

Stock Market Response to FOMC Announcements: Evidence from Firm-Level Analysis

Zhen Ling^{1#}, Rui Wen^{2, *#}, Yisen Wang^{3#}

1. Carey Business School, Johns Hopkins University, Washington DC, 20001, USA, zling8@alumni.jh.edu
 2. Business School, University of New South Wales, Sydney, 2052, Australia, z5520245@ad.unsw.edu.au
 3. Shandong Experimental High School, Jinan, 250001, China, 2827096027@qq.com
- * Corresponding author email: z5520245@ad.unsw.edu.au

co-first authors

Abstract

This study examines firm-level stock market responses to Federal Open Market Committee (FOMC) announcements using event study methodology and panel regression on U.S.-listed stocks. The study calculates cumulative abnormal returns (CARs) around announcement dates and examines their relationship with firm characteristics. The results show that stock prices respond both immediately and with a delay to monetary policy news. Moreover, the research finds that small-cap and high-volatility firms exhibit stronger reactions to market changes. It suggests the deviation from the efficient market hypothesis and the heterogeneity in market responses. These findings highlight the role of firm-specific factors in shaping stock return dynamics around macroeconomic events.

Keywords

Event study method; FOMC announcement drift; EMH (efficient market hypothesis).

1. Introduction

1.1 Research background

The stock market plays a crucial role in both the economic and financial systems (Cooray, 2010). It not only indicates the health of the national economy, but also directly affects the distribution of wealth and the decisions of market participants (Chikwira and Mohammed, 2023). In particular, stock market movements have profound impacts on financial stability and economic growth (Savor and Wilson, 2014). Therefore, a thorough understanding of the stock market's reaction to economic events, such as the announcement of monetary policy, is essential for informed decision-making and effective risk management (Jarociński and Karadi, 2020).

Specifically, a monetary policy announcement by the central bank conveys information regarding interest rate adjustments, shifts in the money supply, and changes in inflation rate expectations (Cieslak et al., 2019). The shock from a monetary policy announcement, such as that from the Federal Open Market Committee (FOMC), has a profound impact on economic stability and financial market movements (Cieslak and Vissing-Jorgensen, 2021). It affects stock market fluctuations through investment flows, investor risk attitudes, and market expectations (Ai and Bansal, 2018). Previous research documents that the FOMC announcement is associated with both immediate and delayed responses in asset prices (Dor and Rosa, 2019). Therefore, insights into the stock market's reaction to monetary policy announcements are vital to both stock investors and policymakers (Kurov et al., 2021).

Notably, economic events such as the 2008 financial crisis and the 2020 COVID-19 pandemic highlight the importance of understanding the interaction between monetary policy and stock market fluctuations (Gorodnichenko et al., 2023). During these periods, central banks worldwide engage in aggressive monetary policy adjustments to stabilize the financial market and facilitate economic recovery (Hanson and Stein, 2015). These unprecedented policy tools sharply reshape market sentiment, volatility, and investor behavior. It implies the necessity for a thorough analysis of stock market reaction in these circumstances (Lunsford, 2020).

1.2 Research question and paper organization

However, despite extensive academic research in the field (Ma and Zhang, 2023), substantial knowledge gaps remain regarding the nuances of stock market reactions to FOMC announcements. While existing studies indicate a broad market reaction to FOMC events, insufficient efforts are made to reveal firm-level responses, and even less is known about the heterogeneity in firm-level reactions.

This paper investigates the short-term effect and medium-term effect of FOMC announcements on individual stock returns in the U.S. equity market. The primary aim is to assess whether firm-specific traits systematically influence the magnitude and timing of stock return adjustments. In doing so, we contribute to the literature regarding monetary policy transmission with new evidence on cross-sectional variations in cumulative abnormal returns (CARs) around policy events. To achieve this research goal, we combine the event study approach with the panel regression technique. Further, the study accounts for market-wide uncertainty and firm-specific return patterns during non-FOMC periods.

