Market Snapshot Tales, Tells, and Tails

Market Strategy | Strategic Advisory Solutions

January 2025

Macro

Tales, Tells, and Tails

Economic Growth

- In absolute terms, economic data continues to be solid.
- Lack of systemic financial imbalances.

Inflation

- The last leg of inflation reduction is proving slow and may be potentially delayed by looming tariff policy.

Labor

- The previously tight US labor market has largely rebalanced with most of the realignment happening via a reduction in job openings rather than job losses.
- The next wave of labor market shifts will prove critical to policy makers.

Monetary Policy

- We expect the Fed to cut rates to 3.50-3.75% by June of 2026. While the path will be data dependent, it would appear clear that current rates are restrictive, but tariffs may flatten the Fed's reaction function.

General Policy

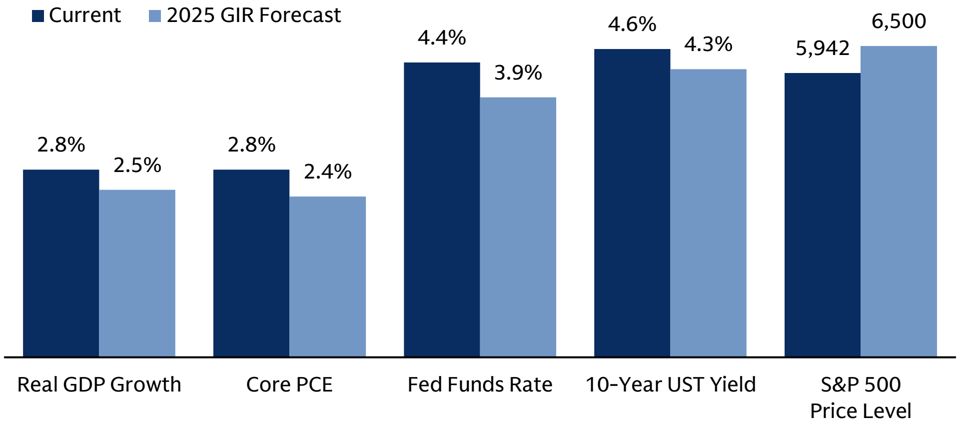
- Given limited, albeit, unified GOP control, we expect front-loaded policy efforts in areas of trade, immigration, taxes, and regulation.
- Markets have heightened awareness towards the deteriorating US public debt profile.

Bottom Line

- Late-cycle conditions are likely to persist. While many investors may hope for a reduction in macro complexity, this is likely to be the new normal. We would emphasize sticking to the plan.

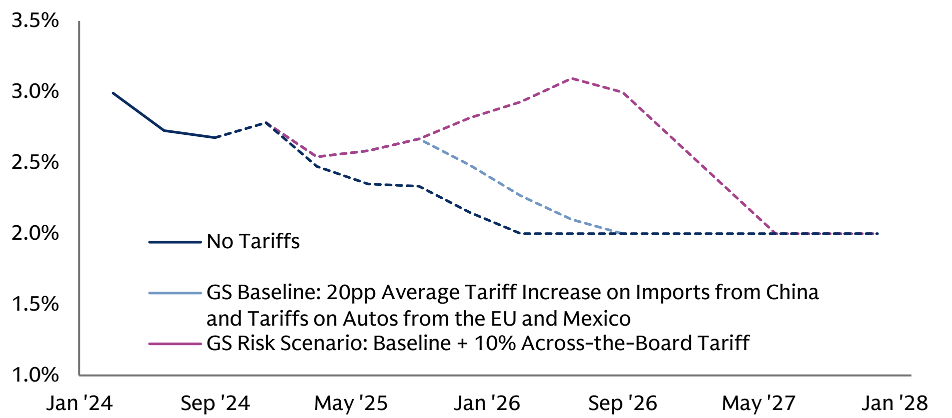
All Eyes On 2025

Percent (%)



Inflation Scenarios Under Tariffs

Core PCE Inflation (% change, year-over-year)



Sources: Federal Reserve Economic Data, Goldman Sachs Global Investment Research and Goldman Sachs Asset Management. Top Chart Notes: As of January 13, 2025. Bottom Chart Notes: As of December 31, 2024. Chart shows potential inflation outcomes under different tariff scenarios. The economic and market forecasts presented herein are for informational purposes as of the date of this presentation. There can be no assurance that the forecasts will be achieved. **Past performance does not guarantee future results, which may vary.**

Global Growth Forecasts

Moving towards trend growth globally

Real GDP Growth

Percent Change YoY	2024	2025 (f) GS	2025 (f) Cons	2026 (f) GS	2026 (f) Cons	Potential GS
US	2.8	2.5	2.1	2.3	2.0	2.3
Euro Area	0.8	0.8	1.0	1.0	1.2	1.4
Japan	-0.2	1.2	1.2	1.1	0.9	0.9
UK	0.8	1.0	1.4	1.3	1.5	1.7
China	4.9	4.5	4.5	4.0	4.2	3.0
Developed Markets	**1.8**	**1.8**	**1.7**	**1.8**	**1.7**	**2.0**
Emerging Markets	**3.9**	**3.9**	**3.9**	**3.8**	**3.9**	**3.6**
World	**2.7**	**2.7**	**2.6**	**2.6**	**2.6**	**2.7**

Our views

- **Globally**, we see limited recession risk and inflation progress slowing.
- The **US** macro backdrop remains stable, though policy measures will be moving to the forefront.
- While not entering a recession, the **Euro area** will likely be on the softer side of growth as it finds itself at the intersection of US policy and geopolitical uncertainty.
- **UK** growth will likely be stable and front-end loaded with some spillovers from Euro area growth and US policy entering the mix.
- We maintain our long-standing optimism about **post-pandemic normalization** with labor markets rebalancing and inflation trending lower, within striking distance of central bank targets.

