# Perceptions about Monetary Policy in 2025

By Carolin Pflueger<sup>1</sup>

## **Abstract**

Building on Bauer, Pflueger, and Sunderam (2024a, 2024b, 2025), I show that perceptions of the ECB's inflation response rose significantly only after the July 2022 liftoff from the zero lower bound. Market responses to inflation surprises also increased, reflecting a heightened perceived inflation reaction. Evidence from increased bond-stock comovements in the fall of 2023 further supports a stronger perceived inflation reaction at that time. These findings suggest that perceptions about the monetary policy reaction function can be measured, and that good monetary policy actions are good monetary policy communication.

## 1 Introduction

The recent inflationary experience, not seen in over forty years, has posed new challenges for monetary policy. After the pandemic of 2020, inflation spiked in 2021 to levels not seen in forty years. Initially, policy rates in most advanced economies remained at zero. More than a year later, the ECB lifted off from zero in July 2022, reaching a peak in late 2023. Since then, inflation and rates have come down gradually.

A well-perceived monetary policy framework matters for at least three reasons. First, it accelerates transmission through financial markets and allows "markets to do the central banks' work for it" <sup>2</sup>. For example, if the ECB reaction function is known, markets can react appropriately to macroeconomic news and thereby move relevant rates even before the next policy meeting. Second, many have argued that a high perceived inflation reaction can improve the inflation-output tradeoff, or allow to bring down inflation more easily at less economic cost (Clarida, Gali, and Gertler, 1999). Third, safe bond markets are interlinked with the broader economic and policy environment, including geopolitical safety.

The core of these remarks is centred on the question "How did perceptions of the ECB's monetary policy framework change during the recent inflationary episode, and beyond?" There are three main findings. First, building on Bauer, Pflueger, and

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<sup>&</sup>lt;sup>2</sup> See Woodford (2005).

Sunderam (2024a,b, 2025) I show evidence from rich survey data measuring the ECB's time-varying perceived inflation reaction. This evidence shows that the perceived inflation reaction rose substantially between late 2021 and late 2023, from zero to one. This means that the Taylor principle was satisfied once the tightening cycle was underway. Second, high-frequency bond yield responses to inflation surprises also strengthened and have remained strong through the first half of 2025. This is consistent with an increase in the perceived inflation reaction and good news for the ECB's long-term credibility in controlling inflation. Third, bond-stock comovements turned positive in late 2023, which can also be attributed to the new perceived inflation reaction when supply shocks are present.

These findings have implications for monetary policy communication. Most importantly, perceptions of the monetary reaction function can be measured, which is useful to evaluate communication strategies. Moreover, the timing of the increase in the perceived inflation reaction suggests that actions matter, consistent with what Bauer, Pflueger and Sunderam (2024a,b) previously found for the U.S. When the true inflation reaction is not perfectly known, observers should revise their perceived inflation reaction upwards after observing a hike in times of high inflation or – more relevant in the current environment – easings that are clearly dependent on incoming inflation data. Further, this analysis shows that quantitative data is useful to infer the perceived monetary policy framework, suggesting that central banks may want to make similar data themselves as part of a quantitative communication effort.

# 2 Estimating the Time-Varying Perceived Inflation Reaction

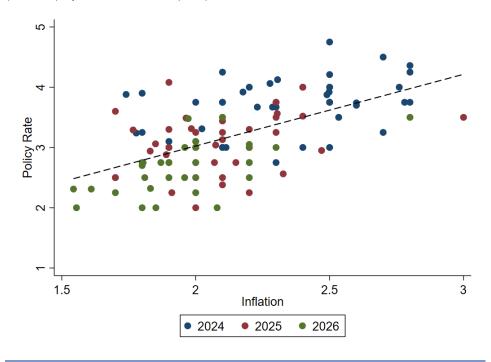
## 2.1 Survey of Professional Forecasters Data

Chart 1 shows raw data from the ECB's survey of professional forecasters. The perceived inflation reaction is measured from the strongly positive slope between inflation forecasts on the x-axis and linked policy rate forecasts on the y-axis. One dot, for example, corresponds to the one-year inflation and policy rate forecasts by Societe Generale, and another dot corresponds to a different forecasting institution and forecast horizon. In this survey wave, a 1.5% inflation forecast was associated with a 2.4% expected policy rate. By contrast, a 2.5% inflation forecast was associated with a substantially higher expected policy rate of 3.6%. This is exactly what we would expect if forecasters incorporate a monetary policy rule with an inflation coefficient above one into their forecasting model.

