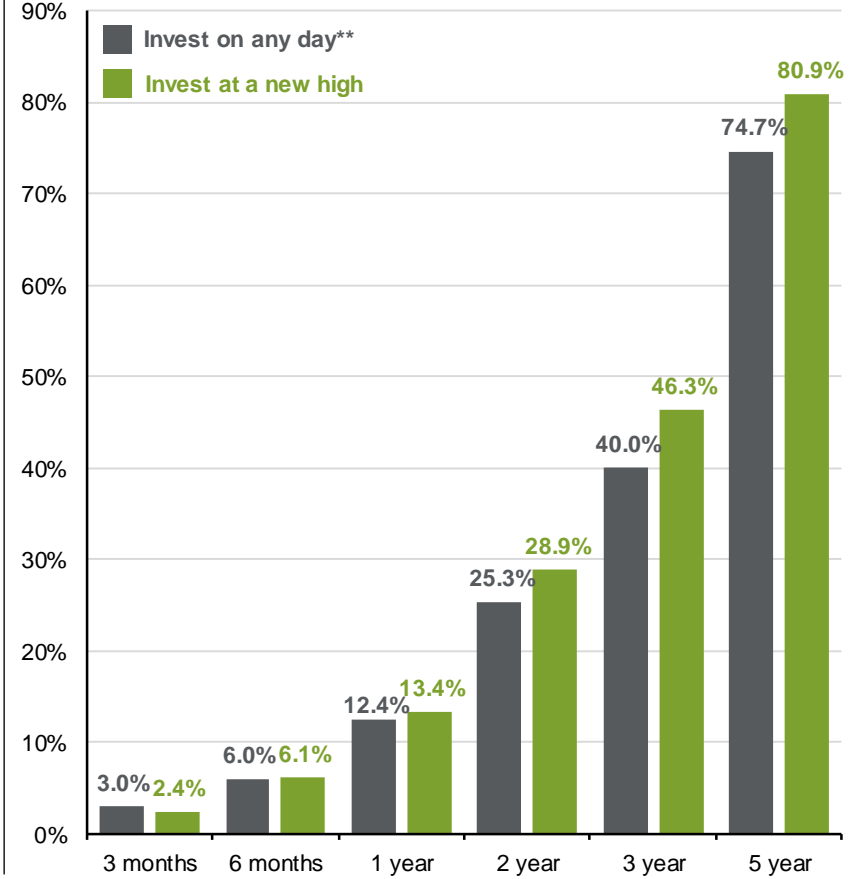
All-time highs and market floors

S&P 500 price index, daily, 1950–today



Average cumulative S&P 500 total returns

Jan. 1, 1988–Dec. 31, 2024



Investing Principles

Source: FactSet, Standard & Poor's, J.P. Morgan Asset Management.

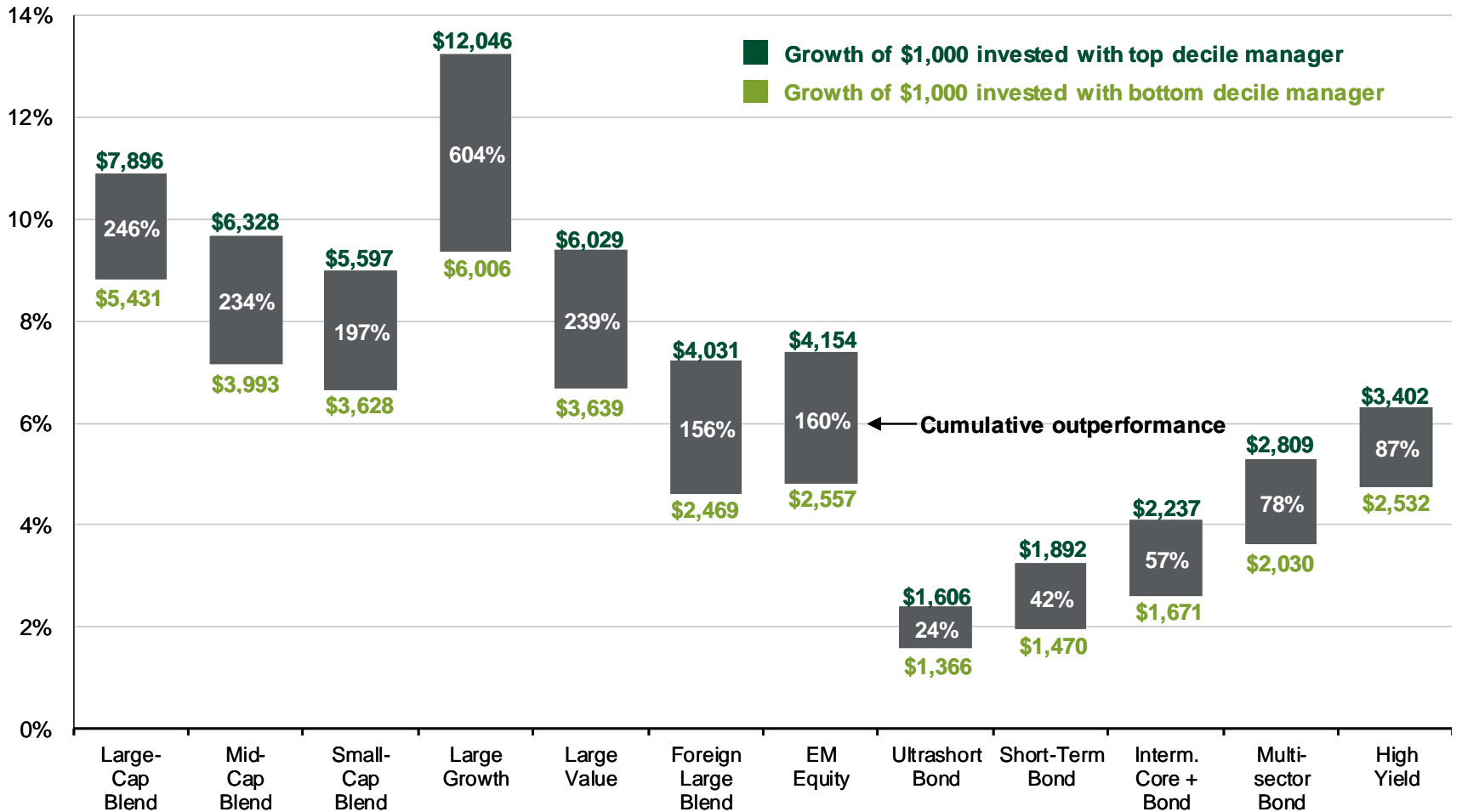
(Left) *Market floor is defined as an all-time high from which the market never fell more than 5%. (Right) ***"Invest on any day" represents average of forward returns for the entire time period whereas "Invest at a new high" represents average of rolling forward returns calculated from each new S&P 500 high for the subsequent 3-month, 6-month, 1-year, 2-year, 3-year and 5-year intervals, with data starting 1/1/1988 through 12/31/2024. Guide to the Markets – U.S. Data are as of July 31, 2025.



