WP-2026-003

# Do Actions Match Words? Reassessing the Taylor Rule in an Emerging-market Context

Vaishali Garga (Federal Reserve Bank of Boston), Benjamin Gryzb (Federal Reserve Bank of Boston) and Rajeswari Sengupta (Indira Gandhi Institute of Development Research)

INDIRA GANDHI INSTITUTE OF DEVELOPMENT RESEARCH

*March 2026*

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## ABSTRACT

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**Keywords:** Commitment, Communication, Credibility, Emerging markets, Forecasts, Forward-looking, Inflation targeting, Monetary policy, Reserve Bank of India, Taylor rule.

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Monday 30th March, 2026

**Abstract**

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*The views expressed herein are those of the authors and do not indicate concurrence by the Federal Reserve Bank of Boston, the principals of the Board of Governors, or the Federal Reserve System. All remaining errors are our own. We thank Roma Kumari for excellent research assistance and participants at the Fourth International Conference on Issues in Economic Theory and Policy at Presidency University (Calcutta), Annual Economics Conference at Ashoka University (Delhi), and DEPR seminar series at Reserve Bank of India (Mumbai) for their valuable feedback. Corresponding Author: Rajeswari Sengupta: rajeswari@igidr.ac.in. Vaishali Garga: vaishali.garga@bos.frb.org. Benjamin Gryzb: benjamin.gryzb@bos.frb.org.

# 1 Introduction

Credibility is central to the effectiveness of monetary policy. In modern monetary regimes, credibility depends on not only the stance of policy actions but also the consistency between what a central bank says and what it does (Blinder, 1999; Ehrmann and Fratzscher, 2007b).[1,2] When central bank communication aligns with policy actions, private agents can form expectations consistent with the announced objective, strengthening policy transmission and anchoring inflation expectations. This consistency is especially important in emerging economies, where institutional credibility and inflation expectations are still evolving and supply shocks are frequent. Conversely, persistent gaps between stated objectives and observed policy decisions can undermine regime credibility, weakening the transmission of monetary policy and raising doubts about the central bank's commitment to its target.

In this paper, we examine whether the adoption of flexible inflation targeting (FIT) altered the alignment between communication and actions in an emerging market setting. We study the Reserve Bank of India (RBI), which formally adopted FIT in 2015 following amendments to the RBI Act and the establishment of a Monetary Policy Committee. The adoption of FIT marked a structural shift in the RBI's operating framework, from a multiple-indicator approach to one with a clearly defined nominal anchor for monetary policy. Under the amended RBI Act, the RBI is legally mandated to target a 4 percent consumer price index (CPI) inflation rate, with a tolerance band of $\pm$ 2 percentage points, while also supporting economic growth subject to maintaining price stability. Evaluating whether the RBI's words and actions evolved in tandem following the adoption of FIT then provides insights into central bank credibility in an emerging-market context, where anchoring expectations and establishing commitment are ongoing challenges.

We address this question in two steps. First, we construct qualitative measures of policy communication using natural language processing applied to the full corpus of RBI monetary policy statements from 2000 to 2025. We quantify the relative salience of inflation stabilization in official communication before and after FIT. Second, we examine whether policy actions reflect a corresponding change in conduct by estimating alternative Taylor-

[1]According to Blinder (1999), "To me, that is the hallmark of credibility: matching deeds to words.... Credibility means that your pronouncements are believed—even though you are bound by no rule and may even have a short-run incentive to renege. In the real world, such credibility is not normally created by incentive-compatible compensation schemes nor by rigid precommitment. Rather, it is painstakingly built up by a history of matching deeds to words. A central bank that consistently does what it says will acquire credibility by this definition almost regardless of the institutional structure" (p. 64).

[2]According to Ehrmann and Fratzscher (2007a), consistency between central bank actions and words is a "necessary condition if the statements are meant to help markets anticipate better future decisions."

type monetary policy reaction functions before and after the implementation of FIT.

Word-frequency analysis shows that the content of the communication evolved markedly after the adoption of FIT. We find a semantic shift toward a clearer emphasis on inflation and output stabilization. In the pre-FIT period, words such as "bank," "market," "rate," and "growth" appeared more frequently than "inflation," consistent with the multiple-indicator approach under which the RBI considered many factors—such as credit conditions, market developments, and external sector dynamics—when making monetary policy decisions. In the post-FIT period, "inflation" became the most frequently used word, followed by "price" and "growth." This finding is consistent with earlier evidence that the RBI's communication became more focused and transparent after 2015 (Mathur and Sengupta, 2019).

By contrast, estimates of standard Taylor-type reaction functions reveal a more complex picture. Following Taylor (1993), we model the policy rate as responding to the inflation deviation from the target and to the output gap. This specification is grounded in the quadratic loss framework of Woodford (2001), in which a greater weight on inflation stabilization in the central bank's objective function implies a stronger response to inflation deviation. Our baseline estimates suggest that, in the pre-FIT period, the RBI's policy rate did not significantly respond to realized inflation, which is consistent with the multi-objective nature of communication at the time. However, this insignificance persists even in the post-FIT period, implying that while the RBI's communication became more inflation-focused with FIT adoption, its actions—as captured by backward-looking Taylor rules—did not exhibit a corresponding shift.[3] The policy rate appears to be driven primarily by its own lag, indicating a high degree of interest rate smoothing in both regimes.

We further find that this apparent misalignment between the RBI's words and actions reflects the limitations of standard Taylor-type rules in capturing forward-looking policy conduct rather than a lack of commitment to the inflation-targeting regime. Since monetary policy operates with lags, central banks typically respond to forecasts of macroeconomic conditions over the relevant policy horizon. To account for this, we examine how the weight on inflation stabilization shifted after FIT adoption through the lens of a forward-looking reaction function, wherein the RBI responds to its own forecasts of inflation and economic activity rather than their realized or lagged values.

We estimate this forward-looking reaction function using internal forecasts extracted from

[3] Our baseline analysis spans 2005:Q1 through 2025:Q2, partitioned into two different policy regimes, namely the pre-FIT regime from 2005:Q1 through 2015:Q2 and the post-FIT regime from 2015:Q3 through 2025:Q2. As a robustness check, we re-estimate our models over a shorter sample spanning 2010:Q1 through 2019:Q4 to exclude the effects of the COVID-19 pandemic and associated unconventional monetary policy measures undertaken by the RBI, and our finding remains unchanged.

the RBI's monetary policy statements. These real-time projections reflect the information set available to policymakers at the time of decision-making.[4] Our results show that the policy rate's response to inflation forecasts is strong and statistically significant in the post-FIT period, and became more pronounced after the regime's adoption. This suggests that the RBI targets expected rather than realized inflation, and the apparent misalignment between words and actions largely disappears once policy is modeled as forecast-based. Our result highlights the important role of macroeconomic forecasting within the FIT framework.[5]

The divergence in results between backward-looking and forward-looking specifications points to the importance of appropriately modeling the central bank reaction function when evaluating regime shifts. It further points to a deeper methodological insight when using backward-looking Taylor rules to study credibility. India's post-FIT inflation performance has been notably stable. Both the levels and volatility of headline and core inflation rates declined markedly after the adoption of FIT. This was the case even during episodes of commodity price shocks, such as 2022 through 2024, when food price inflation rose after the Russian invasion of Ukraine. Despite this shock, headline CPI inflation remained contained, with the average not exceeding 6 percent. This contrasts sharply with the double-digit inflation of the pre-FIT years during episodes of large food price shocks. This improved performance is consistent with the view that the adoption of FIT enhanced the credibility of the RBI, thus strengthening the anchoring of inflation expectations and dampening the transmission of supply shocks to headline inflation (Eichengreen and Gupta, 2024; Garga et al., 2024; Pattanaik et al., 2023; Blagrave and Lian, 2020). If credibility improved and expectations became better anchored, then realized inflation would naturally remain close to target, potentially leading backward-looking Taylor rules to understate the true responsiveness of policy to expected inflation. Overall, our findings underscore the need for richer empirical frameworks—beyond standard Taylor rules—to capture the dynamics of monetary policy in emerging economies, where credibility, expectations, and vulnerability to supply shocks play central roles in policy transmission.

Our paper contributes to several strands of the literature. First, it provides new evidence on monetary policy regime change in an emerging market setting following the adoption of inflation targeting. Second, it introduces a novel data set of real-time RBI inflation projections extracted from monetary policy statements, enabling direct estimation of forward-

[4]We provide our cleaned data set of RBI internal forecasts (2010 through 2025) for public use on our website.

[5]El-Shagi and Ma (2023) also estimate a forward-looking Taylor rule for India but find no statistically significant response to expected inflation. However, they rely on professional forecasters' expectations rather than the RBI's own projections and do not evaluate the structural shift following the adoption of FIT. Other studies, such as Patra and Kapur (2012) and Bhadury et al. (2022), use generalized method of moments (GMM) to instrument for future inflation rather than using explicit central bank forecasts.

looking reaction functions. Third, it shows that standard backward-looking Taylor rules may mischaracterize policy conduct in environments where central banks respond to forecasts rather than realized outcomes. More broadly, the paper highlights the importance of correctly modeling the information set and preferences of policymakers when evaluating regime shifts and assessing credibility in emerging markets, as well as the crucial role played by macroeconomic forecasting in an FIT regime.

In the Indian context, several studies model the RBI's monetary policy reaction function using Taylor-type rules and find mixed evidence of the importance of different macroeconomic indicators in guiding the RBI's policy decisions. Studies such as Klau and Mohanty (2004) and Inoue and Shigeyuki (2009) find that during earlier periods—1990 through 2002 and 1998 through 2007, respectively—the RBI's policy rate responded more strongly to output and exchange rate fluctuations than to inflation. Others, including Hutchison et al. (2013) and Cavoli and Rajan (2008), identify significant coefficients for both inflation and the output gap and also emphasize the strong role of interest rate inertia in the pre-FIT period.[6] More recently, Bhoi et al. (2019) analyze how closely the RBI's policy rate tracks the nominal interest rate implied by a Taylor-type reaction function.

A smaller body of work examines the success of FIT adoption through the lens of standard Taylor-type reaction functions. This research includes Eichengreen et al. (2021), Eichengreen and Gupta (2024), and Bhadury et al. (2022), who infer stronger inflation responsiveness in the post-FIT regime. We revisit these studies and show that their results are sensitive to modeling choices such as using contemporaneous rather than lagged control variables or including specific control variables such as the lagged real interest rate. Across various specifications, we find no robust evidence that the RBI systematically assigned a greater weight to inflation stabilization in the post-FIT period when policy is characterized by backward-looking Taylor rules. Additionally, none of these studies examines whether the RBI's monetary policy communication was consistent with its policy actions following the adoption of FIT. Our paper addresses this gap by providing a more comprehensive assessment of the coherence of the RBI's inflation-targeting framework, considering both words and actions.

The remainder of the paper proceeds as follows. Section 2 describes the institutional evolution of India's monetary policy framework and the adoption of FIT. Section 3 presents the text-based measures of communication. Section 4 estimates backward-looking Taylor rules. Section 5 revisits related studies and reconciles differences in findings. Section 6 estimates forward-looking Taylor rules and highlights the importance of the modeling framework in

[6]See also Debabrata Patra and Kumar Khundrakpam (2014), Patra and Kapur (2012), and Singh and Kalirajan (2006) for other pre-FIT analyses of the RBI's monetary policy reaction function.

the evaluation of policy regimes. Section 7 concludes.

## 2 Background

India's monetary policy has evolved in response to changing economic and financial conditions. Following the financial liberalization of the early 1990s, the RBI adopted a multiple-indicator approach in April 1998. Under this approach, the RBI considered many indicators when making monetary policy decisions, including money supply, credit, trade, capital flows, rates of return in different financial markets, inflation, and exchange rates (Dua, 2020). Consequently, this approach lacked a clear and well-defined policy objective.

The multiple-indicator approach appeared to work fairly well during the first decade after its implementation (1998 through 2008). The average GDP growth rate was 7 percent, and the average inflation rate, both in terms of the wholesale price index (WPI) and the consumer price index (CPI), was 5.5 percent. However, over the next five years, India experienced a period of very high inflation, driven mainly by high food prices and expansionary monetary and fiscal policies implemented in the aftermath of the Global Financial Crisis of 2008. From 2009 to 2013, the WPI inflation rate rose to 10 percent, and the CPI inflation rate increased sharply to 12 percent. Inflation in India was the highest among all G20 countries during this period (RBI, 2014). Household inflation expectations became unhinged, rising dramatically from their low levels during the low and stable inflation phase of 2000 through 2008. Professional forecasters' surveys showed that long-term inflation expectations increased by nearly 150 basis points during this period.

As a result of the increase in the level and volatility of inflation, the credibility of the multiple-indicator approach was called into question. There was growing recognition that the use of a large panel of indicators was leading to a lack of a clearly defined nominal anchor for monetary policy. Several expert committees recommended the need for a clear objective of the RBI's monetary policy and emphasized that the single objective should be inflation control (Mistry, 2007; Rajan, 2009).

On September 12, 2013, during the tenure of RBI Governor Raghuram Rajan, the Expert Committee to Revise and Strengthen the Monetary Policy Framework was established to consider these recommendations. The committee recommended that inflation become the nominal anchor of monetary policy and that the RBI adopt flexible inflation targeting that recognizes the short-term tradeoffs between growth and inflation.[7]

[7]Until the end of 2013, the RBI used the WPI, rather than the CPI, to measure inflation and inflation

The RBI accepted the recommendations of the Expert Committee, leading to formulation of the Monetary Policy Framework Agreement (MPFA) between the Government of India and the RBI on February 20, 2015. With this, India formally adopted FIT, and the RBI was mandated to achieve a well-defined numerical target. The inflation target was defined as 4 percent headline CPI inflation rate, with a tolerance band of $\pm$ 2 percentage points around it. The Finance Act of 2016 amended the RBI Act (1934) to formally add price stability as the main objective of monetary policy.[8] This amended act provided a statutory basis for the implementation of the FIT framework in India.

Under the amended RBI Act, the RBI is deemed to have failed to achieve the target if the headline CPI inflation rate exceeds 6 percent or falls below 2 percent for three consecutive quarters. In such cases, the RBI is required to explain its failure to the government, outline corrective actions, and estimate the time needed to return the inflation rate to within its target range. The amended RBI Act provides that the government shall, in consultation with the RBI, determine the inflation target once every five years. Following the 2020 review, the target was renewed for the next five years, and the third review was scheduled for March 2026.

