

Where should we build now?

Housing supply and the construction outlook in regions of New Zealand

- The rate of construction activity in Auckland remains far too low relative to population growth, although the shortfall is not quite as severe as it seemed a year ago.
- The pace of construction activity is slightly too low in Wellington and Nelson/Tasman.
- For regions of New Zealand except the abovementioned and Canterbury, the current pace of construction activity is broadly appropriate.
- We are forecasting a continued sharp increase in residential construction activity for New Zealand ex Canterbury over the years ahead, centred mainly on Auckland.

A year ago our bulletin "Where should we build?" assessed the rate of house building relative to population in each region of New Zealand except Canterbury (where the earthquakes wrought an obvious need for massive construction activity).

This year we have been able to update our construction versus population growth estimates to account for construction activity over the past year, stronger net immigration, and the wealth of information in the 2013 Census.

The basic finding is that Auckland is still building far too few houses. However, Auckland's construction shortfall may not be as severe as we thought a year ago. Wellington and Nelson/Tasman are also underbuilding, but every other region of the country is building roughly the "right" number of new dwellings each year.

Based partly on these findings, we are forecasting a continued sharp increase in residential construction activity for New Zealand ex Canterbury over the years ahead, centred mainly on Auckland.

The analysis is based on the idea that the number of people per house (PPH) in a region should normally decline slowly as families shrink, the population ages, and average incomes rise. Abnormal changes in PPH may indicate that the prevailing rate of construction activity is unsustainable. For example, if PPH is rising then the rate of building activity is failing to keep pace with population growth, suggesting that at some point building activity will increase. If PPH is falling fast then the rate of construction activity is too high, and can be expected to fall at some point in the future.

The results are summarised in the table overleaf, while charts of people per house in each region are available in the appendix.

The first column of the table shows the accumulated undersupply or oversupply of new dwellings over the past five years. Regions are designated as having an undersupply or oversupply if the average rate of change in PPH has fallen outside the rate of -0.012 per annum to -0.002 per annum.¹

The numbers quoted represent how many extra (or fewer) houses would have been required over a five year period to ensure a normal rate of decline in PPH.

Next, the table shows how many new houses were added to the dwelling stock in each region last year.

Finally, the annual rate of additions to the housing stock that would be required to ensure a normal rate of decline in PPH over the next two years is shown, alongside the increase in construction activity that would be required to meet this target.

Regional details

Auckland

Auckland has been underbuilding since 2008. Rather than falling, the number of people per house has been rising, and now stands higher than it was in the late-1990s.

However, the construction shortfall has not been quite as severe as we estimated last year. We now estimate that over the past five years Auckland has built 13,640 too few dwellings. A year ago the comparable figure was 21,840. The Census revealed that Auckland's population is lower than previously estimated (this has been widely reported elsewhere). Our calculations also reveal that the rate of increase in Auckland's housing stock has been faster than previously estimated. (Our estimate of new dwelling construction relies on a "conversion rate" from dwelling consents to actual increases in the housing stock. The 2013 Census revealed a higher conversion rate than the 2006 Census.)

The pace of residential construction in Auckland has ramped up by 20% over the past year, and now stands close to 6,000 dwellings per annum. Nevertheless, the pace remains far too slow. We estimate that just over 9,163 new units will be needed per annum in Auckland, which would require a further 53% increase in construction activity.

Wellington

Wellington has accumulated a construction shortfall of over 1,000 dwellings over the past five years, and is still building too few new dwellings relative to population growth. Wellington needs a 27% increase in construction activity to achieve gentle decline in PPH.

Nelson/Tasman

Perhaps the biggest surprise of the 2013 Census was the Nelson/Tasman region's population, which is growing more rapidly than previously thought.

The new Census data puts Nelson/Tasman alongside Auckland and Wellington in the category of "underbuilding" regions. Nelson/Tasman requires a 19% increase in building activity to achieve a normal rate of decline in PPH.

It is worth noting, however, that the pace of construction activity in Nelson/Tasman fell in the second half of 2013. A return to the rate of construction activity that prevailed in early-2013 would be sufficient to address Nelson/Tasman's construction shortfall.

Other regions

Northland is estimated to have overbuilt over the past five years. However, this may be a consequence of the pace of construction activity over 2009 and 2010. Since that time, construction activity in Northland has moderated. This more subdued level of construction activity is appropriate for Northland's projected population growth.

Similarly, Taranaki was designated as underbuilding over the past five years. However, the pace of construction activity has recently ramped up, and is now commensurate with population growth.

