



Macro²Markets

US Desk Strategy | Global Markets Americas

US Monthly Outlook:

*Rates Maelstrom Amid
Manufacturing Momentum*

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MUFG Securities, Inc & MUFG Bank, Ltd.

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Summary | Rates Maelstrom Amid Manufacturing Momentum

Macro Musings

- AI has created a major investment boom, but it is highly concentrated and it has yet to lift the broader economy into a stronger growth regime. At least \$400bn of real investment in tech sits above the pre-AI trend, driven overwhelmingly by computer equipment, where annual growth approached 80%. Yet despite this surge, broader demand growth still resembles the shallow post-GFC expansion, when annual growth in real final sales to private domestic purchasers grew at a 2.5–3.5% pace. Current growth falls well short of the larger, more diversified (and productive) expansion experienced pre the dot-com era. Today's growth is moderate at best, considering the AI spending. Until we see broadening of activity, we remain cautious on growth trends.
- Job growth has slowed again across much of the economy, with the hiring rate falling to its lowest level since 2011, limiting growth in wages (which is critical at a time of high energy prices) that drives overall consumer spending. However, advanced manufacturing has emerged as a bright spot, with stronger labor demand accompanying rising profitability in AI-adjacent sectors.
- The 3-month annualized change in core PCE has reached 2%, and maintaining the recent pace of soft monthly increases would keep it near that level through year-end, easing pressure on the FOMC for further tightening. Still, the breadth of price growth remains elevated, with the share of expenditures growing above 3% and the fraction of PCE items with rising prices signaling greater inflation persistence than growth in core PCE.

Fed & Rates View

- *Fed View:* The market is prepped for a much more hawkish Fed than what, we think, will ultimately be delivered. Fed funds futures are pricing roughly three additional rate hikes over the next 12 months, but our base case is that the policy rate remains at today's level over that period, with at most one additional hike in Dec '26 before an eventual cut in Sep '27. Given the potential for weaker fiscal support and fading supply shocks after the midterms, the market's expected rate path appears aggressive.
- The latest SEP suggests the FOMC has become confident that labor market risks have diminished, with the diffusion index on unemployment risks turning negative for the first time since 2021 and growth risks shifting to the upside after years of fearing a growth relapse. Taken together, these revisions point to a SEP that appears influenced by recency bias. We think the FOMC may be overestimating the true health of the US labor market.
- *Rates View:* The UST sell-off has come in three waves: in the first half of 2026 in reaction to the energy price moves, over the summer in response to a hawkish pivot from the new Fed Chair Kevin Warsh, and the final quick big reprice in September when long-bonds had one of their worst monthly performance in years due to a negative backdrop for global rates and competition from IG credit supply (overall and specific from hyperscalers).
- We have shifted up our rates forecast 25-50bps in all quarters through our forecast horizon. That said, the market has priced-in a lot of the Fed path already and there is a risk it has overshot.

Summary | Rates Maelstrom Amid Manufacturing Momentum (continued...)

Market Thoughts

- The recent strong series of UST auctions suggests that the backup has, at a minimum, created enough concession to bring out value investors. Top-ticking is usually ill-advised, but it's possible that US long-term rates are in the process of rounding out a near-term local high as Treasuries are, in our view, in deep-value territory.
- Even with the latest breakout in 1y1y from the broad range established following the super-sized 2022-23 hiking cycle, the move in near-term forwards still pales in comparison to 10y10y. Overall fiscal and supply concerns have been expressed through longer-dated forward rates and some term premia, where long-term rates are not being driven by fundamental Fed policy alone.
- Since the pandemic, USTs have been less effective as a hedge against equity drawdowns, as fiscal expansion, inflation, and elevated USTs supply have tempered bond rallies during risk-off periods. Nevertheless, with yields at historically high levels, USTs now offer both income and total return potential and thus remain a potentially important portfolio hedge and could perform again in a deeper or more prolonged equity market correction.
- Lastly, The US midterms could be an important catalyst for bonds. A Democratic win could create fiscal gridlock, limit additional spending, and increase regulation around AI in 2027, supporting USTs. A Republican win could be more challenging for bonds if it enables continued fiscal expansion. If markets stabilize through the midterms, a constructive setup for high-quality fixed income may emerge, including USTs & MBS, over the next 6-12 months.

Special Topic – Fiscal House of Pain

- Large debts and persistent deficits are a shared challenge in most advanced economies, with elevated interest costs becoming a major hurdle to achieving fiscal sustainability. In the US, interest costs are projected to become roughly twice the size of the primary deficit by 2032. Global bond market participants are keenly aware of these unsustainable debt dynamics, leading to a return of some term premia, and in the US, competition for capital is leading to some crowding out of credit for private markets.
- The US Treasury will need to refinance trillions of dollars of maturing debt while continuing to fund large deficits, meaning that if yields stay elevated, the government will restack higher coupon costs into the outstanding debt, embedding higher debt-servicing costs for years. At the same time, continued reliance on short-term T-bills rather than terming out the debt makes financing costs more sensitive to short-term rates, potentially making Treasury funding more pro-cyclical, less predictable, and less stable.
- Political partisanship poses a risk that the debt ceiling will not be raised or suspended in a timely manner, with a Democratic sweep or split Congress after the Midterms increasing that risk. The current pace of spending will have the US hit the debt ceiling in early FY27, necessitating the use of extraordinary measures if Congress does not reach an agreement. Further complicating this path is a big buyback program that Treasury must fund, and central clearing of repo in mid 2027 may drive s/t HQLA collateral demand.

Section 1: Macro Musings

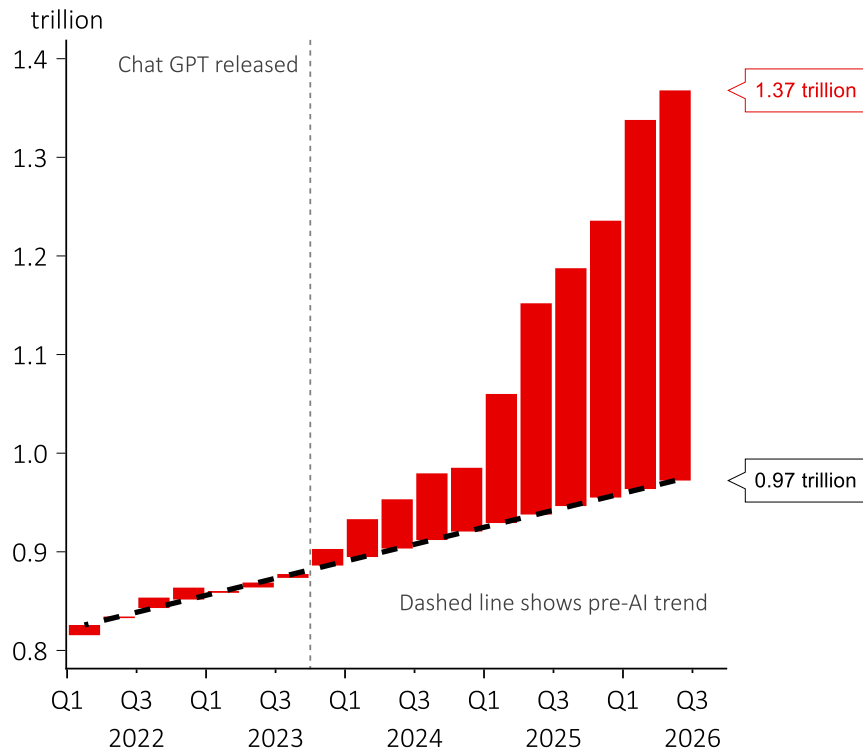
AI booming investment, but growth is still not broad enough

Growth | The AI investment boom is significant, and mostly in physical assets

“Excess” investment in computer equipment and software above the pre-AI trend implies that the relative *real* spending on AI fixed investment is ~400bn

- Growth above the pre-AI trend estimates the level of “new” investment that AI has brought about, which so far, is mostly concentrated in computer equipment (i.e., chips). The total amount of fixed investment into AI is notably higher, with much of the difference likely reflecting re-allocation.
- Investment in software did accelerate a bit after 2023, but growth is in-line with pre-pandemic levels (and well below growth pre-dot com era) whereas growth in computer equipment surged to nearly 80% YoY, highlighting that the current AI investment boom is mostly in physical assets.

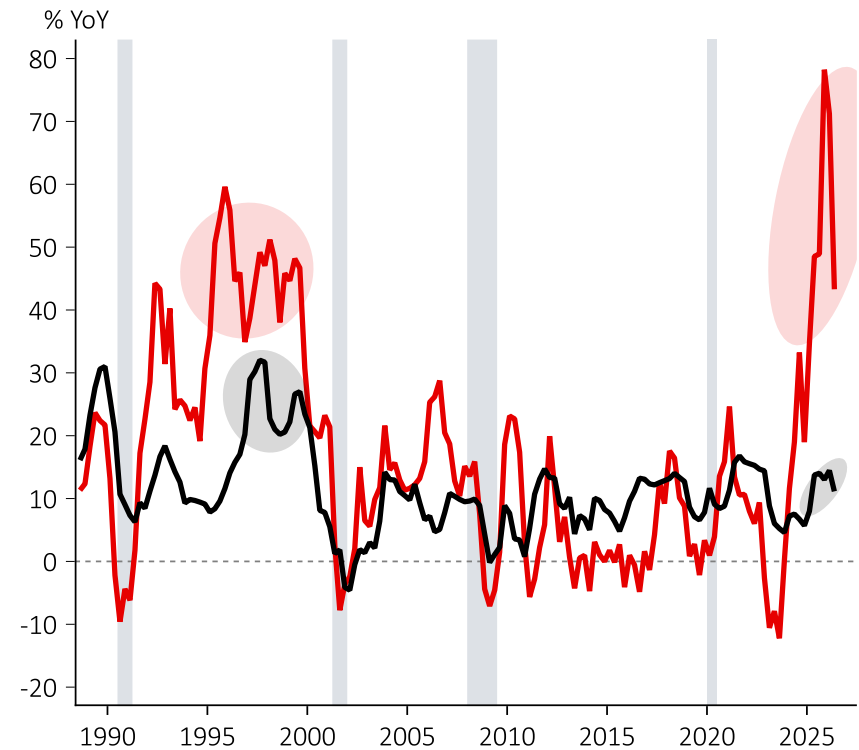
Real Fixed Investment, Annualized



■ Computers & Peripheral Equipment, Software and Data Center Structures

Source: BEA and MUFG US Macro Strategy

Real Fixed Investment Growth



— Computers & Peripheral Equipment — Software

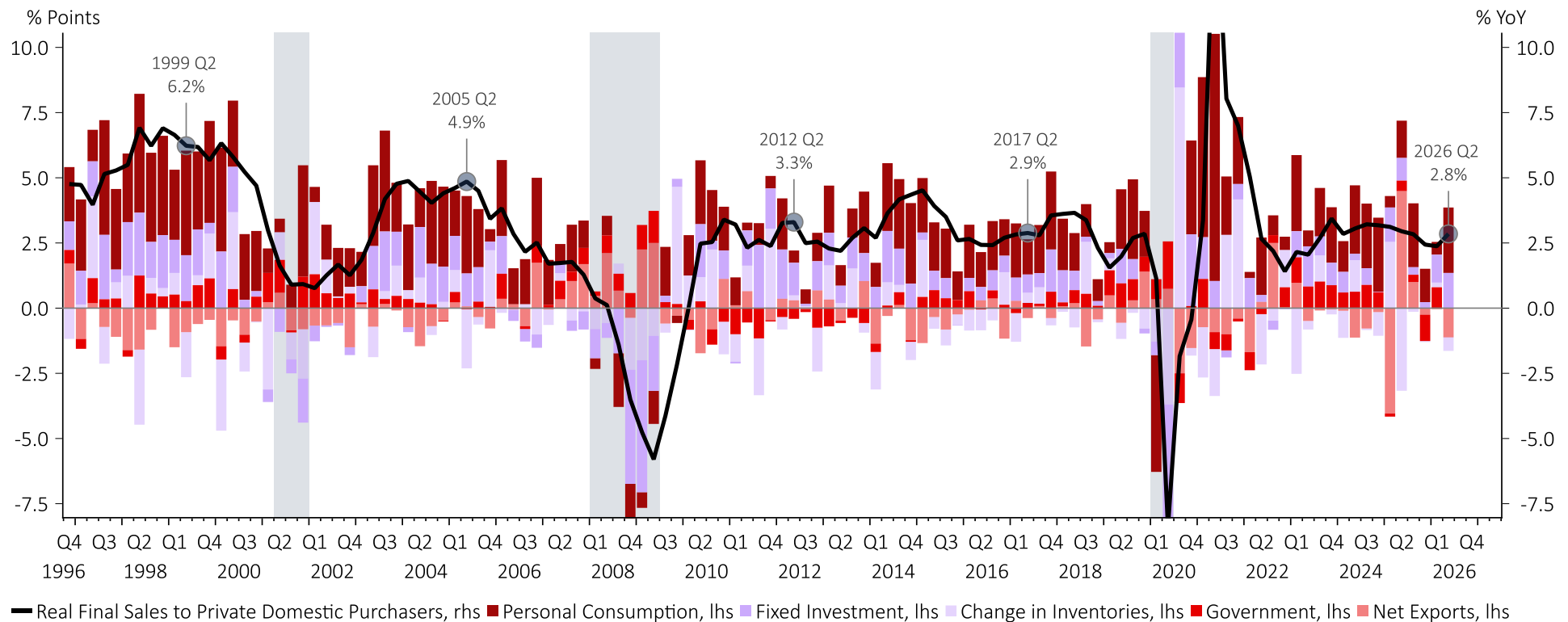
Source: BEA and MUFG US Macro Strategy

Growth | But growth is no stronger than the shallow post-GFC expansion

Real final sales to private domestic purchasers (consumption + fixed investment) illustrates how today's growth can, at best, be described as "moderate"

- The decade after the 2008 Great Financial Crisis (GFC) can be described as a long, but shallow economic expansion/recovery where the core elements of growth (real final sales to private domestic purchasers) trudged along at ~2.5-3.5%. Today's growth level is similar. In our view its really moderate at best, especially when considering the extent of how much the AI boom is propelling investment in computer equipment (well beyond its prior trends).
- The pre-dot com period experienced a much stronger expansion with non-tech sectors also contributing to investment growth (notably housing).

Real Final Sales to Private Domestic Purchasers (% YoY) & Contributions to QoQ Growth in Real GDP



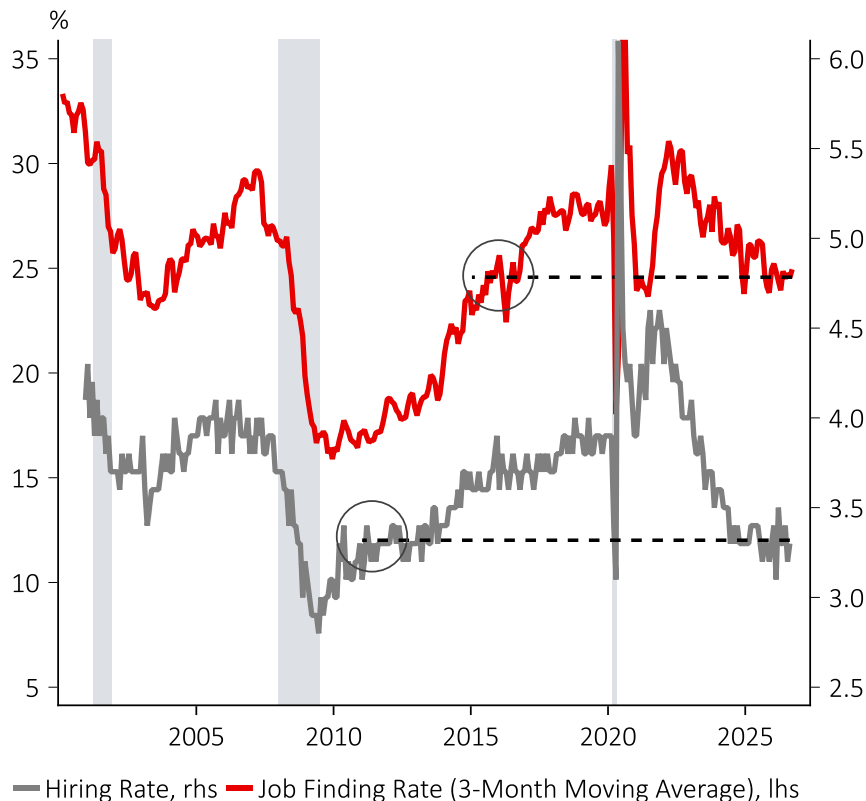
Source: BEA and MUFG US Macro Strategy

Labor | Overall hiring at a decade low, with layoffs impacting white collar jobs

The hiring rate has fallen to, and remains at levels not seen since 2011, consistent with the low job finding rate that sits at 2015 levels.