In line with the practice in most countries whose central bank has an inflation target, the amended RBI Act established a six-member Monetary Policy Committee (MPC) to set the policy repo rate needed to meet the inflation target. The MPC is appointed by the government for four years and includes three RBI members, one of whom is the RBI governor and chairs the committee, and three external members.

The credibility of the FIT framework depends crucially on clear and transparent communication that can help stabilize inflation expectations. In the next section, we examine the changes to the RBI's communication following the adoption of FIT.

# 3 Analysis of the RBI's Communication

The amended RBI Act requires that resolutions adopted by the MPC be published on the RBI website after each monetary policy meeting. The RBI must also publish the minutes of the MPC meetings two weeks after each meeting and a detailed monetary report twice

forecasts because the WPI data were released more frequently (Patnaik and Pandey, 2020). Following the recommendations of the Expert Committee, the inflation target under FIT was redefined as the annual percentage change in the headline CPI, which better reflects the average household's cost of living and aligns with global inflation-targeting practices.

[8]See https://www.indiabudget.gov.in/budget2016-2017/ub2016-17/fb/bill.pdf.

a year outlining the sources of inflation and its forecasts for inflation. The implementation of these provisions implies that there has been a marked change in the *de jure* conduct of monetary policy in the post-FIT regime compared with the earlier framework (Patnaik et al., 2024). In the pre-FIT regime, even though monetary policy statements were published on the RBI website in the form of a governor's statement, there was no regularity in the frequency and intervals of the publication of these statements; the publication schedules varied across governor regimes. In addition, there were multiple types of publications—including policy statements, quarterly reviews, monetary reports, and speeches—as opposed to a more streamlined and uniform means of communication.

We investigate how the RBI's monetary policy communication has evolved with the adoption of FIT. To do this, we identify the most frequently used words in the monetary policy statements as a measure of the topics to which the RBI paid the most attention when deliberating and communicating its monetary policy, and we analyze how the RBI's focus changed with the adoption of FIT. We filter monetary policy statements using natural language processing techniques to generate word clouds—visual representations of statements in which the size of each word reflects the relative frequency of its use in the statements. We first convert the monetary policy statements into a matrix of words. We then remove uninformative words and stem the remaining words using the Porter stemming algorithm.[9,10] Finally, we create word clouds using a set of words that each occur at least five times in the statements, and we impose a limit of 40 words per cloud for legibility.

Figure 1 presents the resulting word clouds for the pre-FIT and post-FIT periods in panels (a) and (b), respectively. The pre-FIT period spans January 2000 through February 2015, while the post-FIT period spans March 2015 through August 2025.[11] We find that during the pre-FIT period, the word "bank" featured most prominently in the RBI's statements, followed by "rate," "market," and "growth." The word "inflation" featured too but less prominently.

[9]The uninformative words include month names as well as the following: RBI, factors, going, high, real, statement, new, major, going, moderated, rising, increased, conditions, reflecting, last, lower, points, index, average, second, expected, India, indicators, effects, cent, per, will, net, impact, within, well, across, remain, remains, remained, since, however, level, also, year, month, recent, unchanged, excluding, likely, higher, continue, said, one, may, billion, due, basis, outlook, first, review, quarter, end, ago, term, crore, increase, sector, economy, economic, base, activity, bank, policy, rate, and MPC.

[10]The Porter stemming algorithm was proposed in 1980 as a process for removing suffixes from words and reducing them to their root forms. For example, the words "running," "runner," and "ran" can all be reduced to their root form, "run."

[11]Here, we choose the pre-FIT sample that is longer than the sample used for our subsequent empirical analysis (2005 to 2015). This is because, during the 2008–2013 period, India experienced very high inflation, as a result of which the word "inflation" was frequently mentioned in the RBI's monetary policy deliberations—as we show later—even though the FIT regime had not yet been introduced. To avoid the domination of the pre-FIT word cloud by the focus topics of the non-representative, high-inflation period and to arrive at a more representative picture of the RBI's pre-FIT communication, we extend the sample back to 2000 when determining its most frequently used words.

By contrast, in the word clouds of the post-FIT period shown in panel (b) of Figure 1, the most prominent word in the RBI's statements was "inflation," followed by "price" and "growth." We also find relatively greater prominence of inflation-related words such as "food" and "CPI" in the cloud, relative to the pre-FIT period. Under the FIT framework, the RBI has a dual mandate of managing price stability and growth—which explains the frequent appearance of "growth" in the word cloud.[12] Together, these findings imply that with the adoption of FIT, the RBI's communication through its monetary policy statements became more narrowly focused on inflation.

Furthermore, the pre-FIT sample includes the years 2008 through 2013, during which India witnessed very high inflation, with WPI inflation reaching 10 percent. Although the RBI had not yet adopted FIT, monetary policy communication often focused on inflation during this period.

For example, the October 2009 statement by the RBI governor read, "The headline inflation, as measured by year-on-year variations in the wholesale price index (WPI), which remained negative during June–August 2009 due to the base effect, returned to positive territory in September 2009 .... During the current financial year (up to October 10, 2009), WPI has increased by 5.95 per cent reflecting higher food price inflation aggravated by deficient monsoon."

Similarly, the April 2010 statement read, "The developments on the inflation front are, however, worrisome. Headline wholesale price index (WPI) inflation accelerated from 0.5 per cent in September 2009 to 9.9 per cent in March 2010 .... There have been significant changes in the drivers of inflation in recent months."

The November statement of the same year highlighted the following as a key rationale behind the monetary policy decision: "Inflation remains high. Both demand side and supply side factors are at play. Inflationary expectations also remain at an elevated level. Given the spread and persistence of inflation, demand side inflationary pressures need to be contained and inflationary expectations anchored."

To obtain a more representative picture of the RBI's communication during the pre-FIT period outside of the years when inflation was the dominant concern, we split the pre-

[12]In the pre-FIT period, RBI monetary policy statements included announcements related to banking regulation, given the RBI's dual role as monetary authority and banking regulator. In the post-FIT period, these regulatory announcements were separated into distinct "Statements on Developmental and Regulatory Policies." This change in document structure could mechanically affect word frequencies. To ensure comparability, we merge the post-FIT monetary policy statements with the corresponding regulatory statements and regenerate the word cloud (see Figure A.6). The results are unchanged: "inflation" remains a prominent term in the post-FIT corpus, alongside "bank."

FIT period into two subsamples: the “normal” pre-FIT sample (pre-2008) and the “high-inflation” pre-FIT sample (post-2008). The resulting word clouds for the two subsamples are shown in Figure 2. The 2000–2007 word cloud in panel (a) shows that “bank,” “market,” “rate,” “increase,” “government,” “credit,” and “reserve” were used more frequently in the statements compared with “inflation.” This is consistent with the fact that during this period, the RBI employed a multiple-indicator approach, whereby it determined its policy stance by considering various factors beyond just inflation, such as credit growth, monetary conditions, output growth, and financial conditions.

This changed during the high-inflation period, when “inflation” became more important relative to most other words, as shown in panel (b). Taken together, these findings highlight that during the pre-FIT period outside of the high-inflation years, the RBI emphasized a variety of macroeconomic indicators in its deliberation and communication.

One concern with comparing communication during the “normal” pre-FIT period with the post-FIT period is that India also experienced high inflation in the post-COVID-19 period. To obtain a more representative picture of the RBI’s communication outside of this high inflation period following FIT adoption, we analyze word clouds based on the statements issued from March 2015 to February 2020, when the inflation rate was low and stable at around 4 percent (Figure 3). We find that “inflation” remains the most prominently featured word in the cloud, even more so than during the high-inflation pre-FIT period (Figure 2 panel [b]).

Our findings are consistent with those of Mathur and Sengupta (2019), who analyze a shorter sample but document similar shifts in communication in the post-FIT regime: Statements became shorter and more easily readable and placed a greater emphasis on “inflation” and related terms such as “fuel” and “food.” In the broader emerging-market context, Silva et al. (2025) apply large-language-modeling analysis to the policy statements of 169 central banks and document significant shifts in monetary policy communication when countries adopt inflation-targeting frameworks, with backward-looking exchange rate statements giving way to forward-looking discussions on inflation, interest rates, and economic activity.

Figure 1: Word Clouds from the RBI's Statements: Pre-FIT versus Post-FIT


(a) Pre-FIT (Jan 2000–Feb 2015) (b) Post-FIT (Mar 2015–Aug 2025)

Note: The figure shows word clouds based on the RBI's monetary policy statements during the pre-FIT period (panel [a]) and the post-FIT period (panel [b]). Each word cloud shows the 40 most used words (among the words used at least five times) across all statements within each sample. The size of each word is proportional to its frequency of appearance.
*Sources*: RBI's monetary policy statements, authors' calculations.

Figure 2: Word Clouds from the RBI's Statements: Pre-FIT Sample Breakdown


(a) "Normal" Pre-FIT (Jan 2000–Dec 2007) (b) "High-Inflation" Pre-FIT (Jan 2008–Feb 2015)

Note: The figure shows word clouds based on the RBI's monetary policy statements during the normal pre-FIT period (panel [a]) and the high-inflation pre-FIT period (panel [b]). Each word cloud shows the 40 most used words (among the words used at least five times) across all statements within each subsample. The size of each word is proportional to its frequency of appearance.
*Sources*: RBI's monetary policy statements, authors' calculations.

Figure 3: Word Clouds from the RBI's Statements: Post-FIT Excluding COVID-19


Note: The figure shows word cloud based on the RBI's monetary policy statements during the post-FIT, pre–COVID-19, low inflation period of March 2015 through February 2020. Each word cloud shows the 40 most used words (among the words used at least five times) across all statements within each subsample. The size of each word is proportional to its frequency of appearance.
*Sources*: RBI's monetary policy statements, authors' calculations.

# 4 Analysis of the RBI's Actions

## 4.1 Methodology

In the preceding section, we show that with the adoption of FIT, there was a change in the RBI's communication stance, with more frequent mentions of inflation and inflation-related words in its monetary policy statements. In this section, we analyze whether this change in the RBI's communication (that is, its words) was accompanied by a change in its conduct of monetary policy (that is, its actions). Specifically, we analyze whether the RBI assigned a greater weight to inflation in its monetary policy reaction function during the post-FIT period. To evaluate this change, we analyze how the coefficients of the RBI's monetary policy reaction function changed with the adoption of FIT.

We first consider a standard Taylor (1993)-type rule of the form in equation 1, in which the policy rate is set as a function of lagged inflation and output gaps:

$$i_t = \alpha\left(\pi_{t-1} - \pi^*_{t-1}\right) + \beta\left(\frac{y_{t-1} - y^*_{t-1}}{y_{t-1}}\right), \quad (1)$$

where $\pi_t$ is the year-on-year inflation gap and $y_t$ is the real GDP gap.[13]

We then consider extensions of the baseline monetary policy reaction function. Interest rate persistence and exchange rate growth have been shown to be additional important determinants of the RBI's monetary policy (Hutchison et al., 2013). Therefore, we augment the baseline rule to include the lagged policy rate and nominal rupee–dollar exchange rate growth as additional target variables, one at a time and then together:

$$i_t = \varrho i_{t-1} + \alpha\left(\pi_{t-1} - \pi^*_{t-1}\right) + \beta\left(\frac{y_{t-1} - y^*_{t-1}}{y_{t-1}}\right) + \delta\left(\frac{e_t - e_{t-1}}{e_{t-1}}\right), \tag{2}$$

where $e_t$ is the quarterly nominal exchange rate (INR/USD). We include the annualized quarter-on-quarter growth in $e_t$ as the target variable.

To evaluate how the reaction function changed with the adoption of FIT, we include a FIT dummy variable and its interaction with the inflation and output gap variables. We set the FIT dummy equal to one in the post-FIT period ($\geq$ 2015:Q2) and zero otherwise.[14] Our main coefficient of interest is that of the FIT–inflation interaction term, which captures the differential response of the RBI's policy rate to the inflation gap in the post-FIT period relative to the pre-FIT period. If the RBI's actions indeed changed in line with its words, we expect the interaction coefficient to be positive and statistically significant.

For the remaining coefficients, our prior is that the coefficients on inflation and output gaps will be positive; as output increases above its potential or as inflation rises above its target level, the central bank responds by raising the policy rate to bring these variables back to their desired levels. We expect the coefficient on lagged interest rate and exchange rate growth to also be positive. A rise in the exchange rate indicates a depreciation of the INR relative to the USD, and when the currency depreciates, the central bank raises its policy rate to attract greater foreign capital inflows and counter the currency depreciation.

For the baseline results, we estimate the monetary policy reaction functions over the 2005:Q1–2025:Q2 period. As a robustness check, we estimate the reaction functions over the 2010:Q3–2019:Q4 period to exclude the COVID-19 period. The choice of the sample in each case is guided by the intention to have a balanced number of observations in the pre-FIT and post-

[13] Although we are aware of the econometric issues in the estimation of Taylor rules, as highlighted by Carare and Tchaidze (2005), one of our goals is to speak to the small body of work that uses Taylor-type rules to evaluate how the RBI's monetary policy actions changed with FIT adoption, and hence we estimate similar rules. Estimating Taylor-type monetary policy reaction functions is also a common approach in the larger emerging-market literature (see Teles and Zaidan (2010) and Moura and Carvalho (2010), among others).

[14] We take 2015:Q2 as the starting point of the FIT framework because the RBI and the Government of India signed the Monetary Policy Framework Agreement in February 2015, marking the formal adoption of FIT in India.

FIT periods.

We measure inflation using the WPI until (and including) 2013:Q4 and thereafter the CPI, in line with the shift in the RBI's preferred measure of inflation over time (RBI, 2014). For the CPI, we use the CPI Combined series.[15] For the pre-FIT period, we compute trend inflation ($\pi^*$) as the decadal average of the inflation rate over the 2004–2014 period, while for the post-FIT period, we set trend inflation equal to the 4 percent inflation target. We compute trend output ($y^*$) using the HP-filter-trend real GDP over the selected sample. For the dependent variable, we use the three-month Treasury bill (T-bill) rate, which is well accepted in the literature as a reasonable proxy for the RBI's monetary policy stance (Mustafi and Sengupta, 2020; Bhattacharya and Patnaik, 2014). We perform robustness checks using the weighted average call money rate (WACR) as an alternative proxy and find similar results.