Our findings reveal three key insights: (i) stock prices exhibit both immediate and delayed reactions to FOMC announcements, (ii) smaller and more volatile firms

respond more strongly to these events, and (iii) the magnitude of the reaction is more closely linked to firm characteristics than to the extent of the monetary policy surprise itself. These results challenge the assumption of uniform policy transmission and raise doubts about the efficient market hypothesis in the context of scheduled macroeconomic news.

The rest of the paper is organized as follows. The Section 2 reviews the relevant literature. The Section 3 describes the data and methodology. The Section 4 presents the empirical results and heterogeneity analyses. The Section 5 discusses the implications of the research and suggestions for future research.

2. Literature review

2.1 Central bank monetary policy and its effect on economic system

Monetary policy refers to the actions of central banks that aim to control inflation, manage economic growth, and ensure the stability of the financial system (Bernanke and Kuttner, 2005). To be specific, conventional monetary policy tools include adjusting interest rates, changing reserve requirements, and operating in the open market. In the US, the Fed (Federal Reserve Bank) implements monetary policy through the FOMC, which meets regularly to determine the target interest rate and provide forward guidance regarding monetary policy in the near future (Gorodnichenko et al., 2023). Monetary policy decisions are a crucial force that affects the financial market and the broader economic condition. This is because they affect the cost of borrowing, the rate of inflation, and expectations of the future, which further influence decisions on investment and consumption (Rosa, 2013).

A central bank's announcement of a monetary policy shift could drastically change market expectations and investor sentiment. Therefore, FOMC announcements are argued to influence both financial market prices and real economic outcomes (Tadler, 2022). In turn, the transparency and clarity of central bank announcements are critical to financial market stability (Woodford, 2005). As discussed by Blinder et al. (2008), the effectiveness of monetary policy depends on the credibility and consistency of central bank communication. The study further argues that uncertainty and misinterpretation of the central bank's signal could trigger adverse financial market reactions, thereby increasing market fluctuations.

In addition to conventional monetary policy tools, to manage extreme economic conditions such as the financial crisis in 2008 and the COVID-19 pandemic in 2020, unconventional monetary policy tools such as QE (Quantitative Easing) are implemented (Bauer and Rudebusch, 2014). In cases where the interest rate reaches the effective lower bound, such unconventional measures are found to be

effective forces in stimulating economic recovery and ensuring financial system stability. By altering the liquidity supply in the market and the expectation about further monetary policy interventions, these unconventional monetary policies are found to affect asset prices and investor behavior in the financial market (Couture, 2021). For instance, in the empirical analysis by Jarociński and Karadi (2020), FOMC announcements are found to be associated with considerable reactions in the stock market.

2.2 EMH (efficient market hypothesis) and related empirical test

Established by Fama (1970), the EMH claims that financial asset prices comprehensively incorporate all value-relevant information. The corresponding implication is that abnormal investment returns are not possible based on historical information (weak form EMH), public news (semi-strong form EMH), and insider information (strong form EMH), respectively (Malkiel, 1989).

However, empirical evidence is provided to challenge the EMH. In particular, the analysis of the stock market's reaction to the FOMC announcement is adopted to challenge the EMH. For instance, Lucca and Moench (2015) suggest that there is a stock market drift before the FOMC announcement. They find that stock returns tend to increase systematically and predictably before FOMC announcements, which indicates the possible inefficiency of the stock market due to the behavioral biases of market investors. In addition, Kurov et al. (2021) provide evidence of a diminishing drift in FOMC announcements over time. The analysis reveals a gradual improvement in market efficiency, which may be attributed to enhanced information transparency and the increasing predictability of central bank monetary policy over time.

In particular, various explanations are provided for the market anomaly surrounding the FOMC announcement. For instance, Dor and Rosa (2019) focus on the issue of information asymmetry and investor risk aversion. Then, as there is a particular group of market participants with more accurate anticipation regarding the monetary policy announcement, their actions before the news release time lead to the pre-event drift of stock returns, moreover, from the perspective of behavioral finance, issues such as herding and overconfidence among individual investors could also contribute to the FOMC announcement-related anomaly (Barberis and Thaler, 2003). Due to cognitive bias and psychological bias, investors are found to underreact or overreact to news releases. It brings in the corresponding post-FOMC announcement drift in the stock market. Such an argument gains support from Tetlock (2007), who indicates that market sentiment and cognitive errors by investors are driving forces behind the deviation of asset prices from their fundamental value.

