

IN THE MATTER of the Resource Management Act 1991

AND

IN THE MATTER of Proposed Private Plan Change 2 to
the Hamilton City Operative District
Plan: Te Awa Lakes Private Plan
Change

**STATEMENT OF EVIDENCE OF JOHN DANIELL POLKINGHORNE FOR THE APPLICANT
(ECONOMICS)
29 OCTOBER 2019**

1. EXECUTIVE SUMMARY

- 1.1 An economic evaluation of PPC2 requires consideration of multiple property sectors (industrial, residential, tourism, retail); likely outcomes with and without the plan change; and the economic effects as a result.
- 1.2 My October 2017 work (“the RCG report”) found that the overall economic effects of PPC2 would be positive.
- 1.3 The RCG report found that the ‘Te Awa Lakes’ site was unlikely to be required for industrial purposes; had some site-specific attributes which could be attractive for residential purposes; and that PPC2 would also enable a range of tourism economic benefits.
- 1.4 Subsequent work by others (the two Market Economics NPS-UDC analyses on behalf of the Future Proof Partners, and the recent Joint Statement of Development Feasibility Witnesses) gives me further confidence in this conclusion, and I elaborate on it further in my evidence.
- 1.5 I have considered relevant economic issues raised by the section 42A report and submitters in my evidence below, but these issues have not caused me to change my overall conclusion.
- 1.6 Based on all of the above, I conclude that the overall economic effects of PPC2 will be positive.

2. QUALIFICATIONS AND EXPERIENCE

- 2.1 My full name is John Daniell Polkinghorne.
- 2.2 I am an associate director of RCG Limited, with responsibility for the company's research and analytics work. I have been employed by RCG Limited since February 2008, initially working as a research analyst and economist.
- 2.3 I hold a Master of Commerce degree from the University of Auckland, majoring in economics. I am a member of the New Zealand Association of Economists.
- 2.4 I have been involved in a variety of projects in the Waikato region, and I am familiar with the Te Rapa area and the relevant property sectors.
- 2.5 I had various involvements in Hamilton City's District Plan review process between 2013-2016, including economic input and evidence on the Business 1-7 zones, Business 3-4 Zones and Strategic Framework (all on behalf of Tainui Group Holdings), and economic evidence for A & A King Family Trust's appeal (ENV-2014-AKL-000, withdrawn prior to hearing).
- 2.6 I also provided a Technical Assessment on a resource consent application at 1 Cook Street, reviewing the economic aspects of the proposal and its suitability under a Centres Assessment Report framework, followed by evidence at that hearing in 2016.
- 2.7 I have been engaged by the Applicant since February 2017. I authored a report titled "Te Awa Lakes: Assessment of Economic Effects" dated 12 October 2017, which accompanied the application for Proposed Plan Change 2 to the Hamilton City District Plan: Te Awa Lakes (PPC2).
- 2.8 I refer to this 12 October 2017 report as "the RCG report" in the body of my evidence.
- 2.9 I also authored a report titled "Te Awa Lakes: Technical Assessment" dated 14 January 2019, which accompanied the Applicant's applications for Resource Consents for Qualifying Developments during the Special Housing Area process.
- 2.10 I confirm that I have read the Code of Conduct for Expert Witnesses contained in the Environment Court Practice Note 2014 and to the extent that I am giving expert evidence, have complied with it in preparing this evidence. I confirm that the issues addressed in

this evidence are within my area of expertise and I have not omitted to consider material facts known to me that might alter or detract from the opinions expressed in my evidence.

3. SCOPE OF EVIDENCE

3.1 I have been asked to provide evidence in relation to the economic effects of PPC2.

3.2 My evidence will cover the following matters:

- a) Relevant facts and context;
- b) Summary of technical report;
- c) Expert caucusing;
- d) Comments on the Section 42A Report;
- e) Comments on submissions; and
- f) Conclusions.

4. RELEVANT FACTS AND CONTEXT

4.1 In this statement of evidence I do not repeat the description of the plan change and refer to the summary of the application in the evidence of John Olliver for the Applicant.

4.2 As outlined above, my original work for PPC2 occurred in 2017, resulting in the “RCG report” of October 2017.

4.3 At the time of writing, I was aware that Market Economics were carrying out analyses for the National Policy Statement on Urban Development Capacity (NPS-UDC), on behalf of the Future Proof Partners.

4.4 The RCG report aimed to add some extra context around industrial and housing issues in Hamilton, rather than attempting to duplicate the NPS-UDC assessments of demand and capacity.

4.5 The results of Market Economics’ two studies, published after the RCG report had been completed, were that Hamilton and the Waikato sub-region have sufficient feasible

capacity for both housing and industrial land, in the short, medium and long term as defined by the NPS-UDC. Dr Doug Fairgray will provide more detail on these studies in his evidence.

4.6 The NPS-UDC analyses undertaken by Market Economics also form part of the relevant context in which my evidence should be read.

4.7 The Joint Statement of Development Feasibility Witnesses (dated 2nd October 2019) is also relevant context for my evidence below. It suggests that the Te Awa Lakes site is unlikely to be viable for industrial development in the next 10-15 years.

4.8 I refer to the NPS-UDC analyses and Joint Statement of Development Feasibility Witnesses in my evidence below, and state where I have relied on them for my conclusions.

5. SUMMARY OF TECHNICAL REPORT

5.1 In the paragraphs below, I summarise my technical report (the “RCG report” of October 2017), but I also note more recent work and data where available and where relevant to my conclusions. I follow the same general structure as the RCG report.

5.2 As outlined in section 1.10 of the RCG report, I undertook the following work in assessing the economic effects of PPC2:

- i. Analysis of various industrial indicators in the Future Proof area to gauge demand and supply;
- ii. Analysis of residential demand and supply in the Future Proof area;
- iii. Information on the local and national tourism industry, and the potential for tourism-related uses at Te Awa Lakes, and flow-on benefits as a result;
- iv. Retail demand modelling and comments on Centres Assessment Report matters; and
- v. Conclusions on the overall economic effects of the proposed plan change.

5.3 In section 2 of my report, I summarise the nearby land uses that form part of the background context to the application. These include:

- a) The surrounding area of Te Rapa North.
- b) The village of Horotiu to the north-west, and the larger town of Ngāruawāhia five kilometres to the north.
- c) The major growth node of Rotokauri to the west of the Expressway, within Hamilton City.

5.4 In terms of key non-rural land uses within Te Rapa North and Horotiu, the RCG report identifies:

- i. The AFFCO landholdings to the north, including the consented Open Country Dairy Factory (I note that this factory has since been built, and is operating).
- ii. The Northgate Business Park, including the Ports of Auckland freight hub and Waikato Milking Systems.
- iii. RX Plastics, the Horotiu Masonry Plant, and various other industrial uses to the west of the Northgate Business Park.
- iv. Some vehicle servicing, showrooms, and the Horotiu School on the opposite side of the Waikato Expressway from the site.
- v. To the south, the Sikh temple and Fonterra's landholdings at its Te Rapa site.