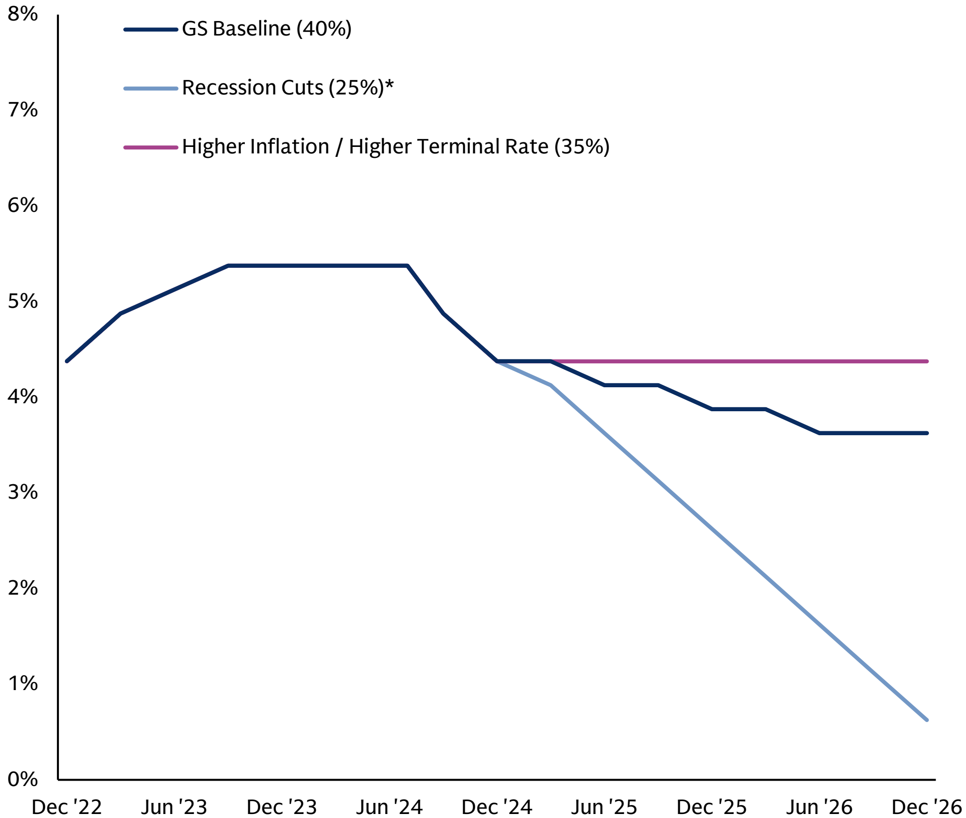
Source: Bloomberg, Goldman Sachs Global Investment Research, and Goldman Sachs Asset Management. As of January 6, 2024. “GDP” refers to gross domestic product. “f” refers to forecast. “Cons.” refers to consensus expectations. “YoY” refers to year over year. Some forecasts may be shaded to highlight data points. “Potential” refers to the GS long-run estimate for full-year 2034 GDP growth. All forecasts refer to Goldman Sachs Global Investment Research. “Our views” refers to Strategic Advisory Solutions, Goldman Sachs Asset Management. The economic and market forecasts presented herein are for informational purposes as of the date of this presentation. There can be no assurance that the forecasts will be achieved. **Past performance does not guarantee future results, which may vary.**

Monetary Policy

Despite tariff unknowns we expect the Fed to further normalize rates and labor data to remain a focus

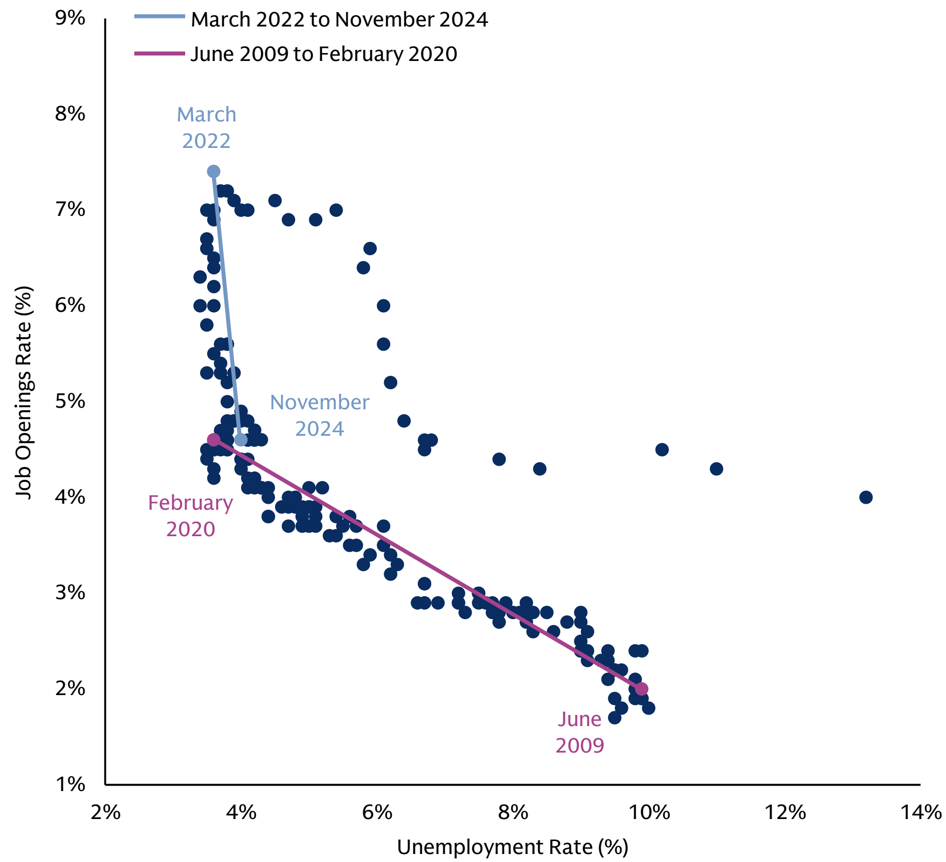
Potential Policy Rate Path

Forecasted Fed Funds Rate Scenario Analysis (%)