Chart 1 only shows a single survey wave, the first quarter of 2024. Chart 2 turns to different survey waves to show how the perceived inflation reaction changed over time.

Chart 1
ECB Survey of Professional Forecasters 2024.Q1

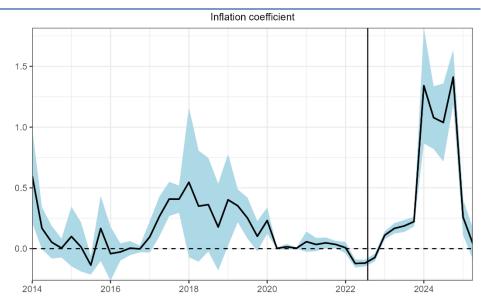
(Inflation and policy rate forecasts in annualized percent)



Sources: Authors' calculations based on Bauer, Pflueger and Sunderam (2024a,b,2025)

Notes: Each dot corresponds to a forecaster-forecast horizon combination in the 2024.Q1 survey wave. Outlier observations with expected inflation smaller than 1.5% (5 observations) are excluded. A fitted regression line with slope equal to 1.2 is shown in dashed.

Chart 2
Perceived Inflation Reaction Rose after Liftoff



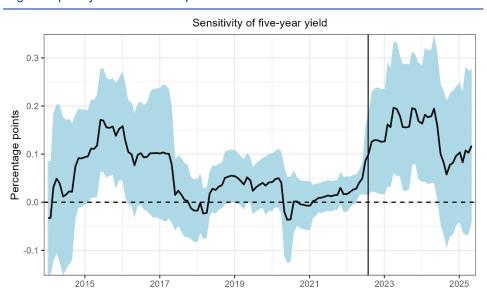
Sources: Authors' calculations based on Bauer, Pflueger and Sunderam (2024a,b,2025) Notes:  $E_t^{(j)}i_{t+h} = \hat{\pmb{\beta}}_t E_t^{(j)}\pi_{t+h} + \hat{\pmb{\gamma}}_t E_t^{(j)} \chi_{t+h} + e_{th}^{(j)}$ , i =policy rate,  $\pi$ =inflation, x =output gap, h = forecast horizon, j=forecaster The vertical line indicates the ECB's liftoff from the zero-lower-bound in July 2022.

Chart 2 plots the survey wave on the x-axis against the perceived inflation reaction on the y-axis. For example, the level for the first quarter of 2024 corresponds to the slope in Chart 1, which is greater than one. Chart 2 shows that the perceived inflation reaction remained close to zero through much of 2022, even as inflation was rising. However, after the ECB's liftoff, the perceived inflation reaction started to rise and eventually became greater than one, consistent with the Taylor principle.

# 2.2 High-Frequency Bond Yield Response to Inflation Surprises

Chart 3 confirms the rise in the perceived inflation reaction using completely different data. For each date on the x-axis, it shows the regression coefficient of daily changes in bond yields onto inflation surprises on core CPI release dates over a 24-month rolling window. The figure shows that the high-frequency bond yield response to inflation surprises also increased, as one would expect if markets price in a stronger inflation reaction. Moreover, five-year bond yields remain responsive to inflation surprises all the way through the present, as indicated by the high coefficient at the end, so the ECB's perceived long-term inflation reaction remains strong.

Chart 3
High-Frequency Bond Yield Response to Inflation



Sources: Authors' calculations based on Bauer, Pflueger and Sunderam (2024a,b,2025) Notes: High-frequency 5-year bond yield response to inflation surprises  $\Delta y_t = \alpha + \theta s_t + \epsilon_t$ . Each observation=core CPI announcement, 24-month rolling regressions. The vertical line indicates the ECB's liftoff from the zero-lower-bound in July 2022.

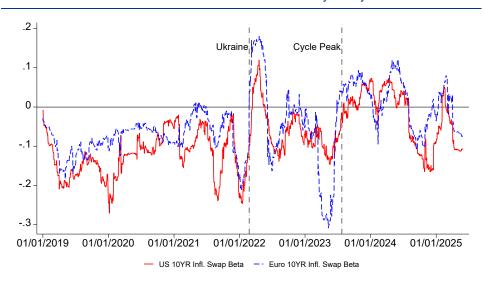
# 3 Implications

Broadening from perceptions about the monetary policy framework, monetary policy communication and credibility also interact with the broader financial and economic environment.