Manager dispersion

20-year manager return dispersion and growth of capital

By asset type, annualized total returns, growth of \$1,000 invested 20 years ago*



Source: Morningstar, J.P. Morgan Asset Management.

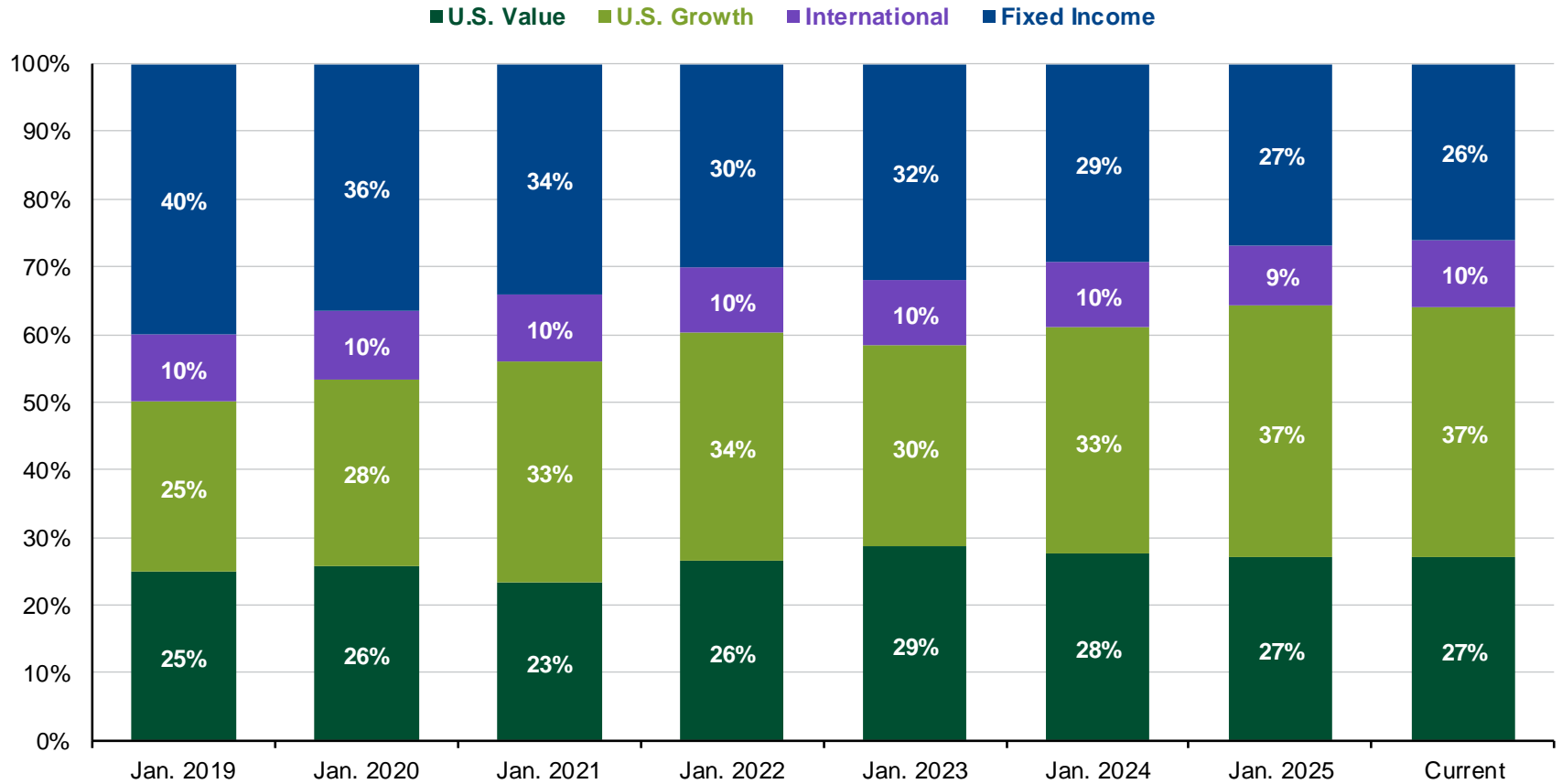
*Represents average annual portfolio return dispersion between the 10th and 90th percentile over a 20-year period for each Morningstar category, including mutual funds and ETFs. Returns are updated monthly and reflect data through 6/30/2025. This information is for illustrative purposes only, does not reflect actual investment results, is not a guarantee of future results and is not a recommendation. Guide to the Markets – U.S. Data are as of July 31, 2025.