The Pain-Free Labor Adjustments Are Over

Unemployment and Job Openings Rates (June 2009 - September 2024, %)



Left Chart Source: Goldman Sachs Global Investment Research and Goldman Sachs Asset Management. As of January 13, 2024. *The recession scenario shows unrealistically slow cuts to capture many sub-scenarios of recessions starting at various points in time. The recession scenarios reflect a subjective recession probability of 15% over the next 12 months and continued elevated risks thereafter. "Terminal rate" refers to the peak spot where the benchmark interest rate will come to rest before the central bank begins trimming it back. Right Chart Source: St. Louis Federal Reserve. As of November 31, 2024. Chart shows the unemployment rate and job openings rate from June 2009 through September 2024. Each plot reflects the unemployment rate (x-axis) and job openings rate (y-axis) for each month of data.
Past performance does not guarantee future results, which may vary.

General Policy Outlook

US Politics

Post-inauguration policy will be focused on protectionism, border security, tax provisions, and oversight

Trade

Base Case: The new US administration enacts a 20pp average increase in the effective tariff rate on China, increased tariffs on autos from the EU and Mexico, and a 3.4pp increase in the effective tariff rate.

Risk Case: New US administration increases effective tariff rate by 10pp on all imports, while potentially revoking Permanent Normal Trade Relations with China (requires legislative action).

Immigration

Base Case: Net immigration slows to 750k/year on the back of increased funding and tighter law enforcement.

Risk Case: Selective deportation of immigrants with criminal records and/or forced deportations of up to 2.1mm individuals.

Fiscal

Base Case: Republicans leverage red honeymoon to enact:

1. Full extension of expiring Trump tax cuts in early 2025
2. Expand SALT deduction
3. Exclude select taxes from overtime and tips
4. Lower corporate tax for domestic manufacturers to 15%
5. Reinstate more generous corporate incentives
6. Allow enhanced ACA subsidies to expire
7. Set limitations on green subsidies

Regulation

Base Case: Republicans focus on three key areas:

1. Antitrust: Enforcement eases slightly with scrutiny around tech sector likely continuing
2. Energy: Easier approval for new energy projects, growing LNG exports, and removing restrictions on greenhouse gas emission
3. Financial: Near-term easing of regulatory burden on consumer finance firms alongside medium-term easing of capital and liquidity requirements

Source: Goldman Sachs Global Investment Research and Goldman Sachs Asset Management. "LNG" refers to Liquefied Natural Gas. As of December 31, 2024. For illustrative purposes only.

Equity Views

Equities

US equities will likely be resilient, but select opportunities exist across and within the asset class

US Equity

- GIR's YE 2025 S&P 500 target is 6500, informed by a solid macro backdrop and earnings momentum.
- More moderate long-term views are governed by high current valuation and market concentration. While we expect market leadership to broaden across and down capitalization, the Mag 7 can continue to outperform.

International DM

- International equities may offer attractive opportunities for exposure to value, cyclicality, and yield at a cheaper price, though selectivity will matter.

EM

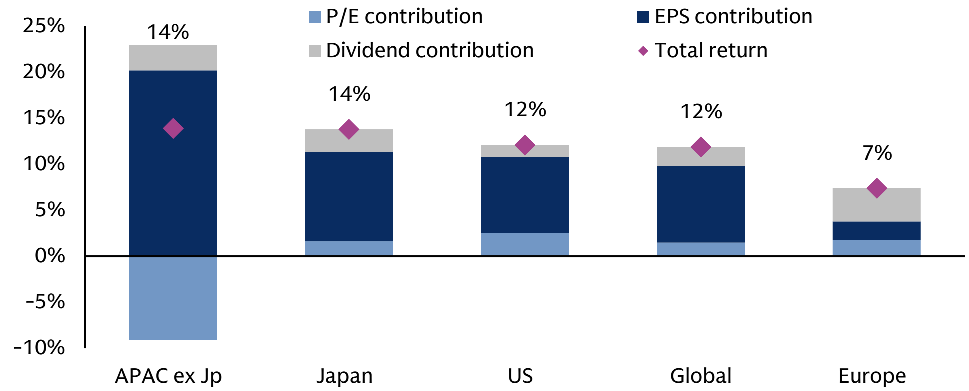
- Shifts in US fiscal and trade policy could drive weakness in EM growth, while higher-for-longer US rates may create a challenging mix for EM. China continues to face 3D challenges (debt, demographics, and de-risking), alongside likely tariff headwinds.
- EM equities with strong domestic micro fundamentals, insulation from US protectionist policy risks, and local policy support are best placed to outperform.

Private Equity

- A stabilizing macro backdrop and a recalibration of investor expectations may act as catalyst for a more normalized deal-making environment in 2025, positioning the industry better for both exits and new capital deployment.

