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US Rates Strategy Weekly August 14, 2026 Joseph Abate, US Rates Strategy Monty Gandhi, US Rates Strategy Troy Ludtka, US Economics joseph.abate@smbcnikko-si.com mgandhi@smbc-cm.com troy.ludtka@smbcnikko-si.com 1 212 893-1592 1 212 224-5114 1 212-224-5483 • Can AI produce more accurate forecasts than economists? On the surface, the results are not encouraging for economists. • The mean squared forecast error from an AI inflation forecast (2019-23) is lower than for economists surveyed by the Philadelphia Federal Reserve. AI does a better job at predicting turning points as well. • But, the AI model's out of sample forecast is biased by future, supposedly unknown data that inadvertently leaks into the AI's training. Because AI is a black box it is difficult to prevent data leakage especially as much of the data used to train the model is not time stamped. • Once this is accounted for, AI's forecast accuracy declines. Economists at the Cleveland Fed outperform AI in true, out-of-sample forecasting horse races by a factor of 7-fold. AI's longer-term projections tend to mean revert and "glide" to the Fed's 2% target. • The Fed temporarily paused its reserve management purchases. We do not believe this is an indication of its longer-term balance sheet plans. Bank reserves have held steady around \$3trn since June and softer overnight funding rates largely reflect reduced demand for financing rather than an oversupply of liquidity. • Favor 5s30s steepeners as easing inflation and softer labor data support belly, while long-end yields remain vulnerable to fiscal and AI capex led supply risks. • Lower expected volatility and a robust risk sentiment favors swap spreads as carry should be helped in the short term. • Most participants at the July FOMC meeting expect underlying inflation pressures to revert to the Fed's 2% target over time. The minutes may reveal more of the underlying details of their thinking and how patient they are willing to remain. We look for industrial production to rise 0.3% in July. Is AI better than economists? Can AI produce more accurate forecasts than economists? Several recent studies examine whether large language models like ChatGPT can produce more accurate forecasts of inflation. On the surface, the results are not encouraging for economists. That said, there are important caveats with AI-produced forecasts that raise questions about whether these are truly forecasts or memories. Forecast studies of economists and AI models attempt to replicate real life. They run a horse race in which economists and AI forecast inflation based only on information as of a particular date. The resulting out-

SMBC US Rates Strategy Weekly 2 of-sample forecast is compared against the actual inflation path. The winner of the race is the one whose mean squared error (actual less predicted) is lowest. Squaring the difference normalizes forecast over/undershooting. AI models are trained using all the historical inflation information – surveys, price menus, quotes, and official commentary – available to the cut-off date. Economists also use this information but at a much narrower scope. Both also use market-based expectations from the TIPs market to shape their views. But while economists input all this data into a structural model of inflation, AI is "trained" off it. Instead of a structural model with replicable parameters and out of sample forecasts, AI is using its own, learned, time-varying probability based "black box" model. The forecast results can be "temperature" adjusted to produce narrow, more deterministic forecasts or ones with more random and variable forecasts. The basic AI forecast structure is set up as follows. "Assume it is July 15, 2020. Do not use any information that was not available to you on July 15, 2020. Provide a forecast of seasonally adjusted CPI y/y growth for years 2021-2025." Faria-e- Castro et al compare an AI based model's CPI y/y forecasts against those from a survey of economists in the

Philadelphia Fed's Survey of Professional Forecasters (SPF). 1 They find that the results from the AI query above are generally more accurate than the SPF. Over the entire 2019-23 period, the MSE (mean squared error) for the AI model is 3.0 compared to 5.7 in the SPF. The SPF performs better than the AI model in 2019 and 2023 but worse between 2020-22. Forecasts out 4y (t+4) are similar – with AI outperforming the economists. 2 Forecasts or memories? So, should market participants replace or retrain their economists? It may be a little early for that. There are two related issues with AI forecasts. First, the black box nature of the AI model means that it struggles to explain the source data it is using or how it is aggregated. And second, because the training data are frequently not time-stamped it is not clear if the AI model isn't using information that would not have been available at the time of the forecast. Although the model may have been trained only through July 2019, it may still incorporate indirect knowledge of the COVID supply chain price spikes into its 2020 inflation projection. Data leakage means that its forecasts may not be true predictions but instead “pre - memories” which could account for AI's overperformance. Alam et al argue that the AI models are not making true out of sample forecasts with then-current data but instead making “pseudo out of sample” predictions. 3 Modelers test the AI by prompting it to name the current Treasury Secretary as of the end of its training period in order to prove that there is no future data leakage. And while the AI models correctly do this, there is still some evidence of data leakage. Alam et al test this out by asking AI to predict inflation out-of-sample and over a time period for which there is no data; ie, truly, out-of-sample, future data. Their model was trained through April 2023. It was then asked to produce month-by-month forecasts beginning in May 2024. Forecast results are best in the April 2023-May 2024 period suggesting there is some leakage even though it was asked not to use any information after April 2023. Forecasts deteriorate once AI is asked to forecast future, out of sample, 1 See “Artificial Intelligence and Inflation Forecasts”, M. Faria-e-Castro and F. Leibovici, Federal Reserve Bank of St. Louis, Q4 2024 2 The MSE for the AI model was 7.9 compared to 13.8 for the economists. 3 See, “Evaluating Inflation Forecasts of Generative AI”, M. J. Alam, S. Boyle, and T. Sekhposyan, Federal Reserve Bank of San Francisco, January 2026