## 4.2 Results

We report the results of the estimations for the period 2005:Q1 through 2025:Q2 in Table 1, introducing the baseline reaction function in the first column and then its augmented versions in subsequent columns, one at a time. In column (1), we show the estimated coefficients of the baseline rule in equation 1. In column (2), we additionally control for interest rate persistence by including the lagged three-month T-bill rate. In column (3), we include the nominal exchange rate growth as an additional control. In column (4), we add the FIT dummy and its interaction with lagged inflation and output gap variables.

[15]This is different from the CPI Industrial Workers (CPI-IW) series, which was used to measure inflation until 2011–2012, after which it was replaced by the CPI Combined series.

Table 1: Estimates of the Baseline Monetary Policy Reaction Functions

| | Dependent Variable: 3-month T-Bill Rate | | | | |
|---|---|---|---|---|---|
| | (1) | (2) | (3) | (4) | (5) |
| L.Inflation Gap | 0.10 | 0.01 | -0.00 | 0.01 | -0.04 |
| | (0.83) | (0.19) | (-0.00) | (0.08) | (-0.38) |
| L.Output Gap | 0.12*** | 0.02 | 0.02 | 0.02 | 0.22** |
| | (3.87) | (1.01) | (0.85) | (1.26) | (2.34) |
| L.3-month T-Bill Rate | | 0.88*** | 0.87*** | 0.84*** | 0.85*** |
| | | (14.01) | (15.42) | (14.12) | (15.00) |
| Exchange Rate Growth | | | 0.01 | 0.01 | 0.01 |
| | | | (0.45) | (0.40) | (0.48) |
| FIT dummy | | | | -0.36*** | -0.38*** |
| | | | | (-2.69) | (-2.99) |
| L.Inflation Gap × FIT dummy | | | | 0.06 | 0.08 |
| | | | | (0.50) | (0.63) |
| L.Output Gap × FIT dummy | | | | | -0.22** |
| | | | | | (-2.30) |
| Constant | 6.41*** | 0.78** | 0.83** | 1.17*** | 1.16*** |
| | (33.52) | (2.10) | (2.34) | (2.83) | (3.08) |
| Observations | 81 | 81 | 81 | 81 | 81 |
| $R^2$ | 0.09 | 0.80 | 0.80 | 0.81 | 0.82 |
| Adjusted $R^2$ | 0.06 | 0.79 | 0.79 | 0.79 | 0.81 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note:* The sample includes quarterly observations from 2005:Q1 through 2025:Q2 with the intent of having a balanced number of observations in the pre- and post-FIT samples. Inflation is measured using the year-on-year growth rate of the WPI until 2013:Q4 and the CPI thereafter. Output is measured using GDP. The inflation gap is calculated by subtracting the 2004–2014 decade average from the inflation rate in the pre-FIT period and subtracting 4 percent in the post-FIT period. The output gap is computed as the percentage difference between actual and potential GDP as a ratio of actual GDP, where potential GDP is computed as the HP-filter-trend GDP over the 2005:Q1–2025:Q2 period. The dependent variable is the three-month T-bill rate. Exchange rate growth is the annualized quarter-on-quarter growth rate of the exchange rate (INR/USD). The FIT dummy is set to one for the 2015:Q2–2025:Q2 period and zero otherwise.
*Sources:* Haver Analytics, authors' calculations.

Across all specifications, the estimated coefficients of the lagged inflation gap are statistically insignificant; however, after we add our full set of controls, the sign changes from positive to negative between columns (1) and (5).[16]

[16]The inflation coefficient remains smaller than one even in the estimation of a generalized Taylor rule of the form $i_t = c + \varrho_1 i_{t-1} + (1-\varrho_1)\left[\alpha\left(\pi_{t-1} - \pi^*_{t-1}\right) + \beta\left(\frac{y_{t-1}-y^*_{t-1}}{y_{t-1}}\right)\right] + \varepsilon_t$, following Coibion and Gorodnichenko (2011), either when including the exchange rate or when not. We also estimate the rule separately for the

The coefficients of the lagged output gap have the expected positive sign and are statistically significant in columns (1) and (5), even after the full set of controls is added. We do not find a significant impact of exchange rate growth on the RBI's policy decision. The coefficient of the FIT dummy is negative, implying that the average three-month T-bill rate during the post-FIT period was lower relative to its average during the pre-FIT period, and the difference is statistically significant. We next turn to the main coefficient of interest: the interaction of the FIT dummy with the inflation gap. It is positive but not statistically significant. This shows that when examined through the lens of the reaction function considered in equation 2, the RBI did not place a significantly higher weight on inflation stabilization during the post-FIT period relative to the pre-FIT period.[17] The coefficient of the interaction term between the FIT dummy and the output gap is negative and significant, suggesting that the RBI raised its policy rate by less during the post-FIT period relative to the pre-FIT period in response to a larger output gap.

The RBI's monetary policy reaction function is characterized by interest rate persistence, as evidenced by the consistent and strong significance of the lagged policy rate across all columns. With the addition of interest rate inertia, the adjusted R-squared also increases sharply from 6 percent to 80 percent, suggesting that the most important determinant of the policy rate in any given quarter is the interest rate of the preceding quarter.[18,19]

As a robustness check for our finding and to allay concerns that the estimates are unduly affected by the COVID-19 pandemic, we re-estimate all the specifications over a truncated sample from 2010:Q3 through 2019:Q4. The results are shown in Table 2. We find that the inflation coefficient is positive and significant only in column (1), where we do not control for interest rate persistence in the reaction function. From column (2) onward, the inflation coefficient is insignificant, similarly to the baseline estimation, and the coefficient of the FIT–inflation interaction term is positive but insignificant, as in the baseline.

Thus, even after removing potential effects of the pandemic on the estimates of the RBI's reaction function, we do not find evidence of a significantly greater weight on inflation

pre-FIT and post-FIT samples to allow for a break in all the coefficients of the response function around the adoption of FIT and still do not find a significant response to inflation in the post-FIT sample. This noncompliance to the Taylor principle can itself lead to nonstationary deviations of expected inflation (Teles and Zaidan, 2010), thereby amplifying the need for alignment between communication and actions to keep expectations anchored.

[17]We find qualitatively similar results when conducting a monthly (instead of quarterly) analysis using the index of industrial production (IIP) rather than real GDP as the measure of economic activity.

[18]Interest rate smoothing is a common element of central bank behavior in inflation-targeting emerging economies, as shown by Mehrotra and Sánchez-Fung (2011).

[19]Controlling for more lags of the dependent variable leaves our results qualitatively unchanged.

stabilization during the post-FIT period.[20]

Table 2: Estimates of the Baseline Monetary Policy Reaction Functions: Excluding the COVID-19 Period

| | Dependent Variable: 3-month T-Bill Rate | | | | |
|---|---|---|---|---|---|
| | (1) | (2) | (3) | (4) | (5) |
| L.Inflation Gap | 0.34** | 0.09 | 0.10 | -0.07 | -0.14 |
| | (2.20) | (0.57) | (0.79) | (-0.47) | (-0.78) |
| L.Output Gap | -0.65*** | -0.10 | -0.12 | -0.11 | 0.00 |
| | (-4.72) | (-0.89) | (-0.81) | (-0.88) | (0.01) |
| L.3-month T-Bill Rate | | 0.76*** | 0.70*** | 0.34* | 0.34* |
| | | (4.84) | (4.45) | (1.78) | (1.73) |
| Exchange Rate Growth | | | 0.02 | 0.02* | 0.02* |
| | | | (1.33) | (1.85) | (1.92) |
| FIT dummy | | | | -1.27*** | -1.32*** |
| | | | | (-2.95) | (-3.06) |
| L.Inflation Gap × FIT dummy | | | | 0.18 | 0.26 |
| | | | | (1.06) | (1.41) |
| L.Output Gap × FIT dummy | | | | | -0.24 |
| | | | | | (-1.22) |
| Constant | 7.31*** | 1.74 | 2.04* | 5.45*** | 5.56*** |
| | (34.80) | (1.54) | (1.80) | (3.32) | (3.31) |
| Observations | 37 | 37 | 37 | 37 | 37 |
| $R^2$ | 0.27 | 0.62 | 0.70 | 0.82 | 0.82 |
| Adjusted $R^2$ | 0.23 | 0.58 | 0.67 | 0.78 | 0.78 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note:* The sample includes quarterly observations from 2010:Q3 through 2019:Q4, with the intent of removing potential effects of the pandemic but having a balanced number of observations in the pre- and post-FIT samples. Inflation is measured using the year-on-year growth rate of the WPI until 2013:Q4 and the CPI thereafter. Output is measured using GDP. The inflation gap is calculated by subtracting the 2004–2014 decade average from this inflation rate in the pre-FIT period and subtracting 4 percent in the post-FIT period. The output gap is computed as the percentage difference between actual and potential GDP as a ratio of actual GDP, where potential GDP is calculated as HP-filter-trend GDP over the 2010:Q3–2019:Q4 period. The dependent variable is the three-month T-bill rate. Exchange rate growth is the annualized quarter-on-quarter growth rate of the exchange rate (INR/USD). The FIT dummy is set to one for 2015:Q2 through 2019:Q4 and zero otherwise.
*Sources:* Haver Analytics, authors' calculations.

As an additional robustness check, we re-estimate the reaction functions for the full as well as truncated samples using the WACR instead of the three-month T-bill rate as the

[20]The coefficients of the interaction terms remain qualitatively unchanged in our analysis when we use monthly IIP data.

dependent variable. We obtain similar results; see Tables A.1 and A.2.

# 5 Through the Lens of the Related Literature

Several other studies estimate Taylor-type reaction functions for the RBI. Some of these studies further evaluate the effectiveness of FIT adoption by estimating such reaction functions around the time of FIT implementation and generally conclude that the regime shift was successful. By contrast, our analysis does not reveal a statistically significant increase in the weight assigned by the RBI to inflation during the post-FIT period relative to the pre-FIT period.[21] In this section, we re-examine the post-FIT change in the RBI's policy conduct by replicating some existing studies and analyze the sources of divergence between our findings and those reported in these studies.

Table 3 summarizes four studies in this literature that we replicate. The table includes the form of the monetary policy reaction function that these studies estimate (column 2), their sample period (column 3), and the macroeconomic indicators they use (column 4). All four studies estimate the reaction function using the ordinary least squares (OLS) method, as we do in the baseline.

Table 3: Specifications from the Related Literature

| Study | Monetary Policy Reaction Function | Sample | Indicators |
|---|---|---|---|
| I. Patra and Kapur (2012) | $i_t = \alpha_0 + \alpha_1(\pi_t - \pi^*) + \alpha_2 y_t + \alpha_3 \Delta e_t + \alpha_4 i_{t-1} + \epsilon_t$ | 1996:Q2–2011:Q1 | $i$: effective policy rate<br>$y$: seasonally adjusted real GDP gap<br>$\pi$: WPI inflation; $\pi^*$: 5 percent<br>$e$: Nominal INR/USD exchange rate |
| II. Eichengreen et al. (2021) | $i_t = \alpha_0 + \alpha_1 y_t + \alpha_2 \pi_t + IT + \epsilon_t$ | 1997:Q1–2019:Q4 | $i$: effective policy rate<br>$y$: seasonally-adjusted real GDP gap*<br>$\pi$: WPI inf. (until 2013:Q4), CPI inf. (starting 2014:Q1)<br>$IT$: dummy equals one post-2016:Q3 |
| III. Eichengreen and Gupta (2024) | $i_t = \alpha_0 + \alpha_1 y_t + \alpha_2 \pi_t + IT + COVID + \epsilon_t$ | 1997:Q1–2024:Q1 | $i$: effective policy rate<br>$y$: seasonally adjusted real GDP gap<br>$\pi$: WPI inf. (until 2013:Q4), CPI inf. (starting 2014:Q1)<br>$IT$: dummy equals one for 2016:Q3–2019:Q4<br>$COVID$: dummy equals one for 2020:Q1–2024:Q1 |
| IV. Bhadury et al. (2022) | $i_t = \gamma_0 + \gamma_1 r_{t-1} + (1-\gamma_1)(\phi_\pi \pi_{t-1} + \phi_y y_{t-1}) + GFC + FIT + \epsilon_t$ | 2004:Q1–2020:Q1 | $i$: weighted average call money rate<br>$r$: real interest rate<br>$y$: seasonally adjusted real GDP Gap<br>$\pi$: CPI-IW inflation gap (based on decade avg.)<br>$GFC$: dummy equals one for 2009:Q1–2020:Q1<br>$FIT$: dummy equals one for 2016:Q1–2020:Q1 |

In each study, the output is measured using seasonally adjusted real GDP. The output gap is computed as the difference between the output and its HP-filter trend over the study sample and is expressed as a percentage of output. The policy rate is measured using either the three-month T-bill rate (as in our baseline); the effective policy rate (EPR), which is

[21] With the exception of specifications that assume a forward-looking reaction function.

constructed as a combination of the bank rate, the repo rate, and the reverse repo rate; or the WACR.

We first replicate the results of each study. We then extend each study to analyze how the estimated coefficients of its respective reaction function evolved with the adoption of FIT. For study I, this involves extending the sample period to include the FIT implementation date then introducing a FIT dummy and its interaction with the inflation and output gap measures. For studies II and IV, this involves including the FIT dummy interacted with the inflation and output variables. For study III, this involves including both FIT and COVID-19 dummies interacted with the inflation and output gap variables. [22]

[22]In an updated version of study II Eichengreen et al. (2021) and in a footnote of study III Eichengreen and Gupta (2024), the authors consider these interactions to analyze the change in reaction function after the implementation of FIT. In this case, our extension is merely a replication of their updated analyses.

