BEFORE THE HEARING PANEL IN FAR NORTH DISTRICT

IN THE MATTER of the Resource Management Act 1991

AND

IN THE MATTER of the hearing of submissions in relation to the Proposed Far North District Plan

STATEMENT OF PRIMARY EVIDENCE OF LAWRENCE MCILRATH ON BEHALF OF FAR NORTH DISTRICT COUNCIL

ECONOMICS

Dated: 23 June 2025

TABLE OF CONTENTS

XECUTIVE SUMMARY	1
NTRODUCTION	8
POPULATION AND GROWTH PROJECTIONS.	10
CAPACITY AND COMMERCIAL FEASIBILITY ANALYSIS	14
COMMERCIAL AND EMPLOYMENT CENTRE	19
MPLOYMENT AND GDP ANALYSIS	25
TATEMENT OF EVIDENCE AND KERIKERI-WAIPAPA AS AN URBAN AREA	<mark>۱</mark> 28
OTHER COMMENTS	33
CONCLUSION	34

EXECUTIVE SUMMARY

- 1. My full name is Lawrence Ryan McIlrath. I have 20 years consulting experience working in both the private and public sectors. I specialise in market assessments, demand and supply analysis, sectoral analysis, and urban economic analysis. I have assisted several councils, including the Far North District Council, with their Housing and Business Capacity Assessments and other workstreams associated with the National Policy Statement on Urban Development (NPS-UD).
- I have been asked to review the Mr Thompson's economic report¹ and statement of evidence² that he prepared in support of Kiwi Fresh Orange Company Limited's submission.
- 3. My evidence covers five key areas of Mr Thompson's report and evidence.

The population growth projections.

- 4. Mr Thompson presents his population projections for the Kerikeri-Waipapa area in his report³ and in his evidence⁴. His population projections are considerably greater than StatsNZ and Infometrics' projections. He suggests that higher migration would lift the population growth.
- 5. I considered historic⁵ migration patterns and I estimate the change in migration that is needed to return the growth that Mr Thompson projects.
- 6. While somewhat dated, official information support the notion that migration is a key driver of the Far North's growth. My analysis shows that if fertility and mortality rates remain stable, then migration (to the Far North) would need to increase by a factor of 2.7 to achieve Mr Thompson's projections. At these rates, the Far North will capture more of Auckland's migration than Hamilton, Wellington, or Christchurch.
- 7. Further, projecting the aggressive growth rate to 2053 will see the Far North have a population approaching that seen in Lower Hutt City (114,000) and Dunedin City (134,600).

¹ Urban Economics report, prepared by Mr Thompson and submitted as part of Kiwi Fresh Orange Company Limited's submission (submission #554).

² Statement of Evidence of Mr Thompson on behalf of Kiwi Fresh Orange Company Limited

³ Section 3.3, page 20 of the UE report

⁴ Para 14 - 28

⁵ I used Census 2013 and Census 2018.

- 8. The scale of migration that is needed to achieve Mr Thompson's population growth is in my opinion unrealistic. Using the high population projections flow through his wider analysis.
- 9. I note that Mr Thompson updated his population projection in his evidence. He also updated the comparators he uses (StatsNZ and Infometrics). All projection sets are higher than those presented in his 2022 report. However, Mr Thompson takes an even more aggressive growth pathway with the updated projections showing an even steeper growth curve. Apart from the reference to strong international migration, Mr Thompson does not provide other reasons for the high(er) growth.
- 10. The observed patterns do not support the scale of migration driven growth that Mr Thompson presents. While migration is at historic highs, the national trend is clearly downwards. It is difficult to see the type of migration Mr Thompson suggests occurring.

Commercial feasibility assessment.

- 11. The capacity modelling associated with the NPS-UD normally starts with estimating Plan Enabled Capacity (PEC). PEC shows the theoretical maximum capacity and is a key input into estimating Commercially Feasible Capacity (CFC), and Realistically Expected to be Realised (RER) capacity.
- Mr Thompson outlines his approach. It appears that he reduces CFC by 50% to reflect the RER component. The basis for disqualifying half of commercially feasible options is not explained.
- I have reviewed the examples Mr Thompson lists with a view to replicate his calculations. Using the profit margin as metric, I can only replicate four of his forty calculations to within 5%.
- 14. I believe that there are several issues with how Mr Thompson estimates feasibility that undermines his results. The issues relate to the standard metrics (same values) he applies to his examples, the application of company tax, and ignoring temporal effects.
- 15. While there is no specific guidance under the NPS-UD regarding assessing commercial feasibility, Mr Thompson's approach is inconsistent with that

used by other councils around New Zealand as well as guidance issued under the National Policy Statement on Urban Development Capacity.