#### 3.1 Bond-Stock Comovements

Chart 4 turns to bond-stock comovements, which increased in the fall of 2023, just as the perceived inflation reaction peaked. This increase in bond-stock comovements has sometimes been described as a return to the turbulent bond markets of the 1980s, though it may be too early to tell. Chart 4 shows 90-day rolling estimates of the inflation component of bond-stock betas, or the regression coefficient of inflation swap returns onto stock returns, for Europe and the U.S. Besides the more persistent increase around the monetary policy cycle peak in the fall of 2023, it also shows a shorter-term increase around the invasion of Ukraine, particularly for Europe. This suggests that supply shocks and geopolitics played a role in generating inflationary concerns. There is a logical story, as monetary policy chooses the point on the inflation-output trade-off when supply shocks are present. If markets perceive a more anti-inflationary response, as in late 2023, stocks decline more in response to an adverse supply shock. Bonds also fall because inflation goes up, and a positive correlation ensues (Campbell, Pflueger, and Viceira, 2020; Pflueger, 2025). The increased bond-stock comovement in late 2023 hence further supports a stronger perceived inflation reaction around that time.

**Chart 4**Bond-Stock Comovements Rose with Perceived Monetary Policy Inflation Reaction



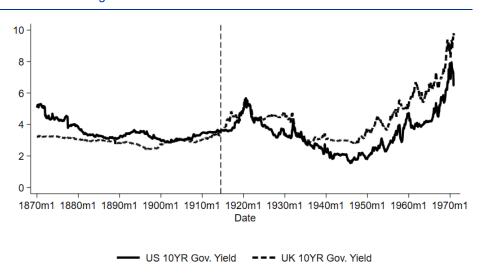
Sources: Authors' calculations based on Campbell, Pflueger and Viceira (2020), Pflueger (2025) and Campbell, Pflueger, and Viceira (2025, in preparation).

Notes: We use inflation swaps to isolate the inflation component of bond returns. Rolling betas  $\beta(r^{(i_nflswap)}, r^{(stocks)})$  are estimated over 90-day rolling windows. Daily inflation swap returns are computed from the change in inflation swap rates:  $r^{(i_nflswap)} \propto -10 \text{ x } \Delta$  10-year inflation swap.

## 3.2 Geopolitics

Chart 4 already illustrated that perceptions of geopolitics can shape inflation and bond market safety. Chart 5 takes a broader view, showing U.S. and U.K. bond yields back to 1870. It shows that the U.K. enjoyed the lowest borrowing rates before WWI, when it was the major military power worldwide. However, it lost this privilege to the U.S. sometime between the big World Wars, when its hard power was overtaken by the U.S. In ongoing work, Pflueger and Yared (2025) model the link between hard power and financial dominance, arguing that there is a two-way virtuous cycle between geopolitical safety, low borrowing rates, and the ability to invest in military capacity. Geopolitical safety is hence an important underpinning – and result – of inflation credibility.

Chart 5
U.S./U.K. borrowing costs switched around WWI/WWI



Sources: Authors' calculations based on Pflueger and Yared (2025).

Notes: Monthly data on 10-year U.S. and U.K. bond yields for 1870-1973 from Global Financial Data. The vertical line indicates the start of World War I.

## 4 Conclusion

To conclude, perceptions of the monetary policy framework are crucial for transmission to financial markets, the ability to bring down inflation at less economic cost, and they are interlinked with geopolitical safety.

The ECB's perceived inflation reaction rose from essentially zero to above one after the ECB lifted off in July 2022. Further, the perceived long-term inflation reaction remains strong.

One big takeaway is that perceptions of the monetary policy reaction can be measured and hence evaluated using the tools we provide here.

The timing of the increase in the perceived inflation reaction suggests that good monetary policy actions are good monetary policy communication. This gives another reason to hike quickly in an inflationary scenario or, more relevant in the current environment, keep easing clearly dependent on incoming inflation data.

Finally, the analyses presented in these remarks use private forecast data. Central banks could make similar data available in real time to communicate their reaction function, such as connected dot-plots, scenario analyses, or quantitative communication more generally.

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