November 24, 2015

HOME IS WHERE THE WEALTH IS

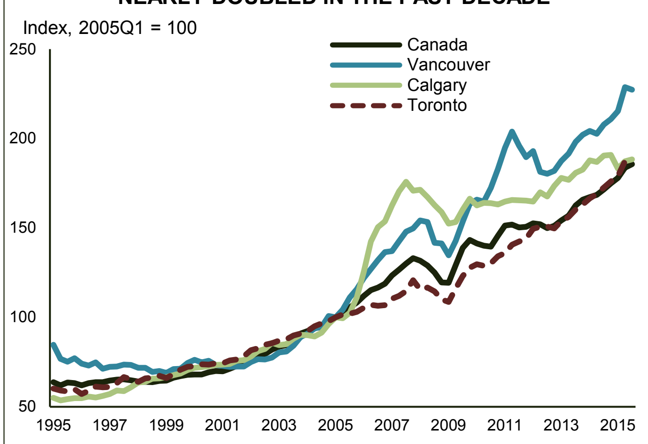
Highlights

- The housing market has been a significant driver of Canadian economic growth over the past decade. The drivers have been both direct, via construction output and employment, as well as indirect, via the support to consumption from increased household wealth resulting from home price gains.
- Housing activity has directly accounted for more than a quarter of the increase in economic output since 2001, and about a fifth of output post-2008. The wealth impacts of home price gains have also been material. We estimate that wealth gains have helped raise consumption growth by 1.2 percentage points (p.p.) per year. This corresponds to lifting GDP growth by an average of about 0.5 p.p. per year since 2001, and an impressive 1.3 p.p. over the post-crisis period.
- On a per capita basis, the western provinces, particularly British Columbia, have seen the largest wealth effects. In contrast, the Atlantic provinces have underperformed.
- House prices are expected to cool in 2016 in beyond, particularly in B.C. and Ontario. That means that consumer spending will lose an important tailwind, even in the absence of a material decline in prices.

The Canadian housing market has seen a rapid acceleration in activity over the past decade. Construction has increased markedly and home prices have nearly doubled. The increase in housing activity has lifted economic growth and raised employment directly, particularly among skilled trade contractors. Rising prices have also boosted household wealth, supporting consumption via the 'wealth effect'. The wealth effect refers to the increase in consumption resulting from a rise in wealth (also referred to as the marginal propensity to consume (MPC) out of wealth). We estimate that for every dollar increase in housing wealth, consumption has been lifted by roughly 5 cents.[1] While not as large as the direct impact of housing activity, the lift to spending has added about 0.5 percentage points to average annual economic growth since 2001. Put another way, just over 21% of consumer spending growth is attributed to the benefits of positive housing wealth effects. It is worth noting that these estimates, particularly for the post-crisis period are 'upper-end' estimates. Significant wealth effects tend to arise from permanent or steady wealth increases; a recovery of wealth following a decline, as we saw in several provinces, tends to have a smaller impact on spending.

Just as wealth has boosted growth on the upside, flat or declining home prices would cut into consumption. We anticipate a modest dip in home prices of between 1% and 3% at the national level over the next two and a half years. A decline of this magnitude would have a relatively modest negative impact on growth, subtracting 0.2 percentage points from real GDP, with the peak impact occurring with

CHART 1. CANADIAN HOME PRICES HAVE NEARLY DOUBLED IN THE PAST DECADE



Source: Canadian Real Estate Association, TD Economics.

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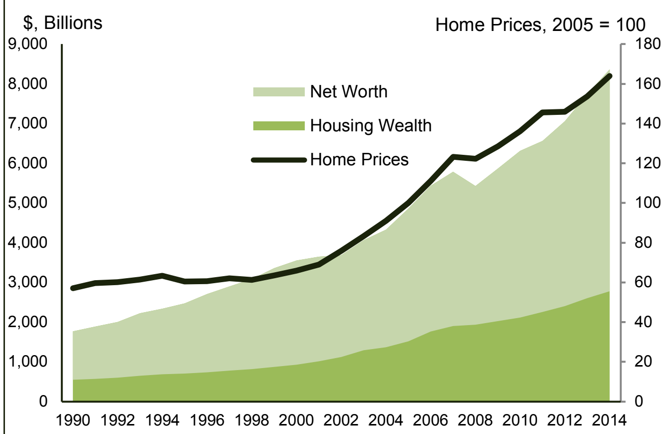
CHART 2. HOUSING KEY PART OF NET WORTH



Source: Statistics Canada, TD Economics. Note that housing wealth is net of mortgages

about a two year lag. Should a more significant home price correction occur, it would present a proportionally larger downside risk to economic growth both through its direct contribution and a more negative wealth effect.