5.5 The RCG report assesses the economic effects of PPC2 on a sector-by-sector basis, including on industrial land availability and demand, housing supply and demand, effects on the tourism sector, and retail demand.

Industrial

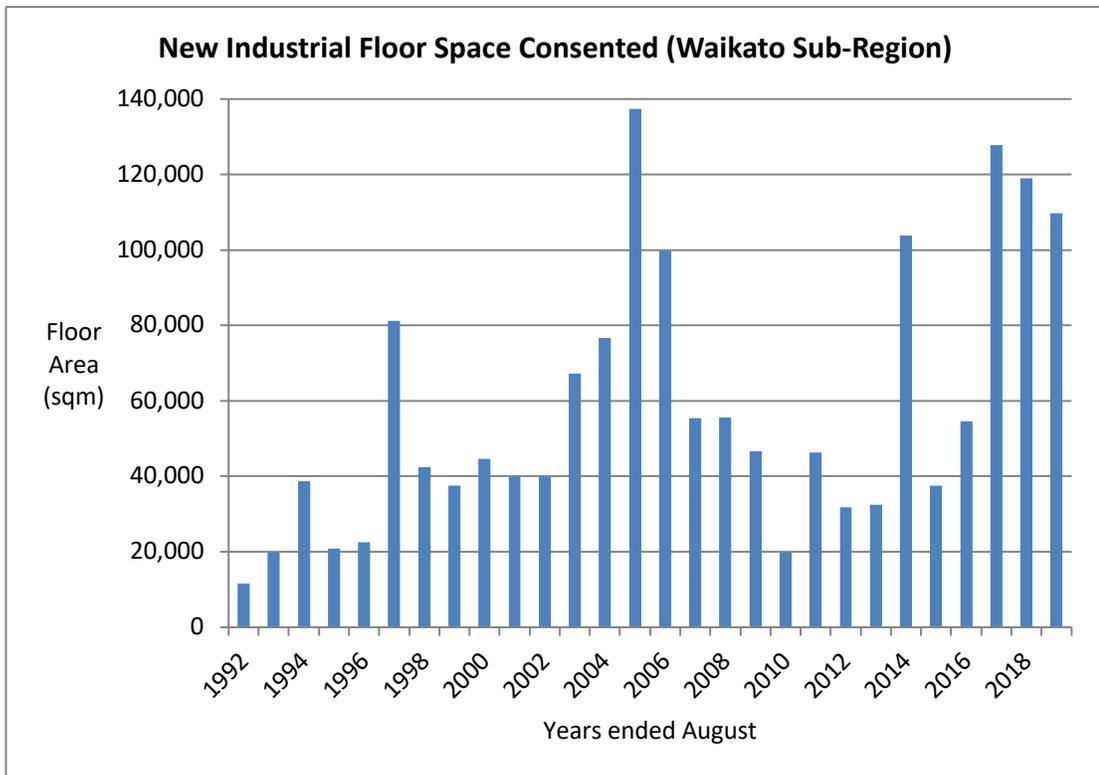
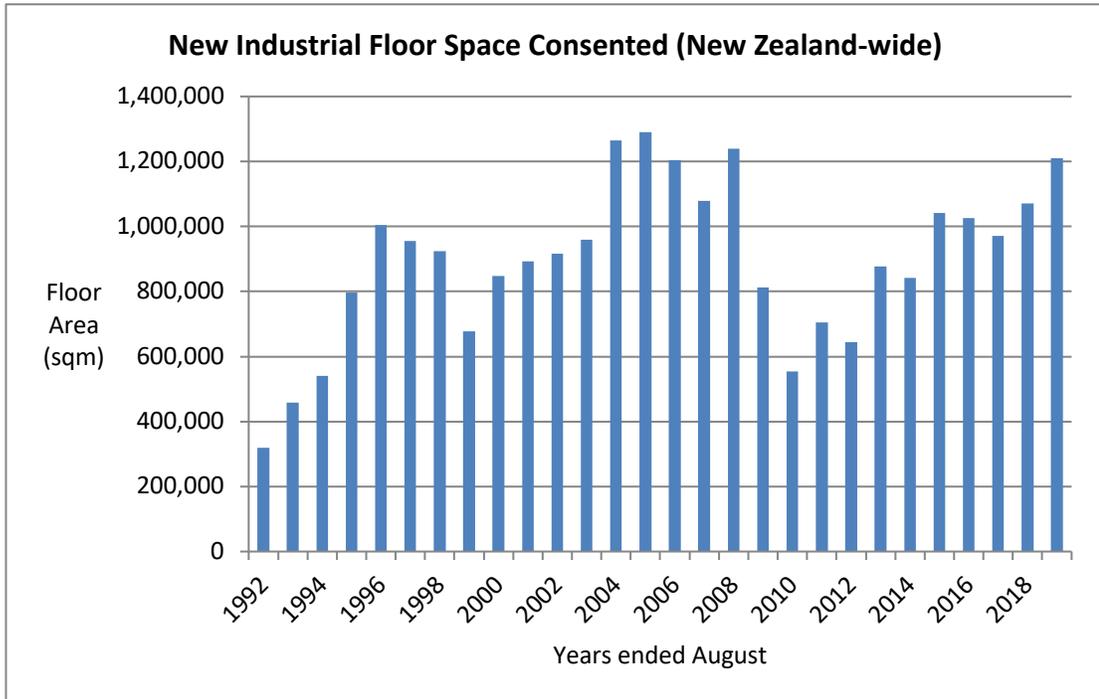
- 5.6 Section 3 of the RCG report, titled Industrial Land Availability, presents some historic and current (to 2017) data on the industrial land market in Hamilton and the sub-region. The key findings remain relevant in 2019.
- 5.7 Section 3.2 of the RCG report summarises Waikato's changing market dynamics over time: a shortage in the mid-2000s, with Future Proof and the RPS putting emphasis on addressing the shortage through a land release programme and "strategic nodes", and a market that in 2017 (and still in 2019, in my view) appears healthy.
- 5.8 Section 3.19 of the RCG report outlines that "industrial land uptake in Hamilton has historically averaged around 8 hectares per annum, versus 18 hectares for the entire sub-region".
- 5.9 Section 3.21 of the RCG report notes that the Waikato Regional Policy Statement provide more than enough land to cater for expected demand, with 1,148 hectares (23 hectares per year) in the Strategic Industrial Nodes alone. Much of this is already zoned.
- 5.10 Section 3.22 of the RCG report commented that "As such, the Future Proof sub-region is more than adequately provided for in terms of future industrial land supply, for both the medium term (to 2021) and the longer term. Given the modelled and historical rates above which suggest 16-18 hectares a year uptake, the area of land enabled in the Regional Policy Statement could in fact create an oversupply. This could undermine the goal of a spatially efficient economy".
- 5.11 The subsequent NPS-UDC analyses by Market Economics, which also considered whether plan-enabled capacity was likely to be 'feasible', supports the view that there will be sufficient industrial land supply into the future.
- 5.12 Some of the industrial property research referred to in the RCG report (at sections 3.29-3.43) has been updated, as outlined below. I note that this research focuses on industrial buildings or (to a lesser extent) on industrial sections, rather than raw industrial-zoned land which is more of a focus for council planning and NPS-UDC analyses.