16. These inconsistencies undermine the robustness of Mr Thompson's approach. In my view, Mr Thompson's approach is likely to misstate the overall feasible capacity.

Commercial and employment centre

- 17. As part of assessing the economic effects of the proposed development, Mr Thompson considers the demand for additional commercial and employment land⁶. It appears that he reports the cumulative position, not the net change after accounting for existing supply. He basis his views on his population projections (which are too high in my view) which underpin his demand projections.
- 18. He uses a set of assumptions about the share of demand from subareas/catchments that will be captured by the proposed centre. He does not outline his supporting analysis for these assumptions. These shares suggest that a portion of demand (current and future) will be diverted away from existing centres. Establishing the proposed retail area will divert a quarter (24%) of demand (2022) away from the existing retail centres. Based on Mr Thompson's estimates⁷, this share will increase increases over time as growth occurs, rising to 33% by 2042.
- 19. Based on the data in Mr Thompson's assumptions and analysis, demand will be diverted from the existing centres. Regardless, Mr Thompson asserts that the centre would not adversely compete with existing centres.
- 20. Mr Thompson outlines several other components that will be included in the proposed development. These include an area for Large Format Retailing (LFR), light industrial as well as other activities. He does not assess the economic effects of these components and he does not offer any further analysis of these large land uses.
- 21. Mr Thompson assesses the retirement village and hotel and tourism accommodation sectors.
- 22. With reference to the retirement village, the assumptions Mr Thompson used do not align with industry standards. Using data published by the Retirement

⁶ Section 7 on page 37.

⁷ Data in Figure 36 on page 38.

Village Association suggests that Mr Thompson's analysis misstates the current situation and growth profile.

- 23. In terms of the proposed hotel, Mr Thompson's analysis contains several critical errors. It appears he applies regional data to the district level, and it also appears that he does not adjust 'whole of sector' data to isolate the 'hotel'-data.
- 24. The envisaged hotel will add between 80 and 120 rooms this scale is similar to that observed in Paihia, but greater than Kerikeri-Waipapa areas where the average size is 13.8 rooms per establishment. Adding 80-120 rooms to the existing market will increase annual capacity to 84,700 and 99,280 stay units (rooms per night per year).
- 25. I estimate the implied demand for rooms based on average occupancy rates (29%) and occupied units. Adding the proposed hotel will lower occupancy rates across the rest of the market to between 15% and 18% - down from circa 29%.

Employment and GDP Analysis

- 26. Mr Thompson includes an analysis of the GDP⁸ and employment impacts associated with the construction and ongoing phases of the proposed development. Mr Thompson applies New Zealand-wide ratios to estimate the impacts. Applying national ratios in the Far North is inappropriate because:
 - (a) The Far North's economic structure does not mirror the New Zealand economy,
 - (b) Interregional imports and exports are not captured.
- 27. From a methodological perspective, an economic assessment must reflect the counterfactual - if a change would have occurred regardless of the proposal, then it should be excluded from the assessment.
- 28. Mr Thompson assumes that half (50%) of the effects are attributed to the proposed development i.e., these effects would not be achieved/materialise without the proposed development. While methodologically appropriate, the 50% appears subjective and he does not explain his rationale for use this share. The anticipated growth could be accommodated elsewhere; thus the

⁸ MR Thompson uses Value Added and GDP. The technical difference relates to how some taxes are treated, but at a practical level the differences are minor.

economic impacts are associated with the growth, not the proposed development.