Table 4: Estimates of the Reaction Functions from the Related Literature: Replications

| | (1)<br>Study I | (2)<br>Study II | (3)<br>Study III | (4)<br>Study IV |
|---|---|---|---|---|
| Inflation Variable | 0.07** | 0.08*** | 0.11*** | 0.28** |
| | (2.41) | (3.30) | (3.88) | (2.20) |
| Output Gap Variable | 0.23*** | 0.19*** | 0.06*** | 0.37*** |
| | (2.91) | (2.81) | (3.11) | (3.13) |
| L.Dependent Variable | 0.85*** | 0.87*** | 0.89*** | |
| | (26.30) | (28.04) | (29.80) | |
| L.Real Interest Rate | | | | 0.44*** |
| | | | | (4.77) |
| Exchange Rate Growth | -0.00 | | | |
| | (-0.13) | | | |
| FIT dummy | | -0.06 | -0.07 | -1.38*** |
| | | (-0.72) | (-0.66) | (-3.70) |
| COVID dummy | | | 0.00 | |
| | | | (0.04) | |
| GFC dummy | | | | 1.37*** |
| | | | | (3.05) |
| Constant | 0.93*** | 0.41* | 0.14 | 5.90*** |
| | (4.45) | (1.79) | (0.61) | (16.40) |
| Observations | 56 | 91 | 108 | 64 |
| $R^2$ | 0.92 | 0.92 | 0.92 | 0.46 |
| Adjusted $R^2$ | 0.92 | 0.92 | 0.92 | 0.41 |
| Dependent Variable | EPR | EPR | EPR | WACR |
| Inflation Variable | WPI Gap | WPI-CPI: Rate | WPI-CPI: Rate | Lagged CPI-IW: Gap |
| Output Gap Variable | Real GDP Gap | Real GDP Gap | Real GDP Gap | Lagged Real GDP Gap |
| FIT Range | ✗ | 2016Q3-2019Q4 | 2016Q3-2019Q4 | 2016Q1-2020Q1 |
| Interactions | ✗ | ✗ | ✗ | ✗ |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note*: The effective policy rate is defined as bank rate (February 1999 through February 2002), reverse repo rate (March 2002 through June 2006), repo rate (July 2006 through November 2008), reverse repo rate (December 2008 through May 2010), and repo rate (June 2010 to present). The COVID-19 dummy is one for the 2020:Q1–2024:Q1 period. The GFC dummy is one for the 2009:Q1–2020:Q1 period. Exchange rate growth is the annualized quarter-on-quarter growth of the INR/USD exchange rate. The real interest rate is defined as the weighted average call money rate (WACR) less the next quarter's CPI-IW inflation rate (year-over-year).
*Sources:* Haver Analytics, authors' calculations.

We successfully replicate the original result of each study. The results of the replication exercise are presented in Table 4 (with more details in Tables A.3, A.5, A.7, and A.9, respectively.) We then present the results of the extension exercise in Table 5. This table follows the format of the replication table then adds additional rows for the controls required to capture the change in the RBI's monetary policy reaction function during the post-FIT period.

Table 5: Estimates of the Reaction Functions from the Related Literature: Extensions

| | (1) Study I | (2) Study II | (3) Study III | (4) Study IV |
|---|---|---|---|---|
| Inflation Variable | 0.05* | 0.09*** | 0.09*** | 0.82*** |
| | (1.94) | (3.31) | (3.47) | (4.18) |
| Output Gap Variable | 0.19** | 0.19*** | 0.18** | 0.09 |
| | (2.39) | (2.64) | (2.51) | (0.51) |
| L.Dependent Variable | 0.88*** | 0.87*** | 0.88*** | |
| | (31.57) | (27.55) | (29.50) | |
| L.Real Interest Rate | | | | 0.30*** |
| | | | | (3.02) |
| Exchange Rate Growth | 0.00 | | | |
| | (0.40) | | | |
| FIT dummy | -0.11 | 0.39* | 0.53** | -1.76*** |
| | (-1.39) | (1.98) | (2.23) | (-4.85) |
| COVID dummy | | | -0.20 | |
| | | | (-0.40) | |
| GFC dummy | | | | 1.63*** |
| | | | | (4.38) |
| Inflation Variable $\times$ FIT dummy | -0.04 | -0.12*** | -0.12* | 0.20* |
| | (-1.34) | (-3.06) | (-1.92) | (1.95) |
| Observations | 113 | 91 | 108 | 64 |
| $R^2$ | 0.92 | 0.92 | 0.93 | 0.60 |
| Adjusted $R^2$ | 0.92 | 0.92 | 0.92 | 0.54 |
| Dependent Variable | EPR | EPR | EPR | WACR |
| Inflation Variable | WPI: Gap | WPI-CPI: Rate | WPI-CPI: Rate | Lagged CPI-IW: Gap |
| Output Gap Variable | Real GDP Gap | Real GDP Gap | Real GDP Gap | Lagged Real GDP Gap |
| FIT Range | 2015Q2-2025Q2 | 2016Q3-2019Q4 | 2016Q3-2019Q4 | 2016Q1-2020Q1 |
| Interactions | ✓ | ✓ | ✓ | ✓ |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note*: The effective policy rate is defined as bank rate (February 1999 through February 2002), reverse repo rate (March 2002 through June 2006), repo rate (July 2006 through November 2008), reverse repo rate (December 2008 through May 2010), and repo rate (June 2010 to present). The COVID-19 dummy is one for the 2020:Q1–2024:Q1 period. The GFC dummy is one for the 2009:Q1–2020:Q1 period. Exchange rate growth is the annualized quarter-on-quarter growth of the INR/USD exchange rate. The real interest rate is defined as the WACR less the next quarter's annual CPI-IW inflation rate.
*Sources:* Haver Analytics, authors' calculations.

There are some similarities between the results of these other studies and our own baseline results. First, regarding the role of interest rate persistence: The coefficient is positive and strongly significant in all specifications, and there is a sharp increase in the adjusted R-squared of the regressions when the lagged interest rate is added as a control variable. This reaffirms the finding that interest rate inertia is an important characteristic of the RBI's monetary policy reaction function. Second, the coefficient of the economic activity measure is positive and significant. Third, the exchange rate has no significant impact on the RBI's monetary policy decision.

At the same time, we observe some systematic differences between our baseline estimates and those reported in these other studies. First, whereas each of these studies obtains a positive and statistically significant coefficient on the inflation term, our baseline specification yields an insignificant coefficient. Second, the coefficient on the FIT dummy itself is positive and significant in studies II and III but negative in studies I and IV, which is consistent with our baseline estimates. Third, in studies I through III, the coefficient of the interaction of the FIT dummy with inflation carries a counterintuitive negative sign and is even statistically significant for studies II and III, whereas in our baseline, this interaction term is positive but statistically insignificant. Study IV is the only one in which this coefficient is positive and significant.

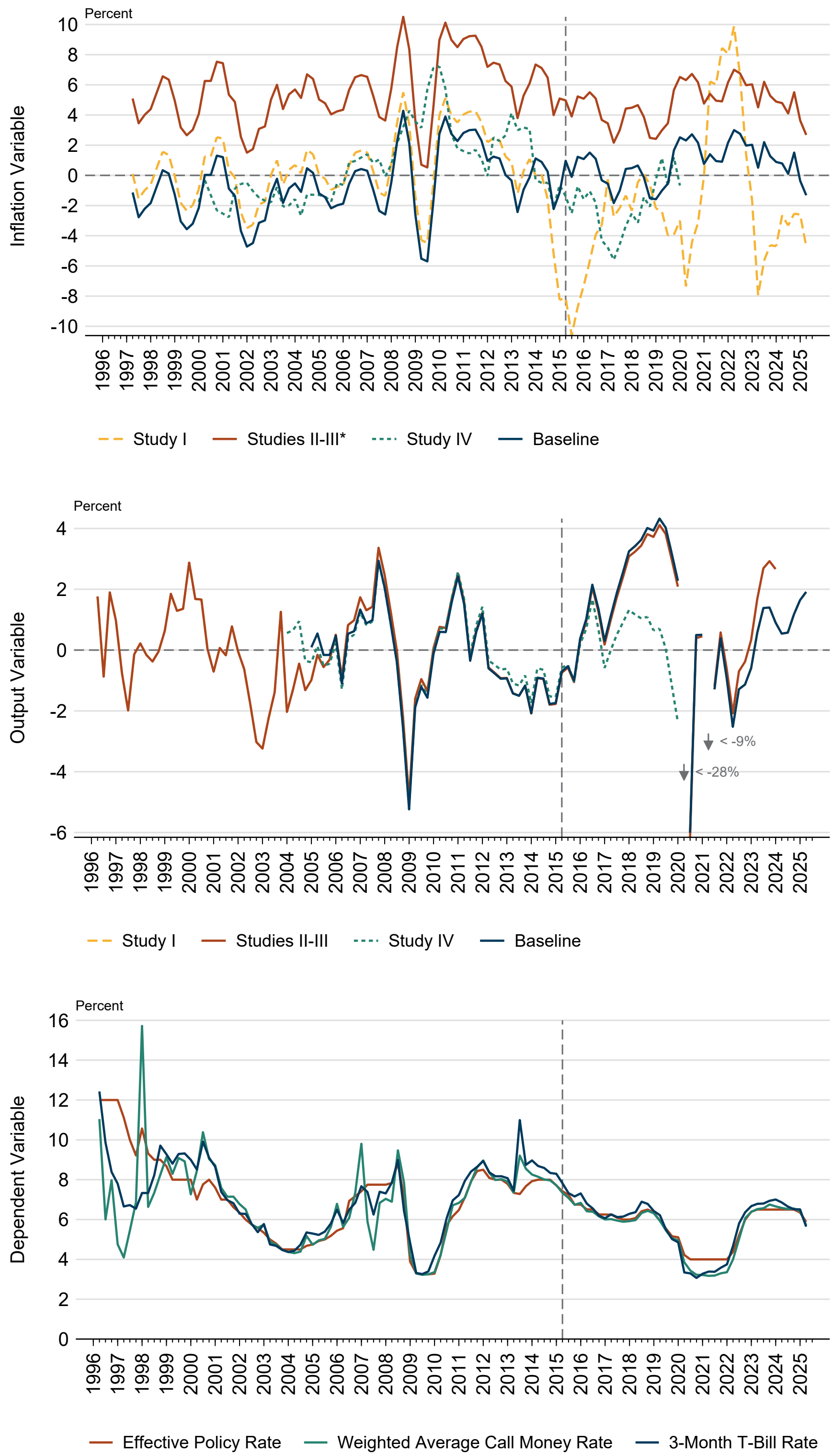
Overall, the negative sign of the interaction term in studies I through III corroborates our central finding that the RBI does not appear to have assigned a greater weight to inflation during the post-FIT period The only study that presents supporting evidence of a change in the RBI's actions in a direction consistent with the regime change is study IV.

These divergences raise the question of why our baseline results differ from those of the existing studies, particularly why our specification yields an insignificant coefficient on inflation and a positive but insignificant coefficient on the FIT–inflation interaction and why the main finding of study IV differs from those of all other studies, including our own baseline. We explore this issue in detail in Appendices A.3 through A.6.

We begin by considering the paths of inflation, output gap, and policy variables used in the different studies and our own baseline in Figure 4. At first glance, the inflation measures of studies II and III and our baseline tend to co-move but differ in levels, while the inflation measures of studies I and IV move quite differently. Study I uses the WPI inflation minus 5 percent as its inflation gap, in contrast to our baseline specification, which employs a combined inflation measure based on WPI inflation until 2013 and CPI inflation thereafter. We also set the inflation target at the decadal average of the combined inflation measure in the pre-FIT sample and at 4 percent in the post-FIT sample. Study IV measures inflation using the CPI-IW index and uses the decadal average of this rate as the inflation target (2000:Q1–2009:Q4 average for the pre-FIT sample and 2010:Q1–2020:Q1 average for the post-FIT sample).

The output gap measures across all studies are similar, which makes sense, as they all use real GDP as the output measure. The minor differences are due to variations in the sample period over which the potential output is computed in each study. Finally, the policy variables used across the different studies co-move over most of the relevant sample.

Figure 4: Comparison of the Macroeconomic Indicators Employed across the Studies




*Notes*: Variables for inflation and output are defined as described in Table 3. Studies II and III use the inflation level, while the remaining studies and our baseline specification use the inflation gap.
*Sources*: Haver Analytics, authors' calculations.

Further, we find that, across studies I through III, the positive and significant inflation coefficient is due to the use of a contemporaneous rather than lagged inflation measure. The positive and significant inflation coefficient in study IV arises from the inclusion of the lagged real interest rate as an additional control variable.

The positive and significant coefficient of the FIT dummy in studies II and III is explained both by their use of a contemporaneous rather than lagged inflation level (see columns (2) and (3) of Tables A.6 as well as A.8) and their use of the inflation level rather than the inflation gap as an independent variable (see column (4) of Tables A.6 and A.8).

Most importantly, the positive and significant coefficient of the FIT–inflation interaction term in study IV is highly dependent on the researchers' modeling choices. For example, when we re-estimate their regression without the lagged real interest rate but with a lag of the dependent variable instead (as is more typical in the literature to capture inertia), the coefficient loses its significance even though it remains positive (see column (1) of Table A.9). If we keep the lagged real interest rate but remove the GFC dummy and associated interaction terms, then the coefficient on the FIT–inflation interaction becomes negative and significant (see column (2) of Table A.9).[23]

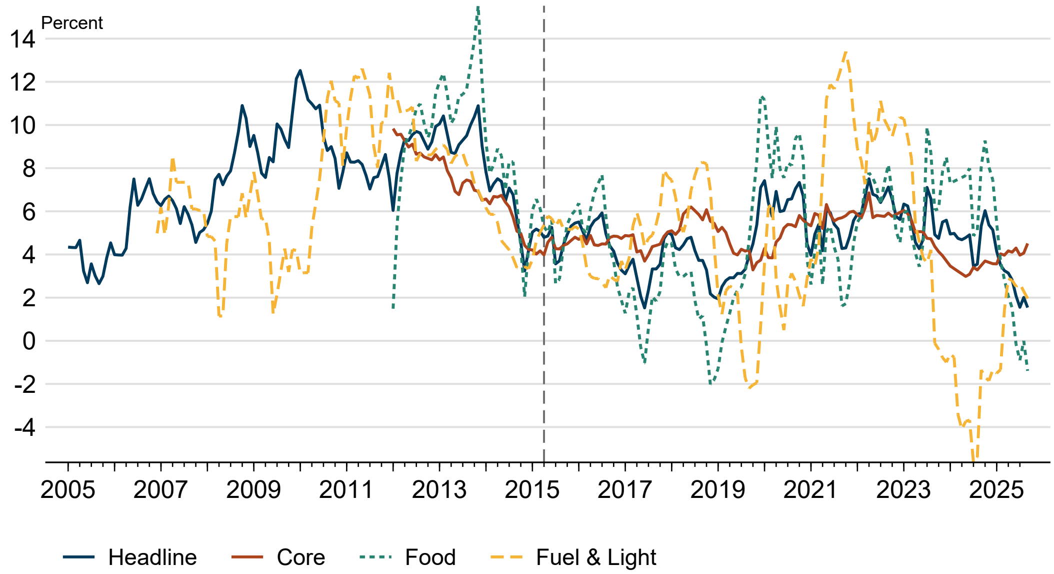
We verify that the differences in the cutoff date that defines the post-FIT period do not account for the divergence between our results and those of these previous studies. We repeat our baseline analysis using the FIT cutoff dates of the different studies and find very similar results (see Table A.10).