60/40 portfolio drift

60/40 portfolio composition by asset class

Start of 2019 to current, no rebalancing



Investing Principles

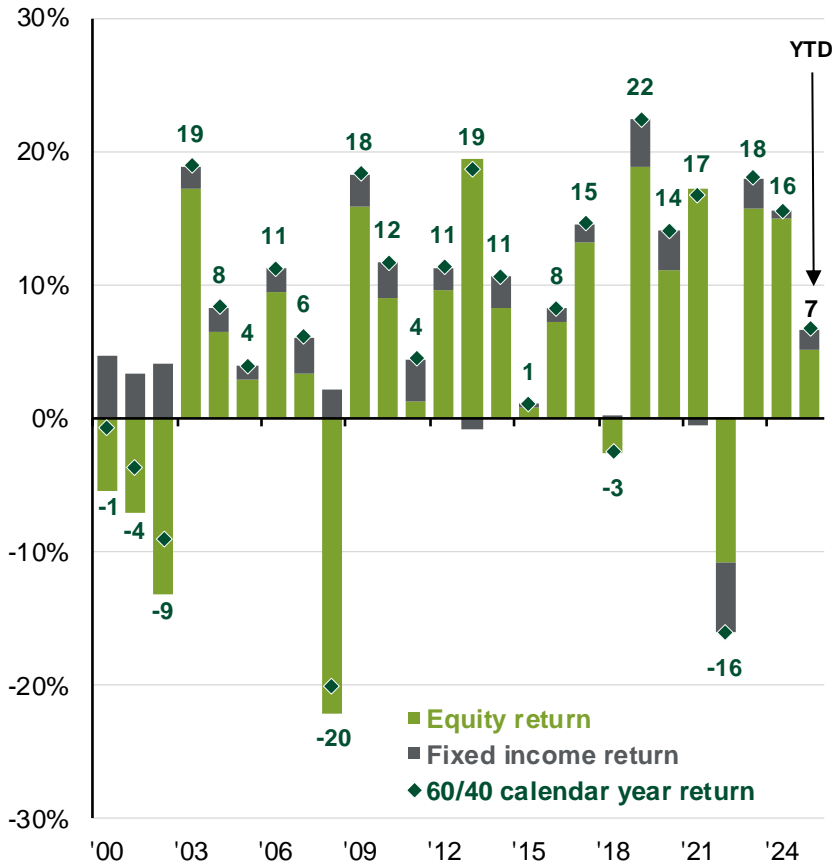
Source: Bloomberg, FactSet, MSCI, Russell, Standard & Poor's, J.P. Morgan Asset Management. Standard asset allocation at the start of 2019 assumes 60% weight to global equities and 40% to U.S. fixed Income. U.S. Value: Equal-weighted Russell 1000 Value and Russell 2000 Value, U.S. Growth: Equal-weighted Russell 1000 Growth and Russell 2000 Growth, International: MSCI ACWI ex-US, Fixed Income: 10% Bloomberg Global HY Index and 30% Bloomberg U.S. Aggregate. Past performance is not indicative of future returns. Guide to the Markets – U.S. Data are as of July 31, 2025.



60/40 returns and stock-bond correlation

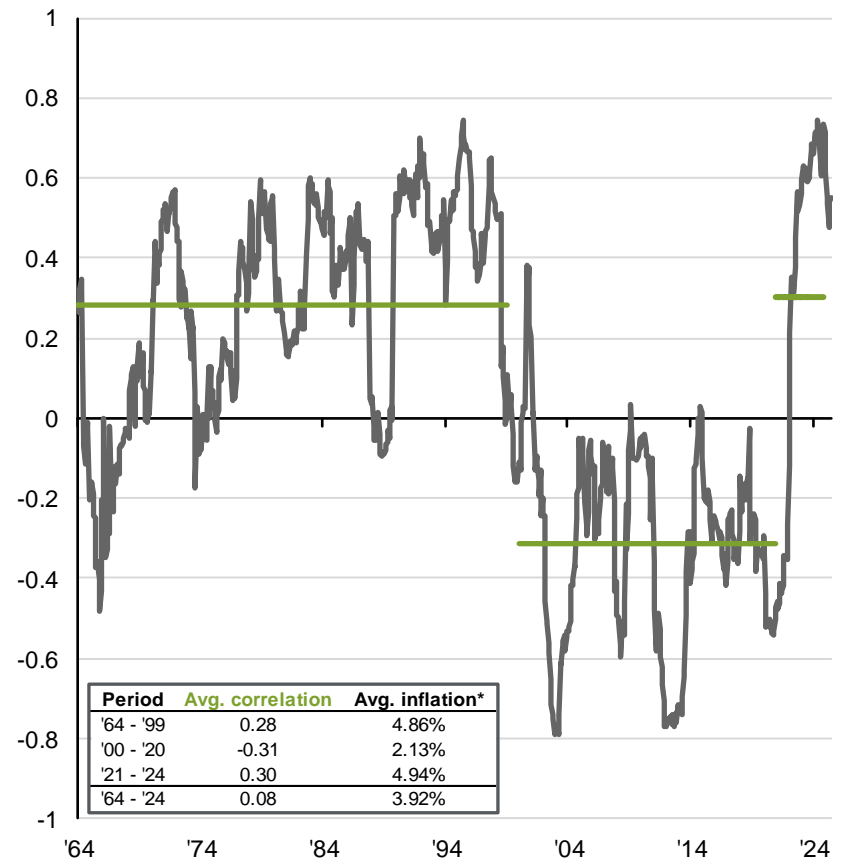
60/40 annual return decomposition

Total return, %



S&P 500 / U.S. 10-year Treasury correlation

Rolling 24-month correlation based on monthly total returns



Source: Bloomberg, FactSet, Haver Analytics, LSEG, Standard & Poor's, J.P. Morgan Asset Management.

(Left) The 60/40 portfolio is 60% invested in the S&P 500 Total Return Index and 40% invested in the Bloomberg U.S. Aggregate Total Return Index.

*Simple average of the year-over-year percent change in headline CPI during each period.