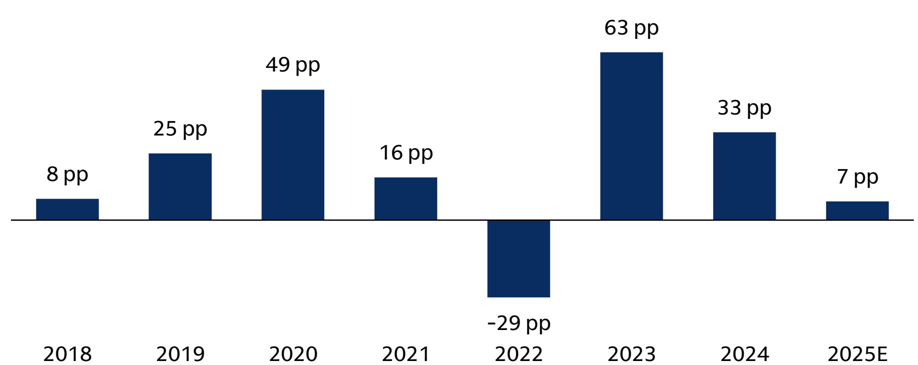
Likely Key Driver of Equity Returns in 2025: Earnings

2025 Equity Market Total Return Breakdown (%)



Closing The Gap

Relative Return of Mag 7 vs S&P 493 (pp)



Top Chart Source: Goldman Sachs Global Investment Research and Goldman Sachs Asset Management. As of January 3, 2025. Chart shows 12-mo total return forecasts. Figures are in local currency. Bottom Chart Source: Goldman Sachs Global Investment Research and Goldman Sachs Asset Management. As of December 31, 2024. "We" refers to Goldman Sachs Asset Management. The economic and market forecasts presented herein are for informational purposes as of the date of this presentation. There can be no assurance that the forecasts will be achieved. **Past performance does not predict future returns and does not guarantee future results, which may vary.** For illustrative purposes only. Please see additional disclosures at the end of this presentation.

S&P 500 Core Views

Equities

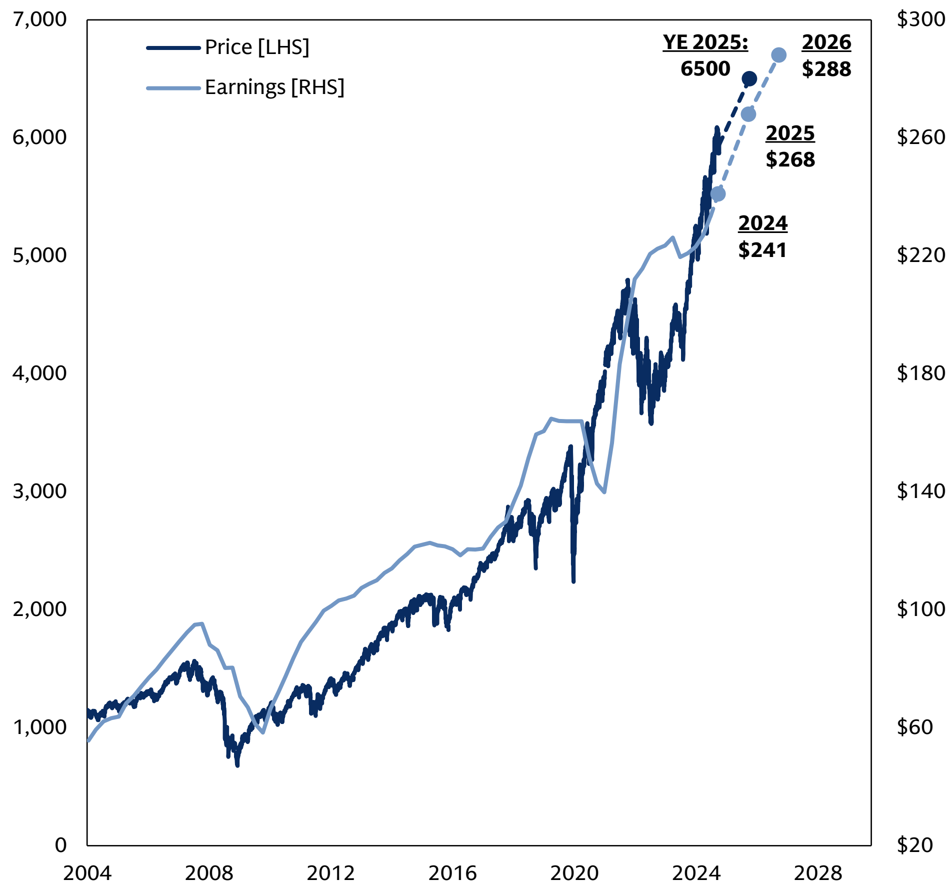
Our S&P 500 2025 year-end target is 6500 given strong macro, though we are priced for perfection

More of the Same:

- Resilient Macro (15% Recession Probability)
- Normalization Fed Cutting Cycle
- Strong Earnings (2025: $268)
- Favorable Seasonals (Nov/Dec +7% Post-Election)
- Share Buybacks ($1 Trillion)
- Absence of Financial Bubbles

Bear Market Bottom	Number of Years of Following Bull Market
May 1970	2.6
October 1974	6.2
August 1982	5.0
December 1987	12.3
October 2002	5.0
March 2009	11.0
March 2020	1.8
October 2022	**2.3**

S&P 500 Price and Earnings Targets



Source: Goldman Sachs Global Investment Research, and Goldman Sachs Asset Management. As of January 3, 2024. "Our" and "we" refers to GS Global Investment Research and Goldman Sachs Asset Management. "Bear market" refers to a period when a market experiences prolonged price declines. "Bull market" refers to a period when a market experiences prolonged price inclines. "P/E" refers to Price-to-Earnings ratio. "Fed" refers to Federal Reserve. For illustrative purposes only. The economic and market forecasts presented herein are informational purposes as of the date of this presentation. There can be no assurance that the forecasts will be achieved. **Past performance does not predict future returns and does not guarantee future results, which may vary.**

Fixed Income Views

Fixed Income

With attractive current yields and further rate cuts likely ahead, opportunity exists in fixed income

Rates

- Moderating growth and decelerating inflation may be supportive of bonds across the curve.
- That said, US policy including mounting fiscal pressures may limit the rally on the long end.
- We expect interest rate curves to steepen gradually.