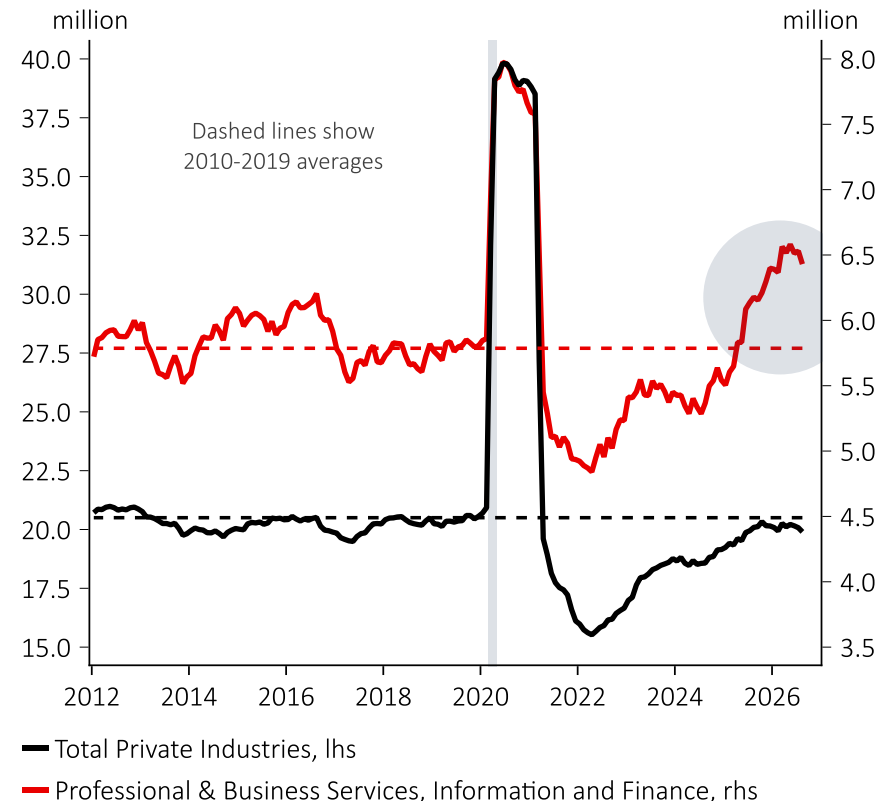
- Job creation remains as the growth engine of the labor market, pushing up aggregate wages and salaries and subsequent consumer spending. Despite the low unemployment rate, jobs growth remains low (due in part to slower immigration), an indication of weaker aggregate demand.
- Job losses remain low, in aggregate, reflected in JOLTS layoffs remaining below the pre-pandemic trend. However, layoffs have trended higher in industries reflecting “white collar” or office-related jobs that comprise a noteworthy percentage of typically higher paying, high-skill employment.

Hiring Rate & Job Finding Rate (3-Month Moving Average)



Source: BLS and MUFG US Macro Strategy

Layoffs by Industry, 12-Month Rolling Sum



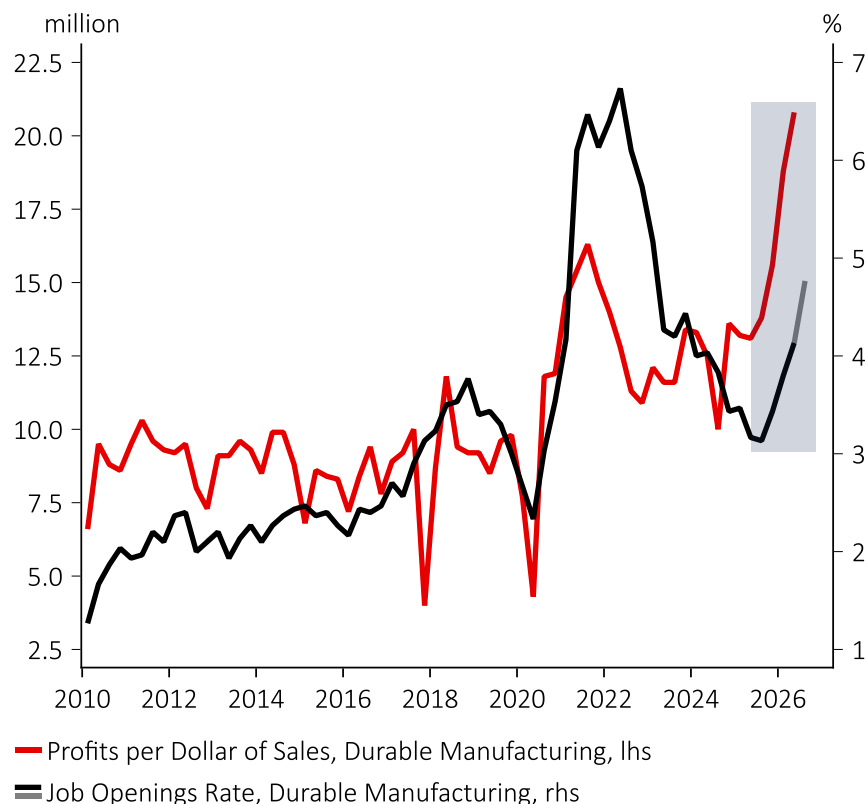
Source: BLS and MUFG US Macro Strategy

Labor | Manufacturing stands out as one of the better performing sectors

While much of the labor market remains stagnant, demand for manufacturing jobs has risen recently, specifically in advanced technology

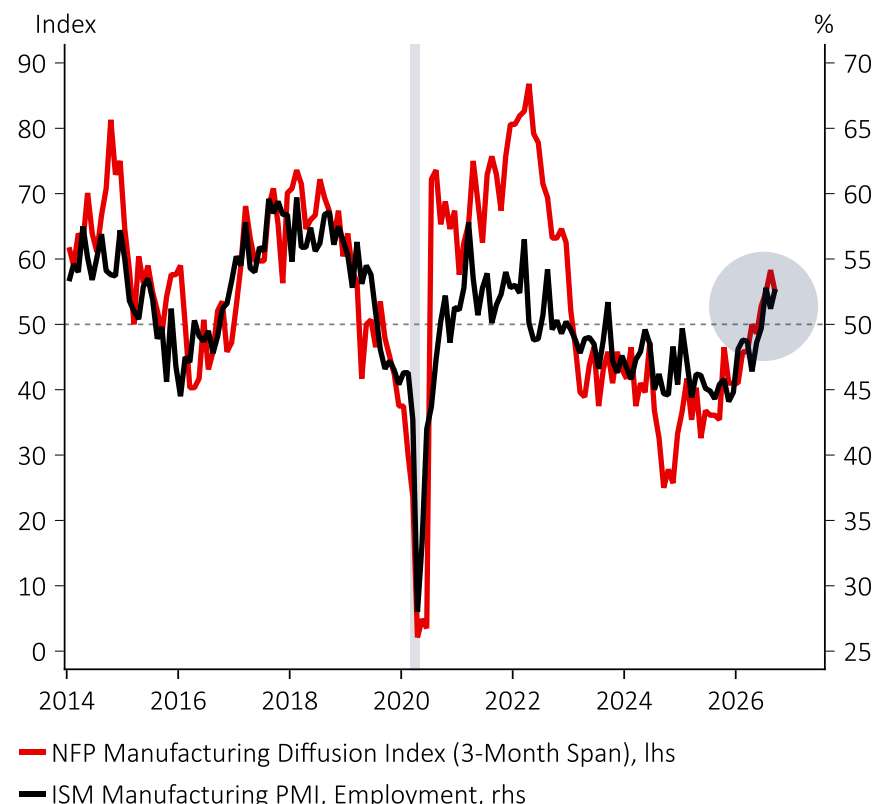
- After years of languishing (especially post the 2022-3 hiking cycle) manufacturing profits have risen sharply in recent quarters (measured as profit per dollar of sales), especially in AI-adjacent subsectors like machinery and computer & electronics that make up the “advanced” manufacturing sector.
- Profitability in manufacturing historically coincides with labor demand in real-time, with the recent rise in profits per dollar of sales contributing to a rise in job openings and subsequent employment growth (seen by the turn higher in NFP manufacturing diffusion index & ISM Manufacturing PMI).

Profits/Dollar of Sales & Job Openings Rate, Durable Manufacturing



Source: USCB, BLS and MUFG US Macro Strategy

NFP Diffusion Index & ISM Employment PMI, Manufacturing



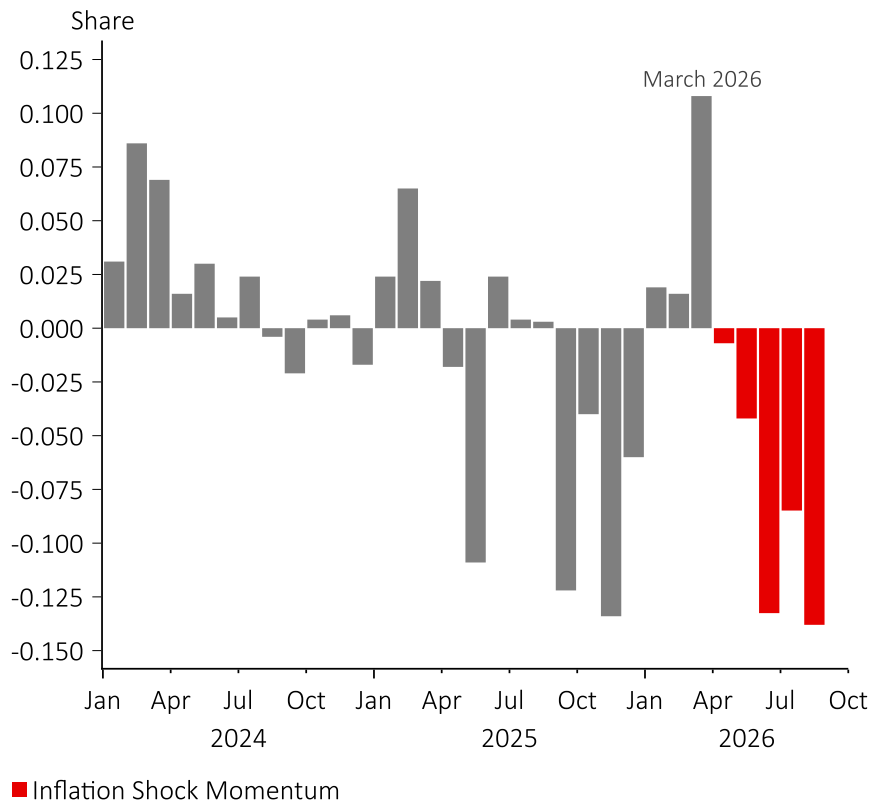
Source: BLS, ISM and MUFG US Macro Strategy

Inflation | The disinflation momentum should ease worries on the FOMC

The momentum over the past 3-4 months suggests that inflation is moving in the right direction, with the 3-month annualized % change hitting 2%

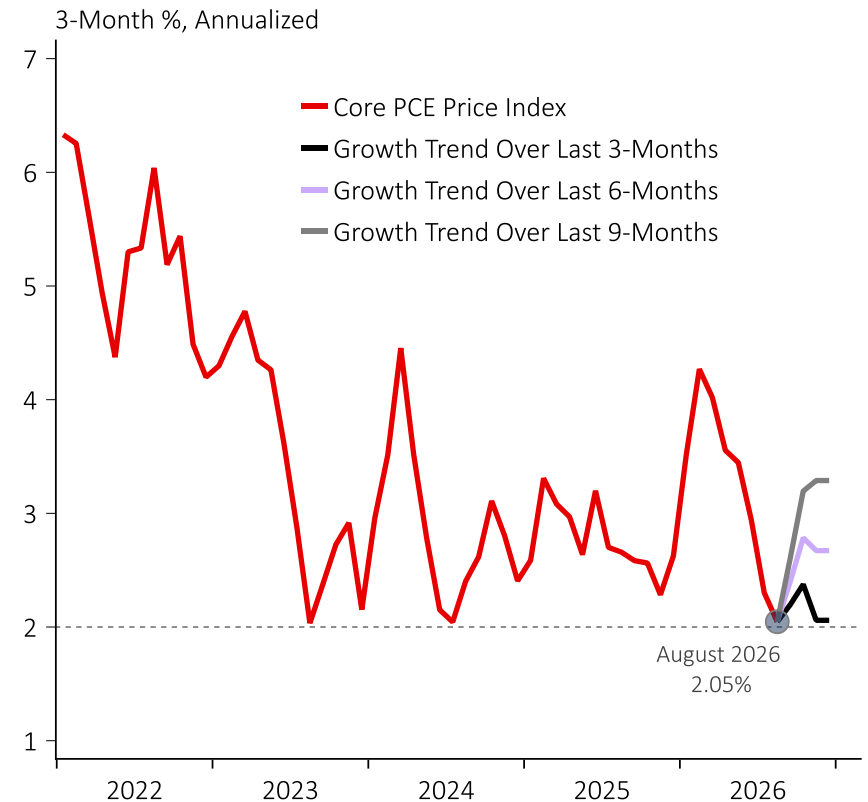
- If core PCE maintains the soft average monthly growth trend from the past 3 months, consistent with the lack of inflation momentum, then the 3-month annualized % change will remain at the Fed's 2% inflation target for the rest of the year, reducing the need for multiple rate hikes ahead.