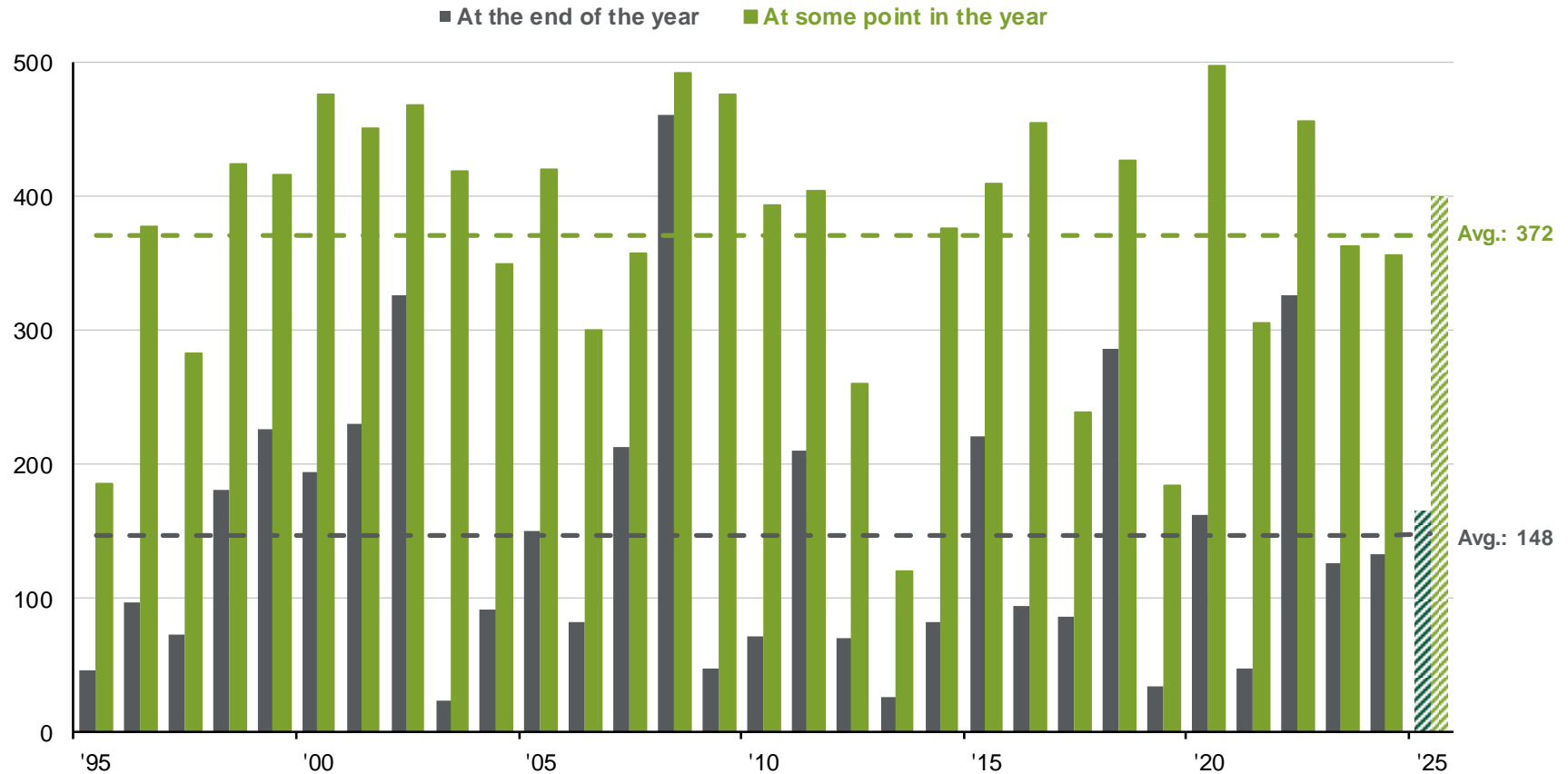
Guide to the Markets – U.S. Data are as of July 31, 2025.



Single-stock volatility and equity market returns

Number of S&P 500 stocks with a drawdown of 5% or more

Despite positive index returns in 22 of 30 years, roughly 75% of stocks experienced a drawdown of 5% or more in any given year



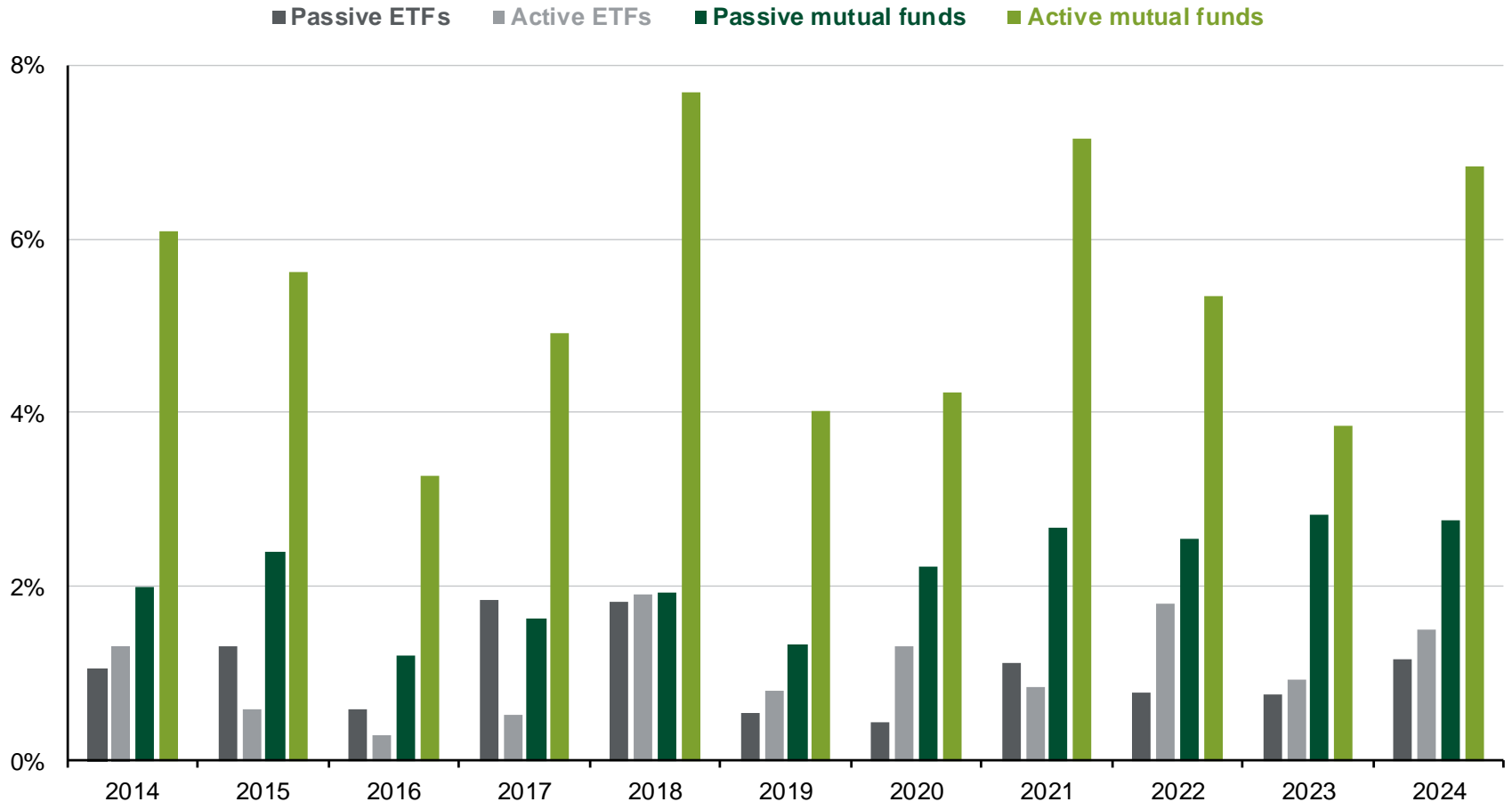
Source: FactSet, Standard & Poor's, J.P. Morgan Asset Management.
A 5% drawdown is calculated from each stock's start-of-year price. If a stock declines by 5% or more at any point during the year, it is counted exactly once – even if it later recovers and declines by 5% again. Data for 2025 are year-to-date as of the latest completed month.
Guide to the Markets – U.S. Data are as of July 31, 2025.