Credit

- The outlook is generally stable, though there is limited scope for further spread tightening.
- Corporate liquidity buffers appear resilient, and strong starting balance sheets may prevent meaningful credit deterioration.
- Ultimately, a combination of deteriorating fundamentals and weakening technicals is needed to catalyze a valuation reset. Neither scenario is in our baseline case for 2025.

Policy Rate Cuts

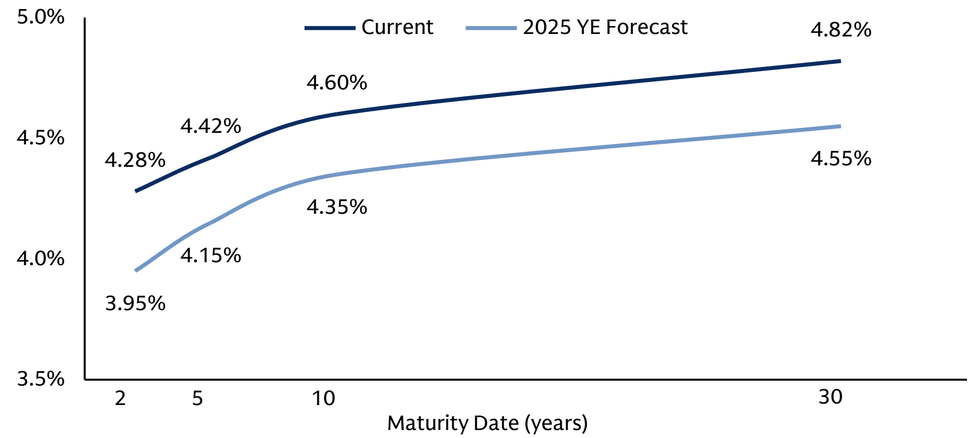
- We think a steepening bias is the right one for a world where the Fed is more focused on growth than inflation risks.
- We expect cuts from all G10 central banks except the BoJ in 2025.

Municipal Bonds

- Being mindful of tax legislation, munis may still benefit from attractive relative yields, stable credit, and investor demand for duration.

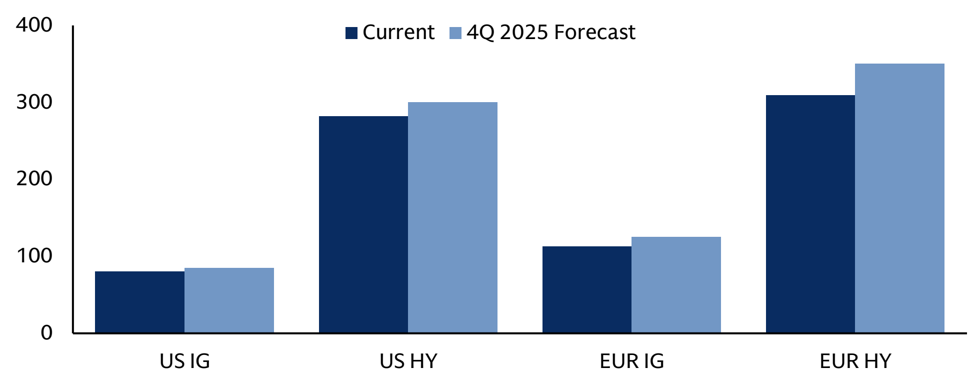
Slow and Steady Re-Steepening

US Treasuries Yield-to-Worst (%)



Credit Standstill

Credit Spread (bps)



Charts Source: Goldman Sachs Global Investment Research and Goldman Sachs Asset Management. As of January 3, 2025, or latest available. For illustrative purposes only. “We” refers to Goldman Sachs Asset Management. The economic and market forecasts presented herein are for informational purposes as of the date of this presentation. There can be no assurance that the forecasts will be achieved. Goldman Sachs does not provide accounting, tax or legal advice. **Past performance does not predict future returns and does not guarantee future results, which may vary.** Please see additional disclosures at the end of this presentation.