2.3 Interaction with FOMC announcement and stock market movement

The discussion in the previous sections emphasizes the significance of monetary policy and the stock market's responsiveness to monetary policy announcements. There are three primary mechanisms underlying the reaction of stock returns to FOMC announcements.

Firstly, as is indicated by Bernanke and Kutter (2005), central bank monetary policy has a direct impact on interest rates. Then, based on the DDM (Discounted Dividend Model), the fundamental value of stocks changes due to the change in the cost of borrowing.

Secondly, aside from affecting the fundamental value of stocks through the discount rate, monetary policy also influences the sentiment of investors and their expectations. For example, Jarociński and Karadi (2020) suggest that central bank policy and forward guidance can affect investment risk attitudes and investment preferences. Cieslak and Vissing-Jorgensen (2021) expand the idea by pointing out the rising optimism and risk tolerance of investors when expansionary monetary policy is announced.

Lastly, as is discussed by Hanson and Stein (2015), liquidity measures by the central bank, such as QE, could affect market stability through investment flow directly. In particular, Bauer and Rudebusch (2014) argue that under circumstances of market uncertainty, the central bank's provision of liquidity can alleviate market pressure and stabilize asset prices. This is because such monetary policy actions, specifically the central bank's provision of liquidity, serve to maintain the confidence of market participants

2.4 Knowledge gap and research contribution

The revelation of previous studies in sections 2.1 to 2.3 demonstrates the interactive relationship between stock market returns and monetary policy announcements. In particular, empirical studies are conducted to assess the EMH in a semi-strong form, using the FOMC announcement as a related context for stock market drift. However, several knowledge gaps in the current research remain to be addressed.

To begin with, most previous studies have focused on the stock market index as a whole, rather than individual stocks. Such analysis fails to capture the possible heterogeneity in stock market reactions among companies of different features. By combining a panel data regression with an event study, the paper is able to capture how stock-level characteristics, such as the idiosyncratic volatility of companies, contribute to the adjustment of stock returns. In this way, the heterogeneous reaction of stocks to the FOMC announcement can be revealed.

Next, for studies that consider the FOMC announcement as a binary shock to the stock market, the underlying assumption is that the stock market's response to expansionary and contractionary monetary policies is homogeneous. However, such an assumption is mainly implausible. By constructing a continuous measurement of the monetary policy shock based on the change in the short-term Treasury bill rate around the FOMC announcement, the paper addresses this issue.

Lastly, previous studies do not consider the possible difference in stock market reaction under different market conditions. However, extreme events such as the COVID-19 pandemic are associated with a considerable change in investor sentiment. It could alter the dynamic relationship between stock market movements and monetary policy announcements. To reflect the potential structural break resulting from the change in economic environment, the study extends the sampling period to post-COVID-19 pandemic years. By comparison, the paper with existing studies from pre-COVID-19 pandemic years reveals possible time heterogeneity.

3. Methodology

3.1 Research objective and approach

The primary objective of this study is to examine the impact of announcements made by the Federal Open Market Committee (FOMC) on stock market performance. More specifically, this study seeks to understand whether companies with distinctive characteristics respond differently to these announcements. In other words, we aim to examine if firms that vary by type or structure show distinct levels of sensitivity to FOMC-related news.

To measure the reaction of firms to these monetary policy announcements, we use the Cumulative Abnormal Return (CAR) as the central dependent variable in our analysis. CAR is used because it reflects the total difference between the actual return of a stock and its expected return. This difference is calculated over a period that is centered around each FOMC announcement. In this way, CAR serves as a valuable tool for assessing market reactions to specific events.

We apply a regression model to examine whether there is a statistical relationship between changes in CAR and company characteristics. We achieve this by categorizing companies by type and then examining their CAR values around the time of FOMC announcements. By doing so, we aim to identify patterns that indicate whether certain types of firms tend to experience greater or smaller deviations from expected returns during the announcement period.

3.2 Construction of the dependent variable: CAR

To compute the CAR, we follow a process that consists of three significant steps.