- 5.13 In a publication to the market in January 2019, Telfer Young noted that “Hamilton’s industrial market is buoyant, with increases in rentals and land values”.¹
- 5.14 CBRE noted in a publication it produced in March 2019 that vacant floor space is “the lowest... on record”, with 39,000 sqm of industrial space added in 2018 to take the total stock to 1.72 million sqm. CBRE found that “Industrial occupiers across [Hamilton and Auckland] have really responded positively to the new product being offered to market. Strong net absorption shows that tenants overwhelmingly prefer new, high quality, efficient spaces in which to operate”.²
- 5.15 Most of the research mentioned above focuses on industrial buildings or (to a lesser extent) on industrial sections, rather than raw industrial-zoned land which is more of a focus for council planning and NPS-UDC analyses.
- 5.16 Lastly, I note that industrial development continues to take place in a number of areas in the Waikato, including Te Rapa Gateway (an area of industrial land behind The Base retail centre), Northgate Business Park (in Horotiu), Titanium Park (adjoining Hamilton Airport), and Ruakura.
- 5.17 Section 4.0 of the RCG report includes data on industrial building consents in the sub-region. These data provide “an accurate, consistent indicator of industrial development and growth” although they do “not fully capture industrial use of land” (for yards, carparks, future expansion land etc).
- 5.18 Across New Zealand, consents have fluctuated significantly over the last 27 years, due to economic cycles and other factors.
- 5.19 Local/ regional markets usually reflect similar trends, but are more ‘lumpy’ as the timing of individual developments can make a big difference to the figures.

¹ <https://telferyoung.com/our-offices/waikato/news-and-publications/hamilton-market-insight-industrial-january-2019/>

² <https://www.cbre.co.nz/about/media-center/occupiers-flock-to-quality-industrial-properties-in-hamilton-with-lowest-vacancy-rate-on-record>

5.20 I update the two graphs from section 4.0 of the RCG report below, for years ended August 1992-2019:



- 5.21 For New Zealand overall, industrial consents are running at a similar level to 2004-2008, and higher than for other years in the 1990s and 2000s.
- 5.22 For the Waikato sub-region, the picture is similar, albeit more 'lumpy' as per section 4.5 of the RCG report. Consents in the last three years have been higher than the historical average and similar to those in the mid-2000s.
- 5.23 My conclusion in section 4.10 of the RCG report is still relevant: over the longer term, "there is no clear evidence of consents (and likely land demand) trending upwards or downwards, and as such historical trends are likely to give a good guide for land uptake".

Housing

- 5.24 Section 5.0 of the RCG report was updated for the Special Housing Area process in 2019.³ Some of the data referred to in the RCG report has been updated, but the trends outlined in section 5.0 of the RCG report remain very much the same.

Housing Demand

- 5.25 At a national level, migration continues to account for the majority of NZ's population growth. Net migration into New Zealand continues to be very strong in 2019, albeit it has dropped back slightly from 2017.
- 5.26 Auckland's inability to build enough housing for the people who live there, or want to live there, continues to have flow-on effects, including for Hamilton. Initial data recently released from the 2018 census seems to support this view.
- 5.27 However, as noted in section 5.13 of the RCG report, there would still be strong growth in Hamilton even if Auckland was able to fully meet its housing needs.
- 5.28 In most parts of New Zealand and most developed countries, the average number of fewer people per household is falling, and has done so for many decades.
- 5.29 However, Auckland and Hamilton have bucked the trend between 2001 and 2013, with household sizes staying very flat during this period. The RCG report noted that "we view the Auckland result as being evidence of the city's struggle to keep up with its housing

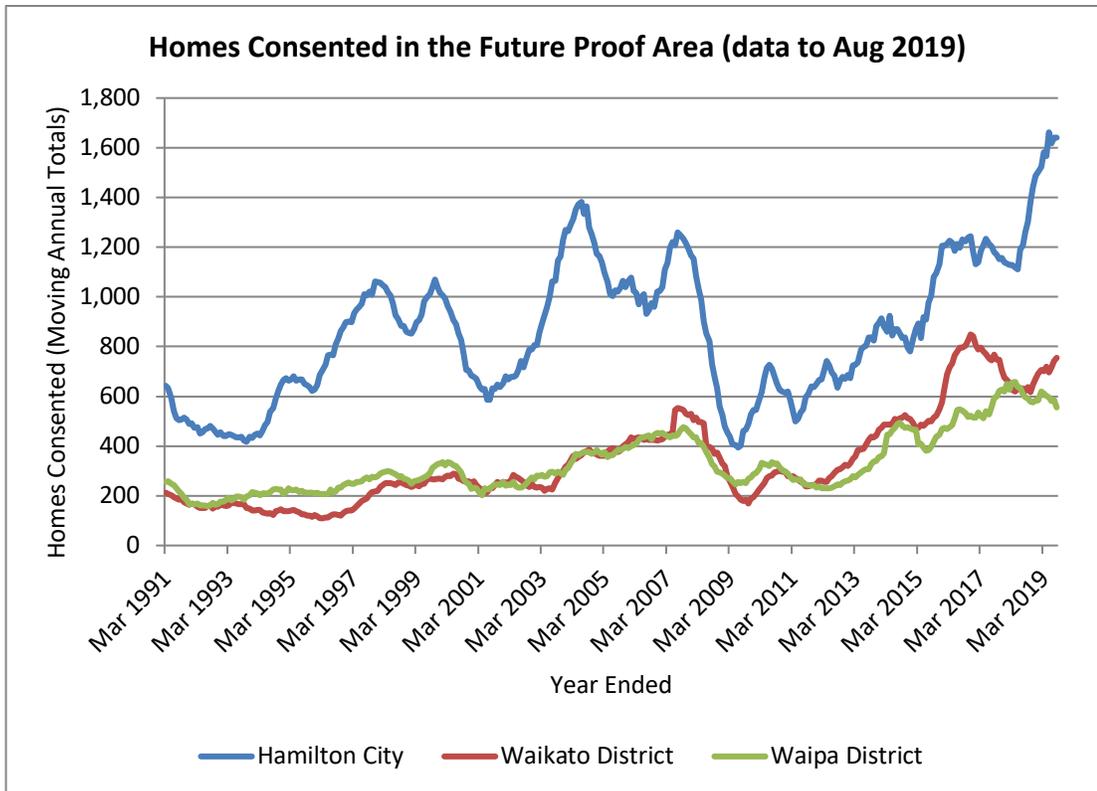
³ " Te Awa Lakes: Technical Assessment", RCG Ltd, 14 January 2019. This report accompanied the Applicant's application for Resource Consents for Qualifying Developments during the Special Housing Area process.

needs over the long term. The Hamilton picture may be more complex, but is at least in part a reflection of these same issues”.