Capital gains by investment vehicle

Capital gains paid by investment vehicle

Weighted capital gains/assets under management



Investing Principles

Source: Morningstar, J.P. Morgan Asset Management.

Capital gains are the taxable profits made when an asset is sold for more than its initial purchase cost. "Weighted" capital gains are the capital gains paid by an investment vehicle divided by its Net Asset Value (NAV). NAV is the per-share value of a fund, calculated by subtracting the fund's liabilities from its total assets and dividing the result by the number of outstanding shares.

This slide comes from our *Guide to ETFs*.

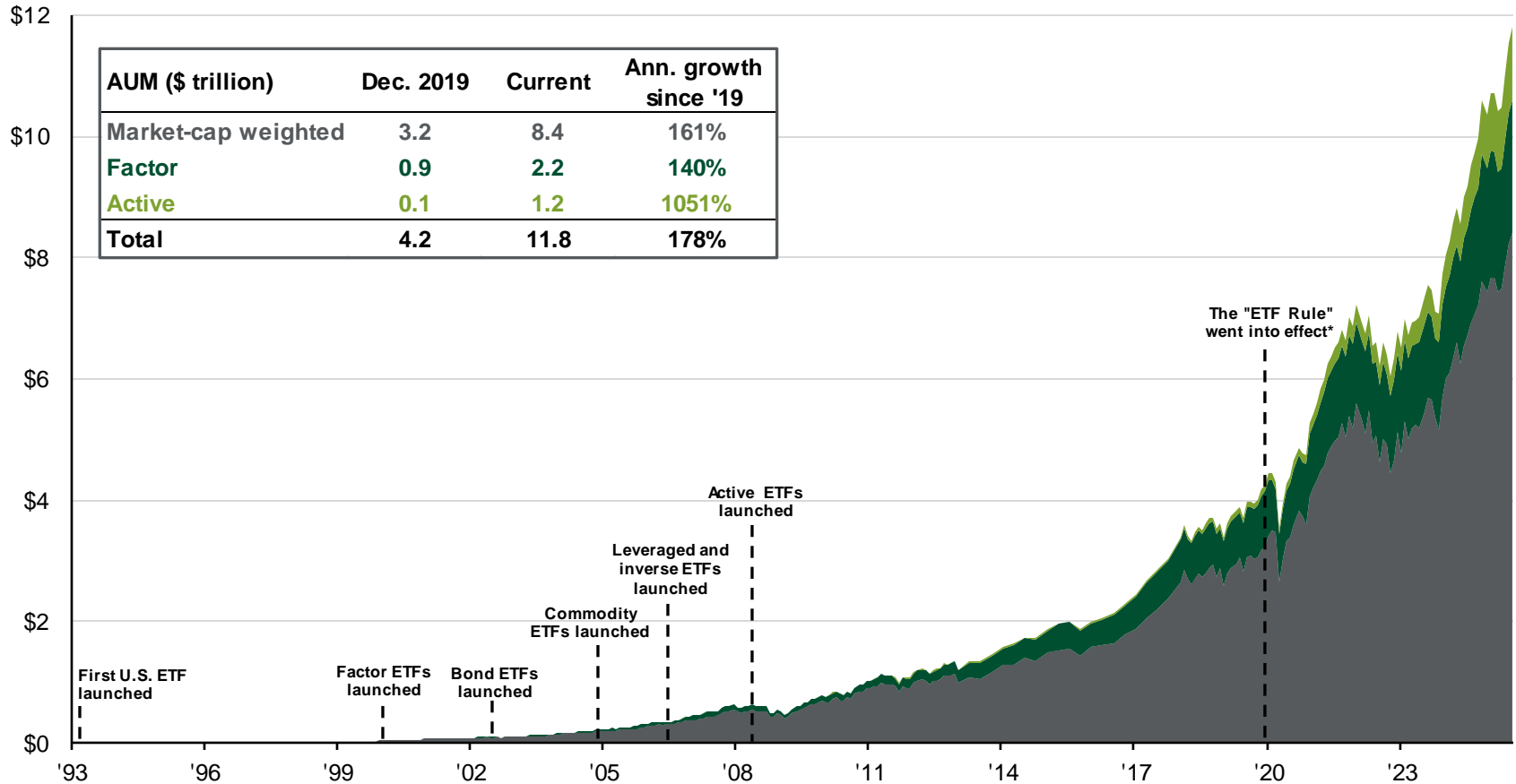
Guide to the Markets – U.S. Data are as of July 31, 2025.