SMBC US Rates Strategy Weekly 3 inflation for which there is no data. The MSEs increase and the AI model misses the month-to-month directional changes in inflation. Longer term inflation forecasts rely heavily on mean reversion to the Fed's 2% inflation target. 4 Indeed, these forecasts are “rigid and unresponsive” and after the training cut off; they are effectively the same regardless of when they are produced. Given these “pseudo out of sample” biases is AI better than economists at forecasting inflation? That is, in real time, and assuming no data leakage about future events, who produces more accurate inflation forecasts? Alam compare the MSE errors from their AI model against those produced by the Cleveland Fed. The Cleveland Fed's forecasts are based on market and survey data. The MSE from the out-of-sample AI model is 7x larger than the Cleveland Fed's forecast errors. In addition, the Fed's model is almost 4x more accurate at predicting turning points in inflation. Favor steepeners – data buys Fed time but risks remain The July inflation data were a step in the right direction with median consensus expectations for the July core PCE now at 0.22% m/m. However, hawkish Fed speak has led the markets to take a “show - me” attitude; it is looking for more disinflationary evidence before fully pricing out hikes. Figure 3 shows the 3m 25 delta skew (puts vs. calls) on 2y futures (TU) has not fallen much highlighting that the markets are not willing to lift their hedges against the risk of higher rates. Combining the benign inflation data with soft labor market data and decelerating wage growth, a case can be made that yields near the top of the range have more room to fall. Weighing against this are geopolitical risks and the lack of clarity on Fed's reaction function. In addition, supply from AI capex cycle and fiscal concerns could weigh on the long-end. The 5s30s steepener is how we prefer to own the constructive view (Figure 4). It expresses the rally in the front end/belly while avoiding the long-end supply risk. 4 As Faria-e-Castro also note. However, the SPF forecasts also “glide” to 2% over longer

forecast horizons. Figure 1: SPF expected inflation (% y/y) Figure 2 : Cleveland Fed expected inflation (% y/y) Note: One-year ahead. Source: Federal Reserve Bank of Philadelphia, SMBC Nikko Note: One-year ahead. Source: Federal Reserve Bank of Cleveland, SMBC Nikko 0 2 4 6 8 10 Mar-18 Mar-20 Mar-22 Mar-24 Mar-26 SPF Actual -2 0 2 4 6 8 10 Jan-19 Jan-21 Jan-23 Jan-25 Predicted Actual

SMBC US Rates Strategy Weekly 4 The key risk to the steepeners, alongside a very hawkish Fed stance, is a change in the issuance mix, where the Treasury would be expected to raise the issuance out to 5y while reducing long-end issuance (10y to 30y). We expect long-end auction sizes to be left unchanged. 5s30s carry slightly positive over the next 3m. Carry trades favored The soft payroll and benign inflation picture buys the Fed time to stay on hold. Gamma on shorter tails is near local lows. Lower expected volatility and a robust risk sentiment favors swap spreads as carry should be helped in the short term. With the 5y and 10y almost at the highs seen in May, we believe that the 30y spreads have room to catch up. Since the April FOMC, the relationship between the 10y yields and the SOFR futures implied terminal rate has moved back toward the Oct 2024 – Mar 2025 regime, away from the post-Liberation Day regimes. Before the April FOMC, the market had been trading in an intermediate regime between those two periods. Figure 3: 3m 25 delta puts less calls (% vol) Figure 4 : 5s30s UST Curve (bps) Source: Bloomberg, SMBC Nikko Source: Bloomberg, SMBC Nikko -0.4 -0.3 -0.2 -0.1 0 0.1 0.2 0.3 -1 0 1 2 Aug-25 Nov-25 Feb-26 May-26 Aug-26 FV (LHS) TU (RHS) -50 0 50 100 150 200 Jan-16 Jan-18 Jan-20 Jan-22 Jan-24 Jan-26

SMBC US Rates Strategy Weekly 5 Week ahead • Industrial Production (Jul, Tues) . We are forecasting 0.3% m/m for the Fed's headline industrial production series. The business equipment subcomponent has taken on added significance in recent years as it is correlated with real capital expenditures in the GDP accounts (Figure 5). Business equipment slowed in Q2 – to 5.8% y/y – after even more rapid growth in 2025. • FOMC Meeting Minutes (Jul, Wed) : Most participants expect underlying inflation pressures to revert to the Fed's 2% target over time (Figure 6). While core CPI and PCE are both primed to slow, the speed of the expected decline is being debated on the FOMC. A small cohort of three voters (Hammack, Logan, and Kashkari) are ready to raise rates now. But a larger group is more open to watchfully waiting (Cook, Warsh, Waller and Jefferson) or comfortable with current policy (Powell, Bowman, Barr, Williams, and Paulson). Although we know the outcome of the meeting it will be interesting to see how inflation debate unfolded and what measures of prices were discussed. Figure 5: Industrial Production of Business Equipment (%y/y) vs. Real CapEx (% y/y) Figure 6 : Core PCE Deflator (%y/y) vs. Core CPI (%y/y) Source: Federal Reserve, BEA, Haver, SMBC Nikko Source: BEA, BLS, Haver, SMBC Nikko -20 -10 0 10 20 30 -20 -10 0 10 20 30 2000 2005 2010 2015 2020 2025 Industrial Production: Business Equipment (%YoY) Real Equipment Investment (rs, %YoY) 0 1 2 3 4 5 6 7 0 1 2 3 4 5 6 7 2000 2005 2010 2015 2020 2025 Core PCE Deflator (%Y/Y) Core CPI (%Y/Y)

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