Step one is to estimate the expected return for each stock. We use the Fama-French Five-Factor Model to do this. This model encompasses five primary risk factors: overall market returns exceeding the risk-free rate (MKT), firm size (SMB), book-to-market value (HML), operating profitability (RMW), and investment patterns (CMA). These factors are widely recognized in literature as capturing key sources of systematic risk. We estimate the model using historical daily return data. The data covers a five-year period, from January 1, 2019, to December 31, 2024. This extended sample period is employed to enhance the reliability and stability of the factor estimates.

Step two is to calculate the abnormal return for each stock. The abnormal return for a given day is calculated by subtracting the expected return, as estimated in step one, from the actual return of the stock. This difference reflects the return that general market conditions or known risk factors cannot explain. It is the part of the return that may be related to new information, such as an FOMC announcement.

Step three is to compute the cumulative abnormal return. We do this by summing the daily abnormal returns across a selected event window. This window typically includes several days before and after each FOMC announcement. We estimate this model will be over three windows. The short term is from the day before the FOMC announcement to the day after. The medium term is from three days before the FOMC announcement to five days after. The long term is from five days before the FOMC announcement to ten days after. The total of the abnormal returns over the period gives us the CAR. This final value is then used as the dependent variable in our regression analysis, which examines the relationship between CAR and firm characteristics.

3.3 Output from expected return estimation

As the initial step in the empirical process, we calculate the expected daily returns for each stock in the sample. These estimated values are critical, as they provide the baseline against which we measure abnormal returns. To ensure accuracy in these baseline estimates, we use the full sample period for model estimation. This helps maintain consistent calibration of the model's factor loadings, thereby improving the robustness of our results.

$$E(R_{i,t}) = \alpha_i + \beta_{MKT}MKT_t + \beta_{SMB}SMB_t + \beta_{HML}HML_t + \beta_{RMW}RMW_t + \beta_{CMA}CMA_t$$

3.4 Summary of CAR calculations

Following the estimation of expected returns, we compute CARs for a subset of companies around FOMC announcement dates. The results reveal considerable heterogeneity in CARs across companies, with some exhibiting positive responses (suggesting favorable market reaction) and others showing negative responses (suggesting adverse reactions). These CAR values form the core outcome metric for regression and heterogeneity analyses.

$$AR_{i,t} = R_{i,t} - E(R_{i,t})$$

$$CAR_i = \sum_{t=T_1}^{T_2} AR_{i,t}$$

3.5 Stock characteristics classification

To probe further into our central research question—whether all stocks react uniformly to monetary policy news—we explore company-level heterogeneity in CAR responses. Drawing on behavioral finance theory, we posit that specific company characteristics may systematically influence the sensitivity to FOMC announcements.

Two primary hypotheses guide our heterogeneity tests. The first one is the size hypothesis. We suppose that small-cap stocks, due to lower analyst coverage and institutional ownership, may be more responsive to the FOMC announcement.

The second hypothesis is the volatility hypothesis, which suggests that stocks with higher historical price volatility may attract more emotion-driven trading behavior, particularly during uncertain macroeconomic events, such as FOMC meetings.

3.6 Heterogeneity by company size

We first explore the influence of company size on CARs. Companies were categorized into three size-based groups according to market capitalization. We select the top 20% of companies by market capitalization from our dataset as the large-cap group. The middle 20% of companies with market capitalization are classified as mid-cap. The bottom 20% of companies are classified as small-cap groups.

We estimate the following regression model:

$$CAR_{it} = \beta_0 + \beta_1 Volatility_i + \beta_2 Shock_t + \beta_3 VIX_t + \beta_4 AR_NONFOMC_{it} + \epsilon_{it}$$

We follow the approach of Hanson and Stein in "Monetary policy and long-term real rates" (2014), which uses the change in the 2-year Treasury yield on FOMC

announcement days to capture market reactions to unexpected policy information. The shock in the formula means the change in the 2-year Treasury yield on FOMC announcement days. VIX is included to control market-wide uncertainty. AR_NONFOMC measures a stock's average abnormal return on non-FOMC days, serving as a control for momentum or stock-specific trends.

