

A survey on the effect of government and monetary policy on Canadian housing prices

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CHRONICLE

ABSTRACT

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During the past few months, the whole Canadian housing prices were witnessed an uptrend. People could enjoy the low interest rates to buy houses, even foreign investors were interested in participating in Canadian real estate pushing the prices up and up. As the COVID19 disappears, we see an uptrend on inflation and, on the other hand, the government placed some restrictions to prevent foreigners of purchasing houses in Canada. This paper investigates whether the government regulation and monetary policy could influence housing prices in Canada.

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1. Introduction

During the past few months, the whole Canadian housing prices witnessed an up-trend. People could enjoy the low interest rates to buy houses, even foreign investors were interested in participating in Canadian real estate pushing the prices up and up. Fig. 1 demonstrates the trends of the index during the recent years. As can be seen from the figure, Ottawa has experienced the sharpest increase in prices since the index was up from 102.4 to 161.9. Montreal witnessed the second sharpest increase during the same period and the index increased from 102 to 145.2. Toronto was ranked three in terms of the upside trend and prices went up from 99.5 to 129.9. The upside potential also can be seen in other cities but not as sharp as these cities. Overall, all these five regions together were witnessed of upside potential from 101.8 to 127.4.

As the COVID19 disappears, we see an uptrend in inflation and, on the other hand, the government placed some restrictions to prevent foreigners from purchasing houses in Canada. During the COVID period Canadian real estate provided some significant opportunities for everyone in the globe to purchase real estate since the interest rate was close to zero. Many Chinese residents were placing buying bids mostly for the cities of Toronto and Vancouver pushing the prices higher and higher. This trend brought the federal government under pressure to take some actions. Although foreigners must pay tax on buying houses, this would not change their minds of ignoring this market. Finally, the federal government of Canada placed a ban on buying real estate in Canada for a period of a few months. On the other hand, the rise in inflation cast some shadow on housing prices.

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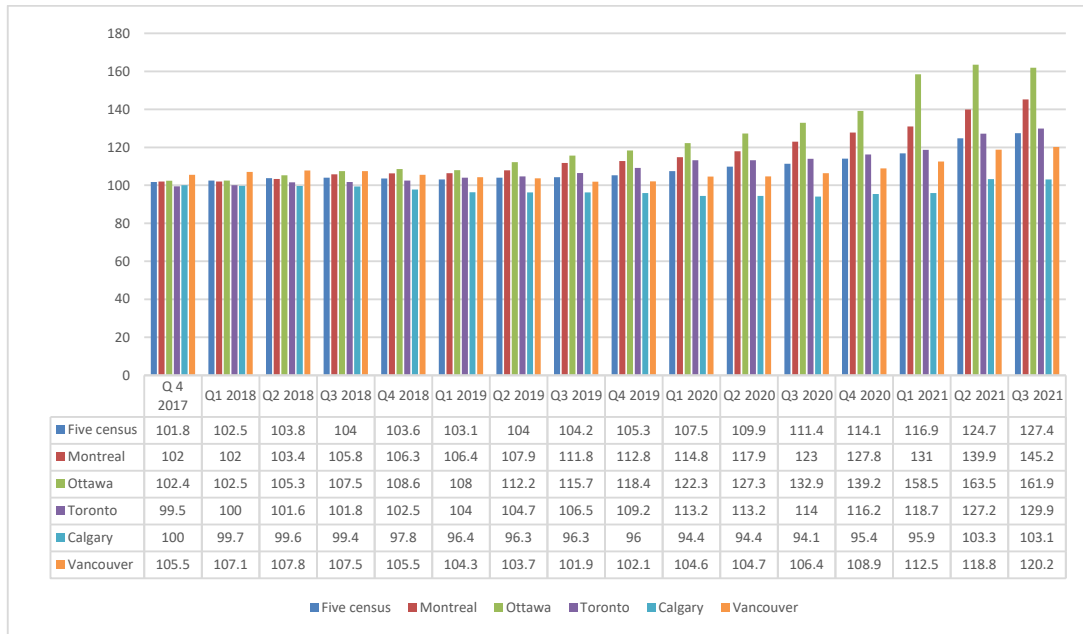


Fig. 1. Residential property price index, quarterly (Source: Statistics Canada)