Laying the foundation: tracing the evolution of Canadian home prices and wealth

Since the late 1990s, Canadian home prices have been on a seemingly inexorable upward path. Even the global recession of 2008-2009 proved only a temporary setback. Currently, national average home prices stand about 90% above their 2005 level (Chart 1). In Vancouver's particularly hot market, prices have more than doubled in the past decade, despite experiencing two corrections over that time.

For those Canadians who purchased a home during this time, the run-up in prices has created a significant financial windfall. The gain has been approximately double the rise in the TSX equity index. It is hard to think of an asset class that is so widely held by Canadians that has outperformed housing over this time.

For many Canadians, their home is the largest single non-pension asset. This means that increases in home values translate directly in household wealth. Housing wealth (taking mortgage debt into account) has been an important driver of overall household net worth, responsible for about 1/3 of the roughly $6.6 trillion increase since 1990 (Chart 2). The importance of housing wealth has also risen through time, accounting for 40% of the increase in net worth since 2001.

Every board and nail counts: the direct contribution of the housing market to the Canadian economy

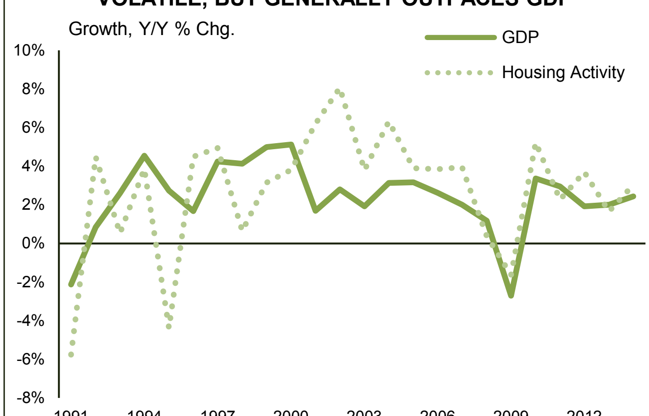
The direct impact of the housing market on economic activity is perhaps the easiest to understand. Housing activity, which includes construction of new homes and economic activity related to the existing stock of homes, currently accounts for nearly 20% of economic output in Canada, a share that has steadily risen since the 1990s (when it was about 15%). Indeed, from 2001 onwards, growth in this sector has outpaced broader growth in Canada in nearly every year. It is unsurprising then, that despite accounting for an average of roughly 17% of GDP between 2001 and 2014, housing activity was responsible for more than 27% of the increase in economic activity over this time.

Housing activity is equally important to the Canadian labour market. On the surface, direct employment in residential construction is not large, accounting for about 1% of total employment in 2014. But, adding in speciality trade contractors (such as foundation contractors, exterior specialists, etc.) results in nearly a 5% share of the job market, which is up sharply from 3.2% in 2001. This equates to more than 290,000 jobs since 2001 and 11% of all employment growth. The homebuilding sector is certainly punching above its weight.

More money, more shopping: wealth and consumption

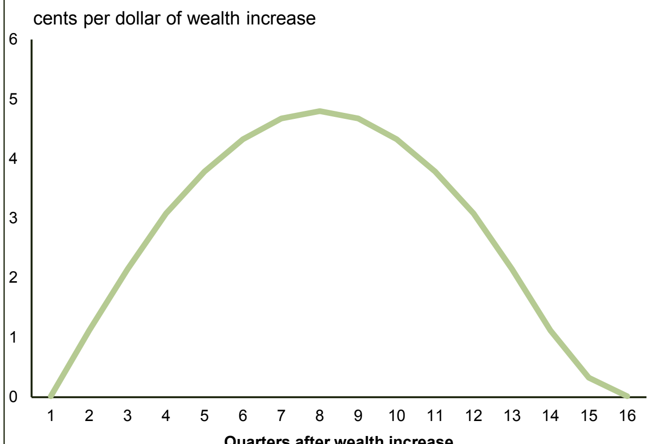
Identifying the direct effects of the housing market is straightforward. However, the impact on the economy goes beyond the easily observable. Changes in home prices also affect the wealth of homeowners, resulting in a wealth ef-