Inflation Shock Momentum Index



Source: San Francisco Fed and MUFG US Macro Strategy

Core PCE Price Index, 3M Annualized % Change & Growth Scenarios



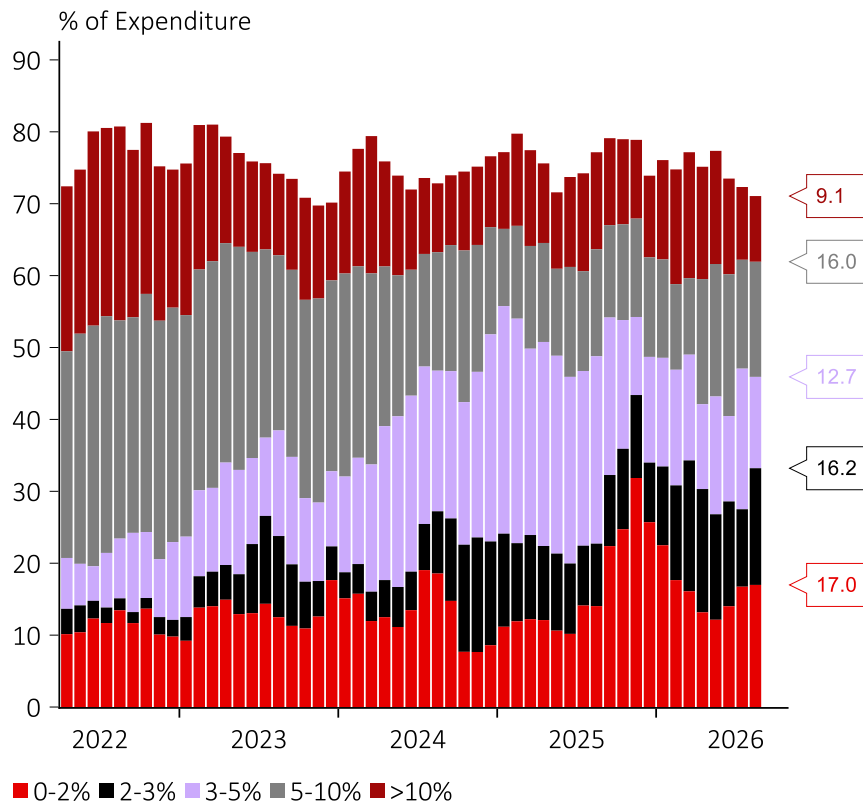
Source: BEA and MUFG US Macro Strategy

Inflation | But the distribution of price growth signals inflation persistence

Chairman Warsh references the distribution of PCE price growth in an attempt to differentiate between relative price moves and underlying inflation

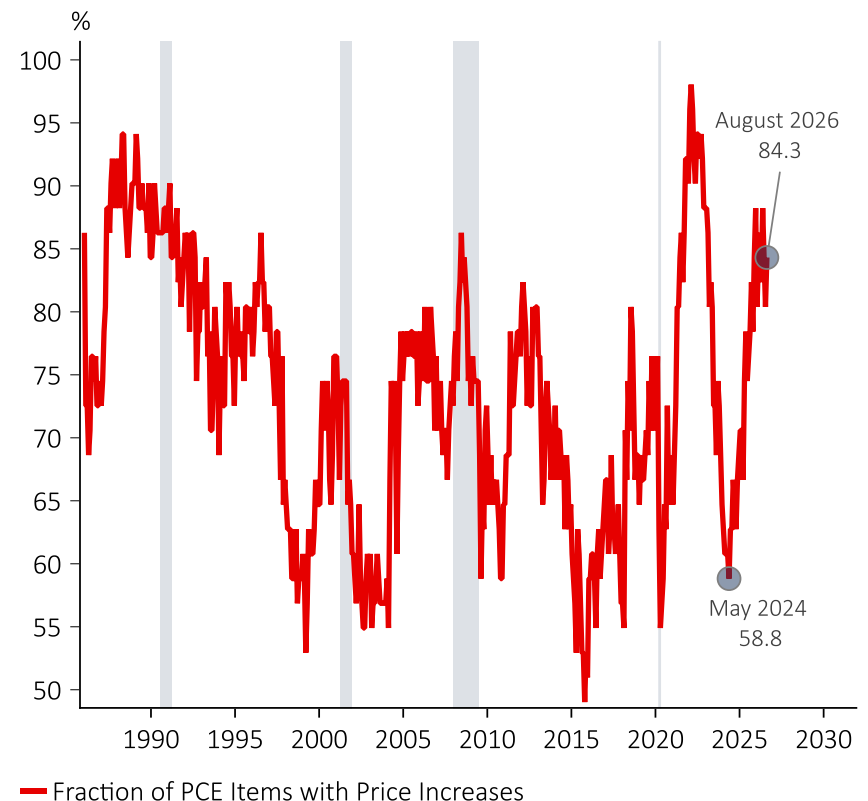
- Looking at the percent of expenditures growing at or above an annualized 3% offers insight into how broad price growth is, a signal of elevated inflationary pressures. By this metric, the current inflation environment is more problematic than what annualized growth in core PCE suggests.
- Meanwhile the fraction of PCE items that are experiencing price increases also provides a similar signal on elevated inflation persistence.

Trimmed-Mean PCE Distribution of Price Increases, Annual Rate



Source: Dallas Fed and MUFG US Macro Strategy

Fraction of PCE Items w/ Price Increases



Source: San Francisco Fed and MUFG US Macro Strategy

Section 2: Fed View

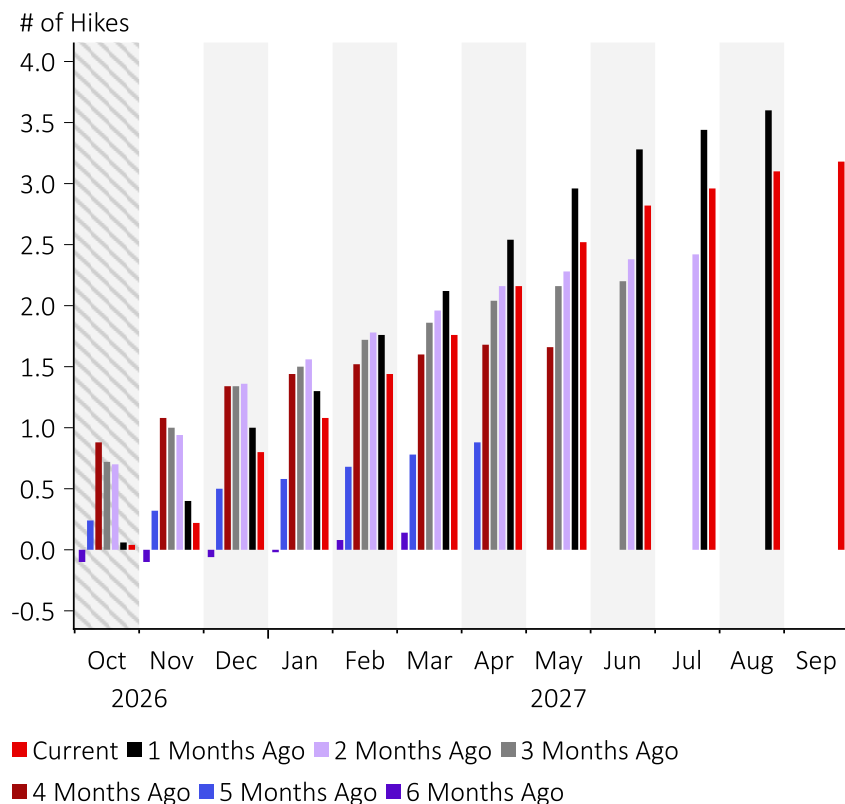
Taking a back seat

Fed | Futures market is pricing in an overly aggressive Fed hiking cycle

Fed Funds futures are pricing in another 3 hikes by September 2027, slightly fewer than what was priced in last month but much more than 6 months ago

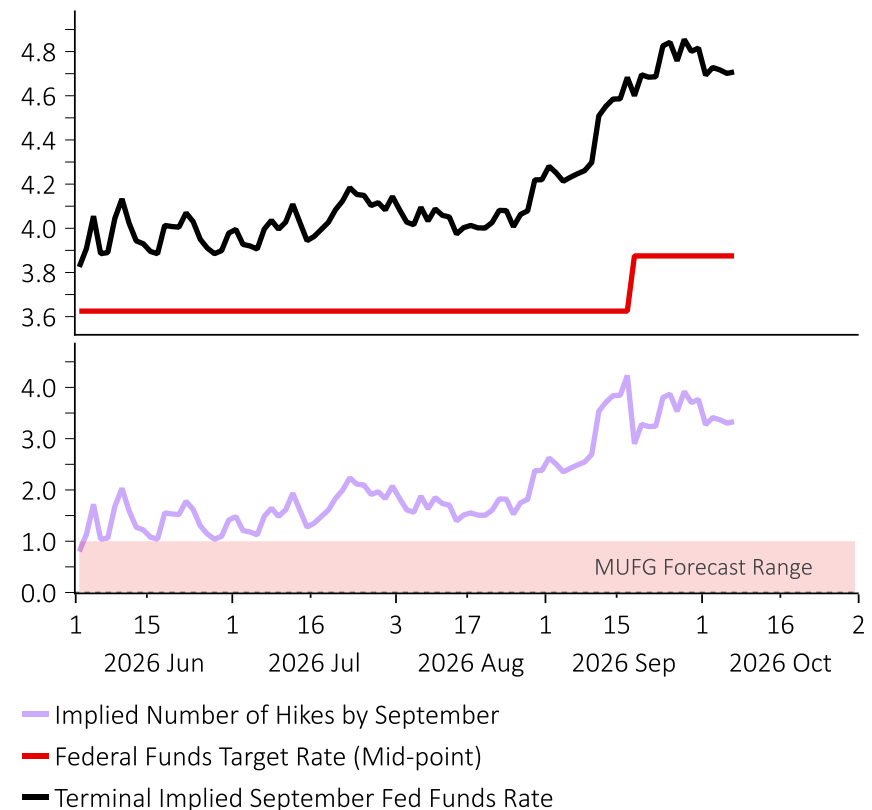
- By this time next year, we expect the Fed Funds Rate to be where it is today, with the potential for another hike in Dec '26 and then a cut in Sep '27.
- A lot can and will happen between now and 3Q27, with the results of the midterms elections potentially ushering in a “lame duck” presidency void of any fiscal thrust policies, a re-focus on regulation, possibility of supply shocks fading (if war ends), all at a time when stocks are ripe for a correction.

Fed Funds Futures, Number of Fed Rate Cuts as of 6 Months Ago



Source: Macrobond and MUFG US Macro Strategy

Implied Number of Fed Hikes & MUFG Forecast



Source: Fed and MUFG US Macro Strategy

Fed | Inflation projections are driving the hawkish sentiment at the Fed

The September Summary of Economic Projections (SEP) highlighted the increased hawkishness on the FOMC, mostly driven by inflation fears

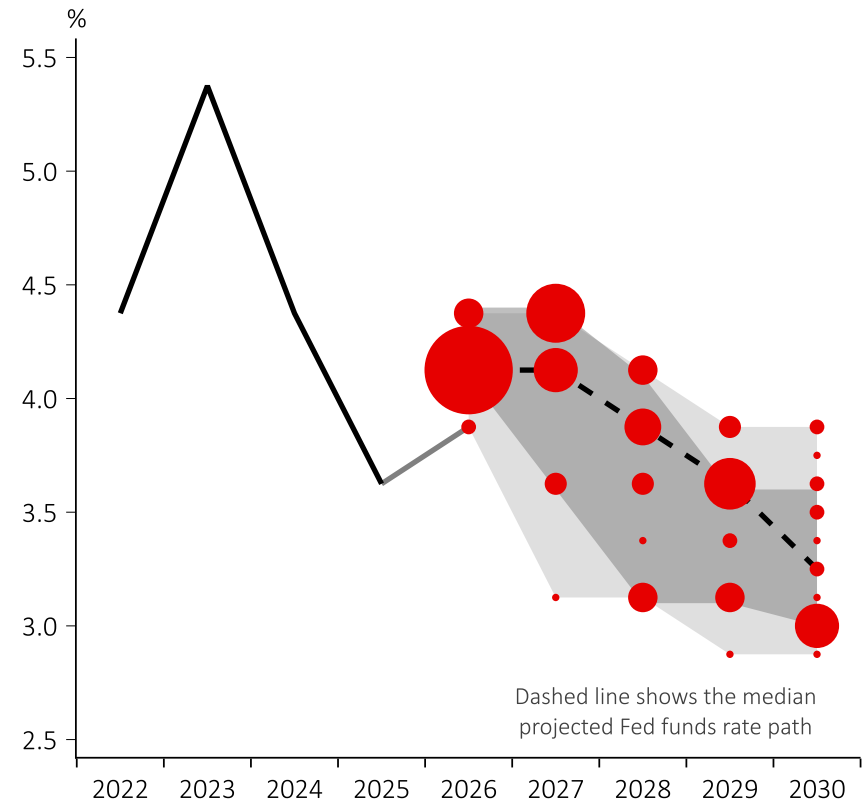
- The median dot shows an additional hike relative to the June SEP, with the already elevated inflation forecasted being pushed up slightly.
- The idea that the Fed can fully turn their attention to inflation, and away from unemployment, is also presented in the latest SEP, with projections of the unemployment rate falling to 4.1%. However, SEPs tend to suffer from recency bias, especially when there is a lack of conviction.

September 2026 FOMC Summary of Economic Projections (SEP)

	Median	2026	2027	2028	2029	Longer run
Change in real GDP	Jun projection	2.2	2.3	2.2		2.0
	Sep projection	2.3	2.4	2.2	2.1	2
	Difference	0.1	0.1	0		0
Unemployment rate	Jun projection	4.3	4.3	4.2		4.2
	Sep projection	4.1	4.1	4.1	4.1	4.2
	Difference	-0.2	-0.2	-0.1		0
PCE inflation	Jun projection	3.6	2.3	2.0		2.0
	Sep projection	3.7	2.3	2.1	2.0	2.0
	Difference	0.1	0	0.1		0
Core PCE inflation	Jun projection	3.3	2.5	2.1		
	Sep projection	3.4	2.5	2.2	2	
	Difference	0.1	0	0.1		
Fed Funds Rate	Jun projection	3.8	3.6	3.4		3.1
	Sep projection	4.1	4.1	3.9	3.6	3.2
	Difference	0.3	0.5	0.5		0.1

Source: Fed and MUFG US Macro Strategy

September 2026 FOMC Dot Plot



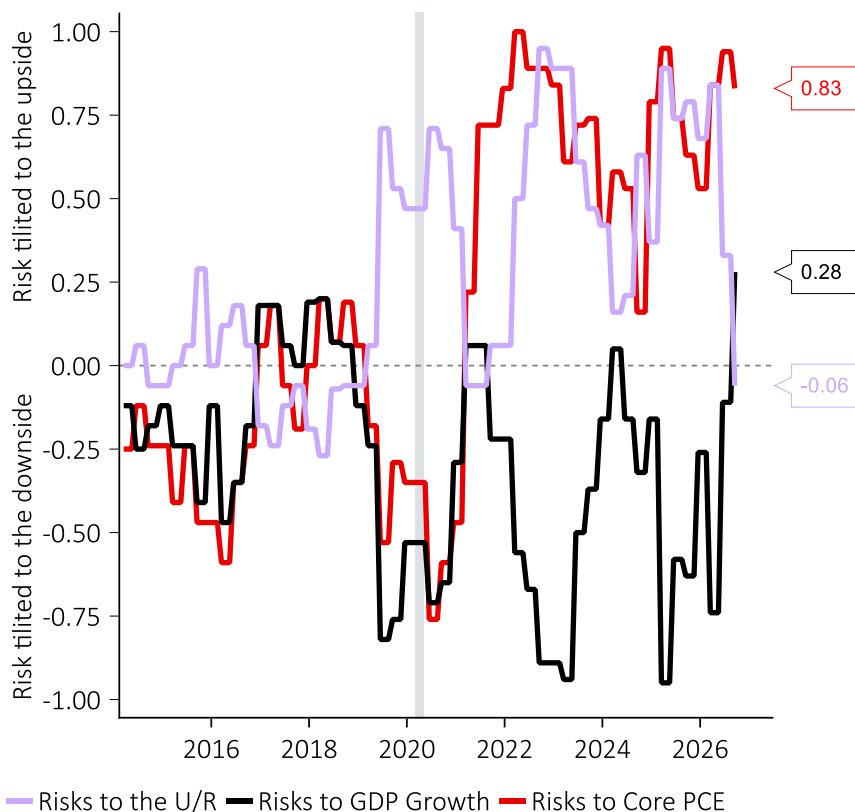
Source: Fed and MUFG US Macro Strategy

Fed | The FOMC's self-assessed risks to their projections may be misplaced

With each Summary of Economic Projections (SEP), the FOMC assesses the risks to their forecasts which can be used to assess their biases and convictions

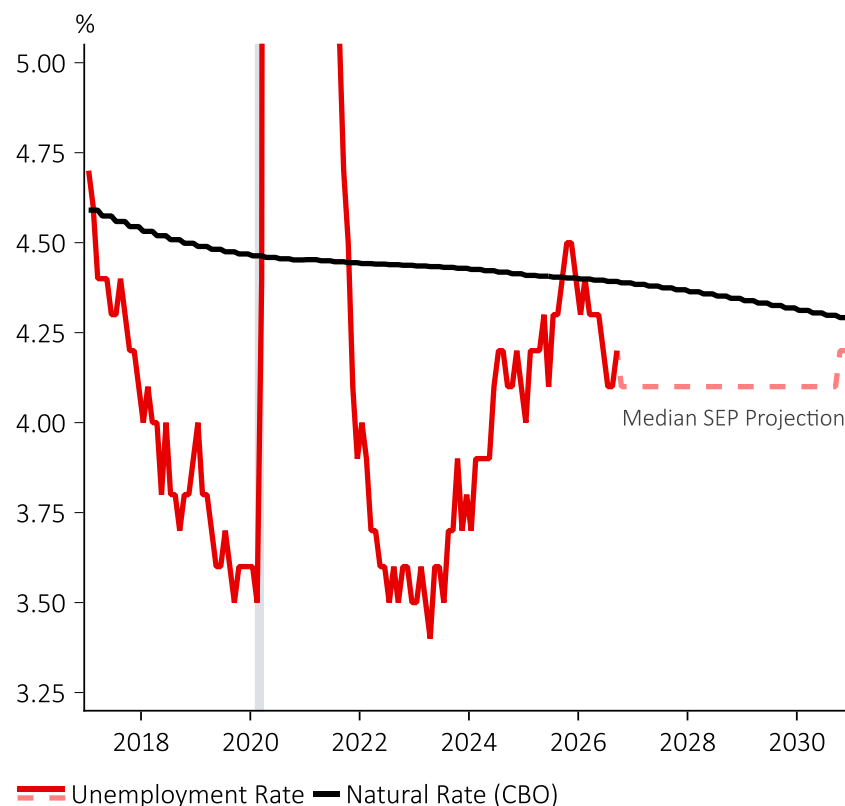
- Latest SEPs saw diffusion index on risks to the unemployment rate (U/R) fall into negative territory for the 1st time since 2021, indicating that FOMC views the risk of U/R falling further as slightly higher than the risk of it rising. Risks to GDP also flipped to the upside after years of growth relapse fears.
- Given that current estimate of the natural rate of unemployment are ~4.3-4.4%, the FOMC median forecast appears overly optimistic on the trajectory.