- 5.30 Based on initial 2018 census results (published since the RCG report was completed), household sizes are likely to have risen in both Auckland and Hamilton over 2013-18. This is certainly a reflection of strong ‘demand’ for housing, and ‘supply’ struggling to keep up, in both cities, although in the last couple of years (2018-19) both cities have made bigger strides on supply.
- 5.31 The RCG report notes at section 5.17 that demographic trends towards falling household sizes “are likely to mean that household growth (and demand for housing) is faster than population growth”. These trends are an important contributor towards housing demand.
- 5.32 As foreshadowed in section 5.22 of the RCG report, household projections for Hamilton have indeed been revised upwards. The latest figure for Hamilton to add 27,500 households between 2013 and 2038 (up from 23,600); Waikato District to add 13,400 (up from 10,800); and Waipa to add 7,400 (up from 5,800).
- 5.33 Lastly, section 5.29 of the RCG report finds that “Hamilton is likely to stay on a medium/high growth track for the foreseeable future. It will take many years for Auckland to make inroads into its housing shortage, and in the meantime the Waikato will be an attractive destination for new migrants and former Aucklanders”. This finding is still relevant in 2019.

Housing Supply

- 5.34 As for housing supply, Hamilton has continued to consent large numbers of new homes – in fact, dwelling consents have reached new records at more than 1,600 homes in the last year as shown in the graph below (updated to August 2019):



- 5.35 The consent data includes a large proportion of intensification of existing urban areas within the Future Proof Area, mainly within a 3 km radius of the Hamilton CBD. Notable areas of development include the CBD and fringe, Frankton, Melville (near Waikato Hospital), Hamilton East, and Hillcrest (near the University of Waikato). Townhouses, terraces and – to a lesser extent – apartments all form part of the mix.
- 5.36 Hamilton City’s share of high-density housing has risen to 50% of total consents in the last two years (years ended August 2018 and 2019), even higher than Auckland. In my view, this is a positive for the city. High-density housing plays an important role in lifting overall housing supply. It has helped Auckland, Hamilton and Wellington to reach record levels of building consents over the last few years.
- 5.37 On the other hand, Hamilton has also seen record levels of housing demand, as measured by population growth. Assuming a constant household size of 2.8 people as per the 2013 census, Hamilton would need roughly 1,400 homes per year to keep up with its population growth.

- 5.38 Using similar assumptions, Hamilton's housing supply exceeded demand in 2003-2007, fell below demand in 2008-2017, and has exceeded demand again in 2018-19 to date.⁴
- 5.39 However, there are still questions around whether this level of new supply can be maintained, and whether Hamilton can supply enough housing to cater for not just population growth, but also declining household sizes over the long term (as opposed to my assumption of constant household sizes above).
- 5.40 As a result of the recent consenting boom, it is likely that Hamilton will achieve its overall Housing Accord targets for the 2017-2019 period, and the relevance of the Housing Accord itself is likely to diminish with the staged repeal of the HASHA legislation.
- 5.41 More generally, though, the Housing Accord and policies by both the current and previous governments suggest a trend towards greater Crown interest in the housing market, both as a direct investor, and through policy reform to encourage greater housing supply. The NPS-UDC and Crown Land Programme (both initiated by the previous government), and Kiwibuild and Kainga Ora legislation (under the current government) are other indicators of this.

House Prices and Affordability

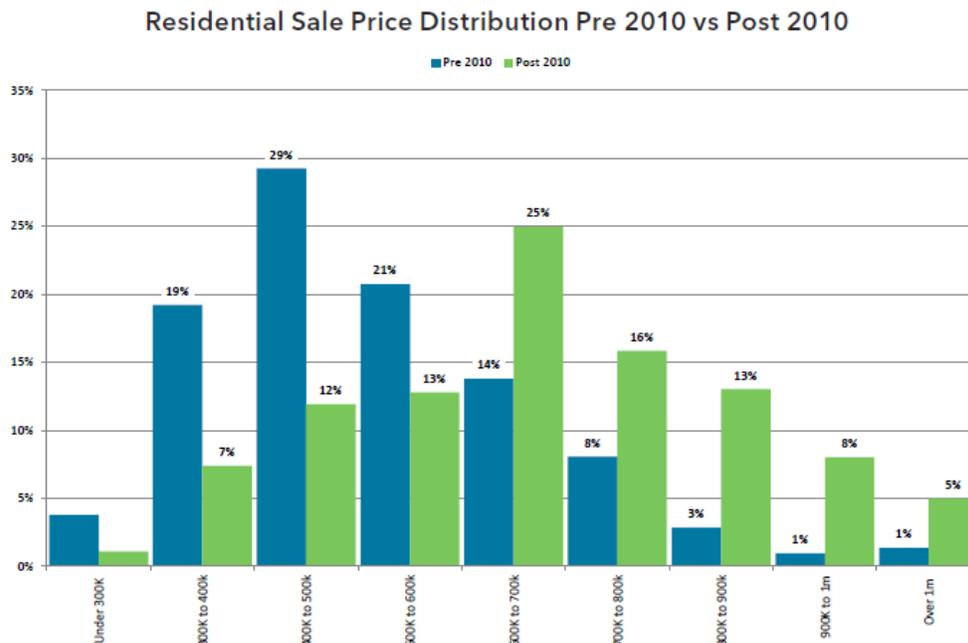
- 5.42 House prices in Hamilton have continued to rise – albeit perhaps not as strongly as they might have with less of a supply response – and the average house value is now \$585,000 as at June 2019,⁵ up from \$537,000 as outlined in the RCG report.

⁴ Hamilton had demand for 4,359 homes over 2003 and supplied 5,698 for an oversupply of 1,339. Hamilton had demand for 10,514 homes over 2008-2017 and supplied 8,220 for an undersupply of -2,294 homes. Based on current rates, Hamilton could supply 3,050 homes in 2018-2019 with demand for 2,780, a slight oversupply.

⁵ <https://www.qv.co.nz/property-trends/residential-house-values>

5.43 Analysis by Hamilton City Council shows that ‘new’ homes – defined as those built after 2010 – typically sell for much higher prices than ‘old’ homes:

Median sale price	Pre 2010	Post 2010	Total
House	\$545,000	\$727,500	\$572,500
Apartment, Flat and Unit	\$395,000	\$447,000	\$400,000
Total	\$495,000	\$678,500	\$511,000



Hamilton House Sales Prices. Source: Hamilton City Council

5.44 The Council’s analysis was based on homes sold in the year to August 2017. With further price growth in Hamilton since then, the percentage of homes in lower price brackets may be even smaller today; on the other hand, this may have been balanced by the growth of multi-unit dwellings, which are typically smaller and therefore cheaper to construct.