# 6 Explaining the Post-FIT Inflation Performance: A Forward-looking Framework

In the preceding sections, both our baseline results and extensions of the related studies suggest that the RBI's response to deviations of inflation from the target did not rise significantly after the adoption of FIT. More broadly, estimates of Taylor-type reaction functions yield mixed assessments of the effectiveness of the FIT regime, with results that are highly sensitive to the choice of inflation measures and model specification.

[23]In fact, adding the lagged real interest rate and the GFC dummy and its associated interactions to our baseline while simultaneously dropping exchange rate growth and estimating the reaction function over study IV's sample also yields a positive coefficient on the FIT–inflation interaction (see column (3) of Table A.9).

Figure 5: CPI Inflation Rates




*Notes:* Headline, core, and food CPI series are seasonally adjusted, while the fuel and light CPI series is not seasonally adjusted. The vertical dashed line marks the FIT adoption date.
*Sources:* Haver Analytics, authors' calculations.

To better interpret these findings, we examine the inflation dynamics over the sample. Figure 5 shows the evolution of the headline, core (excluding food and energy), food, and fuel CPI inflation rates over the sample. Table 6 summarizes statistics of these inflation series, separately for the pre-FIT and post-FIT periods. Both the levels and volatility of the headline and core inflation rates declined markedly after the adoption of FIT. At first glance, this outcome may appear counterintuitive, given that our estimates from Taylor-type rules do not indicate a greater weight on inflation stabilization during this period.

Table 6: Summary Statistics

| | Pre-FIT | | Post-FIT | |
|---|---|---|---|---|
| | Mean | SD | Mean | SD |
| Headline Inflation | 8.03 | 1.97 | 4.73 | 1.42 |
| Core Inflation | 7.15 | 1.66 | 4.79 | 0.87 |
| Food Inflation | 9.03 | 3.06 | 4.72 | 2.95 |
| Fuel and Light Inflation | 7.24 | 2.49 | 4.25 | 4.18 |
| Observations | 39 | | 125 | |

*Notes:* The pre-FIT period spans from January 2012 though March 2015, while the post-FIT period spans from April 2015 through August 2025. The pre-FIT period is truncated relative to the baseline analysis because the food and core inflation series are available starting only in 2012. The average headline inflation rate over the full pre-FIT sample (January 2005 through March 2015) was 7.49 percent.
*Sources:* Haver Analytics, authors' calculations.

The data point to a dual explanation. First, the disinflation in the immediate aftermath of FIT adoption largely reflected favorable food and fuel price dynamics, as also documented by Blagrave and Lian (2020) and Chinoy et al. (2016). In the initial years following the adoption of FIT (2017 through 2019), the average food and fuel inflation rates were 2.3 and 4.2 percent, respectively. This contrasts with the average food and fuel inflation rates of 9.3 and 7.5 percent, respectively, in the three years leading up to FIT adoption (2012 through 2014). Second, even during subsequent episodes of commodity price shocks—such as 2022 through 2024, when food inflation averaged 6.8 percent and fuel prices rose after the Russian invasion of Ukraine—headline CPI inflation remained contained, with the average not exceeding 6 percent. This contrasts sharply with the double-digit inflation of the pre-FIT years during episodes of large food price shocks (see the navy blue line in Figure 5). The latter observation is consistent with the view that the adoption of FIT enhanced the credibility of the RBI, thus strengthening the anchoring of inflation expectations and dampening the transmission of supply shocks to headline inflation (Eichengreen and Gupta, 2024; Garga et al., 2024; Pattanaik et al., 2023; Blagrave and Lian, 2020).[24,25]

A complementary explanation is methodological: Standard Taylor-rule specifications may be ill suited to characterize the RBI's monetary policy reaction function.

## 6.1 Forward-looking Reaction Functions

Since monetary policy operates with lags, central banks typically respond to forecasts of macroeconomic conditions over the relevant policy horizon. To account for this, we also study changes in the weight on inflation stabilization in the post-FIT period by estimating a forward-looking reaction function, whereby the RBI responds to its own forecasts of inflation and economic activity rather than their realized or lagged values. Specifically, we estimate the following equation:

$$i_t = \varrho i_{t-1} + \alpha_1 E_t y_{t+h} + \alpha_2 E_t \pi_{t+h} + \gamma FIT + \chi_1 FIT \times E_t \pi_{t+h} + \chi_2 FIT \times E_t y_{t+h}, \quad (3)$$

where $h = 0, 1, 2, 3$ and $y_{t+h}$ and $\pi_{t+h}$ represent the h-quarter-ahead forecast of economic activity and inflation, respectively.

[24]Indeed, in regimes where inflation expectations are firmly anchored, the estimated Taylor-rule coefficient on inflation may not increase because effective communication and credibility stabilize inflation expectation ex ante, reducing the need for aggressive ex post policy adjustments (Nakamura et al., 2025; Hazell et al., 2020).

[25]Study II, which we replicated earlier, argues similarly that increased credibility may have allowed the RBI to respond less aggressively to inflation, consistent with the study's finding of a negative interaction between the FIT dummy and inflation in the Taylor-rule specification.

We extract the RBI's forecasts of year-on-year inflation and real GDP growth rates from its monetary policy statements. These forecasts typically span horizons from one quarter to one year ahead and are reported on a fiscal year basis. For example, the February 2024 statement projected inflation to be 5.4 percent for fiscal year 2023–2024 and 5 percent for 2024:Q4, corresponding to the forecasts for April 2023 through March 2024 and January through March 2024, respectively.

In a handful of instances, the forecasts were reported for the halves instead of quarters of the fiscal year. When only half-year forecast ranges are provided, we use the accompanying fan charts in the statement to infer the quarterly projections. For example, the December 2018 statement projected the inflation rate to be in the range of 2.7 to 3.2 percent in H2, corresponding to the October 2018–March 2019 period. We interpret the RBI forecasts of the inflation rate for Q3 and Q4 of fiscal year 2018–2019 (October through December 2018 and January through March 2019, respectively) as 2.7 and 3.2 percent and verify that this is consistent with the fan chart.

During the pre-FIT period, the RBI typically reported forecasts only at the fiscal-year horizon, with no quarterly projections available. Although Q4 inflation forecasts were often provided, output growth forecasts were limited to annual averages. To align horizons for inflation with output growth forecasts, we interpolate Q4 output growth forecasts using the annual projections from the statements and the realized real GDP data.

For example, the April 2010 statement projected real GDP growth of 8 percent for fiscal year 2010–2011. Since no quarterly data were available in real time, we assume uniform quarterly forecasts of 8 percent. In July 2010, the RBI raised its annual forecast to 8.5 percent, by which time Q1 real GDP growth had been released at 9.97 percent. Given that the annual forecast equals the average of quarterly forecasts, we back out a Q4 forecast of 8.01 percent.[26] We apply this method to all pre-FIT statements that report an annual real GDP growth forecast alongside at least one quarterly inflation forecast.

We report the results of estimating the forward-looking reaction function of equation 3 over the 2010:Q3–2019:Q4 period in Table 7. Column (1) uses the three-month T-bill rate as the dependent variable, while column (2) uses the WACR as the dependent variable. Both columns use the pooled one- to three-quarter-ahead forecasts of inflation and output growth along with one lag of the dependent variable, the FIT dummy, and the FIT dummy interacted with the inflation and output growth forecasts as controls.

The coefficients on the inflation and GDP growth forecasts are insignificant in both speci-

[26] Assuming $Q2 = Q3 = Q4 = Q$, the condition $8.5 = (9.97 + 3Q)/4$ yields $Q = 8.01$.

fications. The FIT dummy coefficient is negative and significant across both specifications, consistent with the baseline regression and reflecting the lower average levels of both the three-month T-bill rate and the WACR during the post-FIT period. The lagged dependent variable has a positive and significant coefficient, indicating inertia in the RBI's reaction function. The response to economic activity is greater in the post-FIT period when using the T-bill rate but statistically indistinguishable across the pre- and post-FIT periods when using WACR.

The key departure from the baseline result is that the interaction of the FIT–inflation interaction coefficient is positive and significant, implying that the RBI responded more strongly to expected inflation after FIT adoption. This result is robust to alternative choices of the policy instrument.

Although these results point to greater alignment between the RBI's communication and its actions under FIT, two caveats are warranted. First, the estimates rely on an unbalanced sample: 18 observations in the pre-FIT period versus 58 in the post-FIT period. This reflects institutional differences—six scheduled meetings per year with multiple forecast horizons in the post-FIT regime compared with irregular meetings and typically a single forecast horizon during the pre-FIT regime. Second, the RBI publishes forecasts of output growth rather than the output gap. Growth forecasts may not accurately capture cyclical conditions if contemporaneous revisions to potential output are embedded in the forecasts.

Table 7: Estimates of the Forward-looking Monetary Policy Reaction Functions: Excluding the COVID-19 Period

| | (1)<br>3-month T-Bill Rate | (2)<br>Weighted Average Call Money Rate |
|---|---|---|
| Inflation Forecast | -0.59 | -0.30 |
| | (-1.47) | (-1.47) |
| GDP Growth Forecast | -0.08 | 0.03 |
| | (-0.46) | (0.35) |
| FIT dummy | -7.06** | -4.24** |
| | (-2.04) | (-2.42) |
| Inflation Forecast × FIT dummy | 0.68* | 0.39* |
| | (1.72) | (1.89) |
| GDP Growth Forecast × FIT dummy | 0.29* | 0.16 |
| | (1.89) | (1.61) |
| L.Dependent Variable | 0.88*** | 0.84*** |
| | (8.34) | (10.33) |
| Constant | 5.77* | 3.33* |
| | (1.75) | (1.99) |
| Observations | 76 | 76 |
| Pre-FIT | 18 | 18 |
| Post-FIT | 58 | 58 |
| $R^2$ | 0.88 | 0.93 |
| Adjusted $R^2$ | 0.86 | 0.92 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note:* The sample includes quarterly observations from 2010:Q3 through 2019:Q4, with the intent of having a balanced number of observations in the pre- and post-FIT samples. The dependent variable is the three-month T-bill rate in column (1) and the weighted average call money rate in column (2).
*Sources:* RBI's monetary policy statements, Haver Analytics, authors' calculations.

Given the absence of regular forecasts of inflation and economic activity in the pre-FIT sample, we implement two alternative versions of the forward-looking regressions as robustness checks. First, we estimate forward-looking monetary policy reaction functions only for the post-FIT sample. The results shown in Table 8 confirm that the RBI targeted inflation forecasts in the post-FIT period. The coefficients on the inflation forecasts are significant for both columns, using three-month T-Bill rate or WACR as dependent variables. The lagged dependent variable continues to have a positive and significant coefficient. In Table A.11, we further verify that this result is not driven by the high-inflation period following the COVID-19 pandemic.

Table 8: Estimates of the Forward-looking Monetary Policy Reaction Functions: Post-FIT

| | (1)<br>3-month T-Bill Rate | (2)<br>Weighted Average Call Money Rate |
|---|---|---|
| Inflation Forecast | 0.23*** | 0.21*** |
| | (6.46) | (6.63) |
| GDP Growth Forecast | -0.01 | -0.01 |
| | (-0.62) | (-1.41) |
| L.Dependent Variable | 0.93*** | 0.96*** |
| | (41.55) | (46.87) |
| Constant | -0.66** | -0.64*** |
| | (-2.47) | (-2.76) |
| Observations | 164 | 164 |
| $R^2$ | 0.93 | 0.95 |
| Adjusted $R^2$ | 0.93 | 0.94 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note:* The sample includes quarterly observations from 2015:Q2 through 2025:Q2. The dependent variable is the three-month T-bill rate in column (1) and the weighted average call money rate in column (2).
*Sources:* RBI's monetary policy statements, Haver Analytics, authors' calculations.

Second, we use a combined inflation-gap measure that we set equal to the WPI inflation rate minus its decadal (2004–2014) average in the pre-FIT period and the RBI's inflation forecast minus the 4 percent inflation target in the post-FIT period. The FIT–inflation-gap interaction coefficient from this specification captures the differential response of the RBI to the inflation-forecast gap in the post-FIT period relative to WPI-inflation gap in the pre-FIT period. The findings from this alternative estimation, shown in Table A.12, again reaffirm the baseline finding that the RBI did inflation-forecast targeting in the post-FIT period. The results of this estimation are also robust to excluding the COVID-19 period (see Table A.13).

Overall, results from our forward-looking analysis show that the RBI responded to expected inflation in the post-FIT period and can explain why standard Taylor-type rules based on realized inflation fail to detect a stronger policy response to inflation during the post-FIT period. These results highlight the need for richer frameworks to evaluate the behavior of emerging-market central banks and the central role for macroeconomic forecasting in the FIT regime.[27]

[27] This implication is consistent with El-Shagi and Ma (2023), who find little evidence of the Taylor rule being used in practice among inflation-targeting countries, and with Mehrotra and Sánchez-Fung (2011), who find that the behavior of central banks in inflation-targeting emerging economies is better captured with a hybrid McCallum–Taylor rule that incorporates a nominal income target.

# 7 Conclusion

In this paper, we examine the alignment between the RBI's monetary policy communication and its actual conduct, with a particular focus on the period following the adoption of FIT in 2015. Using natural language processing techniques on monetary policy statements, we document a clear shift in the emphasis of the official communication. Before FIT, the RBI's communication referenced a broad set of indicators, such as credit conditions and market developments, while during the post-FIT period, the narrative focused more narrowly on inflation, in line with the statutory mandate of the new regime.

By contrast, estimates of standard Taylor-type reaction functions reveal no systematic increase in the weight assigned to inflation stabilization during the post-FIT period. Across specifications, interest rate inertia remains dominant, while other coefficients vary with model choices, highlighting the fragility of Taylor-rule-based assessments of monetary policy conduct in the emerging-market context. Replications and extensions of previous studies confirm that their results are sensitive to specification details. However, when we consider a forward-looking framework incorporating the RBI's internal forecasts, the responsiveness of the policy rate to expected inflation increases significantly after the adoption of FIT, suggesting a greater role for forecast-based, forward-looking decision-making following FIT adoption.