FOMC SEP Diffusion Index on Risks to Forecast



Source: Fed and MUFG US Macro Strategy

Unemployment Rate & Natural Rate of Unemployment



Source: BLS, CBO and MUFG US Macro Strategy

Section 3: Market Thoughts

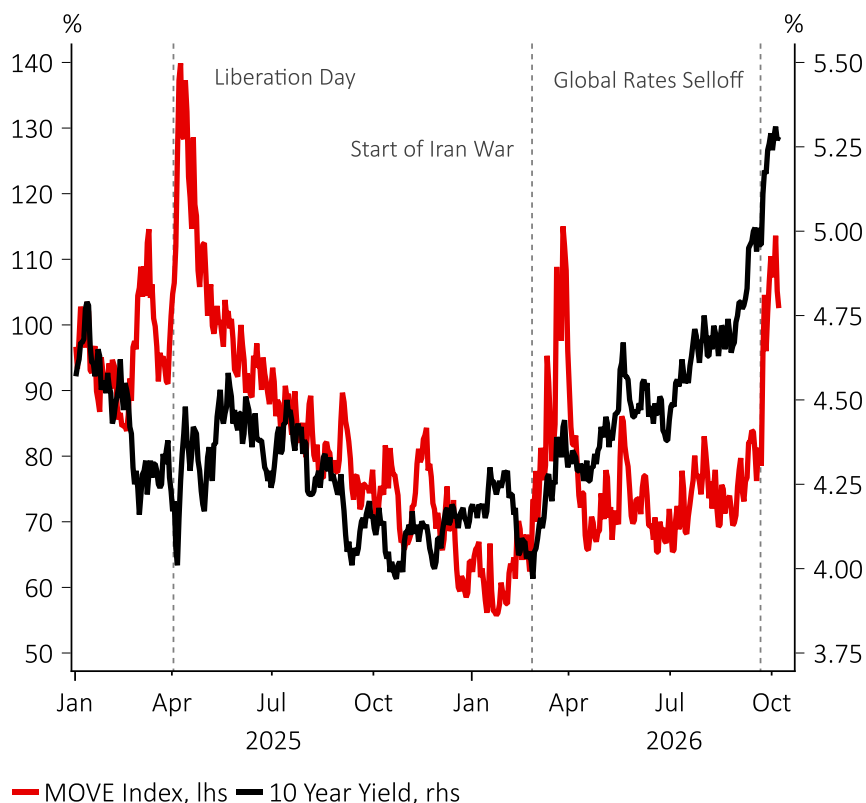
Rates overshoot creating deep-value?

Rates | The range of outcomes for implied vol increases at higher L/T rates

The sell-off in rates was orderly over the summer, as yields grinded up, however the last spike in late September/early October engendered a move in vol

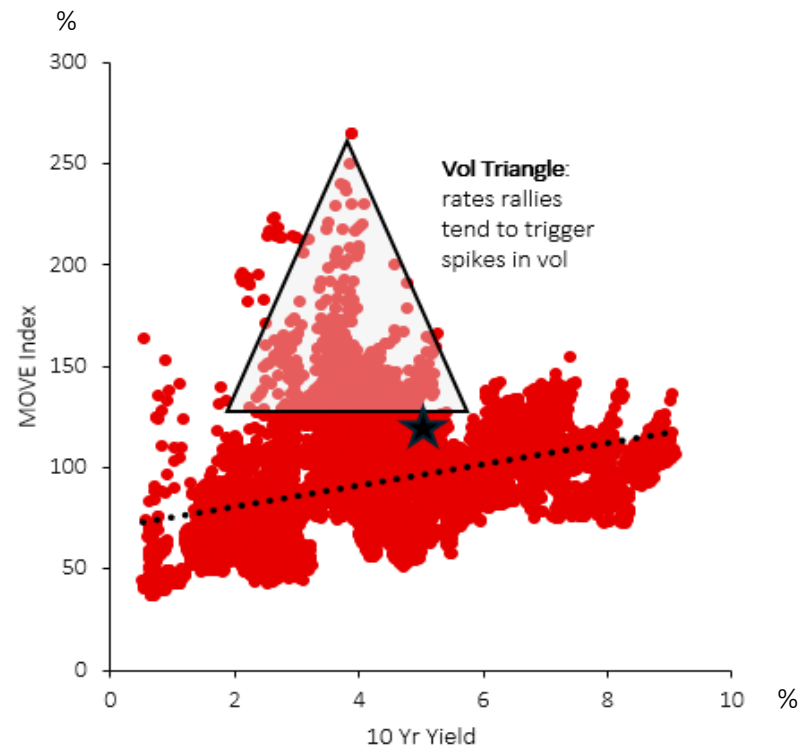
- Short spurts in implied vols, as seen by the MOVE index spike during the one-week pain trade of Liberation Day tend to fade quickly. However, with rates spending the full year grinding up and then experience what felt like a blow-off top in long-term rates around September quarter-end, those sort of moves can see more two-way risk for vols going forward as the range of outcomes open up at higher rate levels (as seen by the vol triangle).

MOVE Volatility Index to 10 Yr Yield



Source: U.S. Treasury, Bloomberg and MUFG US Macro Strategy

MOVE Volatility Index to 10 Yr Yield, Scatterplot



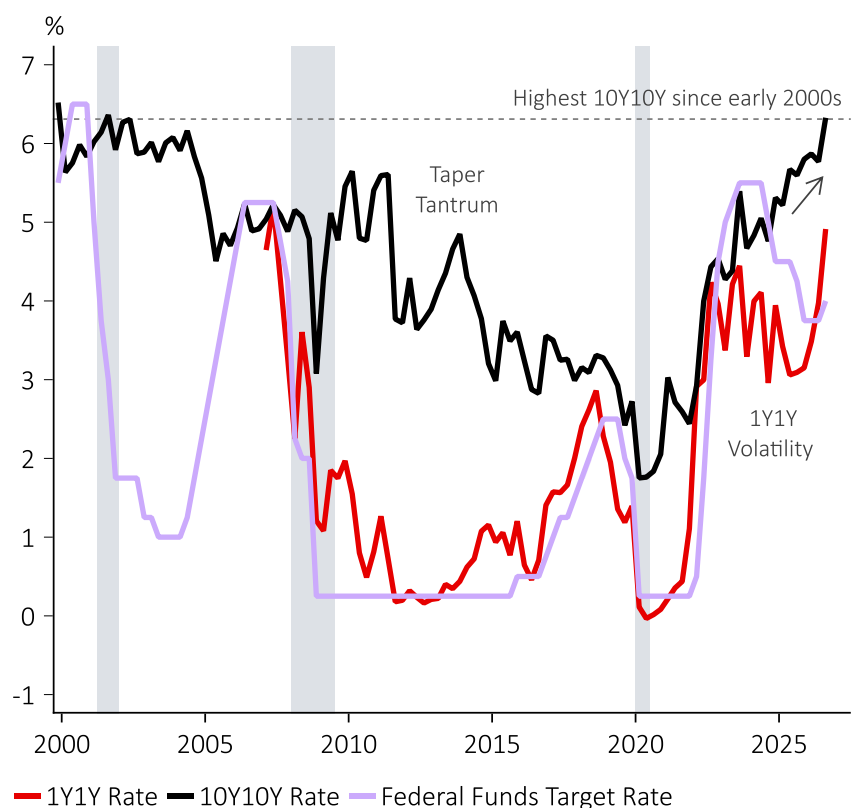
Source: US Treasury, Bloomberg and MUFG US Macro Strategy

Rates | L/T forwards diverged from fundamentals, curve focusing on supply

Long-dated forwards continue to unwind history (and likely have gone too far), while the curve has been focused on UST notes supply dynamics

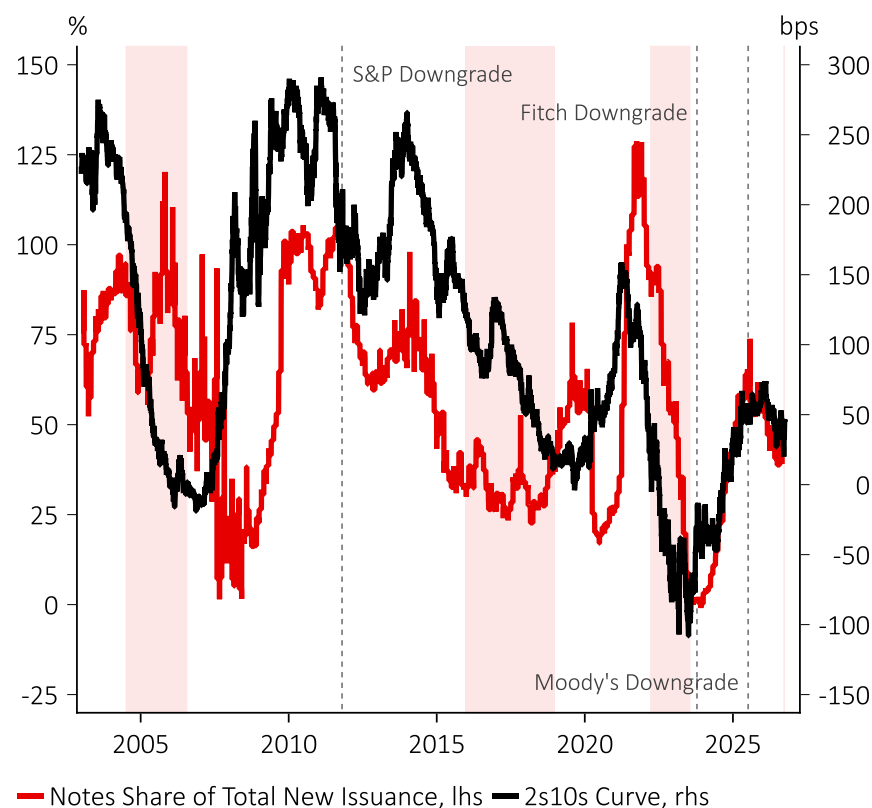
- Up until recently, the 1y1y and 10y10y rates were operating to their own devices. Even with the latest 1y1y breakout from the broad range, it has been in since the end of the super-sized hiking cycle of '22-23. Near-term forwards have not matched the total change of the 10y10y grind up.
- Meanwhile over the last 15 years, the share of UST notes issuance of new marketable debt has had a strong visual correlation with the 2s10s curve. Although we continue to expect the longer-end and L/T forwards to price in supply/fiscal concerns, all rate levels have likely overshoot to the high side.

US 1Y1Y vs 10Y10Y Forward Rates vs Fed Funds Rate



Source: Fed and MUFG US Macro Strategy

Notes Share of 12M Rolling Notes Issuance to 2s10s Curve



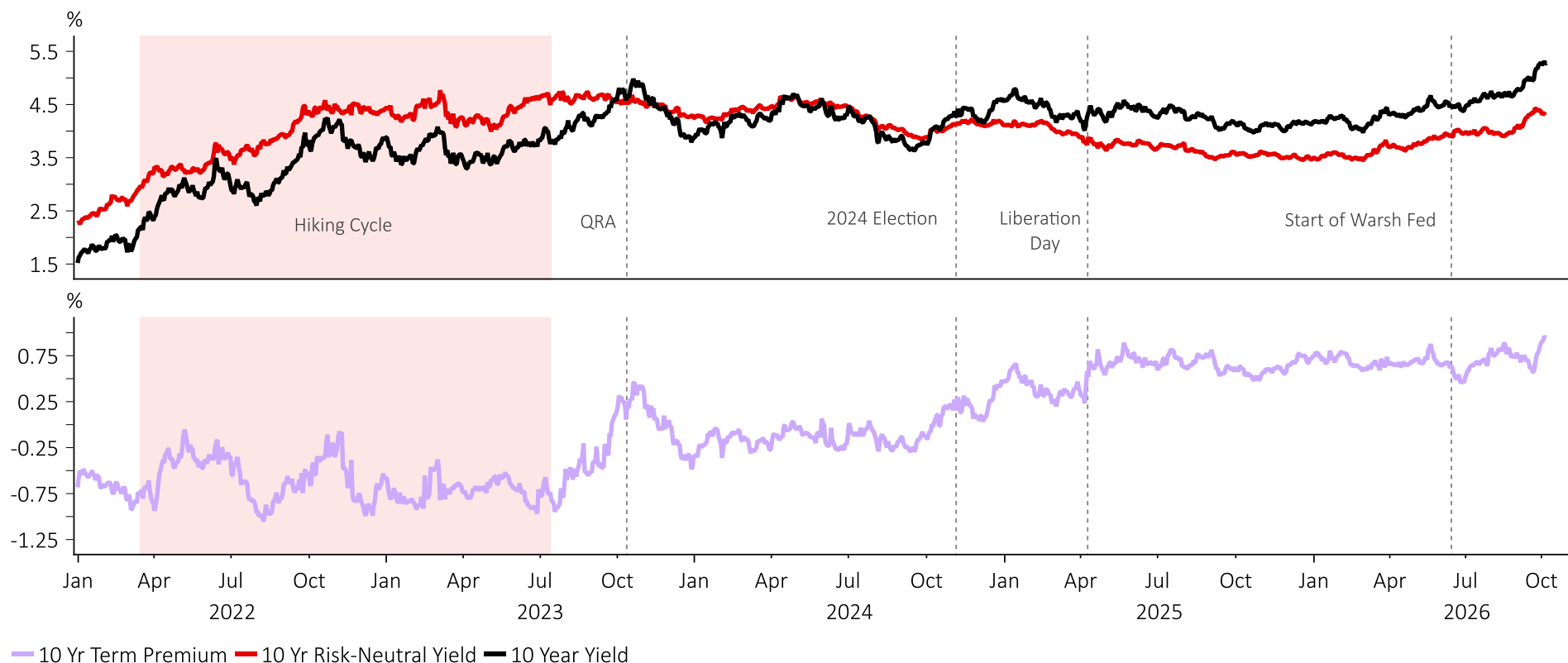
Source: U.S. Treasury and MUFG US Macro Strategy

Rates | Trump 2.0 Fiscal Policies, Making Term Premium (TP) Great Again?