5.45 Based on the 2017 analysis, the median sale price for a ‘new’ house was \$727,500, 33% higher than the price for an ‘old’ house of \$545,000.

- 5.46 The median sale price for a 'new' apartment/ flat/ unit was \$447,000, 13% higher than the price for an 'old' apartment/ flat/ unit of \$395,000.
- 5.47 Only 32% of 'new' homes are sold for less than \$600,000, compared with 69% of 'old' homes.
- 5.48 The main price bracket for 'new' homes as at 2017 was \$600,000-\$700,000 (25% of new homes), followed by \$700,000-\$800,000 (16% of new homes).
- 5.49 I expect that most 'new' homes in the lower price brackets above, especially those under \$600,000, are apartments/ flats/ units.
- 5.50 Lastly (and not fully outlined in the RCG report), I note that Te Awa Lakes has a number of site-specific attributes which could make it attractive for housing. These include:
- a) A commitment to affordability through the provisions outlined in PPC2;
 - b) Similar access to jobs compared with other Hamilton greenfield nodes (although not as good as Peacocke's), and better access than most parts of the Waikato or Waipa districts;
 - c) River and lake amenity, noting that Hamilton suburbs close to the Waikato River or Hamilton Lake are typically seen as more desirable (Hamilton Lake, Beerescourt, Riverlea); and
 - d) Other amenity offered as a result of the mix of uses under PPC2: housing will be "part of an attractive mixed-use community which includes distinctive tourism and adventure activity" (section 9.39 of the RCG report).

Tourism

Tourism in the Waikato

- 5.51 Section 6.0 of the RCG report outlines tourism data for New Zealand and the Waikato.
- 5.52 Sections 6.2 and 6.3 refer to the Tourism Satellite Account, an annual publication by Statistics NZ which records tourism's overall contribution to the New Zealand economy. Most of the figures used in the RCG report have risen slightly with more recent editions

of the Tourism Satellite Account, e.g. for the year to March 2018, tourism's 'direct' contribution to GDP was \$15.9 billion, or 6.1% of total GDP, with an 'indirect' contribution of \$11.1 billion or 4.3% of GDP.⁶ Tourism is certainly an economically significant national industry.

- 5.53 In Hamilton and the Waikato, guest nights have continued to rise. Guest nights in Hamilton have reached a new record of 794,000 for the year to July 2019 up from 757,000 in the RCG report. Occupancy has also risen to a record 68%, up from 65%.
- 5.54 Total guest nights for the Waikato Regional Tourism Organisation (RTO) area⁷ have risen to a record 1.493 million, up from 1.404 million in the RCG report.
- 5.55 Tourism spending has also increased since 2017: for the Waikato RTO, spending reached a record \$1.562 billion in the year to August 2019, up from \$1.402 billion in the RCG report.
- 5.56 Sections 6.36-6.45 of the RCG report refer to a 2016 analysis by The Stafford Group. That analysis had found that "tourism accounts for 4.5% of Hamilton's GDP, contributing \$320 million to the economy and accounting for 8.2% of employment".
- 5.57 Despite this, there have not been any significant changes to Hamilton's accommodation supply since 2017. Tainui Group Holdings is currently progressing a 40-room expansion at the Novotel Tainui Hamilton (due for completion in April 2020), other refurbishments are underway, and several new hotel projects have been proposed but not yet started.
- 5.58 Meanwhile, there have been a large number of hotel projects announced and advanced in other New Zealand cities, especially in Auckland and Queenstown but with a number also in smaller centres. There is a growing pipeline of new hotels and accommodation properties under construction.
- 5.59 The RCG report also highlights the growing trend of cycling tourism as part of the New Zealand tourism sector. As a reasonably local example, it notes that the Waikato River Trail from Pokaiwhenua Bridge in the north to Atiamuri to the south was used by an

⁶ <https://www.stats.govt.nz/information-releases/tourism-satellite-account-2018>

⁷ Consisting of the Future-Proof sub-region, plus Waitomo, Otorohanga, Matamata-Piako and the South Waikato districts.

estimated 25,833 people in 2015, generating over \$1 million in revenue from mostly domestic and some international tourists.

- 5.60 Section 7.10 of the RCG report notes that “Te Awa Lakes is very well positioned to capitalise on cycle tourism. The development sits alongside ‘Te Awa – the great New Zealand river ride’, which will eventually run from Ngāruawāhia to Cambridge”.
- 5.61 This ride consists of three sections, with two sections complete as at 2019. The ‘Ngāruawāhia’ section runs from Ngāruawāhia to Hamilton Gardens (going past the PPC2 site). The ‘Avantidrome’ section runs from the Avantidrome to Karapiro. The middle section, which will join Hamilton Gardens to the Avantidrome, has recently started construction as at September 2019, and is due for completion in 2021.⁸
- 5.62 I note that the ‘Avantidrome’ section currently carries more than 70,000 users per year according to recent figures from the Te Awa River Ride Charitable Trust, whereas the ‘Ngāruawāhia’ section has averaged 184 users per day (67,000 per year) since the Perry Bridge opened at Ngāruawāhia Golf Course in late 2017. The majority of users are likely to be locals and commuters, but there will be some tourists as well, especially once the ride is complete and marketed to a greater extent. I am not aware of any economic evaluation on the Te Awa River Ride to date.

Tourism Effects of PPC2

- 5.63 Section 7.0 of the RCG report evaluates the economic effects of Te Awa Lakes’ tourism offering.
- 5.64 It notes that the Te Awa Lakes Adventure Park will be a unique facility, and a ‘gateway’ attraction for the Waikato, providing new activities and facilities for the region, including the potential for:
- a) Water sport and recreation activities, such as cable tow skiing and wakeboarding.
 - b) Adventure courses, such as high-ropes, climbing frames and zip-lines.

