

TBA MBS Markets Through Growing Interest Rates

An Exploration of TBA Markets During High Mortgage Demand and Increasing Interest Rates

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Motivation

- The past year has seen historic low mortgage interest rates, and the Federal Reserve's response to growing inflation by rapidly increasing interest rates.
- This creates a natural experiment for studying the effects of a shock to mortgage demand on the TBA agency MBS market.
- On a personal level, I wanted to study the economic context in which my wife and I recently purchased a home.

Literature Review

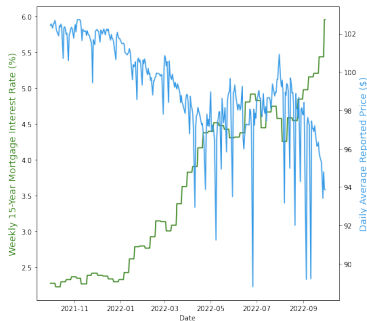
- Vickery, James and Joshua Wright. 2013. "TBA Trading and Liquidity." FRBNY Economic Policy Review 1-18.
- Haoyang Liu, Zhaogang Song, James Vickery. 2021. "Defragmenting Markets: Evidence." Federal Reserve Bank of Philadelphia Working Papers Research Department 1-53.

Data

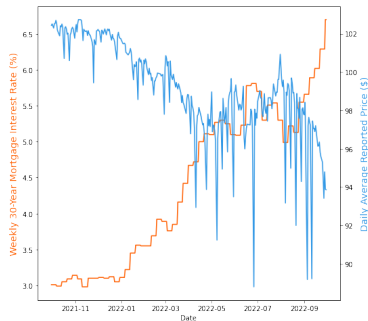
- TBA MBS Market from September 2021 through November 2022
- 15-Year and 30-Year weekly fixed mortgage rate averages
- Monthly New Privately-Owned Housing Units Started

MBS vs Fixed Mortgage Rates

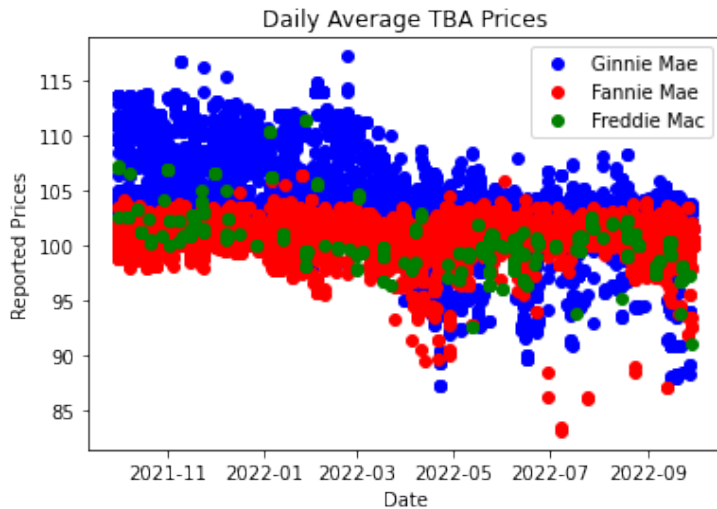
MBS Price vs 15-Year Mortgage Interest Rates



MBS Price vs 30-Year Mortgage Interest Rates



Daily Average TBA Prices



Monthly New Privately-Owned Housing Units Started

New Privately-Owned Housing vs 15-Year Mortgage Interest Rates



New Privately-Owned Housing vs 30-Year Mortgage Interest Rate



New Privately-Owned Housing vs Daily Average Reported MBS Price



Conclusions

- For the literature review, the authors' predictions and analysis held true.
- For the alternative data, the overall trend followed MBS behavior, but had a lag which doesn't make it a good model.