We show that the apparent disconnect between the RBI's words and actions reflects the limitations of standard Taylor-type rules in capturing the behavior of monetary policy in India rather than a lack of commitment by the RBI to the inflation-targeting regime. Post-FIT inflation performance points to the improved credibility of the central bank and better-anchored inflation expectations, which helped contain inflation, despite sizable food and fuel shocks. In general, our findings underscore the need for richer empirical frameworks—beyond standard Taylor rules—to capture the dynamics of monetary policy in emerging economies, where credibility, expectations, and vulnerability to supply shocks play central roles in policy transmission.

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## A.1 Word Clouds: Combined Monetary Policy and Regulatory Statements

Figure A.6: Word Clouds from the RBI's Statements: Pre-FIT vs Post-FIT


(a) Pre-FIT (Jan 2000–Feb 2015)

(b) Post-FIT (Mar 2015–Aug 2025)

Note: The figure shows word clouds based on the RBI's monetary policy statements during the pre-FIT period (panel [a]) and the post-FIT period (panel [b]) where the document corpus for the post-FIT period includes both the monetary policy statements and the statements of development and regulatory practices. Each word cloud shows the 40 most used words (among the words used at least five times) across all statements within each subsample. The size of each word is proportional to its frequency of appearance.
*Sources*: RBI's monetary policy statements, authors' calculations.

## A.2 Robustness Check: Alternative Policy Instrument

In Table A.1, we replace the three-month T-bill rate with the weighted average call money rate (WACR) as a proxy for the RBI's monetary policy rate in our baseline reaction function, holding everything else constant. We find similar results. The inflation gap continues to be statistically insignificant, and the output gap is significant with the expected positive sign. The FIT dummy coefficient is significantly negative, reflecting a lower average call rate in the post-FIT period. The exchange rate has no significant impact on the RBI's interest rate decision. The FIT dummy interacted with the inflation coefficient, our main variable of interest, has a negative sign but continues to be statistically insignificant. The FIT dummy interacted with the output gap remains negative and insignificant. In Table A.2, we truncate the sample at 2019:Q4 to avoid the impact of the pandemic. The results are very similar to the corresponding results using the three-month T-bill rate in Table 2, as the FIT dummy interacted with the inflation coefficient is positive but statistically insignificant.

Table A.1: Estimates of the Baseline Monetary Policy Reaction Functions Using WACR

| | Dependent Variable: WACR | | | | |
|---|---|---|---|---|---|
| | (1) | (2) | (3) | (4) | (5) |
| L.Inflation Gap | 0.13 | 0.04 | 0.02 | 0.06 | 0.02 |
| | (1.28) | (0.79) | (0.44) | (0.81) | (0.22) |
| L.Output Gap | 0.12*** | 0.03** | 0.03** | 0.04* | 0.21 |
| | (3.92) | (2.39) | (2.10) | (1.90) | (1.50) |
| L.WACR | | 0.81*** | 0.79*** | 0.75*** | 0.75*** |
| | | (10.51) | (9.73) | (9.09) | (8.56) |
| Exchange Rate Growth | | | 0.01 | 0.01 | 0.01 |
| | | | (0.87) | (0.80) | (0.87) |
| FIT dummy | | | | -0.40** | -0.41** |
| | | | | (-2.11) | (-2.22) |
| L.Inflation Gap $\times$ FIT dummy | | | | -0.02 | -0.01 |
| | | | | (-0.17) | (-0.05) |
| L.Output Gap $\times$ FIT dummy | | | | | -0.19 |
| | | | | | (-1.36) |
| Constant | 6.14*** | 1.17*** | 1.24*** | 1.73*** | 1.71*** |
| | (33.71) | (2.68) | (2.74) | (3.58) | (3.50) |
| Observations | 81 | 81 | 81 | 81 | 81 |
| $R^2$ | 0.09 | 0.71 | 0.72 | 0.73 | 0.74 |
| Adjusted $R^2$ | 0.07 | 0.70 | 0.70 | 0.71 | 0.72 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note*: The sample includes quarterly observations from 2005:Q1 through 2025:Q2, with the intent of having a balanced number of observation in the pre- and post-FIT samples. Inflation is measured using the year-on-year growth rate of the WPI through 2013:Q4 and the CPI thereafter. Output is measured using GDP. The inflation gap is calculated by subtracting the 2004–2014 decade average from the inflation rate in the pre-FIT period and subtracting 4 percent in the post-FIT period. The output gap is computed as the percentage difference between actual and potential GDP as a ratio of actual GDP, where potential GDP is calculated as HP-filter-trend GDP over the 2005:Q1–2025:Q2 period. The dependent variable is the weighted average call money rate (WACR). Exchange rate growth is the annualized quarter-on-quarter growth rate of the exchange rate (INR/USD). The FIT dummy is set to one for the 2015:Q2–2025:Q2 period and zero otherwise.
*Sources:* Haver Analytics, authors' calculations.

Table A.2: Estimates of the Baseline Monetary Policy Reaction Functions Using WACR: Excluding the COVID-19 Period

| | Dependent Variable: WACR | | | | |
|---|---|---|---|---|---|
| | (1) | (2) | (3) | (4) | (5) |
| L.Inflation Gap | 0.37*** | 0.13 | 0.14 | 0.06 | 0.05 |
| | (3.13) | (1.28) | (1.68) | (0.65) | (0.52) |
| L.Output Gap | -0.62*** | -0.07 | -0.09 | -0.10 | -0.10 |
| | (-5.03) | (-1.00) | (-0.93) | (-1.38) | (-1.07) |
| L.WACR | | 0.85*** | 0.80*** | 0.53*** | 0.53*** |
| | | (10.05) | (7.33) | (3.64) | (3.54) |
| Exchange Rate Growth | | | 0.01 | 0.01** | 0.01** |
| | | | (1.43) | (2.20) | (2.21) |
| FIT dummy | | | | -0.80*** | -0.81*** |
| | | | | (-2.97) | (-2.81) |
| L.Inflation Gap × FIT dummy | | | | 0.03 | 0.03 |
| | | | | (0.28) | (0.28) |
| L.Output Gap × FIT dummy | | | | | -0.02 |
| | | | | | (-0.14) |
| Constant | 6.97*** | 0.98 | 1.26 | 3.63*** | 3.64*** |
| | (42.62) | (1.66) | (1.62) | (3.11) | (2.99) |
| Observations | 37 | 37 | 37 | 37 | 37 |
| $R^2$ | 0.34 | 0.81 | 0.85 | 0.91 | 0.91 |
| Adjusted $R^2$ | 0.30 | 0.79 | 0.83 | 0.89 | 0.88 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note*: The sample includes quarterly observations from 2010:Q3 through 2019:Q4, with the intent of having a balanced number of observation in the pre- and post-FIT samples. Inflation is measured using the year-on-year growth rate of the WPI through 2013:Q4 and the CPI thereafter. Output is measured using GDP. The inflation gap is calculated by subtracting the 2004–2014 decade average from this inflation rate in the pre-FIT period and subtracting 4 percent in the post-FIT period. The output gap is computed as the percentage difference between actual and potential GDP as a ratio of actual GDP, where potential GDP is calculated as HP-filter-trend GDP over the 2010:Q3–2019:Q4 period. The dependent variable is the WACR. Exchange rate growth is the annualized quarter-on-quarter growth rate of the exchange rate (INR/USD). The FIT dummy is set to one for the 2015:Q2–2019:Q4 period and zero otherwise.
*Sources:* Haver Analytics, authors' calculations.

## A.3 Study I: Extensions

Table A.3: Study I: Replication and Extension

| | Dependent Variable: Effective Policy Rate | | | | |
|---|---|---|---|---|---|
| | (1) | (2) | (3) | (4) | (5) |
| Inflation Gap | 0.07** | 0.04*** | 0.04*** | 0.08*** | 0.05* |
| | (2.41) | (3.58) | (3.18) | (3.03) | (1.94) |
| Output Gap | 0.23*** | 0.04** | 0.04** | 0.04*** | 0.19** |
| | (2.91) | (2.53) | (2.55) | (2.91) | (2.39) |
| Exchange Rate Growth | -0.00 | 0.00 | 0.00 | -0.00 | 0.00 |
| | (-0.13) | (0.08) | (0.10) | (-0.08) | (0.40) |
| L.Effective Policy Rate | 0.85*** | 0.90*** | 0.90*** | 0.89*** | 0.88*** |
| | (26.30) | (32.07) | (30.91) | (31.99) | (31.57) |
| FIT dummy | | | -0.02 | -0.05 | -0.11 |
| | | | (-0.21) | (-0.60) | (-1.39) |
| Inflation Gap × FIT dummy | | | | -0.06** | -0.04 |
| | | | | (-2.15) | (-1.34) |
| Output Gap × FIT dummy | | | | | -0.16** |
| | | | | | (-2.09) |
| Constant | 0.93*** | 0.62*** | 0.64*** | 0.67*** | 0.80*** |
| | (4.45) | (3.57) | (3.22) | (3.57) | (4.36) |
| Observations | 56 | 113 | 113 | 113 | 113 |
| $R^2$ | 0.92 | 0.91 | 0.91 | 0.91 | 0.92 |
| Adjusted $R^2$ | 0.92 | 0.91 | 0.90 | 0.91 | 0.92 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note*: Following Patra and Kapur (2012), the inflation gap is computed as the year-on-year growth rate of the WPI minus 5 percent. In computing the output gap, potential GDP is calculated as HP-filter-trend GDP over the relevant sample period. Exchange rate growth is the annualized quarter-on-quarter growth of the INR/USD exchange rate. The FIT dummy is set to one for the 2015:Q2–2025:Q2 period and zero otherwise. The dependent variable is the effective policy rate defined as bank rate (February 1996 through February 2002), reverse repo rate (March 2002 through June 2006), repo rate (July 2006 through Nov 2008), reverse repo rate (December 2008 through May 2010), and repo rate (June 2010 to present). The sample includes quarterly observations from the 1997:Q2–2011:Q1 period in the replication column (1) and extended to 2025:Q2 in the remaining columns (2) through (4).
*Sources:* Haver Analytics, authors' calculations.

In Table A.3, we replicate the results of study I for the sample period of 1997 through 2011. This study analyzed the RBI's monetary policy reaction function for the pre-FIT period. The authors estimated their model using quarterly data for the period of April 1996 through March 2011. While our data start in 1996:Q2, the first four quarters are used to produce the year-on-year growth rate of inflation. Therefore, we replicate the study starting in 1997:Q2 and ending in 2011:Q1 to align as closely as possible with the original analysis. In column (2), we extend the study's model to a longer sample, including data up to 2025:Q2, which allows us to include the FIT period. In columns (3) through (5), we add the FIT dummy (one for the 2015:Q2–2025:Q2 period and zero otherwise) and its interaction with the inflation gap and with both inflation and output gaps, respectively, in accordance with our own baseline analysis in Table 1. We use contemporaneous values of the explanatory variables following the original study (this is different from our baseline, for which we used lagged values to capture lags in data releases).

We mostly replicate the baseline Taylor-rule specification of study I in column (1). We obtain statistically significant coefficients for the inflation gap and the output gap, similarly to the original study. When extending the sample to 2025 while keeping the specification unchanged in column (2), we find that both the inflation gap and the output gap coefficients continue to be positive and statistically significant.

The divergence in the results of study I from ours could be due to three potential factors: (i) they use EPR as the dependent variable, whereas we use the three-month T-bill rate; (ii) they use contemporaneous variables, whereas we lag the variables by one period; and (iii) they use a different inflation gap measure, that is, WPI minus 5 percent, throughout the sample, whereas we use a combination of the WPI and the CPI in measuring the inflation gap, reflecting the changes in the RBI's monetary policy statements.

To better understand which of these factors drives the differences in our findings, we estimate their reaction function (i) using the three-month T-bill rate instead of EPR in Table A.4 column (1), (ii) using lagged values of the independent variables while retaining EPR as the dependent variable in Table A.4 column (2), (iii) using the three-month T-bill rate as the dependent variable and lagged independent variables in Table A.4 column (3), and (iv) using our own baseline WPI-CPI rate gap measure instead of WPI minus 5 percent used in the original study. The estimated coefficient on the inflation gap continues to be statistically significant across all these alternative specifications (except when the FIT dummy is added in the extended sample). Thus, we conclude that the difference between our findings is driven by our different measures of the inflation gap.

Column (2) confirms that the positive significant inflation gap coefficient is driven by the authors' use of contemporaneous rather than lagged controls. While the coefficient of the inflation gap is insignificant even in columns (1) and (3), the remaining coefficients are quite different from the original study's extension (see column (1) of Table 5.)

More importantly, when we introduce the FIT dummy and its interaction terms in columns (3) through (5), neither the coefficient of the FIT dummy nor its interaction with the inflation gap is positive or statistically significant, similarly to what we find in our baseline result. This implies that, even when considered in the context of the model used in study I, the RBI's words are not reflected in its actions during the post-FIT period.

Another similarity worth highlighting is that the lagged interest rate variable is highly significant across all four columns and presumably drives the high adjusted R-squared values, as is the case in our baseline results.

Table A.4: Study I: Exploring the Drivers of Differences

| | (1)<br>3-Month T-Bill<br>Original controls | (2)<br>EPR<br>Lagged controls | (3)<br>3-Month T-Bill<br>Lagged controls | (4)<br>EPR<br>Baseline inflation |
|---|---|---|---|---|
| Inflation Gap | 0.03 | 0.03 | -0.01 | 0.09*** |
| | (0.93) | (0.61) | (-0.22) | (3.72) |
| Output Gap | 0.21*** | 0.15** | 0.17** | 0.18** |
| | (3.14) | (2.30) | (2.41) | (2.58) |
| Exchange Rate Growth | 0.01 | -0.00 | 0.01 | 0.00 |
| | (0.98) | (-0.24) | (0.62) | (0.18) |
| FIT dummy | -0.24* | -0.10 | -0.23* | -0.27*** |
| | (-1.84) | (-1.15) | (-1.83) | (-3.71) |
| L.Dependent Variable | 0.83*** | 0.87*** | 0.85*** | 0.87*** |
| | (17.17) | (24.89) | (18.22) | (34.84) |
| Inflation Gap × FIT dummy | -0.01 | -0.01 | 0.04 | -0.03 |
| | (-0.40) | (-0.16) | (0.68) | (-0.60) |
| Output Gap × FIT dummy | -0.16** | -0.14** | -0.17** | -0.15** |
| | (-2.38) | (-2.25) | (-2.49) | (-2.14) |
| Constant | 1.14*** | 0.83*** | 1.07*** | 0.91*** |
| | (3.50) | (3.65) | (3.39) | (5.15) |
| Observations | 113 | 112 | 112 | 113 |
| $R^2$ | 0.86 | 0.90 | 0.85 | 0.93 |
| Adjusted $R^2$ | 0.85 | 0.89 | 0.84 | 0.92 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note*: Following Patra and Kapur (2012), the inflation gap is computed as the year-on-year growth rate of the WPI minus a general target of 5 percent. In column (4), the baseline inflation gap is used, which uses the year-on-year growth rate of the WPI through 2013:Q4 and the CPI thereafter, with the gap calculated by subtracting the 2004–2014 decade average from this inflation rate in the pre-FIT period and subtracting 4 percent from 2015:Q2 onward. In computing the output gap, potential GDP is calculated as HP-filter-trend GDP over the relevant sample period. Exchange rate growth is the annualized quarter-on-quarter growth of the INR/USD exchange rate. The FIT dummy is set to one for the 2015:Q2–2025:Q2 period and zero otherwise. The sample includes quarterly observations from the 1997:Q2–2025:Q2 period.
*Sources:* Haver Analytics, authors' calculations.