All other regions were found to be building new dwellings at a roughly appropriate pace.

| | Past five years: accumulated over/undersupply of new dwellings | Additions to dwelling stock last year | Annual additions to dwelling stock required to meet new demand | Change in pace of construction activity required to meet new demand |
|-------------------|--|--|--|---|
| Northland | 330 oversupply | 678 | No change required | |
| Auckland | 13640 undersupply | 5986 | 9169 | 53% |
| Waikato | None | 2023 | No change required | |
| Bay of Plenty | None | 1098 | No change required | |
| Gisbourne | None | 58 | No change required | |
| Hawkes Bay | None | 309 | No change required | |
| Taranaki | 390 undersupply | 422 | No change required | |
| Manawatu-Wanganui | None | 455 | No change required | |
| Wellington | 1220 undersupply | 1367 | 1731 | 27% |
| Nelson/Tasman | 260 undersupply | 388 | 461 | 19% |
| Marlborough | None | 167 | No change required | |
| Otago | None | 963 | No change required | |
| Southland | None | 150 | No change required | |

¹ The bounds of this "normal" range represents the maximum and minimum 10-year average rate of change in PPH for the whole of New Zealand, since 1990.

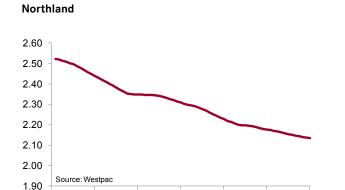
Notes on calculating regional people per house

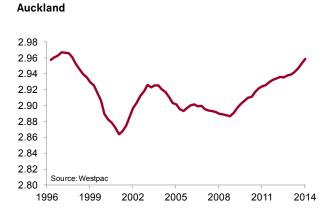
- The number of private dwellings (occupied and unoccupied) in each region is available in the 1996, 2001, 2006, and 2013 censuses. Inter-census and post-2013 census regional dwelling estimates were calculated using regional building consents data. The calculation method was the same as Statistics New Zealand uses to calculate nationwide dwelling estimates, available here: http:// www2.stats.govt.nz/domino/external/omni/omni.nsf/ outputs/Dwelling+and+Household+Estimates
- Regional population estimates up to June 2006 were interpolated from Statistics New Zealand's annual Regional Population Estimates. From September 2006 to June 2013, Statistics New Zealand's Regional Population Estimates were adjusted to reflect the results of the 2013 Census. Beyond June 2013, regional population estimates are Westpac forecasts.

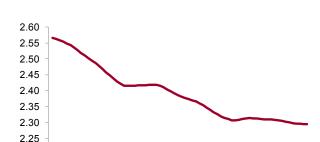
Dominick Stephens

Chief Economist

People per house, regions of New Zealand







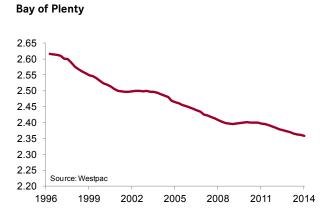
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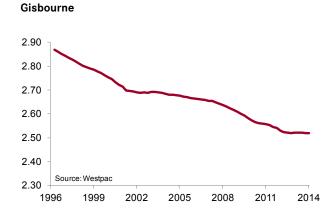
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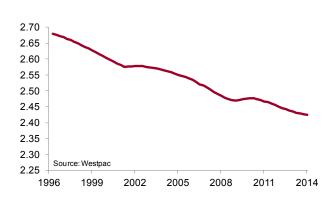
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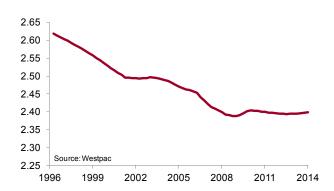
Source: Westpac



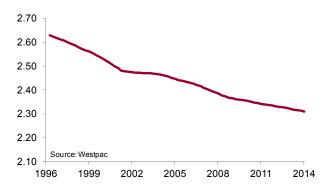




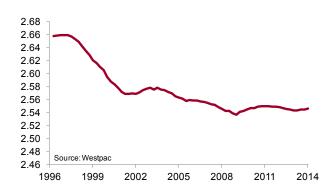
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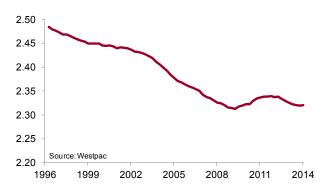
Manawatu - Wanganui



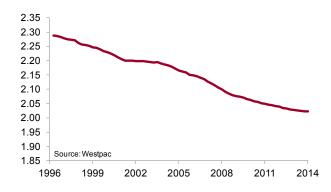
Wellington



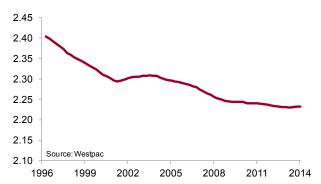
Nelson/Tasman



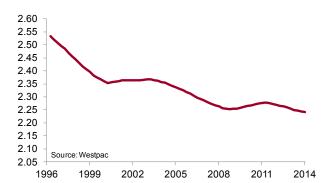
Marlborough



Otago



Southland



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