- 29. Mr Thompson uses the employment and GDP effects and frames these as benefits. GDP is a measure of economic production. GDP it includes items such as salary and wages, and consumption of fixed capital. These items are costs to a business. The salaries and wages are a benefit to workers meaning that in economic terms, these are transfers.
- 30. Changes in GDP are often used to illustrate the scale of change, and to argue the benefits of a larger economy. However simply equating GDP to benefits is not fitting⁹.
- 31. Other issues with Mr Thompson's analysis include:
 - (a) An apparent lack of financing costs.
 - (b) Rates are treated as a benefit. Rates are a cost to households and a revenue source for Councils. It is unclear why Mr Thompson treats it as a benefit. Including it overstates the benefits.
 - (c) The opportunity cost associated with agriculture is captured in the analysis. This is appropriate. However, it appears that opportunity costs are not adjusted to reflect staging.
 - (d) A 4% discount rate is used. Treasury's current guidance is to use a 5% discount rate. Using this default rate lowers Mr Thompson's results by 15%. Mr Thompson does not provide a motivation for using a 4% discount rate.
- 32. In my view, the GDP and employment contribution section in Mr Thompson's report has several issues that undermines its usefulness. The key benefits of the proposal, providing accommodation, can also be achieved through developing other sites, or via intensification. To appreciate the economic effects (in terms of GDP and employment) of the proposed development it needs to be considered against those alternatives.

Kerikeri-Waipapa as an urban area

33. Mr Thompson provides his views about the Kerikeri-Waipapa area and if it satisfies the criteria outlined in the National Policy Statement on Urban

⁹ GDP can be deconstructed into its component parts to aid in understanding the costs and benefits (not only the benefits).

Development (NPS-UD) regarding 'urban environments'. According to the NPS-UD, an urban environment means any area of land (regardless of size, and irrespective of local authority or statistical boundaries) that:

- (a) is, or is intended to be, predominantly urban in character; and
- (b) is, or is intended to be, part of a housing and labour market of at least 10,000 people.
- 34. The population-based criterion is relatively straightforward. Mr Thompson draws on his population projections and shows that the sources/population projections estimate the current population at 9,200 people in the Kerikeri-Waipapa area below the 10,000 threshold.
- 35. The population projections¹⁰ show that over the next decade, the population will growth to between 10,100 and 11,000. Mr Thompson projections put the population at between 14,000 and 16,000. As already mentioned, I consider Mr Thompson's projections as aggressive.
- 36. In addition to the population estimates, Mr Thompson include people working in the surrounding areas (which he does not specific) and adds these individuals to his population estimates for the Kerikeri-Waipapa area. However, for this approach to be consistent, people commuting out of Kerikeri-Waipapa should also be considered. It appears Mr Thompson does not make such as adjustment.
- 37. Currently, the Kerikeri-Waipapa area does not meet the 10,000 people threshold. In my view, the location is likely to meet the threshold in the next 10-15 years.
- 38. The second criterion is about the character of an area. I note that defining and evaluating 'character' is outside my field of economic expertise. I have reviewed Mr Thompson's evidence where it is within my expertise, and from an economic perspective.
- Mr Thompson analyses the large lot residential properties surrounding Kerikeri and Waipapa¹¹. He uses sample to illustrate his views. I note:
 - (a) The sample is too small to be representative and I have concerns about how the sample was selected,

¹⁰ StatsNZ and Infometrics as reported by Mr Thomspson.

¹¹ Para 48 to 51 of his EIC.

- (b) Mr Thompson focuses on the example sites but ignores the surrounding lots, or the spatial context,
- (c) Mr Thompson asserts that the Rural Residential properties surrounding Kerikeri-Waipapa are 'almost entirely residential, with practically no rural activities occurring'. This statement is difficult to reconcile once the spatial context is considered.
- (d) Mr Thompson did not assess other metrics, such as employment or business counts, to enrich his analysis. StatsNZ data shows that there is indeed rural-economy employment in the zone – 3% of the district agriculture employment is in the Rural Residential Zone.
- 40. Mr Thompson comments that his assessment shows that the land use <u>function</u> [Emphasis added] is residential, not rural. This is, in my view, a moot point. Houses provide a residential function, but fulfilling a residential <u>function</u> does not mean that a location has an urban <u>character</u>.
- 41. In my view, the way Mr Thompson's frames and undertakes his assessment of the residential function is misguided and his sampling is likely to introduce bias. Regardless, his emphasis on the residential <u>function</u> does not provide insight relating to the NPS-UD criterion relating to with the urban <u>character</u>.