⁸ <https://www.stuff.co.nz/national/116189975/the-hamilton-section-of-te-awa-cycle-way-underway>

- c) Other recreational activities such as electric go-karting and mini-golf, alongside the already existing Perry Bike Park and the strong links to existing cycle tourism in the Region as referred to above.
- 5.65 Section 7.14 of the RCG report refers to the Adventure Park making an economic contribution in several ways: new 'day' and 'overnight' visitors to Hamilton, as well as longer stays by visitors who were already planning on coming.
- 5.66 The report continues that "Hamilton residents will be important customers for the Adventure Park, but they are not 'visitors' in the tourism sense. Local residents are generally excluded in studies of economic effects, as most of the money they spend is essentially being redistributed from elsewhere in the area... put simply, the economic value of the Adventure Park comes from more tourists to Hamilton (and the Waikato), staying longer".
- 5.67 As such, "accommodation is key to helping the Adventure Park achieve maximum economic impact" (section 7.16 of the RCG report).
- 5.68 Noting that Hamilton residents are not included in tourism calculations, the RCG report finds that "the total increase in spending [in Hamilton]... is a total assumed spending boost of \$3.7 million a year, which we believe to be a very conservative estimate of the tourism impact from the adventure park".
- 5.69 I understand that the tourism benefits of this plan change proposal have been challenged by some submitters, including Fonterra's expert, Mr Mike Copeland. I address those questions later in my evidence in relation to the expert caucusing I participated in, but for now I confirm that consider the tourism impacts to have been appropriately estimated in the RCG report, and (given its inherent conservatism) that they may even be greater than what is provided in the report. I also touch on the section 42A report writer's response later in my evidence, which is supportive of my view of the proposed tourism impacts of the proposal.
- 5.70 The report finds that a potential 190,000 guest nights in Te Awa Lakes' 400 accommodation units could "yield \$34.2 million in spending", and although "not all of this spending will be 'new to the region'... the 'net' increase in spending is likely to be significant".

- 5.71 The RCG report also considers a potential ‘cost’, which is that the PPC2 accommodation offering could compete with the CBD or slow future development there.
- 5.72 Noting the benefits and costs identified above, I concluded that “accommodation at Te Awa Lakes will not compete with the Hamilton CBD to a large extent... [and] the overall economic effects of accommodation units at Te Awa Lakes will be positive” (sections 7.26-7.27).

Retail

- 5.73 Te Awa Lakes is proposed to contain up to 2,500 sqm of retail activity, with shops of less than 150 sqm as a permitted activity (in line with existing Business 6 zones).
- 5.74 Section 8.0 of the RCG report outlines retail demand at Te Awa Lakes, arising from household and business activity.
- 5.75 Business 6 zones in Hamilton are Neighbourhood Centres, intended to “provide services and health-care services capable of meeting the day-to-day needs of their immediate neighbourhoods”. I consider that the proposed retail offering at Te Awa Lakes is consistent with a neighbourhood centre offering, and will fill a similar role in the centres network.
- 5.76 Paragraph 8.32 of the RCG report outlines the positive effects of including retail within PPC2: “residents will be able to satisfy some of their everyday needs locally, without needing to drive to a more distant centre. Visitors will also be more likely to spend, as they can access some shops and services where they are staying. This will be an economic injection for Hamilton”.
- 5.77 I consider that Te Awa Lakes will have similar levels of access to retail shopping as other greenfields nodes in Hamilton – in particular, being close to the major offerings in Te Rapa/ The Base.
- 5.78 The RCG report considers the potential for adverse effects on other centres as a result of the proposed retail offering at Te Awa Lakes. It outlines the Centre Assessment Report methodology from the District Plan, but as stated at paragraph 8.25 of the report, I do not believe a Centre Assessment Report is required for Te Awa Lakes due to the relatively small size of the offering, and the large size of nearby centres (i.e. The Base

and Te Rapa). “Retail activities above the proposed 2,500 m2 cap should be subject to such a report”.

5.79 The RCG report concludes that “there is a negligible chance of Te Awa Lakes having significant adverse effects on The Base or any other centre” and that “providing for 2,500 sqm of retail in Te Awa Lakes will promote sustainable and efficient outcomes”.

5.80 As noted in paragraph 9.57 of the RCG report, Property Economics also found in their peer review that “this level of retail provision is unlikely to have an impact on existing centres”

Response to Peer Review, and Conclusions

5.81 Section 9.0 of the RCG report responds to a peer review by Property Economics – they had reviewed an earlier (May 2017) version of the RCG report. The matters raised by Property Economics in their review have been adequately addressed within the final version of the RCG report dated October 2017, and the later analyses undertaken by Market Economics in their NPS-UDC studies.

5.82 In section 10.0 of the RCG report, I set out my conclusions, namely and in the summary that:

- a) There are no adverse economic effects on industrial land supply as a result of the proposed rezoning through PPC2. I note that this has been confirmed through the further work undertaken by Dr Fairgray on behalf of the Applicant.
- b) The proposed Adventure Park Precinct will provide a gateway destination at the northern entrance to Hamilton City and could result in at least \$3.7 million in additional tourism spending per annum (on a conservative estimate). If not developed at Te Awa Lakes, it would be unlikely to locate elsewhere in Hamilton, and would most likely simply not establish, with a loss of economic opportunity for the city as a result.
- c) The Adventure Park will also catalyse other tourism-related activity: visitor accommodation, F&B and related services. These activities are complementary and will help to support each other’s success.

- d) Accommodation at Te Awa Lakes will increase the total number of guest nights in Hamilton and provide other tourism benefits for the sub-region. The report considers the potential for effects on the CBD, but concludes that the net effects of the accommodation offering are positive.
- e) The potential for adverse effects on existing centres from the retail activity proposed under PPC2 is negligible.
- f) Te Awa Lakes is well situated for its proposed residential uses, can be developed quickly, and will provide important and likely attractive additional housing supply, including an affordable housing component through PPC2.

5.83 I confirm that those conclusions remain valid today, and I reaffirm the key conclusion “that the Te Awa Lakes plan change will have positive economic effects and that it should be supported”.

6. EXPERT CAUCUSING

6.1 I attended facilitated expert caucusing on economic/ strategic issues on 2nd-3rd October 2019 and refer to the joint witness statement signed at the conclusion of that caucusing (I refer to this as the “Joint Statement” below). A number of matters were agreed as a result of that caucusing and I do not comment further on them below.

6.2 The following matters were not agreed between myself and Fonterra’s expert economist, Mr Copeland, at the expert caucusing:

- a) *The “economic effect/cost of the establishment of residential activities on the surrounding industrial zoned land”*
- b) *The “capacity of heavy industrial land supply vs light industrial land supply”*
- c) *The degree to which, if industrial/ residential capacity is “sufficient”, whether PPC2 would improve overall development outcomes or simply shift development from one location to another.*
- d) *The size of tourism economic benefits.*