## A.4 Study II: Extensions

Table A.5: Study II: Replication and Extension

| | Dependent Variable: Effective Policy Rate | | | | | | | |
|---|---|---|---|---|---|---|---|---|
| | (1) | (2) | (3) | (4) | (5) | (6) | (7) | (8) |
| Inflation | 0.15 | 0.12 | 0.13 | 0.08 | 0.11*** | 0.09*** | 0.12*** | 0.09*** |
| | (1.66) | (1.34) | (1.20) | (0.74) | (3.94) | (3.73) | (3.80) | (3.31) |
| Output Gap | | 0.30*** | | 0.34*** | | 0.19*** | | 0.19*** |
| | | (3.14) | | (3.45) | | (2.82) | | (2.64) |
| FIT dummy | | | 0.51 | 0.08 | | | 0.63** | 0.39* |
| | | | (0.69) | (0.13) | | | (2.33) | (1.98) |
| Inflation $\times$ FIT dummy | | | -0.28* | -0.23** | | | -0.14** | -0.12*** |
| | | | (-1.83) | (-2.12) | | | (-2.25) | (-3.06) |
| Output Gap $\times$ FIT dummy | | | | -0.02 | | | | -0.04 |
| | | | | (-0.21) | | | | (-0.47) |
| L.Effective Policy Rate | | | | | 0.88*** | 0.87*** | 0.89*** | 0.87*** |
| | | | | | (27.44) | (28.40) | (27.45) | (27.55) |
| Constant | 5.97*** | 6.14*** | 6.15*** | 6.48*** | 0.15 | 0.37* | 0.07 | 0.39 |
| | (12.04) | (13.21) | (9.53) | (10.66) | (0.66) | (1.75) | (0.25) | (1.66) |
| Observations | 91 | 91 | 91 | 91 | 91 | 91 | 91 | 91 |
| $R^2$ | 0.04 | 0.10 | 0.05 | 0.13 | 0.89 | 0.92 | 0.90 | 0.92 |
| Adjusted $R^2$ | 0.02 | 0.08 | 0.02 | 0.08 | 0.89 | 0.92 | 0.89 | 0.92 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note:* Following Eichengreen et al. (2021), inflation is measured using the year-on-year growth rate of the WPI through 2013:Q4 and the CPI thereafter. Output is measured using seasonally adjusted real GDP. In computing the output gap, potential GDP is calculated as HP-filter-trend GDP over the 1996:Q2–2019:Q4 period. The dependent variable is the effective policy rate defined as bank rate (February 1996 through February 2002), reverse repo rate (March 2002 through June 2006), repo rate (July 2006 through November 2008), reverse repo rate (December 2008 through May 2010), and repo rate (June 2010 to present). The FIT dummy is set to one for the 2016:Q3–2019:Q4 period and zero otherwise. The sample includes quarterly observations from the 1997:Q2–2019:Q4 period.
*Sources:* Haver Analytics, authors' calculations.

In Table A.5, we replicate the results of study II in columns (1) through (8). We use the inflation level instead of the inflation gap, following the original study. We use contemporaneous variables similarly to the original study. Moreover, the researchers define the FIT dummy as equal to one starting in 2016:Q3, while in our baseline, we set it equal to one starting in 2015:Q2.[28] We replicate all the results of this study. We find that while the estimated

[28] In February 2015, the RBI signed a Monetary Policy Framework Agreement with the Government of India's Ministry of Finance, introducing the FIT framework. This was further formalized in the 2016 Union Budget, and the first meeting of the MPC was held in October 2016. Therefore, the effective start date for FIT in India is 2015:Q2, although 2016:Q3 can also be considered the official starting point.

coefficients of inflation and the output gap are positive and statistically significant in all specifications, the coefficient of the FIT dummy interacted with inflation, though significant, has a negative sign. This is counterintuitive, implying that, following FIT adoption, the RBI would lower interest rates in response to increasing inflation, which is the opposite of what we would expect. Once again, the lagged interest rate variable is strongly significant, and its inclusion from column (5) onward drastically improves the adjusted R-squared values. This implies that much of the variation in the policy rate is explained by its own past value, similarly to what we find in our baseline analysis.

The divergence in the results of study II from ours could be due to three potential factors: (i) the authors use EPR as the dependent variable, whereas we use the three-month T-bill rate; (ii) they use contemporaneous variables, whereas we lag the variables by one period; and (iii) they use inflation level, whereas we use the inflation gap.

We explore each of these reasons in Table A.6. In column (1), we obtain similar results if we use the three-month T-bill rate instead of the effective policy rate as the relevant policy instrument of the RBI, suggesting that a different choice of policy instrument does not drive the differences in results. In both column (2) when using EPR as the dependent variable and column (3) when using the three-month T-bill rate as the dependent variable, the coefficient of the inflation gap becomes insignificant once we lag the controls. This implies that study II finds statistically significant and positive coefficients of inflation because the researchers use contemporaneous independent variables, whereas we use lagged variables in our baseline analysis. In column (2), when we use lagged controls, the FIT dummy coefficient also becomes negative and significant, as in our baseline, suggesting that the positive and significant FIT dummy coefficient in column (2) of Table 5 is also driven by their use of contemporaneous control variables.

We note that the coefficient of the FIT dummy interacted with inflation is always negative when statistically significant. Therefore, even when considered in the context of the model of study II, we do not find a change in the RBI's actions that is consistent with change in words during the post-FIT period.

Table A.6: Study II: Exploring the Drivers of Differences

| | (1) | (2) | (3) | (4) |
|---|---|---|---|---|
| | 3-Month T-Bill Original controls | EPR Lagged controls | 3-Month T-Bill Lagged controls | EPR Baseline Inflation |
| Inflation | 0.09** | 0.04 | 0.01 | 0.08*** |
| | (2.56) | (0.82) | (0.24) | (3.15) |
| Output Gap | 0.20*** | 0.17** | 0.20*** | 0.20*** |
| | (2.88) | (2.62) | (2.85) | (2.71) |
| L.Dependent Variable | 0.82*** | 0.84*** | 0.81*** | 0.86*** |
| | (16.81) | (22.33) | (15.28) | (27.70) |
| FIT dummy | 0.33 | -0.31 | -0.57 | -0.26*** |
| | (1.07) | (-1.10) | (-1.51) | (-3.44) |
| Inflation $\times$ FIT dummy | -0.14** | 0.05 | 0.08 | -0.11*** |
| | (-2.25) | (0.74) | (0.82) | (-2.91) |
| Output Gap $\times$ FIT dummy | 0.02 | -0.11 | -0.17 | -0.04 |
| | (0.17) | (-0.78) | (-0.88) | (-0.50) |
| Constant | 0.76* | 0.83** | 1.29*** | 0.94*** |
| | (1.78) | (2.37) | (3.01) | (4.51) |
| Observations | 91 | 90 | 90 | 91 |
| $R^2$ | 0.82 | 0.89 | 0.80 | 0.92 |
| Adjusted $R^2$ | 0.81 | 0.88 | 0.79 | 0.91 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note*: Following Eichengreen et al. (2021), inflation is measured using the year-on-year growth rate of the WPI through 2013:Q4 and the CPI thereafter. Output is measured using seasonally adjusted real GDP. In computing the output gap, potential GDP is calculated as HP-filter-trend GDP over the 1996:Q2–2019:Q4 period. In column (4), the baseline inflation gap is used, which uses the year-on-year growth rate of the WPI through 2013:Q4 and the CPI thereafter, with the gap calculated by subtracting the 2004–2014 decade average from this inflation rate in the pre-FIT period and subtracting 4 percent from the rate 2015:Q2 onward. The FIT dummy is set to one for the 2016:Q3–2019:Q4 period and zero otherwise. The sample includes quarterly observations from the 1997:Q3–2019:Q4 period.
*Sources:* Haver Analytics, authors' calculations.

## A.5 Study III: Extensions

Table A.7: Study III: Replication and Extension

| | Dependent Variable: Effective Policy Rate | | | | | |
|---|---|---|---|---|---|---|
| | (1) | (2) | (3) | (4) | (5) | (6) |
| Inflation | 0.12 | 0.10 | 0.11*** | 0.11*** | 0.11*** | 0.09*** |
| | (1.41) | (1.02) | (4.33) | (3.88) | (3.79) | (3.47) |
| Output Gap | 0.11*** | 0.09** | 0.05*** | 0.06*** | 0.06*** | 0.18** |
| | (3.66) | (2.03) | (3.32) | (3.11) | (3.04) | (2.51) |
| FIT dummy | | -0.84** | | -0.07 | 0.44 | 0.53** |
| | | (-2.61) | | (-0.66) | (1.56) | (2.23) |
| COVID dummy | | -1.69*** | | 0.00 | -0.30 | -0.20 |
| | | (-5.15) | | (0.04) | (-0.61) | (-0.40) |
| L.Effective Policy Rate | | | 0.89*** | 0.89*** | 0.88*** | 0.88*** |
| | | | (31.01) | (29.80) | (29.42) | (29.50) |
| Inflation × FIT dummy | | | | | -0.14** | -0.12* |
| | | | | | (-2.01) | (-1.92) |
| Inflation × COVID dummy | | | | | 0.05 | 0.02 |
| | | | | | (0.56) | (0.22) |
| Output Gap × FIT dummy | | | | | | -0.21** |
| | | | | | | (-2.50) |
| Output Gap × COVID dummy | | | | | | -0.14** |
| | | | | | | (-2.01) |
| Constant | 5.84*** | 6.32*** | 0.10 | 0.14 | 0.12 | 0.30 |
| | (12.21) | (10.48) | (0.52) | (0.61) | (0.52) | (1.33) |
| Observations | 108 | 108 | 108 | 108 | 108 | 108 |
| $R^2$ | 0.07 | 0.21 | 0.92 | 0.92 | 0.92 | 0.93 |
| Adjusted $R^2$ | 0.05 | 0.18 | 0.92 | 0.92 | 0.91 | 0.92 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note:* Following Eichengreen and Gupta (2024), inflation is measured using the year-on-year growth rate of the WPI through 2013:Q4 and the CPI thereafter. Output is measured using seasonally adjusted real GDP. In computing the output gap, potential GDP is calculated as HP-filter-trend GDP over the 1996:Q2–2024:Q1 period. The dependent variable is the effective policy rate defined as bank rate (February 1996 through February 2002), reverse repo rate (March 2002 through June 2006), repo rate (July 2006 through Nov. 2008), reverse repo rate (December 2008 through May 2010), and repo rate (June 2010 to present). The FIT dummy is set to one for the 2016:Q3–2019:Q4 period and zero otherwise. The COVID-19 dummy is set to one for the 2020:Q1–2024:Q1 period. The sample includes quarterly observations from the 1997:Q2–2024:Q1 period.
*Sources:* Haver Analytics, authors' calculations.

In Table A.7, we replicate the results of study III in columns (1) through (4). In column (5), we extend the study authors' model to include the interactions of the FIT and COVID-19 dummies with inflation to capture the differential responses of the RBI to inflation in the post-FIT and post–COVID-19 samples, respectively. In column (6), we also include the interactions of the FIT and COVID-19 dummies with the output gap. In the original study, while the dummy variables are added to the model, they are not interacted with inflation.[29] The FIT dummy takes the value one for the 2016:Q3–2019:Q4 period and zero otherwise. The COVID-19 dummy takes the value one for the 2020:Q1–2024:Q1 period and zero otherwise. The extension of the sample to 2024 and the inclusion of a COVID-19 dummy to cover the extended sample are the main differences between studies II and III.

We successfully replicate all the results of study III in the first four columns of Table A.7. The estimated inflation coefficients are statistically significant in all specifications that control for interest rate persistence, which contrasts with our baseline analysis. Again, this is driven by the use of inflation rather than the inflation gap in the estimated rule, as we show later. We explore what factors drive this difference using an approach similar to the one used in study II. In Table A.8, addressing one source of difference at a time, we find that the main driver of the difference in results between study III's analysis and our baseline model is its use of contemporaneous rather than lagged control variables.

As with study II, we do not find a positive significant coefficient of the FIT–inflation interaction term, suggesting that even through the lens of study III, the RBI does not seem to place a greater weight on inflation stabilization during the post-FIT period.

[29]The original study refers to the COVID-19 dummy as IT2. In a footnote, the researchers note that they ran their model with the interactions and found results qualitatively similar to those we show in column (6).