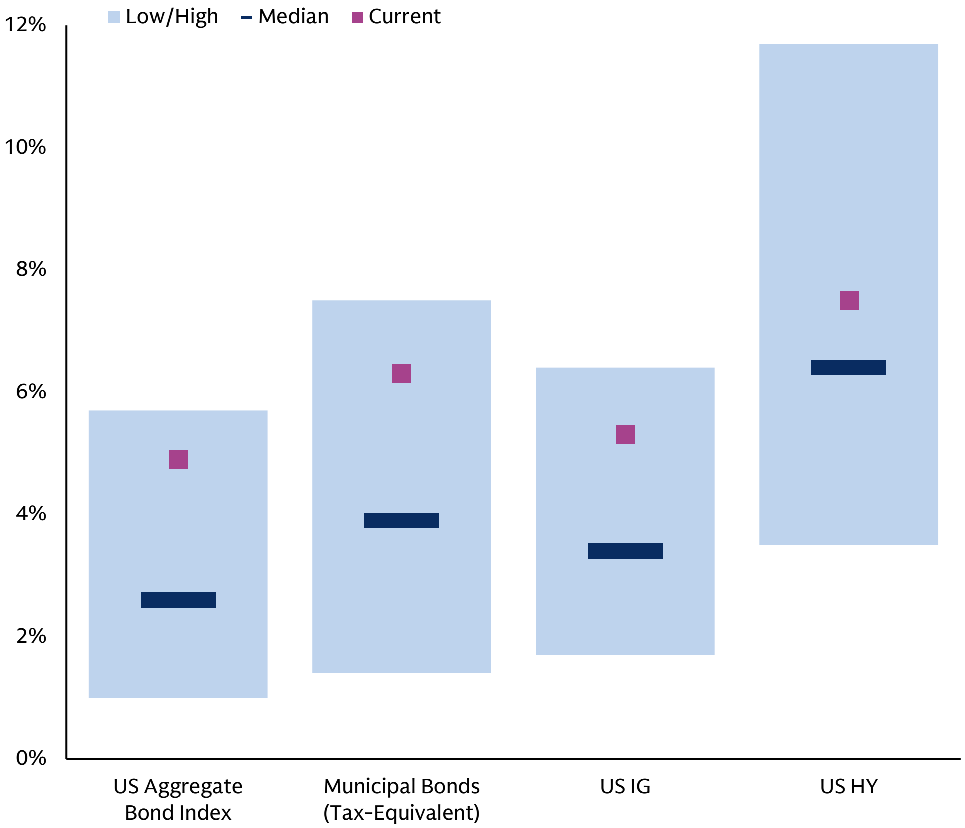
Yield is Only One Part of the Equation

Fixed Income

Core bonds offer attractive features today and may be relied on over correctly predicting rate cuts

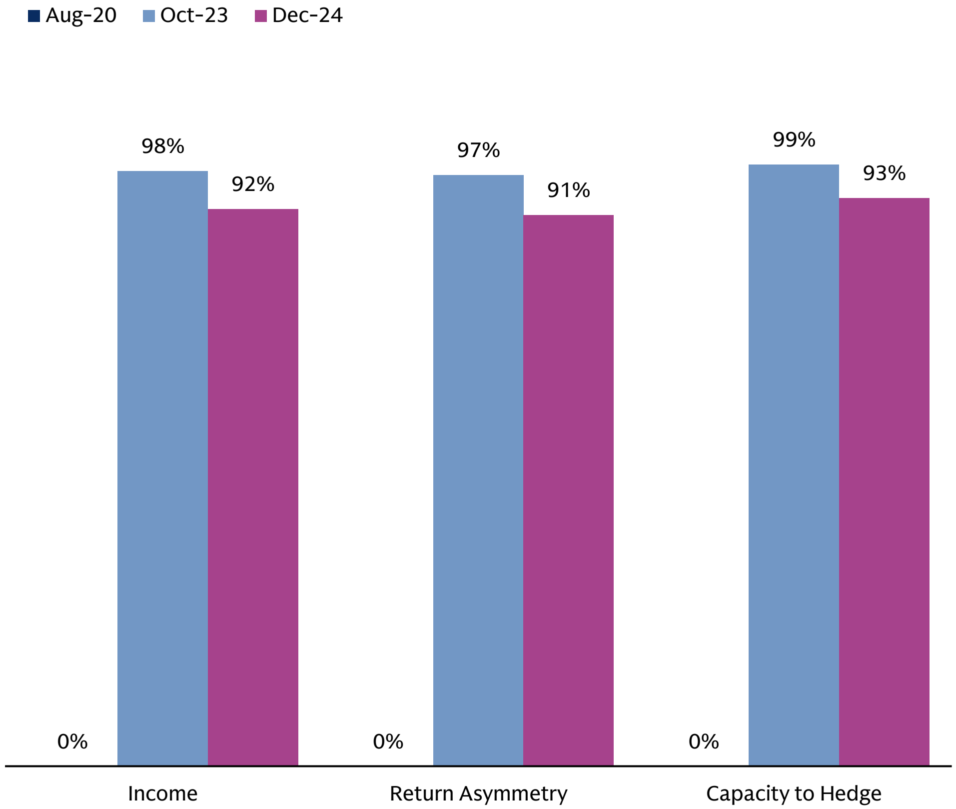
Above Average Yields

Yield to Worst (%, Prior Ten Years)



Bonds Have Come A Long Way

Benefits of Intermediate Fixed Income (Percentile, % 20-Year Trailing)



Left Chart Source: Bloomberg and Goldman Sachs Asset Management. As of December 31, 2024. Charts shows the minimum, maximum, median, and current yield-to-worst of various fixed income markets considering prior ten years of yields. Right Chart Source: Bloomberg and Goldman Sachs Asset Management. As of December 31, 2024. Chart shows the illustrative total return of a 10-Year US Treasury bond, calculated by summing the modified duration price impact of a 1pp change in rates with the bond's yield at the time. August 2020 was chosen as it was the month the 10-Year US Treasury yield hit an all-time low. The results are based on the historical returns of the indices used and no representation is made that an investor achieved similar results. The example provided does not reflect the deduction of investment advisory fees and expenses which would reduce an investor's return. The results will vary based on market conditions. **Past performance does not guarantee future results, which may vary.** Please see additional disclosures at the end of this presentation.