INTRODUCTION

- 42. My full name is Lawrence Ryan McIlrath.
- 43. I have 20 years consulting experience working in both the private and public sectors. I have worked on numerous projects assessing and evaluating the financial and market aspects of projects, policies, and investment programmes. Most of these assessments reflected the interplays between and spatial distribution of market segments.
- 44. I have a BA et Sc (Planning), majoring in Economics from the Potchefstroom University of Christian Higher Education (South Africa), as well as a Master of Business Administration from North-West University (South Africa). I am a Director of Market Economics Ltd (M.E), an independent research consultancy.
- 45. I specialise in market assessments, demand and supply analysis, sectoral analysis, and urban economic analysis. My work includes assessing sectoral structures and interactions, over time and across locations, scenario assessment and growth modelling, as well as evaluating the implications of different growth pathways on market segments. I have applied these skills across many sectors and locations around New Zealand.
- 46. I have been involved in preparing Housing and Business Land Assessments ("HBAs") for a numbers of growth Councils under the National Policy Statement on Urban Development Capacity (NPS-UDC) and National Policy Statement on Urban Development (NPS-UD). These assessments included demand and supply analysis associated with local economies, their growth drivers, and outlooks. I have assisted the following councils with their HBAs and associated workstreams:
 - (a) Far North District Council
 - (b) SmartGrowth (Tauranga City Council and Western Bay of Plenty)
 - (c) Waipā District Council
 - (d) Nelson City Council
 - (e) Napier City Council, Hastings District Council
 - (f) Queenstown-Lakes District Council.

- 47. In preparing this evidence I have:
 - Reviewed the Urban Economics report, prepared by Mr Thompson and submitted as part of Kiwi Fresh Orange Company Limited's submission (submission #554).
 - (b) Reviewed the Statement of Evidence of Mr Thompson on behalf of Kiwi Fresh Orange Company Limited.

Code of conduct

48. While this is a Council hearing, I have read the Code of Conduct for Expert Witnesses (contained in the 2023 Practice Note) and agree to comply with it. Except where I state I rely on the evidence of another person, I confirm that the issues addressed in this statement of 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 my expressed opinions.

Scope of evidence

- 49. I have been asked to review the economic assessment associated with Kiwi Fresh Orange Company Limited's submission. My scope of evidence addresses Mr Thompson's analysis as presented in:
 - (a) Mr Thompson's report that is attached to Kiwi Fresh Orange Company Limited's submission (submission #554). Mr Thompson's report is attached as Supporting export report (labelled viii), and it starts on page 454 of the submission. The report is dated 19 October 2022.
 - (b) Mr Thompson's statement of evidence ('statement' or 'evidence') on behalf of Kiwi Fresh Orange Company Limited (13 May 2024).
- 50. My statement of evidence addresses the following matters in Mr Thompson's report and evidence:
 - (a) The population growth projections.
 - (b) Commercial feasibility assessment.
 - (c) Commercial and employment centre analysis.
 - (d) Employment and GDP impact assessment, and his assessment of the economic costs and benefits.

- (e) Mr Thompson's views about the Kerikeri-Waipapa area as an urban environment.
- 51. I address each of these points in my evidence below.

POPULATION AND GROWTH PROJECTIONS.

- 52. Mr Thompson presents his population projections for the Kerikeri-Waipapa area in his report¹² and in his evidence¹³. His population projections are considerably greater than StatsNZ and Infometrics' projections.
- 53. Mr Thompson asserts that the population projections prepared by StatsNZ and Infometrics are too pessimistic and do not reflect the demand patterns that could be expected. He identifies migration as key driver of population growth going forward and states that high migration rates will be achieved on the back of comparatively more affordable housing and lifestyle factors favouring the Far North.
- 54. He points to a survey of Aucklanders that was commissioned by Urban Economics (UE). That survey found that 55% of Aucklanders are considering relocating out of Auckland with the main reasons being mortgage costs, lifestyle, and traffic. Based on the UE survey, 960,000 Aucklanders are considering relocating.
- 55. Unfortunately, Mr Thompson does not provide any detail about the survey meaning that it is difficult to comment on the survey's applicability to the Far North situation. The following type of information would have been helpful in gauging technical suitability and representativeness of the survey, and how to appropriately apply or interpret it in the Far North context:
 - (a) sample size,
 - (b) dates when sampling occurred and when the survey was undertaken,
 - (c) demographic attributes of respondents (age, household size),
 - (d) employment/occupation status,
 - (e) location in Auckland,

¹² Section 3.3, page 20 of the UE report ¹³ Para 14 - 28

- (f) current homeownership status, and
- (g) income levels.
- 56. As mentioned, Mr Thompson provides his own population projections. I have used M.E's Population Model to review Mr Thompson's projections and to identify the shifts in population growth drivers that are required to meet his projected population totals. Mr Thompson identified migration as a key driver, so I focus on:
 - (a) Historic migration patterns,
 - (b) The lift in migration rates that is required to achieve his population projections.