6.3 I refer to matters a) through d) in more detail below.

Economic Effects/Cost of Residential Activities on Nearby Industrial Land

- 6.4 In my view, there are three types of possible externality effects which could be considered, in terms of PPC2's effects on nearby industrial land.
- 6.5 The first is a possible reduction in agglomeration benefits in the Te Rapa North/ Horotiu area. I discuss this in sections 9.8-9.29 of the RCG report, and Dr Fairgray discusses the issue in more detail in his evidence. I agree with Dr Fairgray that any activity 'lost' to this particular site would be likely to locate elsewhere in the nodes, or in other nodes around Hamilton with similar potential for agglomeration benefits.
- 6.6 I also note that, if the PPC2 land cannot be viably developed for industrial, then there will be no difference in agglomeration benefits with or without PPC2.
- 6.7 A second possible effect is that PPC2 would slow the uptake of other industrial zoned sites in the Te Rapa North/ Horotiu nodes, most of which are currently undeveloped.
- 6.8 In my view, this is unlikely. These nodes remain a 'strategic' location, with good access to the expressway (and on the Horotiu side, the railway lines) As per below, most modern industrial uses are 'light' rather than 'heavy' and can operate successfully close to residential uses.
- 6.9 A third possible effect is that of reverse sensitivity, e.g. in terms of Fonterra's existing or potential future operations.
- 6.10 On this matter, I note the section 42A report which finds that the proposed measures through PPC2 will be efficient and effective in mitigating any reverse sensitivity effects.
- 6.11 I further note that the rationale for treating reverse sensitivity as an economic effect is dubious,⁹ and the issue is better considered as a planning effect (as required under the Waikato RPS) and by technical experts.
- 6.12 On the whole, I conclude that PPC2 will not have negative economic externality effects on nearby industrial land.

⁹ See, for example, <http://www.nzlii.org/nz/journals/CanterLawRw/2006/1.html>

Heavy industrial vs light industrial capacity and supply

- 6.13 To my knowledge, few studies have distinguished between heavy and light industrial uses. However, a 2015 report by BERL found that “the price per hectare of heavy industrial land [remained] fairly stable [over 1997-2012] while that of light industry and warehousing and distribution has grown markedly”.¹⁰
- 6.14 The BERL report also found that “the amount of industrial land used for heavy industry” was 2,950 hectares in 1997, 3,000 hectares in 2006, “and has remained largely unchanged since”, although there was an increase in 2002-2004 which BERL suggest may have been due to a classification change. However, ‘light’ industrial land use increased from 750 hectares to 1,600 hectares between 1997 and 2012.
- 6.15 This suggests that over the 15 years to 2012, almost all uptake of industrial land was for ‘light’ rather than ‘heavy’ uses. In my view, this broad pattern is likely to continue, and reflects ongoing growth in such sectors as wholesaling and logistics, more so than for heavy manufacturing and the like.

Increasing/ Improving Development Outcomes vs Reallocating Them

- 6.16 I disagree with Mr Copeland’s statement at paragraph 25 of the Joint Statement. Even when there is “sufficient” development capacity, enabling more capacity can lead to (at least some) additional development, as per my statement at paragraph 27 of the Joint Statement.
- 6.17 This is standard economic theory; development is not a zero-sum game. It is equally relevant for housing, industrial or any other kind of land use.
- 6.18 As explicitly recognised in the NPS-UDC, providing for competition can mean more choice, in locations, typologies and price points. PPC2 could mean slightly more homes are built across the sub-region; and/ or at slightly lower prices; and/ or types or locational attributes that might not otherwise have been available. This is a positive effect.

¹⁰ Upper North Island Industrial Land Demand, BERL, February 2015 at ii.

- 6.19 Price alone can be a sufficient driver to tip the scale towards more homes in total. Prices affect how and where people decide to live, whether they need to have flatmates or extended family in order to afford a home (to rent or buy), etc.
- 6.20 Although PPC2 is likely to lead to some additional and / or more affordable housing, in my view, it is still important to consider whether this might be an inefficient outcome – that is, whether any ‘negative’ effects might result.
- 6.21 Negative effects could include transport externalities – e.g. Te Awa Lakes being more car-dependent than other growth nodes, leading to more congestion and emissions and a less efficient active/ public transport network.
- 6.22 These issues are addressed in more detail by transport experts, but seem to be best summarised in the Statement of Evidence of Mr Alisdair Gray dated 13 October 2019, paragraphs 30-31. Mr Gray finds that “without effective mitigation, the likely outcome is... a small but cumulative adverse impact”, but that “this is not the worst place” for “discrete areas of residential development around Hamilton’s boundaries”. Looking at both development in Hamilton City and the surrounding Waikato District, I would see Te Awa Lakes as having a similar level of car dependence and therefore very minor transport economic externalities.
- 6.23 Another potential negative effect is inefficient or underutilised infrastructure investment. This issue is canvassed in detail in the Statement of Evidence of Mr Luke O’Dwyer dated 14 October 2019, paragraphs 172-182. He finds that the modelled results of PPC2 “are not material in terms of undermining the HUGS settlement pattern with respect to sequencing and timing of other residential areas”, and “that the infrastructure investments made by the City would continue to generate public value and not be undermined by the PPC”.
- 6.24 The evidence cited above gives me further confidence that any negative effects of housing at Te Awa Lakes will be minor, and that the ‘net’ effects will be positive.

Tourism Economic Effects

- 6.25 Mr Copeland has expressed a view that the tourism benefits of Te Awa Lakes are likely to be overstated.

- 6.26 The RCG report draws from as many data sources as possible in making its conclusions on tourism effects. This includes visitation figures for Waikato attractions, guest night and spending statistics, national-level tourism data from Stats NZ which provides the definitive source of tourism's economic impact, etc.
- 6.27 The RCG report sets these matters out in detail, especially in sections 9.40 - 9.52.
- 6.28 I have also focused on direct tourism effects, and looked at the Hamilton City/ Waikato sub-region level.
- 6.29 In my opinion, it is appropriate to take a sub-regional view for Te Awa Lakes, as visitation from Aucklanders (for example) will add to economic activity in the Waikato, and as the plan change is being assessed at a district planning level.
- 6.30 There are two aspects to the tourism offering at Te Awa Lakes: the Adventure Park, and the visitor accommodation. The Adventure Park would be a new attraction for the sub-region, whereas the visitor accommodation would add to the region's capacity (while providing an offering different to what could be found in other sub-region locations). These two aspects are of course complementary, but I have looked at their effects separately.
- 6.31 There have been several 'adventure parks' proposed in New Zealand in recent years, albeit most of these have been mountain biking facilities with very different offerings from Te Awa Lakes. I set out below a number of examples:
- a) One proposed park was in Porirua, and an economic report was prepared by MartinJenkins with visitor projections provided by the proposed operator of the park.¹¹ The park was "expected to have just over 337,000 uses in its third full year of operation", with 40,900 of those coming from "rest of NZ/ international" visitors outside the Wellington urban area. MartinJenkins found that the park would have a direct economic impact of \$5.1 million for the Wellington urban area's GDP. Since the park has not yet opened, it is not possible to verify these figures.

¹¹ "Economic Impact Assessment of Porirua Adventure Park", MartinJenkins, 25 July 2018. Available at https://porirua.govt.nz/documents/1820/Porirua_Adventure_Park_-_Economic_Assessment_Report.pdf

b) Christchurch Adventure Park, on the other hand, opened in December 2016 but was severely damaged by the Port Hills fires of February 2017. The park was closed for 10 months and continues to be affected by the aftermath of the fires. This makes it difficult to draw any comparisons from the park's brief history so far.