To explore the time dynamics of market reaction, we estimate this model over three event windows. The short term is from the day before the FOMC announcement to the day after. The medium term is from three days before the FOMC announcement to five days after. The long term is from five days before the FOMC announcement to ten days after.

3.7 Heterogeneity by stock volatility

In the second heterogeneity analysis, we investigate whether stock price volatility moderates the response to FOMC announcements. Volatility is measured as the standard deviation of daily returns over a specified pre-event period. We select the top 20% of companies by historical volatility from our dataset as the large-cap group. The middle 20% of companies with historical volatility are classified as mid-cap. The bottom 20% of companies are classified as small-cap groups.

The regression specification is consistent with the size-based analysis:

$$CAR_{it} = \beta_0 + \beta_1 Volatility_i + \beta_2 Shock_t + \beta_3 AR_NONFOMC_{it} + \epsilon_{it}$$

We also estimate the model across the same three event windows, short, medium, and long term, to identify both immediate and delayed reactions to monetary policy events.

Table 1. Summary Statistics of Variables

Variable name	CAR	SHOCK	SIZE	VIX	AR_NONFOMC
Count	138.0000	138.0000	138.0000	138.0000	138.0000
Mean	0.0405	0.0367	14.5747	21.2428	0.0422
Std	0.02463	0.3928	2.6747	9.5345	0.0252
Min	0.0154	-1.1500	11.0713	12.0900	0.0157
Max	0.2052	1.0000	18.4053	68.6000	0.1754

4. Results

4.1 Overview of CAR outcomes

Using the Fama-French Five-Factor Model, we compute company-level expected returns and derive cumulative abnormal returns (CAR) around FOMC announcement dates. Across the sampled companies, we observe significant heterogeneity in CARs, both in magnitude and direction. This variation suggests that company-specific characteristics, rather than aggregate monetary shocks alone, are key to understanding market responses to FOMC decisions.

4.2 Heterogeneity by company size

To test the Size Hypothesis, we classify companies into large-cap, mid-cap, and small-cap groups based on market capitalization and estimate CAR regressions over three-time windows: short-term (from the day before the FOMC announcement to the day after), medium-term (from three days before the FOMC announcement to five days after), and long-term (from five days before the FOMC announcement to ten days after).

Table 2. Size Hypothesis Regression Results Across Three Event Windows

Variable	Short-Term [-1, +1]	Medium-Term [-3, +5]	Long-Term [-5, +10]
Intercept	0.0779*** (5.789)	0.0761*** (7.461)	0.0763*** (8.538)
SIZE	-0.0044*** (-5.589)	-0.0045*** (-7.455)	-0.0043*** (-8.125)
VIX	0.0008*** (3.912)	0.0010*** (6.532)	0.0008*** (5.956)
AR_NONFOMC	0.2516** (2.525)	0.1977** (2.619)	0.2163*** (3.270)
SHOCK	-0.0008 (-0.194)	-0.0030 (-0.921)	-0.0033 (-1.141)
Controls	YES	YES	YES
R ²	0.547	0.622	0.713
Adj. R ²	0.533	0.672	0.704

Notes: 1. ***, **, * denote significance at 1%, 5%, and 10% levels respectively.

2. t-statistics are reported in parentheses

These are our key findings. Across all windows, the coefficient on company size (SIZE) is consistently negative and highly significant, indicating that smaller companies exhibit stronger reactions to FOMC announcements. The monetary policy shock (SHOCK), proxied by the change in the 2-year Treasury yield on FOMC days, is not statistically significant across all periods. AR_NONFOMC, a control for company-specific momentum, shows a positive and significant effect throughout, suggesting that companies with strong idiosyncratic return patterns during non-FOMC periods tend to react more sharply to macroeconomic events. The AR_NONFOMC coefficient remains significant in all windows, and its magnitude exhibits a modest decline (from 0.25 to 0.19 to 0.21), suggesting a diminishing influence over longer horizons. The VIX, which captures market-wide uncertainty, has a positive and significant impact on CAR in the short term but becomes less stable across longer time windows. The model explains a meaningful portion of CAR variation, with an R^2 of 0.547 in the short-term regression.