Gali and Gambetti (2015) provided some evidence in which stock prices could rise in response to monetary policy tightening. This counter-intuitive result may imply that raising the policy rate in reaction to a perceived asset price deviation from fundamentals could fail to contain an emerging bubble. In fact, the housing prices are usually at the epicenter of deep and protracted recessions, it is important to evaluate whether their results also hold true when we consider housing instead of stock prices. Thus, André et al. (2022) forecasted a Bayesian VAR model based on an asset-pricing framework permitting for rational bubbles in the United States, the United Kingdom, and Canada. In addition, this estimation framework separates the basic entity of housing prices from its bubble part, derived as the deviation of gathered prices from the fundamental assets. This helps to study the responses of both components to a monetary policy shock and evaluate how bubbles could influence the responses of housing prices to monetary policy tightening. André et al. (2022) reported that housing prices respond negatively to an interest rate hike, as common intuition would imply, which means the monetary policy may play an essential role in fighting housing price bubbles.

According to Tomal and Rahman (2021), statistical thresholds happen whenever the changes in the relationships between a response and predictor variables are not linear but abrupt at some points of the predictor variable values. In this paper, we defined a piecewise-linear regression model which can detect two thresholds in the relationships via changes in slopes. We developed the corresponding Bayesian methodology for model estimation and inference by proposing prior distributions, deriving posterior distributions, and generating posterior values using Metropolis and Gibbs sampling algorithm. The parameters in our model are easy to understand, highly interpretable, and flexible to make inferences. The methodology has been applied to estimate threshold effects in housing market pricing data in two cities - Kamloops and Chilliwack - in British Columbia, Canada. Our findings revealed that the implementation of changes in the government property tax policies had threshold effects in the market price trend.

Sun et al. (2021) performed an investigation on the role of the housing price risk in describing the timing and the extent to which development sprawls at the urban fringe. They found that higher-risk areas had 3–5 percentage points slower growth in urban coverage in 1986–2016; if policy were to stabilize price risk, urban coverage could have been increased by 7.02–9.79%. Zhang et al. (2021) performed a spatial autoregressive analysis for housing prices in city of Toronto. They reported that neighborhood socioeconomic items could mostly contribute to describe the housing prices, while housing characteristics and accessibility measures could also be substantially influential. Their results provided shed light for planners concerning factors impacting housing prices and, hence, residential location decision-making. Vishwakarma (2021) performed an investigation on long-run drivers and integration in interprovincial Canadian housing price relations. They investigated the influential components of housing markets in Canada by studying the housing prices from 1999 to 2016 of six metropolitan areas in different provinces, namely, Calgary, Vancouver, Winnipeg, Toronto, Montreal and Halifax. They reported that cities' housing prices were in long-run equilibrium but post-crisis Canadian housing markets were more integrated. The Calgary, Vancouver, Toronto and Montreal markets drive the Canadian housing market, leading all cities toward long-run equilibrium.

Killins (2020) investigated the effect of real estate prices, real estate exuberance and real estate volatility on bank profits based on a dynamic panel methodology by a unique sample of Canadian banks by using quarterly data over the period 1996–

2018. The change in housing prices appeared to yield a positive effect on profitability measured by return on assets or return on equities, but under risk-adjusted measures of profitability, and this positive effect appeared to dissipate. When exuberance is seen on the real estate market, this could also result in a positive effect on non-risk adjusted measures of profitability. Killins (2020) found the volatility of real estate prices had little effect on the riskiness of banking profits in Canada. Clark and Ferrer (2019) investigated the impact of Canadian housing prices on fertility.

Okkola and Brunelle (2018) performed a quantile regression investigation from Canada over the period 1991–2011 to learn the changing determinants of housing affordability in oil-booming agglomerations. They found differentiated impacts for households with low, median and high levels of housing stress. They provided some evidence of emerging vulnerabilities, substantially among renters, first-time homebuyers and people outside the labor force. Nistor and Reianu (2018) performed an empirical investigation to find the determinants of housing prices in Ontario cities from 2001 to 2011. Killins et al. (2017) investigated the effect of oil shocks on the housing market in Canada and United States. Apergis and Geka (2012) investigated the association between real estate prices and inflation. The results showed that housing prices could react to inflation variations under certain conditions, significantly.

3. Summary

As we can observe from the brief survey in this paper, housing prices are very sensitive to different factors such as inflation, interest rate, government regulation, etc. We have learned that government actions of banning foreigners from participating in the real estate market could contribute to demand slowdown. On the other hand, the rise of interest rates may increase the cost of borrowing the money from banks, which could lead to lower demand for housing prices. Other factors such as immigration and deregulation policies could heat up the market and increase the present prices.

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