6.32 The Rotorua Attractions & Activities Monitor is a long-running survey of Rotorua's major tourism businesses, including 13 major 'attractions' and 12 smaller 'activities'. In the year to July 2019, the major attractions had 3.25 million visitors or 250,400 each on average, and the smaller activities had 162,000 visitors or 13,500 each.¹² 70% of visitors were international, although this reflects Rotorua's status as an international tourism hub.

6.33 These examples, and those others outlined in the RCG report (other key Waikato attractions being Hobbiton and Waitomo Caves), support my view of the tourism economic benefits of PPC2. I have been careful to rely on local, relevant and accurate data wherever possible.

6.34 I have also estimated spending for tourists who stay at the Te Awa Lakes visitor accommodation, but have not treated that as an 'economic effects' figure, as I note that much of that spending would be reallocated from, or take place, elsewhere in the sub-region. I also note that the PPC2 accommodation offering will compete to the CBD to a (limited) extent).

6.35 My finding on PPC2 accommodation is that it will have a 'net positive' effect, acknowledging the potential for some limited negative effects on the CBD.

6.36 Lastly, I note that Te Waka, the new Waikato economic development agency, is looking closely at tourism development, and a number of Waikato tourism operators (including Hamilton and Waikato Tourism, Hampton Downs Motorsport Park, Waitomo Adventures Ltd and Hobbiton Movie Set) have submitted in support of PPC2. This suggests that the tourism industry expects there to be benefits from the Te Awa Lakes tourism offering which may have wider significance for the sub-region and region.

¹²[https://www.rotoruanz.com/RNZ/media/MediaLibrary/Business/Do%20Business/Research%20and%20Statistics/RAAMSummary.p
df](https://www.rotoruanz.com/RNZ/media/MediaLibrary/Business/Do%20Business/Research%20and%20Statistics/RAAMSummary.pdf)

7. COMMENTS ON THE SECTION 42A REPORT

- 7.1 As identified in the section 42A report, PPC2 could have a variety of potential effects. In terms of economic effects, I have considered the points raised in paragraphs 2.19 and 2.21 (which summarise the submissions received on PPC2), 3.5, 4.9 and 4.10 of the report.
- 7.2 The section 42A report states at paragraph 3.5 that “the positive effects of the plan change include; enhanced recreational use of the Waikato River and site, economic benefits of the adventure park and associated visitor accommodation in terms of further employment and economic growth, and economic and social effects associated with increasing the potential housing supply and availability in Hamilton”. I agree with this summary.
- 7.3 I agree with paragraph 4.9 that “the loss of the industrial land capacity from the site will not create or contribute to a shortage of industrial land”. Both my own work and Dr Fairgray’s support this view.
- 7.4 I also agree with paragraph 4.10 that “while the additional residential capacity supplied by PC2 can be regarded as a positive, it is not required to allow Hamilton City to meet its residential capacity obligations under the NPS-UDC”.
- 7.5 Even though Hamilton and the sub-region has ‘sufficient’ feasible residential capacity, adding more can still be a good thing. The NPS-UDC states that “competition is important for land and development markets because supply will meet demand at a lower price when there is competition... [with] plenty of opportunities for development”.
- 7.6 The NPS-UDC is supportive of competition, notes the importance of price, and that people will trade off different types, locations and price points of dwellings “to meet their own needs and preferences”.

8. COMMENTS ON SUBMISSIONS

- 8.1 Waikato Regional Council (submission 41) note concern that the Assessment of Economic Effects “does not adequately address... the impact of the commercial aspects of the proposal on other commercial centres (RPS Policy 6.16)”.

- 8.2 In my view, these effects have been considered through the RCG report, the Property Economics peer review and in my statement of evidence. The size of the centre proposed in PPC2 means it will not have any economic effects on the larger centres identified in Table 6-4 of the RPS.
- 8.3 Hamilton City Council (submission 47) queries “the effects, costs and benefits of a TAL hotel on the City’s visitor accommodation objectives, policies and overlay, the business hierarchy and particularly the Central City as reflected in the ODP”.
- 8.4 Economic effects relating to PPC2’s accommodation offering are discussed in sections 7.22-7.27 and 9.46-9.51 of the RCG report. Although I noted the potential for some competition with the CBD, I concluded that the ‘net’ benefits of the accommodation offering would be positive. In their peer review, Property Economics also noted that PPC2 “accommodation is unlikely to significantly compete with CBD commercial accommodation”.
- 8.5 Hamilton City Council also asks: “the Neighbourhood Centre is of such a scale as to be a suburban centre in terms of the ODP Business Hierarchy. What are the costs and benefits of such a proposal?” From a retail perspective, the scale of the proposed offering falls squarely within the Neighbourhood Centre definition, not the Suburban Centre one. Furthermore, Te Awa Lakes’ ability to cater for a mixed catchment which could include tourists and Adventure Park visitors, and passing traffic along the Waikato Expressway (as per the existing motorway service centre) reduces the potential for effects on other centres.
- 8.6 Fonterra (submission 46) raise several points under the heading “Economic” (paragraphs 5.14-5.16 of their original submission). In my view, these points have been addressed through work undertaken by myself or other experts.

9. CONCLUSION

- 9.1 The history of the Te Awa Lakes site, and how it came to the current zoning, is largely irrelevant for purposes of assessing the economic effects of PPC2.
- 9.2 The RCG report of October 2017 found that the site was unlikely to be required for industrial purposes; had some site-specific attributes which could be attractive for residential purposes; and that PPC2 would also enable a range of tourism economic benefits. It concluded that the overall economic effects of PPC2 would be positive.
- 9.3 Under PPC2, Te Awa Lakes is likely to be developed for a mix of uses, including housing, an adventure park and accommodation.
- 9.4 The housing offering will promote competition in the development market, and between different locations, types and price points of homes. This is a positive economic effect, and the effects will remain net positive, given that any negatives (e.g. transport or infrastructure externalities) will be minor.
- 9.5 Potential effects on industrial neighbours (developed or otherwise) should be considered, but only to the extent that they constitute real economic externalities. As outlined in my evidence above, I do not believe that there will be any such effects on the industrial land nearby.
- 9.6 The adventure park will offer something new for the Waikato, and as per the RCG report, I see its effects as “unambiguously positive”.
- 9.7 The accommodation offering will also add something new in the context of the Waikato’s existing capacity, and given Te Awa Lakes’ location, “it will appeal to regional visitors who are in the region to visit Matamata, Waitomo etc”. I see this as also having ‘net’ positive economic effects.
- 9.8 In conclusion, I believe that PPC2 will have positive economic effects for Hamilton and the Waikato sub-region.

John Daniell Polkinghorne

29 October 2019