Historic migration patterns

- 57. Mr Thompson does not provide his population growth assumptions i.e., how much weight he assigns to migration (NZ or international) or natural growth (births). Instead, it appears that his projections are based on growth observed over the recent past. He also asserts that the high growth over the past 7-10 years appear to be driven by Aucklanders relocating to the Far North in response to high house prices and lifestyle choices¹⁴. The source informing this position is not listed.
- 58. There is limited (recent) information about inter-regional migration in New Zealand and I use the 2013 and 2018 Census to provide some context. I acknowledge that these datasets are somewhat dated but in the absence of more recent information releases, it remains useful. I use this information as a benchmark against which to compare Mr Thompson's analysis.
- 59. Both 2013 Census and 2018 Census provide information about where people¹⁵ lived 5 years before Census night. This information can be used to estimate interregional shifts. I use this data to:
 - (a) Identify migration's role in driving the Far North's population growth.
 - (b) Identify Auckland's potential role as source for migration (for the Far North).

 ¹⁴ Section 3.4, page 22 of UE report.
 ¹⁵ Usually resident population

- 60. The two census periods cover migration patterns over a ten-year period. The Census data confirms that migration is in fact a key source of population growth with migration (international and NZ-based) accounting for 68% and 73% of population growth in the 5 years before the 2013 and 2018 Censuses, respectively.
- 61. Migration from Auckland to the Far North accounted for between 15% and 16% of the Far North's growth¹⁶. While not insignificant, it shows that the Far North relies on other sources for growth and is not solely dependent on Auckland-based migration. Natural growth (births) accounted for between 27% and 29% of growth between 2007 and 2018.
- 62. The weight and relative importance that Mr Thompson assigns to Aucklandbased migration in the growth projections appear to be very aggressive.

Required migration to achieve UE projections

- 63. The Urban Economics report is dated October 2022 meaning that there are newer population projections than those used as benchmark in the report. Both StatsNZ and Infometrics have more recent projections. I compare Mr Thompsons' projections against the earlier StatsNZ projections as well as the more recent ones. I include M.E population projections as a third benchmark.
- 64. Mr Thompson's projections for the Far North district are significantly higher than all other projections. By 2033:
 - (a) Mr Thompson's medium projections are:
 - (i) 12% greater than Infometrics' projections (previous set and current set),
 - (ii) 11% to 16% greater than the StatsNZ projections, and
 - (iii) 11% greater than the M.E projections.
 - (b) Mr Thompsons' high projections are:
 - (i) 23% and 19% greater than the Infometrics projections (current and earlier projections),
 - (ii) 16% and 20% greater than the StatsNZ projections (December 2022 set and 2021 set, respectively), and

 $^{^{\}rm 16}$ Census information – 2013 and 2018 Census respectively.

- (iii) 16% greater than the M.E base projections.
- 65. The comparison shows that Mr Thompson's projections are greater than five other projection sets around 12% for the medium settings and 19% for the high projections.
- 66. As part of my review, I used M.E's Population Model to identify the shift in migration that is implied in Mr Thompson's projections. The M.E Population Model mirrors StatsNZ's approach and underlying assumptions. It provides an ability to evaluate population outcomes under different growth assumptions/settings.
- 67. In Mr Thompson's view, the Far North will attract a higher number of individuals from Auckland due to the change in relative attractiveness in the district. I have estimated by how much migration needs to increase to achieve the totals Mr Thompson is projecting. My analysis shows that if fertility and mortality rates remain stable, then migration (to the Far North) would need to increase by a factor of 2.7 to achieve Mr Thompson's projections.
- 68. Applying this factor to historic Auckland migration patterns suggests that the Far North will be the largest destination for Aucklanders, outperforming large cities such as Tauranga, Hamilton, Wellington, and Christchurch.
- 69. Extending the period to 2053 and applying Mr Thompson's assumed migration rates returns the following population numbers for the Far North:
 - (a) Medium projection 107,020,
 - (b) High projection 133,700.
- 70. Under these assumptions, the Far North's population would approach that seen in Lower Hutt City (114,000) and Dunedin City (134,600).
- 71. While I agree with Mr Thompson that lifestyle choices, and factors such as housing affordability, influence household decisions about where to live, the scale of migration that is needed to achieve his population growth is in my opinion excessive.