CHART 3. HOUSING ACTIVITY CAN BE MORE VOLATILE, BUT GENERALLY OUTPACES GDP



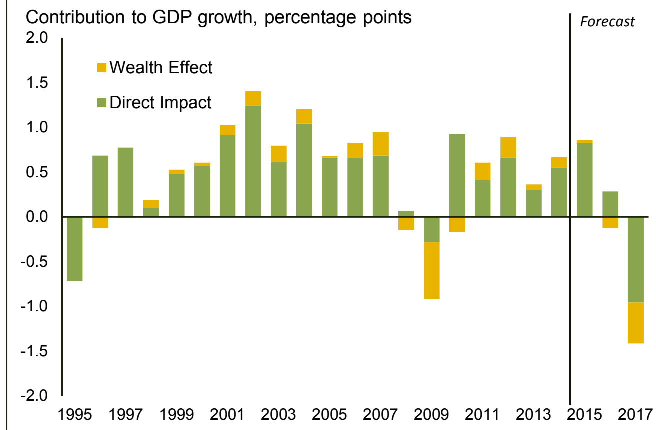
Source: Statistics Canada, TD Economics. Housing activity is defined as the sum of residential investment, imputed rent for homeowners, and spending on household goods and services.

CHART 4. WEALTH IMPACT TAKES TIME TO BUILD, BUT IS LONG-LASTING



Source: TD Economics

CHART 5. HOUSING AN IMPORTANT CONTRIBUTOR TO GROWTH



Source: Statistics Canada, TD Economics.

fect. Most studies have found that for financial wealth, the effect is quite small – on the order of a few cents for every dollar increase in wealth with the impact arriving a few quarters later.

In contrast, the impact of housing wealth on consumption can be significant. Estimates vary considerably, with marginal propensities estimated to be as small as 2 cents to as high as 17 cents, depending on the country, estimation approach, and the time horizon considered.[2] Based on Bank of Canada research and our own analysis, we find a housing wealth effect for Canada of just below 5 cents on the dollar.[3] The effect does not occur immediately; it takes about 8 quarters to peak, and lasts about 4 years (Chart 4).[4]

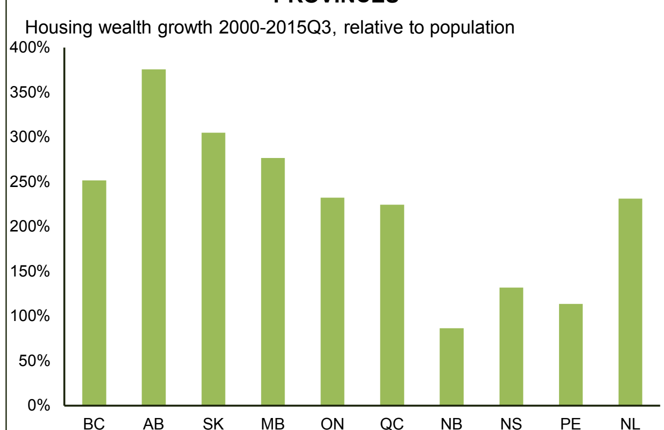
To more clearly see the impact of home price growth, Chart 5 plots the estimated contribution to GDP growth since the mid-1990s. From about 2001 onwards, the wealth effect became an important component of economic growth, contributing between 0.2 and 0.3 percentage points to annual growth, or around 10% of GDP growth (20% of consumption). The exception is 2008 and 2009, where the lingering effects of a cooled housing market resulted in a negative wealth effect that exacerbated the growth slowdown (alongside from the direct effect). Indeed, when considered alongside the direct impacts, housing is an important bedrock of the Canadian economy, responsible for more than 20% of total activity, and as much as one-third in some years.

Location, location, location: Wealth gains concentrated in specific provinces

The evolution of the Canadian housing market has not been homogenous across provinces. Some markets, such as B.C. and Ontario have seen strong price gains, while the Atlantic provinces have put in more modest performances. The varied performance of these markets is reflected in the distribution of the wealth gains that have accrued from the real estate market.

Unsurprisingly, the strongest gains in per-capita housing wealth have occurred in the Prairie Provinces. A combination of strong price gains and fast growth in the size of the housing stock have combined to push wealth up rapidly, even taking strong population growth into account (Chart 6).[5] Perhaps more surprising is the relative performance of housing wealth in British Columbia and Ontario, which both saw a near-tripling of housing wealth since the turn of the millennium, compared with the four- and five-fold increases seen in Alberta and Saskatchewan. In many ways this is a result of existing wealth already being quite high in

CHART 6. LARGEST GAINS SEEN IN WESTERN PROVINCES



Source: Statistics Canada, CMHC, TD Economics

2000; subsequent gains were not as significant relative to the starting point, despite relatively strong price performance.[6]

Prices are now on their way down for oil-producing provinces, and this may prove a 'beta-test' of the potential impacts that stem from negative wealth effects. Take Alberta. We anticipate home prices will retrench by a cumulative 6.5% between 2015 and 2017. This is roughly three times the decline expected for the nation as a whole. The impacts on spending are just beginning to be felt, due to the lagged impacts of the wealth effect. Returning to the notion depicted in Chart 4, even after price declines run their course in the oil-producing provinces, the impact on spending could linger for 1-2 years more years. For Alberta, this could drag GDP down by roughly -0.5 percentage points during their recovery years. The impact appears surmountable, but nevertheless is a factor that could ultimately mute some of the province's momentum as it moves back into a growth stage. Fortunately for Alberta, the degree of claw back in home prices expected this time around is small relative to the cumulative gains over the past decade, shielding the majority of homeowners from more material negative wealth impacts.