Small-cap companies experience more pronounced CAR movements following FOMC announcements. Our results prove that small-cap companies exhibit stronger reactions to FOMC announcements.

4.3 Heterogeneity by volatility

To evaluate the Volatility Hypothesis, we group companies by their historical return volatility and estimate the same regression framework across the three event windows.

Table 3. Volatility Hypothesis Regression Results Across Three Event Windows

Variable	Short-Term [-1, +1]	Medium-Term [-3, +5]	Long-Term [-5, +10]
Intercept	-0.0017 (-0.738)	-0.0014 (-0.860)	0.0008 (0.497)
Volatility	1.3084*** (8.707)	1.0876*** (12.526)	0.9244*** (11.287)
AR_NONFOMC	0.3899*** (6.142)	0.3162*** (6.633)	0.3150*** (6.437)
SHOCK	0.0013 (0.407)	-0.0004 (-0.152)	-0.0001 (-0.056)
Controls	YES	YES	YES
R^2	0.736	0.842	0.850
Adj. R^2	0.730	0.839	0.846

Notes: 1. ***, **, * denote significance at 1%, 5%, and 10% levels respectively.

2. t-statistics are reported in parentheses

These are our key findings. Volatility exhibits a strong, positive, and meaningful relationship with CAR across all periods, indicating that highly volatile companies respond more aggressively to FOMC announcements. The magnitude of the volatility coefficient declines over time—from 1.3 (short run) to 1.1 (medium run) and 0.9 (long run)—indicating that the effect of volatility is most substantial immediately after announcements and tapers off subsequently. SHOCK remains statistically insignificant, reinforcing the conclusion that the size of the monetary policy surprise itself is a weak predictor of company-level reactions. AR_NONFOMC continues to be a strong and significant determinant of CAR, reflecting persistence in abnormal return behavior across different market regimes. The short-term volatility model achieves an R^2 of 0.74, suggesting excellent explanatory power.

High-volatility companies experience more pronounced CAR movements following FOMC announcements. Our results demonstrate that companies with high historical volatility exhibit stronger reactions to FOMC announcements, whereas companies with low volatility show more muted reactions.

5. Conclusion and discussion

5.1 Research conclusion

This study examines the heterogeneous company-level responses to Federal Open Market Committee (FOMC) announcements, utilizing cumulative abnormal returns (CAR) as the primary performance metric. By estimating expected returns via the Fama-French Five-Factor Model and analyzing company behavior across multiple event windows, we uncover several key insights.

The first insight is that company-specific characteristics dominate aggregate policy shocks in determining market reactions. The change in Treasury yields (SHOCK) does not significantly explain CAR, suggesting that macro-level surprises are less influential at the company level than previously assumed.

The second finding is that small-cap and high-volatile companies exhibit significantly larger CARs following FOMC announcements, indicating that market reactions are far from uniform. This finding supports both the Size Hypothesis—that small companies face informational inefficiencies—and the Volatility

Hypothesis—that high-risk companies attract more attention and speculative trading during periods of macroeconomic uncertainty.

The third one is that the constant impact of company-cap and diminishing impact of volatility over time indicate no apparent stock market lag in reaction to the FOMC announcement.

5.2 Implications

These results have practical relevance for multiple stakeholders. Asset managers and traders can enhance event-driven strategies by overweighting companies with high volatility or persistent abnormal returns during regular periods. Corporate executives and investor relations teams can tailor communication strategies based on their company's sensitivity profile. Policymakers and regulators should recognize the non-uniform transmission of monetary policy and consider company-level impacts when assessing financial stability. Fintech developers and quantitative modelers may incorporate company-specific variables, such as historical volatility and non-FOMC abnormal returns, into predictive models for event response.

5.3 Future research directions

This study offers some opportunities for further exploration, such as industry-specific analysis of FOMC responsiveness, a comparison between value and growth stocks in terms of monetary policy sensitivity, an examination of macroeconomic regime shifts on company behavior, and an investigation into the role of investor attention, media coverage, and company transparency in mediating response heterogeneity.