Historic house prices

72. A key proposition in Mr Thompson's argument is that housing affordability in the Far North, combined with lifestyle priorities, will act as key drivers

attracting migrants. House prices reflect a range of considerations, including locational factors, local amenity, local economic opportunities and employment, other amenities (e.g., access to health), and social factors. The decision to relocate to another region is influenced by how regions compare i.e., how does the Far North compare against other potential destinations such as Napier or Hastings, Cambridge, Tauranga, or Palmerston North. Housing costs is one factor that is considered when deciding to relocate to another region.

- 73. Housing costs and affordability are some of the factors, but not the only ones featuring in location decisions. Examples of the factors that are considered when evaluating locations include:
 - (a) The size of the economy, its structure, the number, and type of employment opportunities that it can support,
 - (b) Growth prospects, population growth and outlook,
 - (c) Infrastructure and regional connectivity,
 - (d) Land availability and the construction sector's ability to deliver housing,
 - (e) Life cycle and family/social considerations
 - (f) Climate considerations.
- 74. The Far North will compete against other regions for housing investment. Households consider the relativity of housing costs i.e., how house prices compare across locations and the comparison is not only Far North vs Auckland, but also Far North vs other locations vs Auckland.

CAPACITY AND COMMERCIAL FEASIBILITY ANALYSIS

- 75. Generally, the approach to estimating Plan Enabled Capacity (PEC) is uncontroversial. However, there are several nuances around Commercially Feasible Capacity (CFC) and Realistically Expected to be Realised (RER) capacity to consider in the assessment.
- 76. Mr Thompson outlines his interpretation of the approach for assessing available development capacity, and commercially feasible capacity.

- 77. In my view, CFC is a 'project level' assessment that compares the anticipated sales price of a development against the total development costs. If the sales price is greater than the total development costs plus a 20% margin, then that opportunity is deemed commercially feasible. A key factor across approaches is ensuring internal consistency. The RER capacity can be estimated using different approaches and the underlying steps can give rise to differences. My preferred approach is to use demand levels to limit how much of the supply would be developed (after accounting for affordability, housing typology preferences and temporal shifts). Mr Thompson subtracts 50% of CFC to reflect the RER component and then uses the balance to inform his market scenario. The basis for disqualifying half of commercially feasible options is not explained.
- 78. I have reviewed the examples Mr Thompson included in his assessment¹⁷ with a view to replicate his calculations. I cannot replicate his process. Using the profit margin as metric, I can only replicate four of his forty calculations to within 5%. (Appendix 1 shows my workings).
- 79. I have identified four key issues with Mr Thompson's calculations:
 - (a) Inconsistent treatment of GST.
 - (b) Using an After Tax Margin.
 - (c) Standard metrics.
 - (d) Temporal effects.

Inconsistent treatment of GST

- 80. Mr Thompson lists his sources as QV Cost Builder and CoreLogic. QV Cost Builder provides cost estimates for different construction elements. These costs rates are presented exclusive of GST. It is unclear if the construction cost rates used by Mr Thompson have been adjusted for GST. My review of the rates suggest that this is not the case.
- 81. Mr Thompson subtracts GST from the anticipated sales price. However, to be consistent, the GST component on input costs should be accounted for. Without an adjustment the resulting margins are negatively impacted (lowered).