Most of the rise in rates has been a function of real rates and a re-pricing of Fed expectations (risk-neutral) more so than TP, but fiscal fear keeping rates up

- In all fairness, TP has been rising ever since the Yellen Treasury decided, under former President Biden (into and out of the QRA in 4Q23) to lean on T-Bills versus terming out the debt (a policy initial criticized by the current Treasury Secretary – but who has since doubled-down on same idea).
- Ironically, the dream of “lower rates” has failed because Trump 2.0 fiscal policies (tariffs, debt financed tax-cuts, etc.) and the war are inflationary and/or boosting nominal activity. This has led to tension in the bond market remaining high (keeping yields up in the process) since early 2025.

UST 10Y Yields vs 10Y Risk Neutral Rate vs 10Y Term Premia (ACM Model)



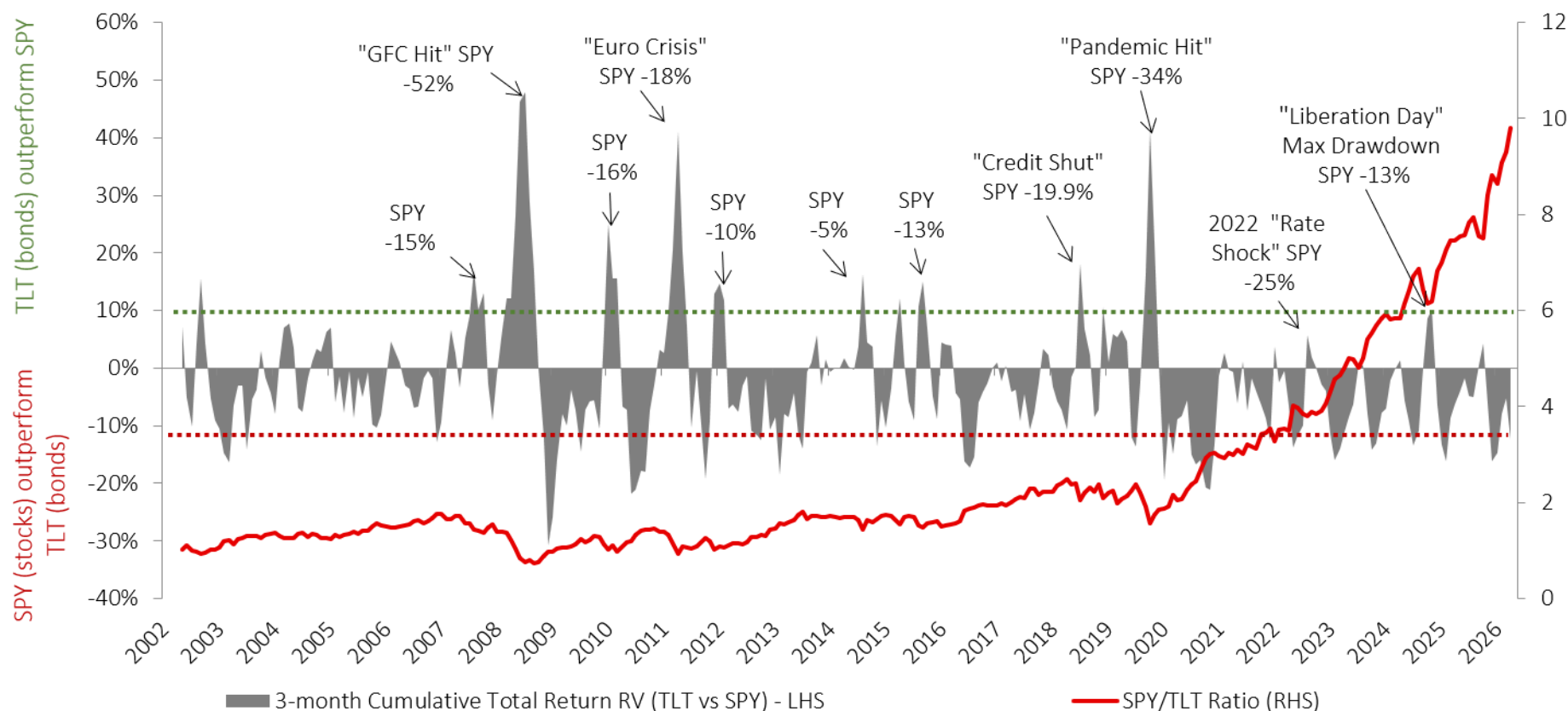
Source: New York Fed, U.S. Treasury and MUFG US Macro Strategy

Rates | Have USTs permanently lost FTQ status? Need risk-off to test theory...

Historically, bonds would perform in a risk-off move in equities, however, since the pandemic long-duration bonds have been unable to sustain a rally

- The last two equity drawdowns, the brief liberation day swoon and prior to that the Fed rate shock move in 2022, bonds only rallied 9 to 5% respectively versus equities being down -13% to 25%. Whereas prior to 2020 (pandemic) bonds would rally 10-40% on major equity decline.
- Post pandemic reliance on fiscal spending to keep the economy expanding, triggering inflation and supply/demand indigestion, hit USTs. That said, we still believe that in a risk-off move (via stocks drawdown or if USD goes bid over Euro-area concerns), USTs will serve as a portfolio hedge.

SPY/TLT Ratio vs 3M Cumulative Total Return (TLT as proxy for long-end of Treasury curve ETF vs SPY the SP500 ETF)



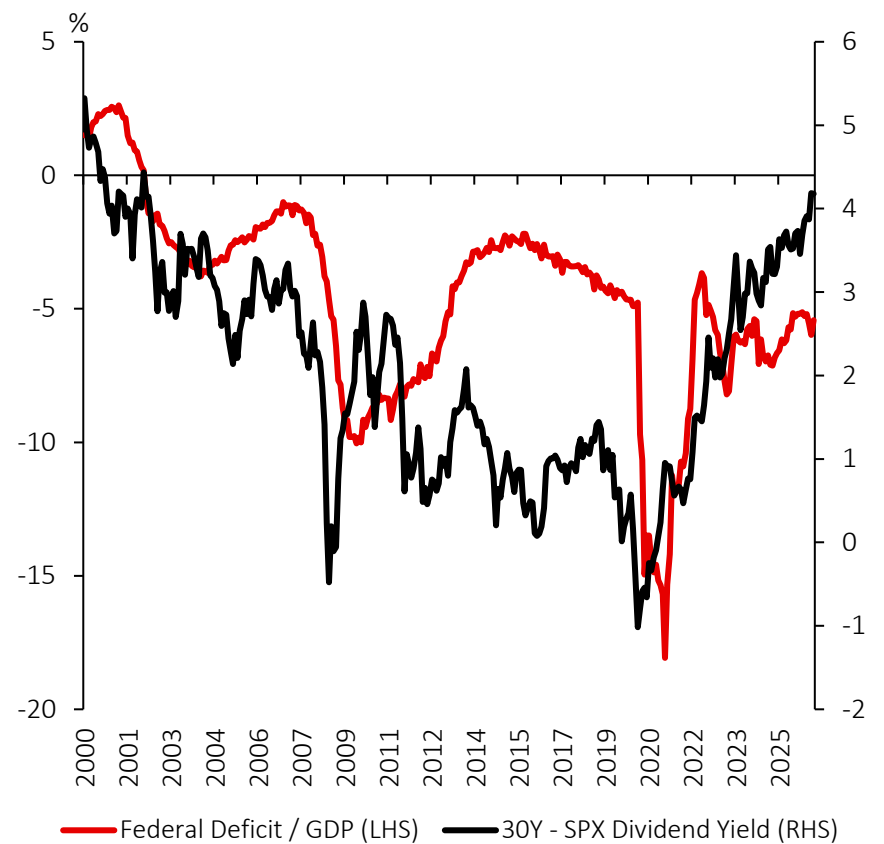
Source: Bloomberg, MUFG U.S. Macro Strategy

Cross Asset | USTs have had a rough return period, but look attractive to stocks

Nominal activity from ongoing fiscal policy (large deficits) have helped stocks perform but also pushed them to extreme returns versus long bonds

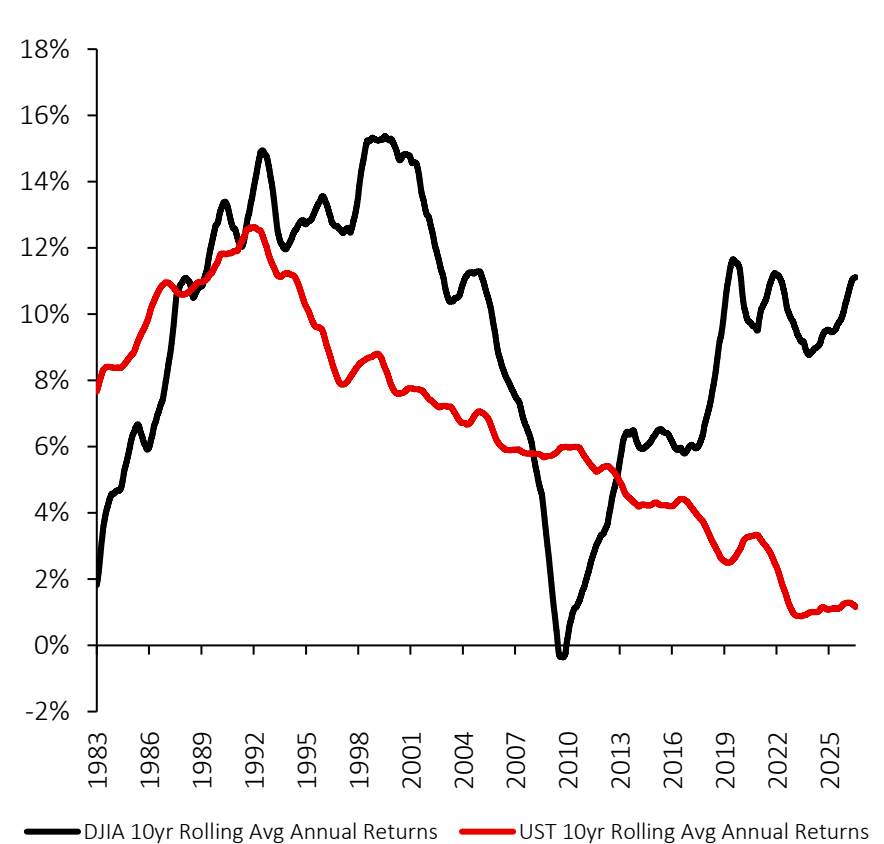
- We still think that USTs will perform in a more meaningful equity market correction, where long-term rates could have scope to decline 100 or more basis points if markets were to ever experience a risk-off environment that lasts for more than 1-month. Although there has not been a clear sign that asset allocation out of stocks into bonds have occurred, bonds are a real alternative, at least from a cashflow comparison of yields vs dividends.

30Y TSY Yield to SPX Dividend Ratio vs US Deficit to GDP Ratio



Source: Bloomberg, MUFG US Macro Strategy

SPX to IG Index 10Yr Rolling Returns



Source: Bloomberg, MUFG US Macro Strategy

Section 4: Special Topic

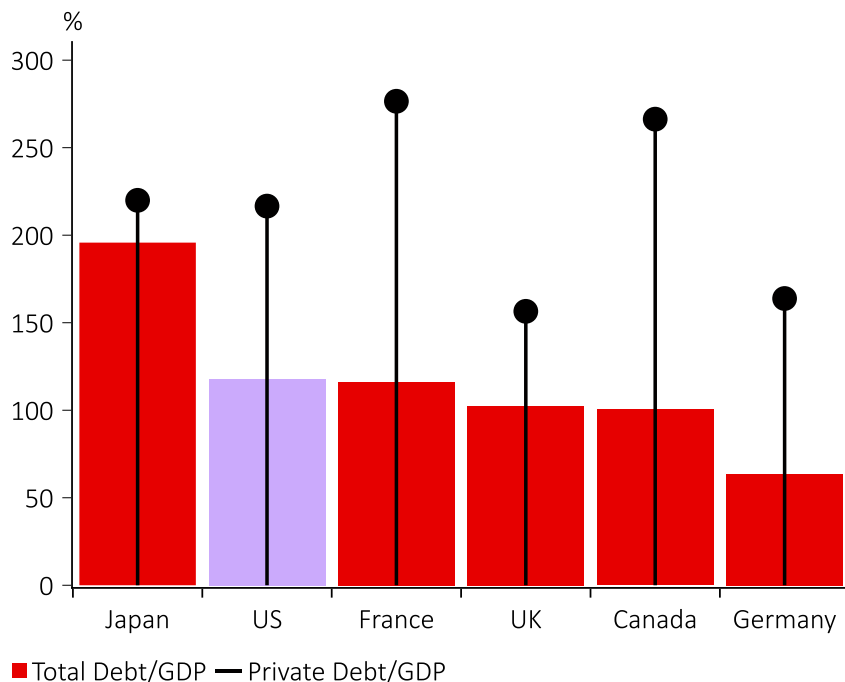
Fiscal House of Pain

Fiscal | High debt levels and big deficits are not a uniquely US phenomenon

Fiscal pressures are being felt globally across nearly all advanced economies in Europe, & Japan... and now in the US... leading to term premia returning...

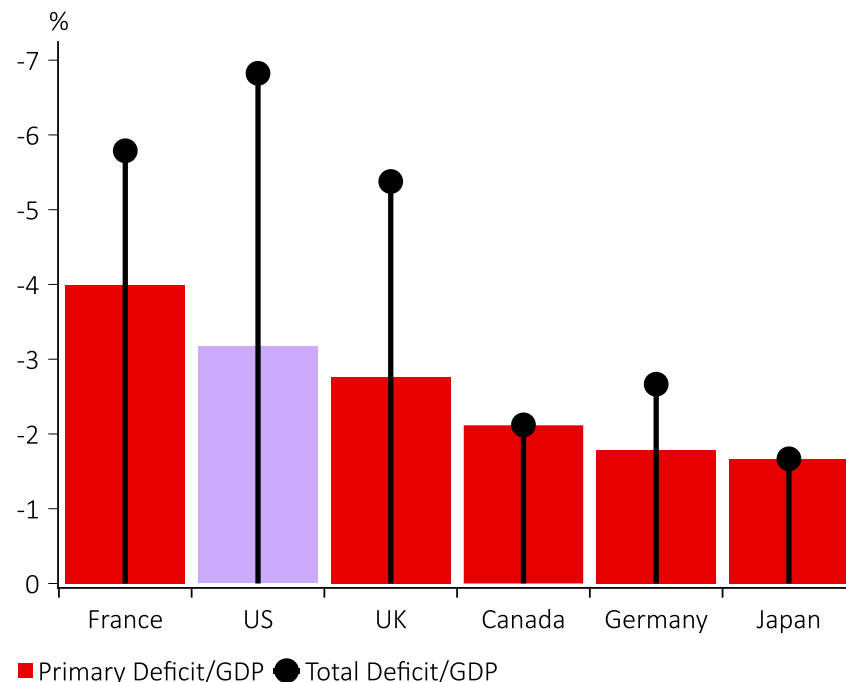
- Japan has the highest debt relative to GDP, but it's the persistent running of high annual deficits in the US and Europe that poses the most significant risk, especially as interest costs make up an increasingly larger share. Advanced economies are indeed caught between a rock and a hard place.
- Global bond market participants are keenly aware of these unsustainable developed markets (DM) debt dynamics leading to a return of some term premia. That said, the US debt markets still benefit from the reserve currency status, ability to print own currency whereas it's more precarious in Europe. Also, given Europe has many large money center banks, the overall high private debt levels reduce fiscal flexibility & raise credit concerns.

