The Effects of Rent Control: Evidence from New York City

Ruoyun Tan

MACSS Project Proposal April 15, 2020



Introduction

Research question: How did the Rent Act of 2011 of New York influence the tenants and landlords in New York City?

Rent Act of 2011: some amendments that further protect tenants

For example,

- Frequency of vacancy increases: Landlords cannot increase the rent upon vacancy more than once in any calendar year.
- Less rent increase if apartment improvements were made: the landlord
 can permanently increase the legal regulated rent by \(\frac{1}{60}\) of the cost of
 the improvements if the buildings has more than 35 apartments (was \(\frac{1}{40}\)
 under the prior Rent Law).

Theory

- Literature and models about the housing market.
- Diamond, Rebecca, Tim McQuade, and Franklin Qian. 2019. "The Effects of Rent Control Expansion on Tenants, Landlords, and Inequality: Evidence from San Francisco." American Economic Review, 109 (9): 3365-94.
- This paper studies the effect of a 1994 law change in San Francisco that changed the rent control system based on when each building was built.

Models for reference

Models in the Diamond et al. paper:

To study the effect on tenants:

$$Y_{iszt} = \delta_{zt} + \alpha_i + \beta_t T_i + \gamma_{st} + \epsilon_{it}$$

To study the effect on landlords:

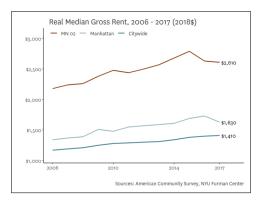
$$Y_{kzt} = \delta_{zt} + \lambda_k + \beta_t T_k + \epsilon_{kt}$$

Data

- Sources of data to be examined:
 - New York City Housing and Vacancy Survey (NYCHVS)
 - Coredata.nyc (NYU Furman Center)
 - Housing New York Units by Building(Department of Housing Preservation and Development (HPD)) and other available data on NYC Open Data
 - Data from real estate agencies such as StreetEasy

Data Figure

Figure: Rent in Greenwich Village/Soho (Code: MN 02)



Source: https://furmancenter.org/neighborhoods/view/greenwich-village-soho

Some Computational Methods to be Considered

- Logistic regression
- Cross-validation
- Interpolation to improve the data
- SVM to categorize and predict
- Simulation: what would happen if all landlords respond in a certain way to the rent control measures?

Some Hypothesis to be Studied

- With more rent control measures, tenants may tend to stay in the same address.
- landlords may be pushed to redevelop the building or find other measures to mitigate the impact of rent control.

Possible Contribution

- Develop methods that are applicable to other regions with similar datasets
- Policy implications: In 2019, New York passed new rent laws.

Summary

- This project aims at study the effect of rent control using evidence from New York City.
- Build on and extend existing studies (Diamond et al.)
- Computational methods