In sum, our findings challenge the conventional narrative that monetary policy shocks yield uniform market responses. Instead, they reveal a more nuanced mechanism in which company-level risk profiles drive differential reactions to macroeconomic news.

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References

- Ai, H., & Bansal, R. (2018). Risk preferences and the macroeconomic announcement premium. *Econometrica*, 86(4), 1383-1430.
- Barberis, N., & Thaler, R. (2003). A survey of behavioral finance. In G. M. Constantinides, M. Harris, & R. M. Stulz (Eds.), *Handbook of the Economics of Finance* (Vol. 1, pp. 1053-1128). Elsevier.
- Bauer, M. D., & Rudebusch, G. D. (2014). The signaling channel for Federal Reserve bond purchases. *International Journal of Central Banking*, 10(3), 233-289.
- Bernanke, B. S., & Kuttner, K. N. (2005). What explains the stock market's reaction to Federal Reserve policy? *Journal of Finance*, 60(3), 1221-1257.
- Blinder, A. S., Ehrmann, M., Fratzscher, M., De Haan, J., & Jansen, D. J. (2008). Central bank communication and monetary policy: A survey of theory and evidence. *Journal of Economic Literature*, 46(4), 910-945.
- Chikwira, C. & Mohammed, J.I. (2023). The impact of the stock market on liquidity and economic growth: Evidence of volatile market. *Economies*, 11(6), p.155.
- Cieslak, A., Morse, A., & Vissing-Jorgensen, A. (2019). Stock returns over the FOMC cycle. *The Journal of Finance*, 74(5), 2201-2248.
- Cieslak, A., & Vissing-Jorgensen, A. (2021). The economics of the Fed put. *The Review of Financial Studies*, 34(9), 4045-4089.
- Cooray, A. (2010). Do stock markets lead to economic growth? *Journal of Policy Modeling*, 32(4), pp.448-460.
- Couture, C. (2021). Financial market effects of FOMC projections. *Journal of Macroeconomics*, 67, p.103279.
- Dor, A. B., & Rosa, C. (2019). The pre-FOMC announcement drift: An empirical analysis. *The Journal of Fixed Income*, 28(4), 60-72.
- Fama, E. F. (1970). Efficient capital markets. *Journal of finance*, 25(2), 383-417.
- Gorodnichenko, Y., Pham, T., & Talavera, O. (2023). The voice of monetary policy. *American Economic Review*, 113(2), 548-584.
- Hanson, S. G., & Stein, J. C. (2015). Monetary policy and long-term real rates. *Journal of Financial Economics*, 115(3), 429-448.
- Jarociński, M., & Karadi, P. (2020). Deconstructing monetary policy surprises—the role of information shocks. *American Economic Journal: Macroeconomics*, 12(2), 1-43.
- Kurov, A., Wolfe, M. H., & Gilbert, T. (2021). The disappearing pre-FOMC announcement drift. *Finance Research Letters*, 40, 101781.

Lucca, D. O., & Moench, E. (2015). The pre-FOMC announcement drift. *The Journal of Finance*, 70(1), 329-371.

Lunsford, K. G. (2020). Policy language and information effects in the early days of Federal Reserve forward guidance. *American Economic Review*, 110(9), 2899-2934.

Ma, L., & Zhang, X. (2023). Post-FOMC Drift. *The Quarterly Journal of Finance*, 13(3), 2350010.

Malkiel, B. G. (1989). Efficient market hypothesis. In *Finance* (pp. 127-134). London: Palgrave Macmillan UK.

Rosa, C. (2013). The financial market effect of FOMC minutes. *Economic Policy Review*, 19(2).

Savor, P., & Wilson, M. (2014). Asset pricing: A tale of two days. *Journal of Financial Economics*, 113(2), 171-201.

Tadle, R. C. (2022). FOMC minutes sentiments and their impact on financial markets. *Journal of economics and business*, 118, 106021.

Tetlock, P. C. (2007). Giving content to investor sentiment: The role of media in the stock market. *Journal of Finance*, 62(3), 1139-1168.

Woodford, M. (2005). Central bank communication and policy effectiveness. *Journal of Economic Perspectives*, 19(4), 55-68.