Public (bars) & Private Debt (lollipops) as a % of GDP, 2025



Note: Canada, France, and Japan as of 2024
Source: IMF and MUFG US Macro Strategy

Primary (bars) vs Total Deficits (lollipops) as a % of GDP, 2025



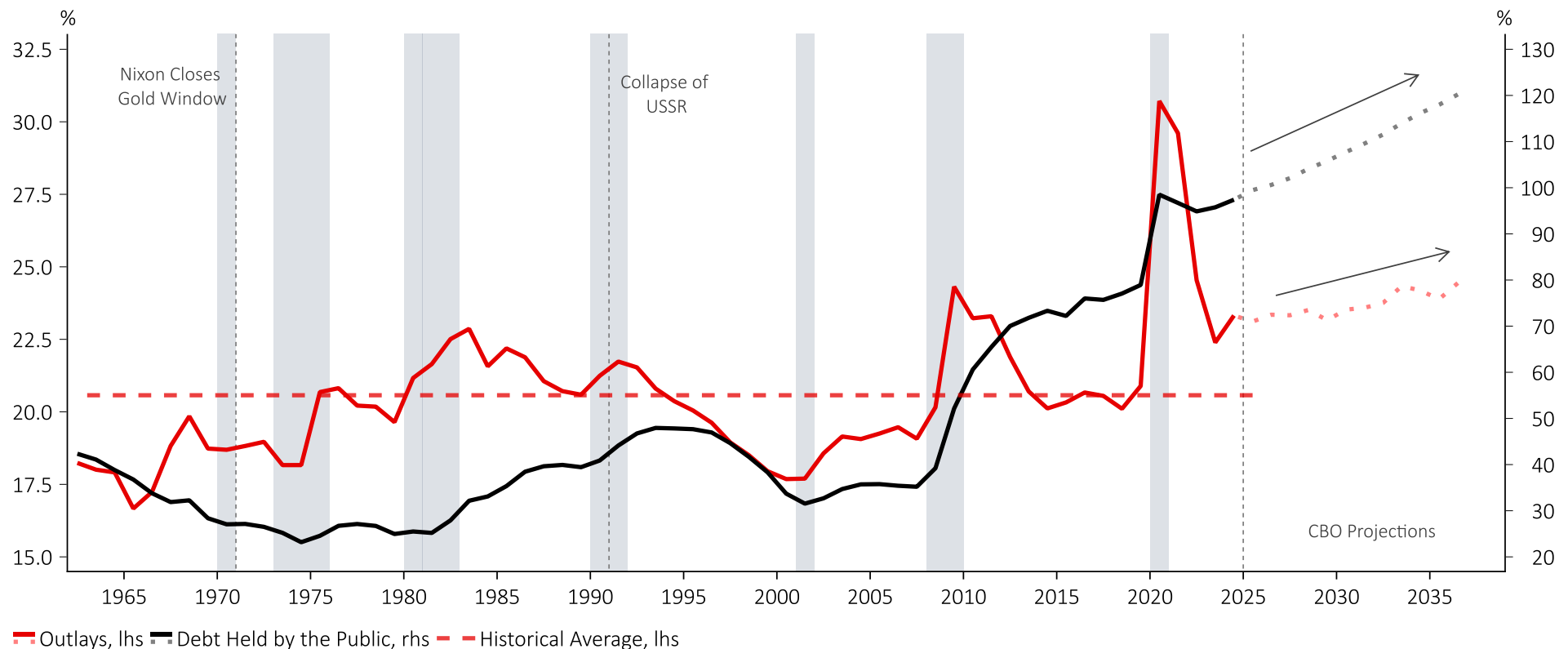
Note: Canada, France, and Japan as of 2024
Source: IMF and MUFG US Macro Strategy

Fiscal | Demographic & geopolitics are risks to already elevated US debt loads

Government outlays as a % of GDP has historically hovered just over 20% of GDP, only increasing during recessions, lately spending remains above average

- The US outspent the USSR on weapons and introduced tax cuts in the 1980s resulting in the U.S. gross national debt crossing the \$1 trillion mark. But after only a brief period of reduced outlays and lower debt loads, it's been no looking back as each administration has tacked on more debt since Y2k.
- Unfortunately, there is little political appetite for fiscal restraint and austerity measures typically backfire, negatively impacting growth and revenue to service debts. Now, spending to GDP is as high as it was during previous recessions (and projected to worsen) and that is without any apparent crisis.

Government Outlays & Debt Held by the Public as a % of GDP



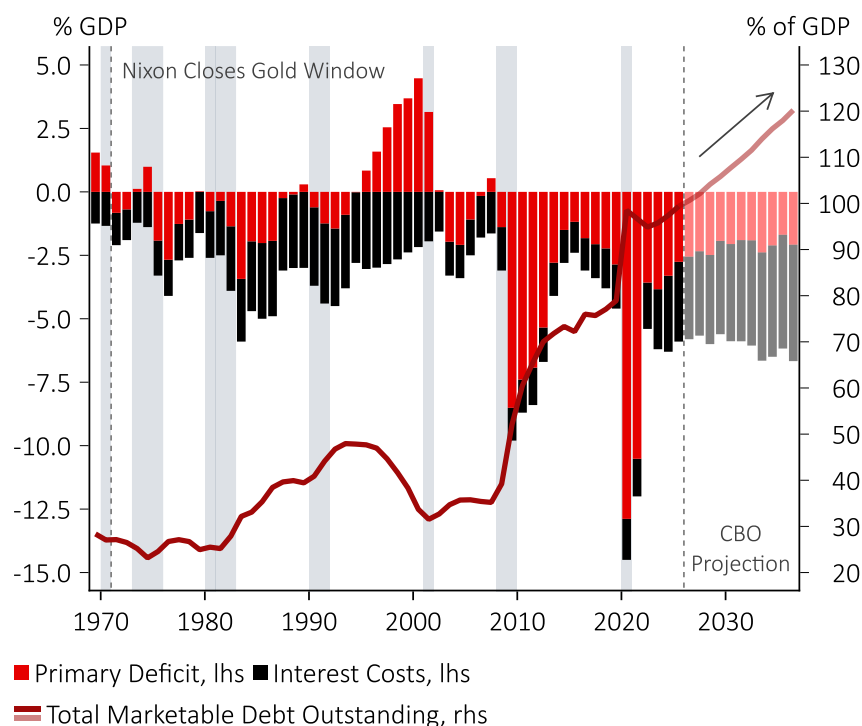
Source: CBO and MUFG US Macro Strategy

Fiscal | High interest rates pose a major hurdle to achieving US debt sustainability

Primary deficits are expected to improve under a moderate growth environment, but interest costs make up an increasing large share of the total deficits

- Interest costs are forecasted to be over double the size of the primary deficit by 2032. While more responsible fiscal policies can significantly improve the path for the primary deficit, elevated interest rates will maintain the deficit near 6% relative to GDP for the foreseeable future.
- Moving forward, the balance between interest rates and potential nominal growth will dictate whether the overall debt can stabilize or worsen. In the heatmap matrix, we estimate marketable UST debt to GDP ratios through 2030, assuming the CBO average primary deficit to GDP of 2.5%. It is very difficult to lower the US debt to GDP ratio over the next few years, growth needs to be running at 5% or higher and rates 200-300bps lower.

US Deficit & Debt as a % of GDP, by Fiscal Year



Note: Primary deficit + interest costs = total deficit
Source: CBO, OMB and MUFG US Macro Strategy

Marketable Debt to GDP Ratios; 2030 Growth vs Rates Scenario

		Average Nominal GDP							
		2.0%	2.5%	3.0%	3.5%	4.5%	5.0%	5.50%	6%
Average Interest Rate	2%	112.78	110.23	107.76	105.36	100.76	98.55	96.41	94.32
	2.50%	115.38	112.78	110.24	107.78	103.07	100.81	98.62	96.48
	3%	118.04	115.37	112.78	110.26	105.43	103.11	100.87	98.68
	3.50%	120.74	118.01	115.35	112.78	107.83	105.46	103.16	100.92
	4%	123.50	120.70	117.98	115.34	110.28	107.85	105.50	103.20
	4.50%	126.31	123.44	120.66	117.96	112.78	110.29	107.88	105.53
	5%	129.17	126.24	123.39	120.62	115.32	112.78	110.30	107.90
	5.50%	132.09	129.09	126.17	123.34	117.91	115.31	112.78	110.31
	6%	135.06	131.99	129.00	126.10	120.55	117.88	115.29	112.78

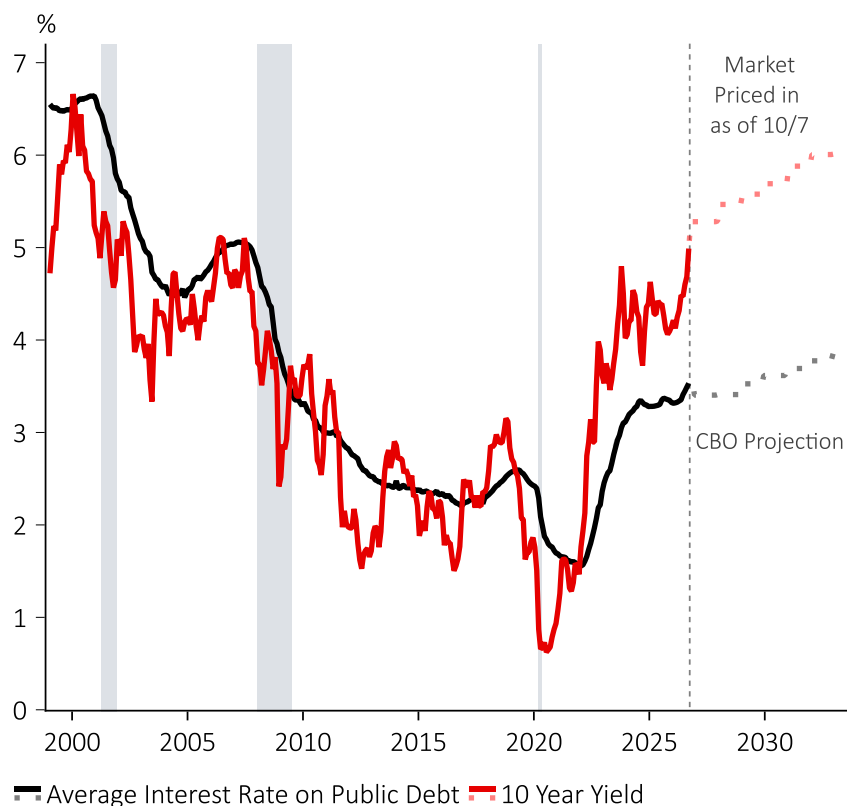
Source: U.S. Treasury, BEA and MUFG US Macro Strategy

Fiscal | US fiscal dynamics reaching a pivotal moment, at the “Ferguson limit”

Average interest on public debt outstanding is steadily rising with new debt being issued at higher rates pushing interest costs above defense spending

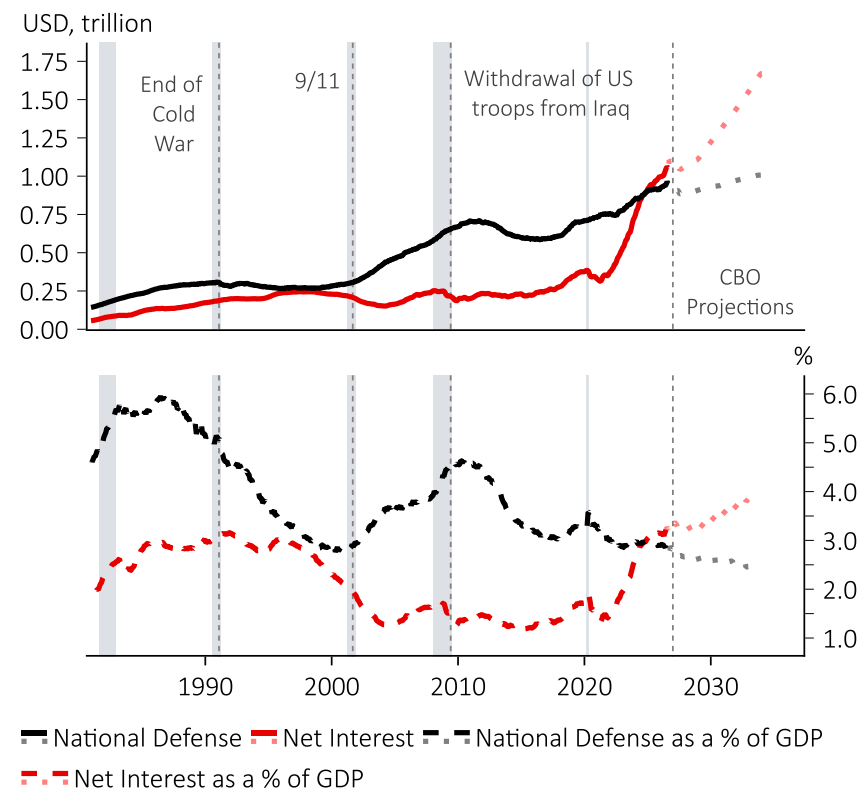
- Historically, Fed hikes resulted in only a minor bump in the average coupon of US debt outstanding. While we don't expect the Fed to embark on a prolonged hiking cycle, given the rolling over of debt (plus big deficits) at current rate levels, average interest costs will rise as new debt replaces old.
- Current futures pricing is inconsistent with moderate growth and 2% inflation, with forward 10-yr rates showing an unsustainably high 6% by 2032.
- Ferguson's law identifies the risk that large empires face once their debt servicing costs exceed defense spending, US reached that point in 2025.

10 Yr UST Yield vs the Average Interest Rate on UST Debt



Source: U.S. Treasury, CBO, Bloomberg and MUFG US Macro Strategy

Net Interest Expense & National Defense Spending, % of GDP



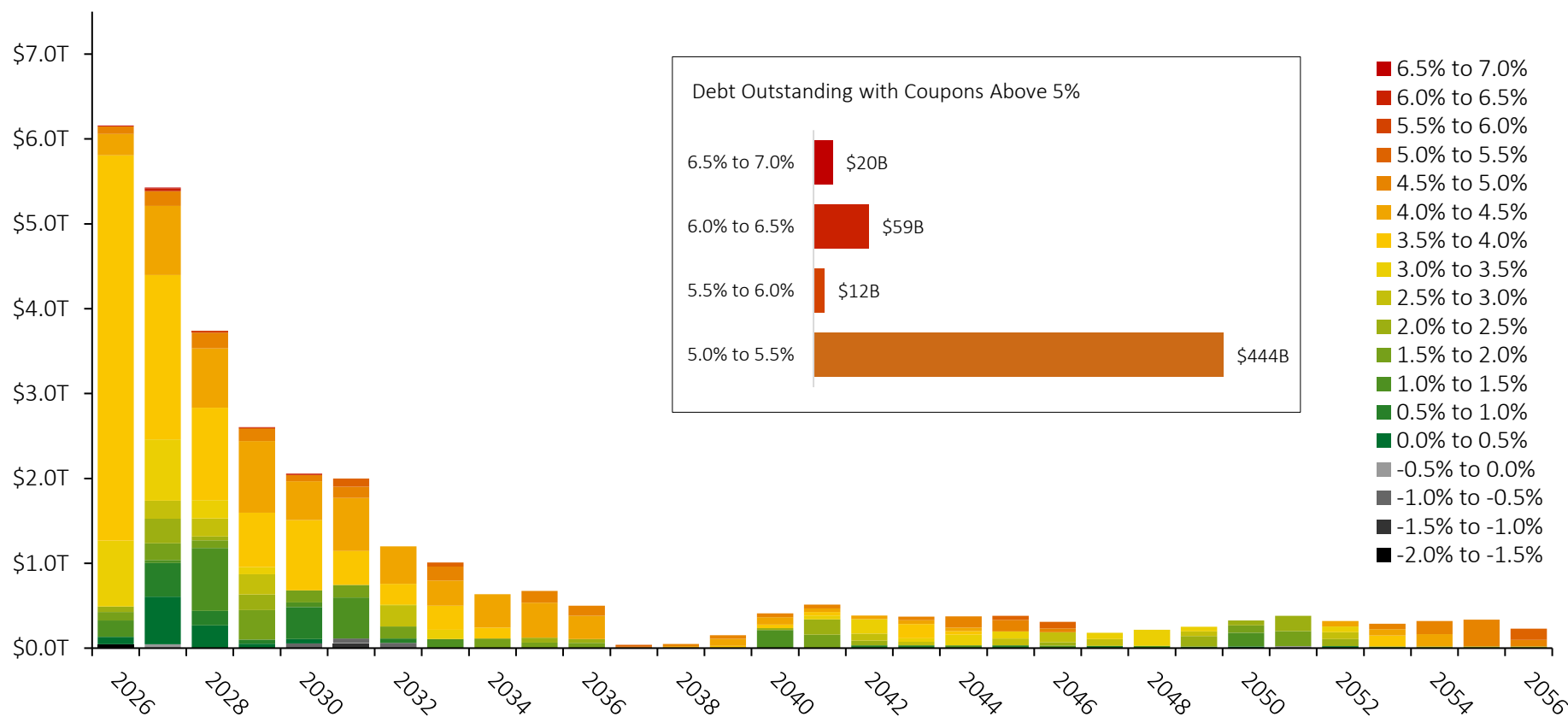
Source: U.S. Treasury, CBO and MUFG US Macro Strategy

Fiscal | The US faces rollover risk that will likely embed interest costs in 2027-'28

Majority of the Treasury's lower-coupon debt is set to mature over the next two years, with the new debt likely to be issued at a higher rates

- Given the aging of the legacy UST debt outstanding, the number of USTs with coupons over 5% is around \$535bn, less than 2% of the total debt
- There is a continued need to rollover trillions in debt and fund big deficits each year. If the whole US yield curve stays near or higher than 5%, the US government will start to restack higher coupon costs into the outstanding debt, embedding higher debt servicing costs for years.