Growth and evolution of the ETF market

Growth in AUM of U.S. ETFs

By ETF investment process, USD trillions



Investing Principles

Source: Bloomberg, J.P. Morgan Asset Management.

“Market-cap weighted” ETFs are index-linked passive investment vehicles. “Factor” ETFs are ETFs that focus on specific factors or characteristics and are passively linked to a custom index. *The “ETF Rule,” officially SEC Rule 6c-11, went into effect in December 2019 and modernized regulation of ETFs as open-ended funds by establishing a clear and consistent framework for most ETFs across both index and actively managed strategies, enabling ETF issuers to bring new strategies to market, and permitting “custom in-kind” creation and redemption baskets to be available for all types of covered ETFs under the new regulation.

This slide comes from our *Guide to ETFs*.

Guide to the Markets – U.S. Data are as of July 31, 2025.



J.P. Morgan Asset Management – Index definitions

GTM

U.S.

69

All indexes are unmanaged and an individual cannot invest directly in an index. Index returns do not include fees or expenses.

Equities:

The **Dow Jones Industrial Average** is a price-weighted average of 30 actively traded blue-chip U.S. stocks.

The **MSCI ACWI (All Country World Index)** is a free float-adjusted market capitalization weighted index that is designed to measure the equity market performance of developed and emerging markets.

The **MSCI EAFE Index (Europe, Australasia, Far East)** is a free float-adjusted market capitalization index that is designed to measure the equity market performance of developed markets, excluding the US & Canada.

The **MSCI Emerging Markets Index** is a free float-adjusted market capitalization index that is designed to measure equity market performance in the global emerging markets.

The **MSCI Europe Index** is a free float-adjusted market capitalization index that is designed to measure developed market equity performance in Europe.

The **MSCI Pacific Index** is a free float-adjusted market capitalization index that is designed to measure equity market performance in the Pacific region.

The **Russell 1000 Index**® measures the performance of the 1,000 largest companies in the Russell 3000.

The **Russell 1000 Growth Index**® measures the performance of those Russell 1000 companies with higher price-to-book ratios and higher forecasted growth values.

The **Russell 1000 Value Index**® measures the performance of those Russell 1000 companies with lower price-to-book ratios and lower forecasted growth values.

The **Russell 2000 Index**® measures the performance of the 2,000 smallest companies in the Russell 3000 Index.

The **Russell 2000 Growth Index**® measures the performance of those Russell 2000 companies with higher price-to-book ratios and higher forecasted growth values.

The **Russell 2000 Value Index**® measures the performance of those Russell 2000 companies with lower price-to-book ratios and lower forecasted growth values.

The **Russell 3000 Index**® measures the performance of the 3,000 largest U.S. companies based on total market capitalization.

The **Russell Midcap Index**® measures the performance of the 800 smallest companies in the Russell 1000 Index.

The **Russell Midcap Growth Index**® measures the performance of those Russell Midcap companies with higher price-to-book ratios and higher forecasted growth values. The stocks are also members of the Russell 1000 Growth index.

The **Russell Midcap Value Index**® measures the performance of those Russell Midcap companies with lower price-to-book ratios and lower forecasted growth values. The stocks are also members of the Russell 1000 Value index.

The **S&P 500 Index** is widely regarded as the best single gauge of the U.S. equities market. The index includes a representative sample of 500 leading companies in leading industries of the U.S. economy. The **S&P 500 Index** focuses on the large-cap segment of the market; however, since it includes a significant portion of the total value of the market, it also represents the market.

Fixed income:

The **Bloomberg 1-3 Month U.S. Treasury Bill Index** includes all publicly issued zero-coupon US Treasury Bills that have a remaining maturity of less than 3 months and more than 1 month, are rated investment grade, and have \$250 million or more of outstanding face value. In addition, the securities must be denominated in U.S. dollars and must be fixed rate and non convertible.

The **Bloomberg Global High Yield Index** is a multi-currency flagship measure of the global high yield debt market. The index represents the union of the US High Yield, the Pan-European High Yield, and Emerging Markets (EM) Hard Currency High Yield Indices. The high yield and emerging markets sub-components are mutually exclusive. Until January 1, 2011, the index also included CMBS high yield securities.

The **Bloomberg Municipal Index**: consists of a broad selection of investment-grade general obligation and revenue bonds of maturities ranging from one year to 30 years. It is an unmanaged index representative of the tax-exempt bond market.

The **Bloomberg US Dollar Floating Rate Note (FRN) Index** provides a measure of the U.S. dollar denominated floating rate note market.

The **Bloomberg US Corporate Investment Grade Index** is an unmanaged index consisting of publicly issued US Corporate and specified foreign debentures and secured notes that are rated investment grade (Baa3/BBB or higher) by at least two ratings agencies, have at least one year to final maturity and have at least \$250 million par amount outstanding. To qualify, bonds must be SEC-registered.

The **Bloomberg US High Yield Index** covers the universe of fixed rate, non-investment grade debt. Eurobonds and debt issues from countries designated as emerging markets (sovereign rating of Baa1/BBB-/BBB+ and below using the middle of Moody's, S&P, and Fitch) are excluded, but Canadian and global bonds (SEC registered) of issuers in non-EMG countries are included.

The **Bloomberg US Mortgage Backed Securities Index** is an unmanaged index that measures the performance of investment grade fixed-rate mortgage backed pass-through securities of GNMA, FNMA and FHLMC.

The **Bloomberg US TIPS Index** consists of Inflation-Protection securities issued by the U.S. Treasury.

The **J.P. Morgan Emerging Market Bond Global Index (EMBI)** includes U.S. dollar denominated Brady bonds, Eurobonds, traded loans and local market debt instruments issued by sovereign and quasi-sovereign entities.

The **J.P. Morgan Domestic High Yield Index** is designed to mirror the investable universe of the U.S. dollar domestic high yield corporate debt market.

The **J.P. Morgan Corporate Emerging Markets Bond Index Broad Diversified (CEMBI Broad Diversified)** is an expansion of the **J.P. Morgan Corporate Emerging Markets Bond Index (CEMBI)**. The CEMBI is a market capitalization weighted index consisting of U.S. dollar denominated emerging market corporate bonds.