FX and Commodities

US policy shifts may lead to a ‘stronger for longer’ USD and hedging opportunities within commodities

FX

- **USD:** We expect the dollar to be ‘stronger for longer’ in 2025 as tariff risks and divergent growth prospects support USD strength. We had expected the dollar to gradually decline as global growth moved into better balance. However, Dollar challengers still struggle to mount a better case.
- **EUR:** The Euro Area faces a challenging set of circumstances and is highly vulnerable to global trade policy uncertainty. Bearish sentiment is already embedded into the currency, mostly due to investor pessimism regarding the macro trajectory.
- **JPY:** Gradual BoJ rate hikes are not an impediment towards a weaker Yen, which may allow for more sustained policy tightening.

Global FX Forecasts

	Current	GIR Forecast			LT GIR Forecast		
Currencies	**Spot**	**3m**	**6m**	**12m**	**2026**	**2027**	**2028**
EUR/USD	1.02	1.00	0.97	0.97	1.06	1.10	1.13
GBP/USD	1.22	1.23	1.22	1.20	1.29	1.28	1.28
USD/JPY	158	160	161	162	145	132	119
USD/CNY	7.20	7.40	7.50	7.50	7.30	7.10	6.90

Commodities

- The unusually wide range of potential US policy shifts in 2025 may strengthen the diversifying role of commodities in portfolios.
- Long gold and oil positions, in particular, can act as critical inflation and geopolitical hedges in tail scenarios, including tariff escalation, geopolitical oil supply disruptions, and debt fears.

Commodity Positions Can Act as Inflation Hedges

Inflation Shocks	Inflation Risks Post US Elections	Commodity Hedge
Positive Demand Shock (Bonds ↓)	Fiscal Easing	1. Industrial Medals 2. Oil 3. Natural Gas[1] 4. Agriculture[1] 5. Copper/ Aluminum[2]
Negative Supply Shock (Equities ↓; Bonds ↓)	Hawkish on Iran Oil Supply	1. Oil 2. Natural Gas[1] 3. Agriculture[1] 4. Gold
Central Bank Credibility Loss/Geopolitics (Equities ↓; Bonds ↓)	Fed Subordination, Tariffs, and/or Debt Fears	1. Gold

Left Chart Source: Goldman Sachs Global Investment Research and Goldman Sachs Asset Management. As of January 13, 2025, or latest available. “LT” refers to Long-term. Right Chart Source: Goldman Sachs Global Investment Research and Goldman Sachs Asset Management. As of December 31, 2024. 1 reflects a green substitute commodity hedge. 2 reflects a green enhancement commodity hedge. “We” refers to Goldman Sachs Asset Management. The economic and market forecasts presented herein are for informational purposes as of the date of this presentation. There can be no assurance that the forecasts will be achieved. For illustrative purposes only.

High Conviction Investment Strategies

Our highest conviction investment strategies for investing in today's market environment

Investment Strategy	Rationale and Key Risks
Tax-Advantaged Equity SMAs	• Stock dispersion and a micro-driven return environment may provide robust opportunities for tax alpha through tax-loss harvesting, in our view. • Recent index returns have been driven by the Magnificent 7 while other S&P 500 constituents' performance has been mixed, which may allow for ample loss harvesting opportunities among the index laggards. • Key Risk: a bull market with subdued volatility and low dispersion limits opportunities for tax-loss harvesting.
International Equities	• US equities continue to trade at lofty valuations, which highlights the relative discount of international counterparts. • Although valuations alone should not dictate equity allocations, international equities may offer attractive opportunities to get exposure to value, cyclicality, and yield at a cheaper price. • Key Risks: geopolitical tensions, tariffs, weaker macroeconomic environments, and a strong US dollar.
Municipal Bonds	• We believe munis could continue to benefit over the near term due to 1) attractive real and tax-equivalent yields, 2) stable credit fundamentals, and 3) a strong retail demand. • We expect 9 of 10 G10 central banks to be easing in 2025 and to largely "see through" one-time tariff inflation. • Key Risk: US tax policy that that could expand SALT tax deductibility.
Small Caps	• The combination of low current valuations, a relatively healthy economic outlook, and global trade uncertainty may make small-cap equities an attractive alternative to large-cap peers trading at higher valuations, in our view. • A small cap catch-up could happen swiftly, should improving sentiment drive higher investor positioning, in our view. • Key Risks: higher rates, and in turn a higher cost of capital, may challenge smaller companies' balance sheets. Smaller companies demonstrate higher cyclicality and would struggle should GDP growth disappoint expectations.
Liquid Alternatives	• The correlations between 1) stocks and hedge funds and 2) bonds and hedge funds have decreased considerably, reflecting opportunity for further portfolio diversification through liquid alternatives. • Many companies are staying private for longer, generating more of their value while under private ownership, which we believe investors can take advantage of through liquid alts. • Key Risks: liquid alternatives may underperform equities in a risk-on environment.

Source: Goldman Sachs Asset Management. As of December 31, 2024. Diversification does not protect an investor from market risk and does not ensure a profit. Past correlations are not indicative of future correlations, which may vary. **Past performance does not predict future returns and does not guarantee future results, which may vary.** Goldman Sachs does not provide accounting, tax or legal advice. Please see additional disclosures at the end of this presentation. There is no guarantee that objectives will be met. For discussion purposes only.

Glossary

Additional Notes

Page 2 Notes: “Fed” refers to Federal Reserve. “GIR” refers to Goldman Sachs Global Investment Research. “GDP” refers to Gross Domestic Product. “Core PCE” refers to Personal Consumption Expenditures, excluding food and energy. “UST” refers to US Treasury.

Page 6 Notes: DM refers to Developed Markets. EM refers to Emerging Markets. Top Chart Notes: “APAC ex Jp” refers to the MXAPJ index, “Japan” refers to the TOPIX index, “US” refers to the S&P 500 index, “Global” refers to the MXWD index, and “Europe” refers to the STOXX 600 index.