US Debt Stack by Maturity and Interest Rate Bucket, as of September 30, 2026



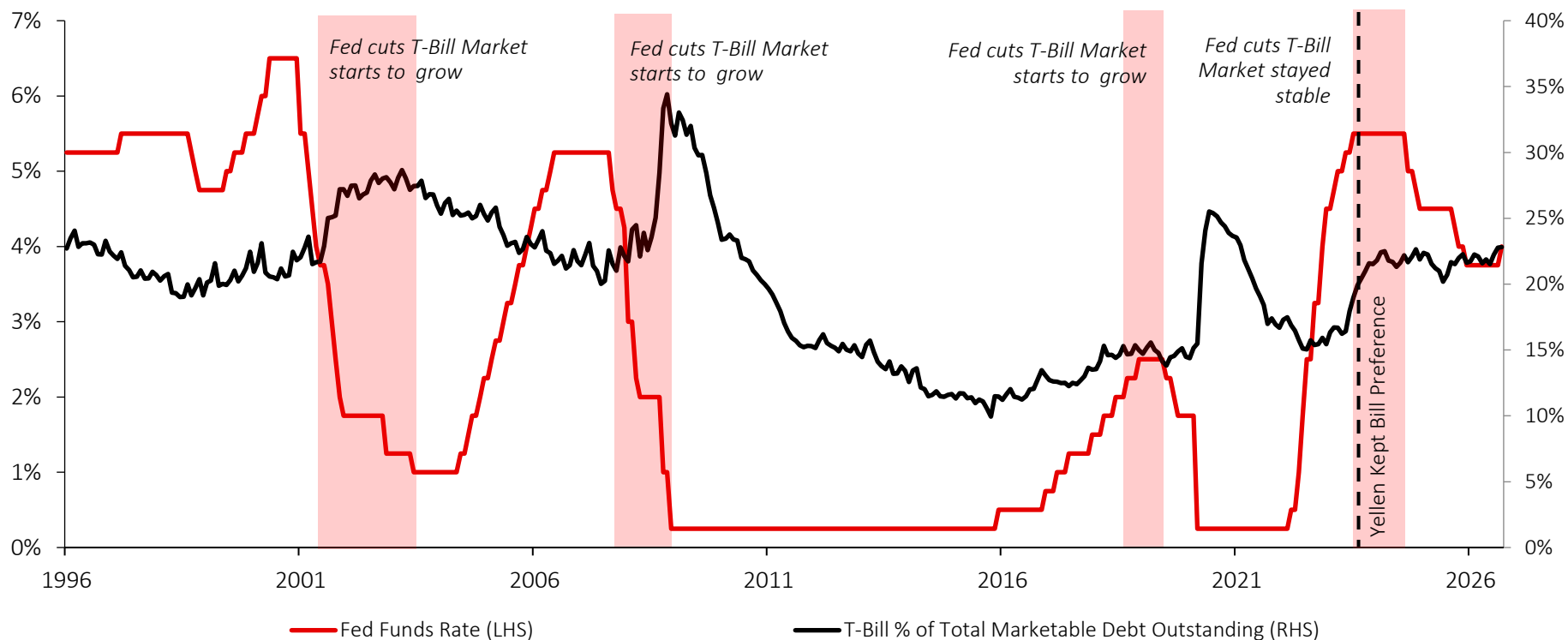
Source: US Treasury, MUFG US Macro Strategy

Fiscal | Expecting rates to fall, Bessent has maintained his predecessor's policy

When T-bills are the largest Treasury category (like in 2008 and 2020) and the Fed changes rates policy, it can have a material impact on interest costs

- After the October 2023 QRA, the Treasury did not term out the debt, a policy the current Treasury under Scott Bessent has continued. If T-bills become a disproportionately larger piece of the total UST debt outstanding, it would make UST debt servicing costs become more pro-cyclical.
- Pro-cyclical funding will make issuance less predictable and funding costs less stable too. Furthermore, even though Treasury buybacks help retire less liquid long-term off-the-run USTs, It is now wise to keep shifting issuance into shorter maturities at the expense of long-term sector issuance.

Federal Funds Rate to T-bill Share of Outstanding Debt



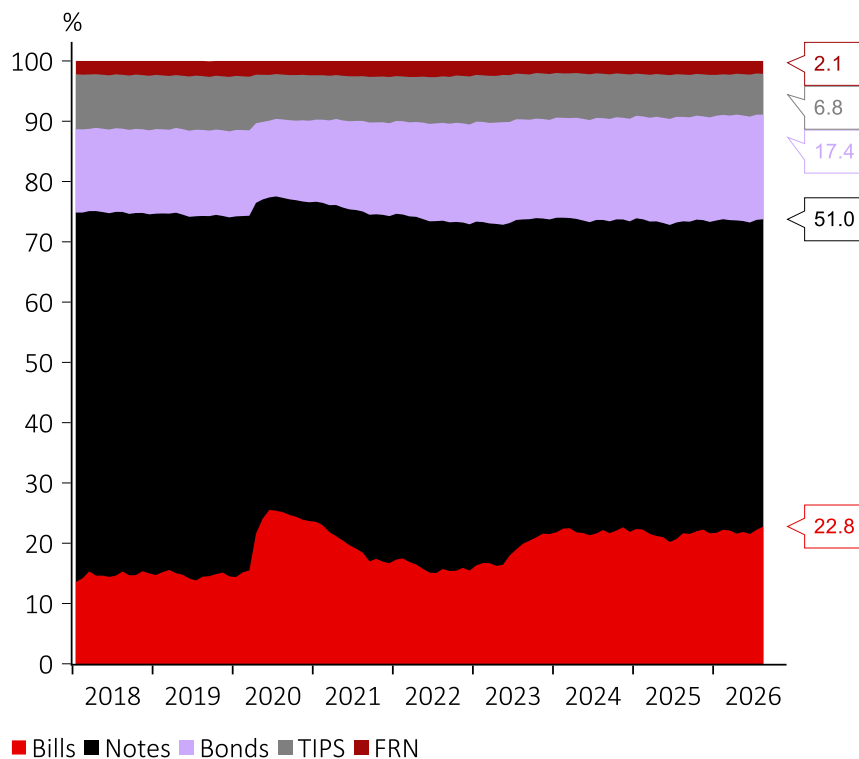
Source: Bloomberg and MUFG US Macro Strategy

Fiscal | Expect tweaks, not wholesale changes, to US debt funding strategy

There is a limit to how much government financing can rely on short term funding through T-bills issuance w/ bills already financing ~23% of the debt

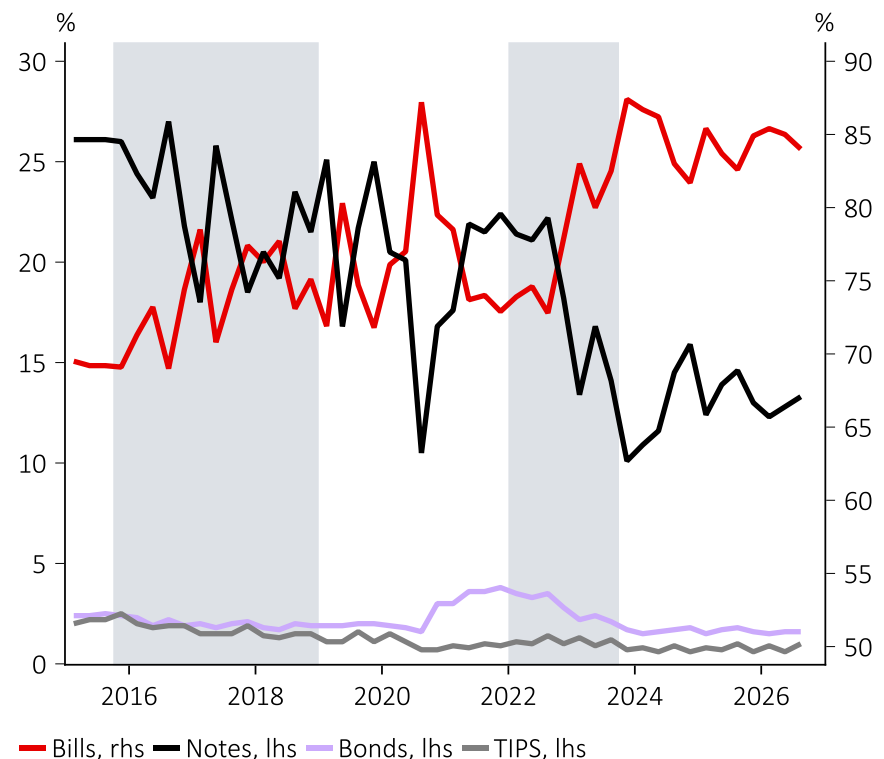
- Bills issuance typically rises during periods of crisis as a quick way to fund fiscal stabilizers and/or inject liquidity. Existing elevated levels of high T-bills as % of total debt may hinder the government's ability to issue more in a crisis, as it would overexpose the debt to Fed policy and rollover risk.
- During the pandemic, bills share of total debt increased from ~15% to ~25% as the Treasury issued ~\$2.4 trillion to finance fiscal stimulus. If a similar event were to happen again, the Treasury has much less capacity to issue debt due to the large debt load and high T-bill share of financing.

Marketable Securities Outstanding, Share of Total



Source: SIFMA and MUFG US Macro Strategy

Rolling Activity: UST Gross Issuance Share by Security Type



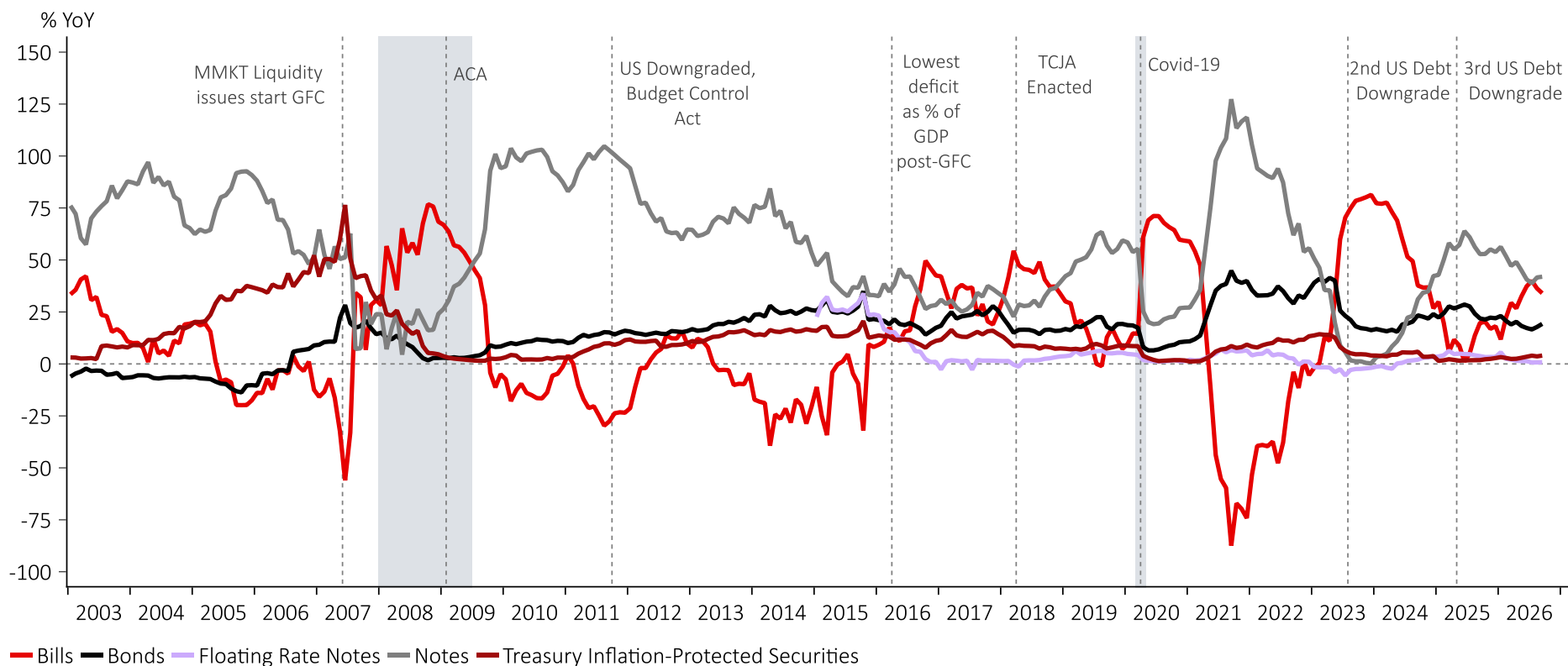
Source: U.S. Treasury and MUFG US Macro Strategy

Fiscal | Did the US miss the window (since 2023) to further term out the debt?

Bills tend to rise as percentage of total issuance during periods of economic stress while the notes program does the heavy lifting when deficits stabilize

- The bill market is usually the shock absorber whenever the US government needs to issue large sums of debt quickly to fund fiscal stabilizer (seen post GFC and Covid 19). However, it's the UST notes program (2s -10s) that does the heavy lifting when the US gov't needs to term out its debt load.
- Interestingly, the last decline in notes as % of total issuance was post 1st downgrade. The 2nd downgrade occurred around the time that Yellen did not term out the debt. And the 3rd downgrade occurred when the notes program was providing most of the financing of annual marketable debt.