Table A.8: Study III: Exploring the Drivers of Differences

| | (1)<br>3-Month<br>T-Bill | (2)<br>EPR<br>Lagged | (3)<br>3-Month<br>T-Bill<br>Lagged | (4)<br>EPR<br>Baseline<br>Inflation |
|---|---|---|---|---|
| Inflation | 0.10*** | 0.04 | 0.01 | 0.09*** |
| | (2.66) | (0.87) | (0.23) | (3.28) |
| Output Gap | 0.18** | 0.15** | 0.17** | 0.18** |
| | (2.55) | (2.53) | (2.47) | (2.56) |
| L.Dependent Variable | 0.85*** | 0.86*** | 0.85*** | 0.88*** |
| | (19.77) | (24.30) | (17.58) | (29.68) |
| FIT dummy | 0.46 | -0.18 | -0.33 | -0.13 |
| | (1.34) | (-0.63) | (-0.81) | (-1.31) |
| COVID dummy | -0.56 | -0.77 | -0.74 | -0.31** |
| | (-0.73) | (-0.92) | (-0.60) | (-2.13) |
| Inflation × FIT dummy | -0.13* | 0.06 | 0.07 | -0.11* |
| | (-1.72) | (0.82) | (0.71) | (-1.81) |
| Inflation × COVID dummy | 0.07 | 0.11 | 0.08 | 0.03 |
| | (0.49) | (0.67) | (0.36) | (0.29) |
| Output Gap × FIT dummy | -0.20** | -0.19*** | -0.24*** | -0.21** |
| | (-2.21) | (-2.78) | (-2.67) | (-2.54) |
| Output Gap × COVID dummy | -0.12* | -0.14** | -0.16** | -0.15** |
| | (-1.72) | (-2.27) | (-2.28) | (-2.05) |
| Constant | 0.57 | 0.72** | 1.06*** | 0.88*** |
| | (1.46) | (2.19) | (2.70) | (4.45) |
| Observations | 108 | 107 | 107 | 108 |
| $R^2$ | 0.86 | 0.90 | 0.84 | 0.93 |
| Adjusted $R^2$ | 0.85 | 0.89 | 0.83 | 0.92 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note*: Following Eichengreen and Gupta (2024), inflation is measured using the year-on-year growth rate of the WPI through 2013:Q4 and the CPI thereafter. Output is measured using seasonally adjusted real GDP. In computing the output gap, potential GDP is calculated as HP-filter-trend GDP over the 1996:Q2–2024:Q1 period. In column (4), the baseline inflation gap is used, which uses the year-on-year growth rate of the WPI through 2013:Q4 and the CPI thereafter, with the gap calculated by subtracting the 2004–2014 decade average from this inflation rate in the pre-FIT period and subtracting 4 percent from the rate from 2015:Q2 onward. The FIT dummy is set to one for the 2016:Q3–2019:Q4 period and zero otherwise. The COVID-19 dummy is set to one for the 2020:Q1–2024:Q1 period. The sample includes quarterly observations from the 1997:Q3–2024:Q1 period.
*Sources:* Haver Analytics, authors' calculations.

## A.6 Study IV: Extensions

Table A.9: Study IV: Exploring the Drivers of Differences

| | (1) Bhadury et al. 2022 | (2) Bhadury et al. 2022 | (3) Baseline |
|---|---|---|---|
| L.Inflation Gap | 0.29 | 0.39** | 0.52** |
| | (1.34) | (2.52) | (2.26) |
| L.Output Gap | 0.01 | 0.27* | 0.40 |
| | (0.04) | (1.75) | (1.40) |
| L.Real Interest Rate | | 0.44*** | 0.34*** |
| | | (4.14) | (3.99) |
| L.WACR | 0.59*** | | |
| | (3.86) | | |
| FIT dummy | -1.00*** | -0.55 | -1.44*** |
| | (-2.74) | (-1.56) | (-3.78) |
| GFC dummy | 0.61 | | 0.70 |
| | (1.24) | | (1.37) |
| L.Inflation Gap × FIT | 0.08 | -0.11 | 0.03 |
| | (0.86) | (-0.89) | (0.15) |
| Observations | 64 | 64 | 64 |
| $R^2$ | 0.69 | 0.36 | 0.44 |
| Adjusted $R^2$ | 0.63 | 0.29 | 0.35 |
| Dependent Variable | WACR | WACR | WACR |
| Inflation Variable | Lagged CPI-IW: Gap | Lagged CPI-IW: Gap | WPI-CPI: Gap |
| FIT Range | 2016Q1-2020Q1 | 2016Q1-2020Q1 | 2015Q2-2020Q1 |
| Interactions | ✓ | ✓ | ✓ |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note:* In column (1), following Bhadury et al. (2022), inflation is measured using the CPI-IW. In computing the inflation gap, trend inflation is computed as a decadal average of inflation (1999 through 2010 and 2011 through 2020, respectively). Output is measured using real GDP. In computing the output gap, potential GDP is calculated as HP-filtered-trend GDP over the 2004–2020 sample. The GFC dummy is set to one for the 2009:Q4–2020:Q1 period. The FIT dummy is set to one for the 2016:Q1–2020:Q1 period. In column (2), the same specification is followed, with one change: The lagged real interest rate is used to account for persistence instead of the lagged dependent variable. In column (3), following the baseline specification, inflation is measured using the year-on-year growth rate of the WPI through 2013:Q4 and the CPI thereafter. The inflation gap is calculated by subtracting the 2004–2014 decade average from the inflation rate in the pre-FIT period and subtracting 4 percent from the rate in the post-FIT period (2015:Q2 onward). The output gap is computed as the percentage difference between actual and potential GDP as a ratio of real GDP, where potential GDP is calculated as HP-filter-trend GDP over the 2004:Q1–2020:Q1 sample. All dummy variables are interacted with both inflation and output gaps in each specification. The sample includes quarterly observations from the 2004:Q1–2020:Q1 period.
*Sources:* Haver Analytics, authors' calculations.

Finally, in Table A.9, we explore the drivers of the positive and significant coefficient of the FIT–inflation interaction term in study IV. Relative to our baseline regression, there are four differences. First, the researchers' inflation measure is based on the CPI-IW rather than a combination of WPI and CPI inflation rates. Second, they include a GFC dummy and lagged real interest rate in their reaction function. Third, they do not control for exchange rate growth. Fourth, they exclude the COVID-19 period from their estimation.

In column (1), we remove the lagged real interest rate from their model and instead introduce the lagged dependent variable as a control to align with our baseline and with studies I through III. We find that the coefficient of the inflation gap switches from negative to positive and becomes insignificant, similarly to what we find in our baseline analysis. Crucially, the FIT–inflation interaction loses significance as well. In column (2), we instead remove the GFC dummy and associated interactions (with inflation and the output gap) from the researchers' model. Once again, the FIT–inflation interaction term coefficient loses significance and, in fact, switches from positive to negative. Finally, in column (3), we run the study's model using the inflation gap and output gap measures from our baseline instead. We find that the coefficient of the FIT–inflation interaction term becomes positive. While not shown, we find similar results if we use the three-month T-bill rate instead of WACR in column (3). This suggests that the study's use of different inflation and policy rate variables is not driving the positive significant coefficient of the interaction term in the researchers' model.

Given the lack of robustness of the positive significant coefficient on the interaction term in study IV, we conclude that even through the lens of the model used in this study, the RBI does not appear to attach a greater weight to inflation stabilization during the post-FIT period.

## A.7 Robustness Check: Alternative FIT Cutoff Dates

Table A.10: Estimates of the Baseline Monetary Policy Reaction Functions Using Alternative FIT Cutoff Dates

| | Dependent Variable: 3-month T-Bill Rate | | | |
|---|---|---|---|---|
| | (1) | (2) | (3) | (4) |
| | 2014Q1 | 2015Q2 | 2016Q1 | 2016Q3 |
| L.Inflation Gap | -0.05 | -0.04 | -0.03 | -0.03 |
| | (-0.47) | (-0.38) | (-0.34) | (-0.29) |
| L.Output Gap | 0.26*** | 0.22** | 0.22** | 0.22** |
| | (2.65) | (2.34) | (2.47) | (2.42) |
| L.3-month T-Bill Rate | 0.85*** | 0.85*** | 0.84*** | 0.84*** |
| | (15.59) | (15.00) | (14.89) | (14.60) |
| Exchange Rate Growth | 0.01 | 0.01 | 0.01 | 0.01 |
| | (0.55) | (0.48) | (0.49) | (0.47) |
| FIT dummy | -0.28* | -0.38*** | -0.35*** | -0.36*** |
| | (-1.97) | (-2.99) | (-2.81) | (-2.95) |
| L.Inflation Gap $\times$ FIT dummy | 0.09 | 0.08 | 0.06 | 0.07 |
| | (0.79) | (0.63) | (0.47) | (0.55) |
| L.Output Gap $\times$ FIT dummy | -0.26*** | -0.22** | -0.22** | -0.21** |
| | (-2.68) | (-2.30) | (-2.42) | (-2.34) |
| Constant | 1.09*** | 1.16*** | 1.18*** | 1.18*** |
| | (3.16) | (3.08) | (3.05) | (3.00) |
| Observations | 81 | 81 | 81 | 81 |
| $R^2$ | 0.83 | 0.82 | 0.82 | 0.82 |
| Adjusted $R^2$ | 0.81 | 0.81 | 0.81 | 0.81 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note:* The sample includes quarterly observations from the 2005:Q1–2025:Q2 period, with the intent of having a balanced number of observations in the pre- and post-FIT samples. Inflation is measured using the year-on-year growth rate of the WPI through 2013:Q4 and the CPI thereafter. Output is measured using GDP. The inflation gap is calculated by subtracting the 2004–2014 decade average from the inflation rate in the pre-FIT period and subtracting 4 percent from the rate in the post-FIT period. The output gap is computed as the percentage difference between actual and potential GDP as a ratio of actual GDP, where potential GDP is computed as the HP-filter-trend GDP over the 2005:Q1–2025:Q2 period. The dependent variable is the three-month T-bill rate. Exchange rate growth is the annualized quarter-on-quarter growth rate of the exchange rate (INR/USD). The FIT dummy is set to one starting from the date displayed in the column header through 2025:Q2 and zero otherwise.
*Sources:* Haver Analytics, authors' calculations.

## A.8 Robustness Checks: Forward-looking Reaction Functions

Table A.11: Estimates of the Forward-looking Monetary Policy Reaction Functions: Post-FIT and Excluding the COVID-19 Period

| | (1) | (2) |
|---|---|---|
| | 3-month T-Bill Rate | Weighted Average Call Money Rate |
| Inflation Forecast | 0.10** | 0.09** |
| | (2.18) | (2.57) |
| GDP Growth Forecast | 0.25*** | 0.20*** |
| | (4.63) | (5.33) |
| L.Dependent Variable | 0.81*** | 0.82*** |
| | (12.11) | (14.25) |
| Constant | -1.12*** | -0.84** |
| | (-2.85) | (-2.66) |
| Observations | 58 | 58 |
| $R^2$ | 0.83 | 0.85 |
| Adjusted $R^2$ | 0.82 | 0.84 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note:* The sample includes quarterly observations from 2015:Q2 through 2019:Q4. The dependent variable is the three-month T-bill rate in column (1) and the weighted average call money rate in column (2).
*Sources:* RBI's monetary policy statements, Haver Analytics, authors' calculations.

Table A.12: Estimates of the Forward-looking Monetary Policy Reaction Functions: Combined WPI–CPI-forecast

| | (1) 3-month T-Bill Rate | (2) Weighted Average Call Money Rate |
|---|---|---|
| Inflation Gap | -0.03 | 0.01 |
| | (-0.42) | (0.19) |
| L.Output Gap | 0.23** | 0.22 |
| | (2.14) | (1.38) |
| L.Dependent Variable | 0.83*** | 0.76*** |
| | (14.05) | (9.13) |
| FIT dummy | -0.55*** | -0.61*** |
| | (-3.38) | (-3.07) |
| Inflation Gap × FIT dummy | 0.41*** | 0.33** |
| | (2.97) | (2.30) |
| L.Output Gap × FIT dummy | -0.18* | -0.15 |
| | (-1.72) | (-0.95) |
| Constant | 1.30*** | 1.72*** |
| | (3.50) | (3.52) |
| Observations | 71 | 71 |
| Pre-FIT | 40 | 40 |
| Post-FIT | 31 | 31 |
| $R^2$ | 0.82 | 0.73 |
| Adjusted $R^2$ | 0.81 | 0.70 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note:* The sample includes quarterly observations from 2005:Q1 through 2025:Q2, with the intent of having a balanced number of observations in the pre- and post-FIT samples. Inflation is measured using year-on-year growth rate of the WPI through 2013:Q4 and the RBI's inflation forecast thereafter. Output is measured using GDP. The inflation gap is calculated by subtracting the 2004–2014 decade average from the inflation rate in the pre-FIT period and subtracting 4 percent from the rate in the post-FIT period. The output gap is computed as the percentage difference between actual and potential GDP as a ratio of actual GDP, where potential GDP is computed as the HP-filter-trend GDP over the 2005:Q1–2025:Q2 period. The dependent variable is the three-month T-bill rate in column (1) and the weighted average call money rate in column (2). The FIT dummy is set to one for the 2015:Q2–2025:Q2 period and zero otherwise. *Sources:* RBI's monetary policy statements, Haver Analytics, authors' calculations.

Table A.13: Estimates of the Forward-looking Monetary Policy Reaction Functions: Combined WPI–CPI-forecast and Excluding the COVID-19 Period

| | (1)<br>3-month T-Bill Rate | (2)<br>Weighted Average Call Money Rate |
|---|---|---|
| Inflation Gap | -0.04 | 0.06 |
| | (-0.45) | (1.03) |
| L.Output Gap | -0.12 | -0.15 |
| | (-0.70) | (-1.39) |
| L.Dependent Variable | 0.24 | 0.49*** |
| | (0.93) | (3.51) |
| FIT dummy | -2.02** | -1.29*** |
| | (-2.82) | (-3.62) |
| Inflation Gap × FIT dummy | 0.85*** | 0.42*** |
| | (3.12) | (3.17) |
| L.Output Gap × FIT dummy | 0.34* | 0.32** |
| | (1.76) | (2.71) |
| Constant | 6.37** | 4.05*** |
| | (2.74) | (3.41) |
| Observations | 29 | 29 |
| Pre-FIT | 18 | 18 |
| Post-FIT | 11 | 11 |
| $R^2$ | 0.76 | 0.88 |
| Adjusted $R^2$ | 0.70 | 0.85 |

Robust t-statistics in parentheses.
* $p < 0.1$, ** $p < 0.05$, *** $p < 0.01$.
*Note:* The sample includes quarterly observations from 2010:Q3 through 2019:Q4, with the intent of having a balanced number of observations in the pre- and post-FIT samples. Inflation is measured using year-on-year growth rate of the WPI through 2013:Q4 and the RBI's inflation forecast thereafter. Output is measured using GDP. The inflation gap is calculated by subtracting the 2004–2014 decade average from the inflation rate in the pre-FIT period and subtracting 4 percent from the rate in the post-FIT period. The output gap is computed as the percentage difference between actual and potential GDP as a ratio of actual GDP, where potential GDP is computed as the HP-filter-trend GDP over the 2010:Q3–2019:Q4 period. The dependent variable is the three-month T-bill rate in column (1) and the weighted average call money rate in column (2). The FIT dummy is set to one for the 2015:Q2–2019:Q4 period and zero otherwise. *Sources:* RBI's monetary policy statements, Haver Analytics, authors' calculations.