The **J.P. Morgan Emerging Markets Bond Index Global Diversified (EMBI Global Diversified)** tracks total returns for U.S. dollar-denominated debt instruments issued by emerging market sovereign and quasi-sovereign entities: Brady bonds, loans, Eurobonds. The index limits the exposure of some of the larger countries.

The **J.P. Morgan GBI EM Global Diversified** tracks the performance of local currency debt issued by emerging market governments, whose debt is accessible by most of the international investor base.

The **U.S. Treasury Index** is a component of the U.S. Government index.



J.P. Morgan Asset Management – Definitions

GTM

U.S.

70

Other asset classes:

The **Alerian MLP Index** is a composite of the 50 most prominent energy Master Limited Partnerships (MLPs) that provides investors with an unbiased, comprehensive benchmark for the asset class.

The **Bloomberg Commodity Index** and related sub-indices are composed of futures contracts on physical commodities and represents twenty two separate commodities traded on U.S. exchanges, with the exception of aluminum, nickel, and zinc

The **Cambridge Associates U.S. Global Buyout and Growth Index®** is based on data compiled from 1,768 global (U.S. & ex-U.S.) buyout and growth equity funds, including fully liquidated partnerships, formed between 1986 and 2013.

The **CS/Tremont Hedge Fund Index** is compiled by Credit Suisse Tremont Index, LLC. It is an asset-weighted hedge fund index and includes only funds, as opposed to separate accounts. The Index uses the Credit Suisse/Tremont database, which tracks over 4500 funds, and consists only of funds with a minimum of US\$50 million under management, a 12-month track record, and audited financial statements. It is calculated and rebalanced on a monthly basis, and shown net of all performance fees and expenses. It is the exclusive property of Credit Suisse Tremont Index, LLC.

The **HFRI Monthly Indices (HFRI)** are equally weighted performance indexes, utilized by numerous hedge fund managers as a benchmark for their own hedge funds. The HFRI are broken down into 4 main strategies, each with multiple sub strategies. All single-manager HFRI Index constituents are included in the HFRI Fund Weighted Composite, which accounts for over 2200 funds listed on the internal HFR Database.

The **NAREIT EQUITY REIT Index** is designed to provide the most comprehensive assessment of overall industry performance, and includes all tax-qualified real estate investment trusts (REITs) that are listed on the NYSE, the American Stock Exchange or the NASDAQ National Market List.

The **NFI-ODCE**, short for NCREIF Fund Index -Open End Diversified Core Equity, is an index of investment returns reporting on both a historical and current basis the results of 33 open-end commingled funds pursuing a core investment strategy, some of which have performance histories dating back to the 1970s. The NFI-ODCE Index is capitalization-weighted and is reported gross of fees. Measurement is time-weighted.

Definitions:

Investing in **alternative assets** involves higher risks than traditional investments and is suitable only for sophisticated investors. Alternative investments involve greater risks than traditional investments and should not be deemed a complete investment program. They are not tax efficient and an investor should consult with his/her tax advisor prior to investing. Alternative investments have higher fees than traditional investments and they may also be highly leveraged and engage in speculative investment techniques, which can magnify the potential for investment loss or gain. The value of the investment may fall as well as rise and investors may get back less than they invested.

Bonds are subject to interest rate risks. Bond prices generally fall when interest rates rise.

Investments in **commodities** may have greater volatility than investments in traditional securities, particularly if the instruments involve leverage. The value of commodity-linked derivative instruments may be affected by changes in overall market movements, commodity index volatility, changes in interest rates, or factors affecting a particular industry or commodity, such as drought, floods, weather, livestock disease, embargoes, tariffs and international economic, political and regulatory developments. Use of leveraged commodity-linked derivatives creates an opportunity for increased return but, at the same time, creates the possibility for greater loss.

Derivatives may be riskier than other types of investments because they may be more sensitive to changes in economic or market conditions than other types of investments and could result in losses that significantly exceed the original investment. The use of derivatives may not be successful, resulting in investment losses, and the cost of such strategies may reduce investment returns.

Distressed Restructuring Strategies employ an investment process focused on corporate fixed income instruments, primarily on corporate credit instruments of companies trading at significant discounts to their value at issuance or obliged (par value) at maturity as a result of either formal bankruptcy proceeding or financial market perception of near term proceedings.

Investments in **emerging markets** can be more volatile. The normal risks of investing in foreign countries are heightened when investing in emerging markets. In addition, the small size of securities markets and the low trading volume may lead to a lack of liquidity, which leads to increased volatility. Also, emerging markets may not provide adequate legal protection for private or foreign investment or private property.

The price of **equity securities** may rise, or fall because of changes in the broad market or changes in a company's financial condition, sometimes rapidly or unpredictably. These price movements may result from factors affecting individual companies, sectors or industries, or the securities market as a whole, such as changes in economic or political conditions. Equity securities are subject to "stock market risk" meaning that stock prices in general may decline over short or extended periods of time.

Equity market neutral strategies employ sophisticated quantitative techniques of analyzing price data to ascertain information about future price movement and relationships between securities, select securities for purchase and sale. Equity Market Neutral Strategies typically maintain characteristic net equity market exposure no greater than 10% long or short.

Global macro strategies trade a broad range of strategies in which the investment process is predicated on movements in underlying economic variables and the impact these have on equity, fixed income, hard currency and commodity markets.

International investing involves a greater degree of risk and increased volatility. Changes in currency exchange rates and differences in accounting and taxation policies outside the U.S. can raise or lower returns. Some overseas markets may not be as politically and economically stable as the United States and other nations.

There is no guarantee that the use of **long and short positions** will succeed in limiting an investor's exposure to domestic stock market movements, capitalization, sector swings or other risk factors. Using long and short selling strategies may have higher portfolio turnover rates. Short selling involves certain risks, including additional costs associated with covering short positions and a possibility of unlimited loss on certain short sale positions.

Merger arbitrage strategies which employ an investment process primarily focused on opportunities in equity and equity related instruments of companies which are currently engaged in a corporate transaction.