Share of Rolling 12M UST Issuance by Security Type, YoY % Change



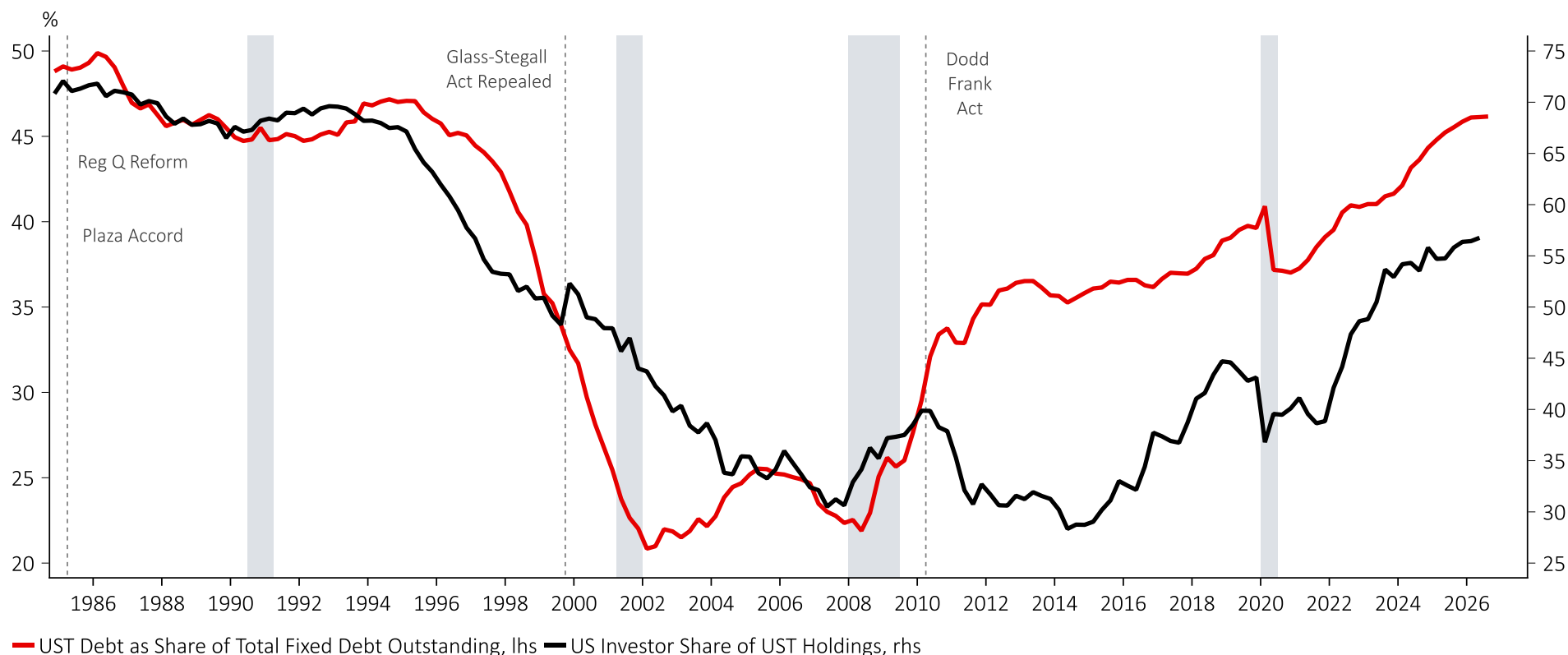
Source: U.S. Treasury and MUFG US Macro Strategy

Fiscal | Continued government deficits poised to crowd out private markets

The growth of US federal debt has been outpacing private debt growth since the GFC, making publicly held debt a larger share of total debt outstanding

- US government debt has increased its share of total domestic debt, reaching shares of GDP not seen since the 1990s. This comes at a time where additional Treasury supply has largely been absorbed by US domestic investors (whereas in the past most of the new UST demand came from foreign investors). Competition for capital has been a factor in the rise in rates and is leading to some crowding out of credit for private markets.

US Public Debt Share of Total Debt & the % Held by US Public



Source: Bloomberg, Federal Reserve, US Treasury and MUFG US Macro Strategy

Fiscal | Foreign Central Banks are no longer the net buyers of Treasuries

While demand for Treasuries across the board is positive, medium-term trends in UST demand are driven by GSEs, ETFs, and non-financial businesses

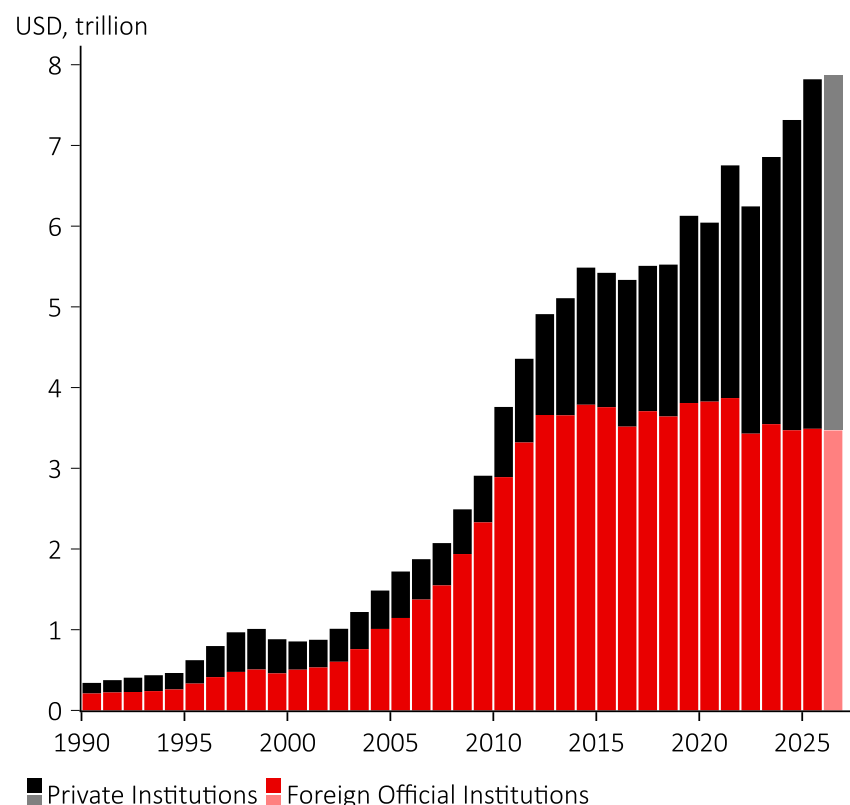
- The largest investor categories that have traditionally been primary sources of UST demand (foreign holders and the Fed) have slowed their purchases of USTs amongst slower reserve accumulation by foreign central banks and quantitative tightening/ balance sheet runoff by the Fed.
- Private UST demand, particularly from ETFs, jumped. Nonfinancial business and GSEs cash seems to be moving into USTs (although the overall total share remains low). Foreign demand has also shifted away from official flows (central banks) to more private buyers (but likely hedge funds via basis).

Treasury Holdings by Investor Type, Q2 2026

Investor	Holdings (Billions, USD)	Share of Total (%)	2 Yr CAGR (%)	CAGR - Total (%)
Foreign Holders	9,269	32	5.7	-2.69
Federal Reserve	4,083	14	1.1	-7.26
Money Market	3,282	11	15.7	7.36
Households & Nonprofits	2,831	10	10.2	1.83
Banks & Credit Unions	2,041	7	12.8	4.44
Mutual Funds	1,741	6	10.6	2.26
State & Local Gov	1,648	6	5.4	-2.94
ETFs	808	3	24.2	15.88
Private Pension Funds	590	2	9.8	1.44
Public Pension Funds	585	2	10.2	1.86
Insurance Companies	609	2	5.1	-3.24
Nonfinancial Businesses	313	1	20.6	12.21
GSEs	274	1	27.0	18.62
Other	939	3	16.5	8.18
Total	29,014	100%	8.4%	-

Source: MUFG US Macro Strategy

Private vs Official Share of Foreign Holders of US Treasuries



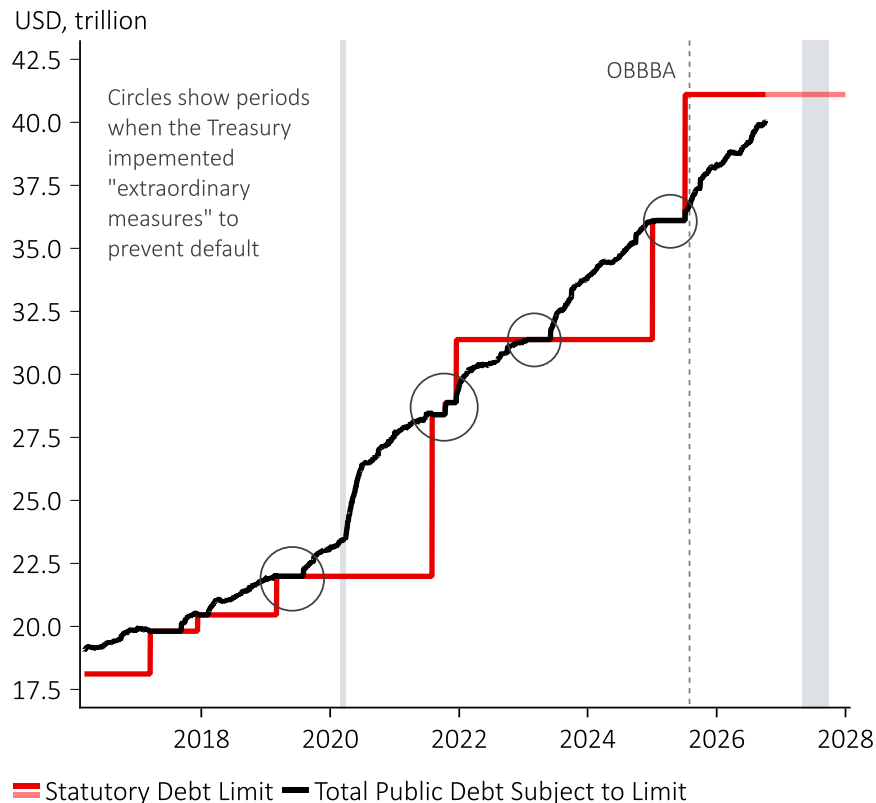
Source: Federal Reserve and MUFG US Macro Strategy

Fiscal | US to hit debt limit and exhaust extraordinary measures by mid 2027

The current pace of spending will have the US hit the debt ceiling in early FY27, necessitating the use of extraordinary measures if not raised or suspended

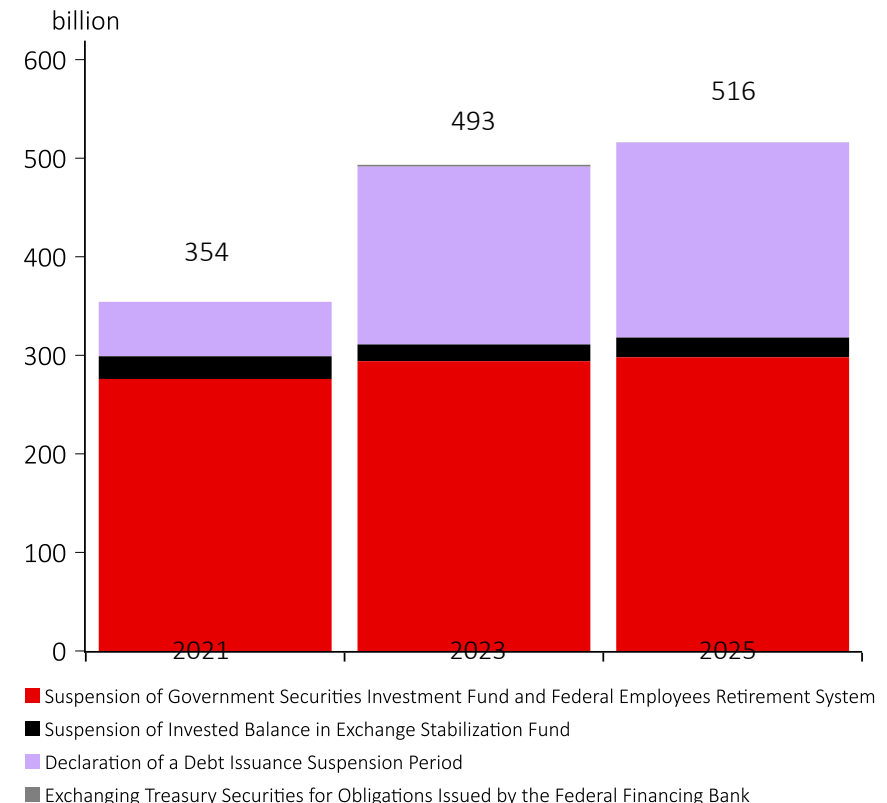
- Political partisanship poses a risk that the debt ceiling will not be raised or suspended in a timely manner, with a Democratic sweep or split Congress increasing that risk. If the debt ceiling is not raised or suspended, the Treasury will be forced to use “extraordinary measures” to prevent default.
- In recent history (2021-2025 experience), Treasury had approx. \$450B in funds available for use of extraordinary measures to last around 6 months.
- Further complicating this path is that Treasury has a big buyback program to fund, and central clearing of repo in mid 2027 may drive collateral demand.

US Debt Limit vs Public Debt Outstanding



Source: U.S. Treasury and MUFG US Macro Strategy

Use of Extraordinary Measures in Prior Government Shutdowns



Source: Congressional Research Office and MUFG US Macro Strategy

Section 5: Forecasts

US Fixed Income and Economic Scenarios

Forecasts | US Fixed Income Scenarios, Fed Views with UST Rates Path

10Y Yield	IG Spreads	HY Spreads	Mortgage Spreads
5.24 (Last)	81 bps (Last)	310 bps (Last)	122 bps (Last)
<i>Low</i> <i>High</i>	<i>Low</i> <i>High</i>	<i>Low</i> <i>High</i>	<i>Low</i> <i>High</i>
5.000% - 5.500%	100bp - 140bp	350bp - 450bp	140bp - 160bp
4.000% - 5.000%	80bp - 100bp	275bp - 350bp	110bp - 140bp
3.500% - 4.000%	70bp - 80bp	250bp - 275bp	90bp - 110bp

Source: MUFG US Macro Strategy as of 10/9/2026

Note: Top range = bear case, Middle range = base case, Bottom range = bull case

Tenor	Q4-2026	Q1-2027	Q2-2027	Q3-2027
Fed Funds Rate	4.125	4.125	4.125	3.875
US 2-Year	4.500	4.250	4.125	3.875
US 5-Year	4.625	4.500	4.375	4.250
US 10-Year	4.750	4.625	4.500	4.375
US 30-Year	5.375	5.250	5.000	4.875

Source: MUFG US Macro Strategy as of 10/09/2026

Forecasts | US Economic Scenarios (Current vs Historical Estimates)

Historical Frequency (Since 1947)	US Economy Scenario Probabilities	Apr 2025	May 2025	Jun 2025	Jul 2025	Sept 2025	Oct 2025	Nov 2025	Mar 2026	June 2026	July 2026	Oct+ 2026
3%	Boom Period (High GDP/ High CPI)	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	5%
55%	Goldilocks (Potential GDP/ Stable CPI)	0%	0%	0%	0%	10%	10%	5%	0%	0%	0%	10%
20%	Stagnation (Low GDP/ Low to Stable CPI)	10%	20%	25%	30%	15%	10%	10%	10%	20%	30%	25%
8%	Stagflation (Low GDP/ High CPI)	40%	35%	35%	40%	45%	50%	50%	50%	45%	40%	35%
14%	Mild/Hard Recession (Negative to Low GDP/ Low to Negative CPI)	50%	45%	40%	30%	30%	30%	35%	40%	35%	30%	25%

As of Oct 9, 2026

Source: MUFG US Macro Strategy

* Note: Probabilities refers to the likelihood of any given scenario over a 12-18 month forecast window

* Low vs High for GDP and CPI is in comparison to potential GDP of 2% and Central Bank Target of 2%

* For stagnation: In this scenario growth is coming in sub-potential GDP (of roughly 1.75%) and annual inflation is low to stable

*For stagflation: In this scenario inflation is coming in above Central Bank Target, actually well north of 3.25%, while growth is lackluster

*For recessions: When assigned a number for this scenario that is greater than the sum of other potential scenario outcomes, it implies our base case and that the economy is on the path towards a hard landing. If its 50% means a mild recession/bumpy landing expectation

+ Latest view is altered if we have a change in a specific economic scenario probability in a specific monthly report

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