Slowing housing wealth to deliver glancing blow, not a knock-out punch

Because only a few provinces (Alberta, Saskatchewan and Newfoundland and Labrador) are expected to see significant declines in home prices and by extension housing wealth, this results in only a modest negative impact on consumption at the national level. Cumulatively over 2016 and 2017, the housing wealth effect is expected to reduce growth by about 0.2 percentage points –about a 10% decline in the national growth rate, but ultimately not a major headwind when balanced against the other drivers of economic growth. To have a more material national impact, a scenario would have to play out where Alberta-style impacts occur simultaneously in the two 'heavy hitter' housing markets: Ontario and B.C. Such a scenario would drag overall Canadian GDP down by 0.7 percentage points – definitely a more material impact.

Significant price declines need a catalyst, however, and this is lacking at the national level, making the likelihood of a more significant decline very remote. For instance, the unemployment rate would need to rise to the 8% to 9% range to precipitate such a house price decline, or a meaningful recession along the lines of the global financial crisis in 2008/2009, which was the catalyst for a 2.7% contraction in Canadian output. Economic out-turns of these magnitudes are rare and are not in the cards in our forecast. Growth is expected to remain stable around 2% in coming years, supported by a recovering export market, which will help boost growth in the key provinces of Ontario and B.C. As a result, our base case assumes a modest weight from potential negative wealth impacts at the national level, paralleling a rebalancing in the housing market.

Bottom Line

The impact of housing on the Canadian economy goes beyond bricks and mortar. The wealth created (or destroyed) by movements in housing markets creates a knock-on effect, goosing growth up, or rubbing salt in the wound depending on the situation. In the recent period, this effect has generally been positive, helping add as much as 1.3 percentage points to real GDP growth in the post-crisis period. All good things must of course come to an end, and with a normalization of national home prices expected in the coming years, the wealth effect is likely to create a modest but not insurmountable headwind to growth. The 'pause' in the pace of wealth growth is expected to be quite small, particularly when compared with the increases seen in recent years. Indeed, the pause is expected to come at the same time as exports and other non-housing-related sectors of the economy become more significant drivers of growth, as outlined in our Quarterly Economic Forecast. As a result, despite anticipated housing market developments, growth is nonetheless expected to track around 2% in coming years.

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ENDNOTES

1. Based on research using 1980 to 2012 data. Peak impact occurs with a roughly 8 quarter lag, and impacts persist for roughly 4 years. Recent research, suggests that the effect may be smaller for wealth gains that represent a recovery from past losses. As past movements in Canadian prices have generally been small, we apply the same reaction to all wealth movements within our sample.

2. Carroll, Otsuka and Slacalek (2011) find an immediate impact of about 2 cents, rising to 9 cents with time. Christelis, Georgarakos and Jappelli (2015) estimate an impact of about 5.6 cents on the dollar using European data. Dvornak and Kohler (2004) find a somewhat smaller impact of about 3 cents per dollar, using Canadian and Australian data. The higher range of estimates are reported in Benjamin, Chinloy and Jud (2004).

3. Specifically, the peak impact is 4.8 cents, occurring 8 quarters after the initial change in housing wealth. For Bank of Canada research, see Pichette (2004), and Dorich et al. (2013). Our estimates more closely match those found in the Bank of Canada's workhorse projection model (ToTEM II), as described in Dorich et al. See also note 1.

4. To simplify the analysis, we have shortened the length of impact somewhat. This change does not materially affect the estimated impacts.

5. In many ways this result is by construction. Due to a lack of data, we construct initial housing stocks based on provincial populations, taking the average number of individuals per dwelling into account. This stock is valued at average market prices to generate an initial level of housing wealth, which then grown through time using housing completions and changes in home prices.

6. A note of caution is warranted here, particularly for British Columbia: as mentioned in note 1, wealth effects may be smaller for wealth increases that follow periods of decline. This applies in particular to B.C. as this province saw the largest swings in home prices (Chart 1). Moreover, although it is difficult to assess how significant the impact may be, foreign ownership will result in wealth gains accruing outside of the Canadian economy, reducing the domestic impact. For these reasons, the estimates presented here should be considered "high end" estimates; the actual impact is likely to be smaller.