Mid-capitalization investing typically carries more risk than investing in well-established "blue-chip" companies. Historically, mid-cap companies' stock has experienced a greater degree of market volatility than the average stock.

Price to forward earnings is a measure of the price-to-earnings ratio (P/E) using forecasted earnings. **Price to book value** compares a stock's market value to its book value. **Price to cash flow** is a measure of the market's expectations of a firm's future financial health. **Price to dividends** is the ratio of the price of a share on a stock exchange to the dividends per share paid in the previous year, used as a measure of a company's potential as an investment.

Real estate investments may be subject to a higher degree of market risk because of concentration in a specific industry, sector or geographical sector. Real estate investments may be subject to risks including, but not limited to, declines in the value of real estate, risks related to general and economic conditions, changes in the value of the underlying property owned by the trust and defaults by borrower.

Relative Value Strategies maintain positions in which the investment thesis is predicated on realization of a valuation discrepancy in the relationship between multiple securities.

Small-capitalization investing typically carries more risk than investing in well-established "blue-chip" companies since smaller companies generally have a higher risk of failure. Historically, smaller companies' stock has experienced a greater degree of market volatility than the average stock.



J.P. Morgan Asset Management – Risks & disclosures

GTM

U.S.

71

The Market Insights program provides comprehensive data and commentary on global markets without reference to products. Designed as a tool to help clients understand the markets and support investment decision-making, the program explores the implications of current economic data and changing market conditions.

For the purposes of MiFID II, the JPM Market Insights and Portfolio Insights programs are marketing communications and are not in scope for any MiFID II / MiFIR requirements specifically related to investment research. Furthermore, the J.P. Morgan Asset Management Market Insights and Portfolio Insights programs, as non-independent research, have not been prepared in accordance with legal requirements designed to promote the independence of investment research, nor are they subject to any prohibition on dealing ahead of the dissemination of investment research.

This document is a general communication being provided for informational purposes only. It is educational in nature and not designed to be taken as advice or a recommendation for any specific investment product, strategy, plan feature or other purpose in any jurisdiction, nor is it a commitment from J.P. Morgan Asset Management or any of its subsidiaries to participate in any of the transactions mentioned herein. Any examples used are generic, hypothetical and for illustration purposes only. This material does not contain sufficient information to support an investment decision and it should not be relied upon by you in evaluating the merits of investing in any securities or products. In addition, users should make an independent assessment of the legal, regulatory, tax, credit, and accounting implications and determine, together with their own financial professional, if any investment mentioned herein is believed to be appropriate to their personal goals. Investors should ensure that they obtain all available relevant information before making any investment. Any forecasts, figures, opinions or investment techniques and strategies set out are for information purposes only, based on certain assumptions and current market conditions and are subject to change without prior notice. All information presented herein is considered to be accurate at the time of production, but no warranty of accuracy is given and no liability in respect of any error or omission is accepted. It should be noted that investment involves risks, the value of investments and the income from them may fluctuate in accordance with market conditions and taxation agreements and investors may not get back the full amount invested. Both past performance and yields are not reliable indicators of current and future results.

J.P. Morgan Asset Management is the brand for the asset management business of JPMorgan Chase & Co. and its affiliates worldwide.

To the extent permitted by applicable law, we may record telephone calls and monitor electronic communications to comply with our legal and regulatory obligations and internal policies. Personal data will be collected, stored and processed by J.P. Morgan Asset Management in accordance with our privacy policies at <https://am.jpmorgan.com/global/privacy>.

This communication is issued by the following entities:

In the United States, by J.P. Morgan Investment Management Inc. or J.P. Morgan Alternative Asset Management, Inc., both regulated by the Securities and Exchange Commission; in Latin America, for intended recipients' use only, by local J.P. Morgan entities, as the case may be. In Canada, for institutional clients' use only, by JPMorgan Asset Management (Canada) Inc., which is a registered Portfolio Manager and Exempt Market Dealer in all Canadian provinces and territories except the Yukon and is also registered as an Investment Fund Manager in British Columbia, Ontario, Quebec and Newfoundland and Labrador. In the United Kingdom, by JPMorgan Asset Management (UK) Limited, which is authorized and regulated by the Financial Conduct Authority; in other European jurisdictions, by JPMorgan Asset Management (Europe) S.à.r.l. In Asia Pacific ("APAC"), by the following issuing entities and in the respective jurisdictions in which they are primarily regulated: JPMorgan Asset Management (Asia Pacific) Limited, or JPMorgan Funds (Asia) Limited, or JPMorgan Asset Management Real Assets (Asia) Limited, each of which is regulated by the Securities and Futures Commission of Hong Kong; JPMorgan Asset Management (Singapore) Limited (Co. Reg. No. 197601586K), this advertisement or publication has not been reviewed by the Monetary Authority of Singapore; JPMorgan Asset Management (Taiwan) Limited; JPMorgan Asset Management (Japan) Limited, which is a member of the Investment Trusts Association, Japan, the Japan Investment Advisers Association, Type II Financial Instruments Firms Association and the Japan Securities Dealers Association and is regulated by the Financial Services Agency (registration number "Kanto Local Finance Bureau (Financial Instruments Firm) No. 330"); in Australia, to wholesale clients only as defined in section 761A and 761G of the Corporations Act 2001 (Commonwealth), by JPMorgan Asset Management (Australia) Limited (ABN 55143832080) (AFSL 376919). For all other markets in APAC, to intended recipients only.

For U.S. only: If you are a person with a disability and need additional support in viewing the material, please call us at 1-800-343-1113 for assistance.

Copyright 2025 JPMorgan Chase & Co. All rights reserved

Prepared by: David P. Kelly, Jordan K. Jackson, John C. Manley, Meera Pandit, Gabriela D. Santos, Aaron Mulvihill, Stephanie Aliaga, Sahil Gauba, Mary Park Durham, Brandon Hall, Katie Korngiebel and Grant Papa.

Unless otherwise stated, all data are as of July 31, 2025 or most recently available.

Guide to the Markets – U.S.

JP-LITTLEBOOK | a52b56c0-f77b-11e6-b437-005056960c63