Page 9 Notes: Right Chart shows the 10-Year US Treasury Note’s 20-year relative percentile across three characteristics on November 9, 2020 and November 9, 2023. The first characteristic is the security's yield. The second characteristic is the illustrative distribution of total returns if the 10-Year interest rate moves 1pp higher and 1pp lower. The illustrative total return in the case of a 1pp increase in the interest rate is calculated by adding the 10-Year US Treasury Note's yield to its respective modified duration price impact of a 1pp increase in interest rates. The illustrative total return in the case of a 1pp decrease in the interest rate is calculated by adding the 10-Year US Treasury Note's yield to its respective modified duration price impact of a 1pp decrease in interest rates. The distribution of total returns is calculated by dividing those two figures. The third characteristic is the ability of a 10-Year US Treasury Note to hedge an equity market drawdown via price appreciation assuming interest rates fall to 0%. This is calculated by multiplying the yield of a 10-Year US Treasury Note by its modified duration. Goldman Sachs Asset Management’s and Bloomberg’s products are not related, and Bloomberg has not endorsed either Goldman Sachs Asset Management or its products.

Page 11 Notes: “Tax alpha” refers to the return of a portfolio conducting tax-loss harvesting less the return of the portfolio not conducting tax-loss harvesting. “Alpha” refers to risk adjusted excess returns. “SMA” refers to separately managed account. “Magnificent 7” refers to NVDA, MSFT, AMZN, META, TSLA, AAPL, AND GOOG. “Correlation” refers to the amount by which two investments vary relative to each other.

Equities

The S&P 500 Index is the Standard & Poor’s 500 Composite Stock Prices Index of 500 stocks, an unmanaged index of common stock prices. The index figures do not reflect any deduction for fees, expenses or taxes. It is not possible to invest directly in an unmanaged index.

The Euro Stoxx 600 Index represents the performance of 600 publicly-traded companies based in one of 18 EU countries.

The TOPIX Index is a free-float adjusted market capitalization-weighted index that is calculated based on all the domestic common stocks listed on the Tokyo Stock Exchange First Section.

The MSCI Asia Pacific ex-Japan Index captures large and mid cap representation across 4 of 5 Developed Markets countries (ex Japan) and 9 Emerging Markets countries in the Asia Pacific region.

The MSCI World Index captures large and mid-cap representation across 23 Developed Markets (DM) countries*. With 1,397 constituents, the index covers approximately 85% of the free float-adjusted market capitalization in each country.

Fixed Income

The 10-Year Treasury is a US Treasury debt obligation that has a maturity of 10 years.

The Bloomberg U.S. Aggregate Bond Index measures the performance of investment grade, U.S. dollar-denominated, fixed rate taxable bond market, including Treasuries, government-related and corporate securities, MBS (agency fixed-rate and hybrid ARM pass-throughs), ABS, and CMBS.

The Bloomberg Municipal Bond Index tracks the market for tax-exempt municipal securities in the US.

Other

Euro Area refers to the Eurozone. The Eurozone is comprised of Austria, Belgium, Cyprus, Estonia, Finland, France, Germany, Greece, Ireland, Italy, Luxembourg, Malta, the Netherlands, Portugal, Slovakia, Slovenia, and Spain.

Volatility is a measure of variation of a financial instrument’s price.

Risk Considerations and General Disclosures

Risk Considerations

Equity securities are more volatile than fixed income securities and subject to greater risks. Small and mid-sized company stocks involve greater risks than those customarily associated with larger companies.

Investments in foreign securities entail special risks such as currency, political, economic, and market risks. These risks are heightened in emerging markets.

Emerging markets securities may be less liquid and more volatile and are subject to a number of additional risks, including but not limited to currency fluctuations and political instability.

An investment in real estate securities is subject to greater price volatility and the special risks associated with direct ownership of real estate.

Investments in fixed-income securities are subject to credit and interest rate risks. Bond prices fluctuate inversely to changes in interest rates. Therefore, a general rise in interest rates can result in the decline in the bond's price. Credit risk is the risk that an issuer will default on payments of interest and principal. This risk is higher when investing in high yield bonds, also known as junk bonds, which have lower ratings and are subject to greater volatility. All fixed income investments may be worth less than their original cost upon redemption or maturity.

Buy-write strategies are subject to market risk, which means that the value of the securities in which it invests may go up or down in response to the prospects of individual companies, particular sectors and/or general economic conditions. They are also subject to the risks associated with writing (selling) call options, which limits the opportunity to profit from an increase in the market value of stocks in exchange for up-front cash at the time of selling the call option. In a rising market, the strategy could significantly underperform the market, and the options strategies may not fully protect it against declines in the value of the market.

Bonds are subject to interest rate, price and credit risks. Prices tend to be inversely affected by changes in interest rates.

Although Treasuries are considered free from credit risk, they are subject to interest rate risk, which may cause the underlying value of the security to fluctuate. Income from municipal securities is generally free from federal taxes and state taxes for residents of the issuing state. While the interest income is tax-free, capital gains, if any, will be subject to taxes. Income for some investors may be subject to the federal Alternative Minimum Tax (AMT).

Investments in commodities may be affected by changes in overall market movements, commodity index volatility, changes in interest rates or factors affecting a particular industry or commodity.

The currency market affords investors a substantial degree of leverage. This leverage presents the potential for substantial profits but also entails a high degree of risk including the risk that losses may be similarly substantial. Such transactions are considered suitable only for investors who are experienced in transactions of that kind. Currency fluctuations will also affect the value of an investment.

The above are not an exhaustive list of potential risks. There may be additional risks that are not currently foreseen or considered.

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