¹⁷ Figure 54 to Figure 57 on page 58/59. BF\64392716\2

82. Using the 19 Shepard Road example (Medium size), Mr Thompson estimates the margin as 20%, but my attempts to replicate his approach suggest that the margin is closer to 13%. The following table shows my interpretation of Mr Thompson's approach:

Interpretation of Mr Thompson's approach										
Itom		Formula	19 Shepherd Road							
item		Formula	(Medium size)							
Sales price	Α		8,870,000							
Costs	В	B = (b1 + b2 + b3 + b4)	5,907,600							
Procurement cost	b1		1,020,000							
Construction	b2		3,901,500							
Development costs	b3		720,000							
Sales Commission	b4		266,100							
GST on Sales	С	A * 0.15	1,330,500							
GST on Inputs	D	B * 0.151 ¹⁸								
GST (Net)	Е	C - D	1,330,500							
Gross Profit (before company tax)	F	A - B - E	1,631,900							
Net Profit (After tax)	G	F * (1 - 28%)	1,174,968							
Net Profit Margin (After tax)	Н	F/A	13.2%							
Mr Thompson's margin			20%							

- 83. I have used several different approaches trying to replicate Mr Thompson's estimated margin. These include:
 - (a) Adjusting the CV value adjustment (+20% and -20%),
 - (b) Including GST on inputs,
 - (c) Including and excluding companies tax.
- 84. In the above example, the closest result is with 'GST on inputs' included. Under this approach the net margin (after tax) is estimated at 20.4%. While this approach returns a similar result as Mr Thompson's estimate, it appears to be a coincidence because the estimated net profit (after tax) is estimated as \$1.8m, compared to Mr Thompson's \$1.17m.
- 85. Capturing the effects of GST on inputs in the analysis improves robustness and completeness. The mechanism of this adjustment means that the margins all improve (more favourable) relative to Mr Thompson's calculations. I am unclear if Mr Thompson made such an adjustment or not.

¹⁸ Treatment unclear.

Use of after tax margin

- 86. Mr Thompson's approach to estimating the margin generates a 'net retained margin' that is the position after company tax. In effect, he assesses the projects in terms of retained earnings, or the money that could be returned to shareholders. Put differently, he views each project as a 'company' and the way his assessment is structured does not take a 'project focused, due diligence' type structure.
- 87. I have completed several housing capacity assessments around New Zealand and my approach to calculating the margin is consistent with approaches applied elsewhere, including:
 - (a) Tauranga City Council's housing assessment (feasibility assessment)¹⁹.
 - (b) Wellington Regional Residential Capacity Territorial Authority Summary²⁰.
 - (c) Greater Christchurch Partnership (GCP) housing assessment²¹.
 - (d) Dunedin City Council Housing Capacity Assessment²².
 - (e) New Plymouth District Council Housing and Business Capacity Assessment²³.
- 88. The feasibility calculations used in these housing assessments all follow the structure outlined in the Ministry for Business, Innovation and Employment (MBIE) and Ministry for the Environment (MfE) guidance that was published for NPS-UDC. That guidance clearly indicates that the profit margin is 'pre-tax'. Figure 1 shows a screenshot of the key outputs and the assessment is on a 'before tax basis'.

		5.5									
Тур	be	Item	Detached (large)	Detached (small)	Duplex (large)	Duplex (small)	Terrace Home (Large)	Terrace Home (Small			
Bro	514	Pre tax profit \$	(\$118,010)	(\$53,329)	\$236,579	\$344,764	\$593,196	\$548,769			
F10		Pre tax margin %	-16.1%	-6.8%	18.9%	27.0%	31.9%	28.8%			
		Development feasible?	No	No	No	Yes	Yes	Yes			
Guidance re using		Profit maximising?	No	No	No	No	Yes	No			
pre-tax position.)	Margin maximising?	No	No	No	No	Yes	No			
		Plan-enabled?	Yes	Yes	Yes	Yes	Yes	Yes			

Figure 1: Extract of the NPS-UDC modelling guidance.

¹⁹ Completed by Veros Property

²⁰ Prepared by Property Economics.

²¹ Greater Christchurch Housing Development Capacity Assessment. July 2021.

²² Dunedin City Council. Housing Capacity Assessment. Update. October 2023.

²³ The feasibility calculation was prepared for the Council by Property Economics.

89. In my view, Mr Thompson's approach to include company tax means that he estimates a Net Profit After Tax (**NPAT**) position. Estimating the margin using this metric is incorrect. This approach reduces (lowers) the project margins used to assess project feasibility, and erroneously disqualifies some feasible development options. This compounds across the analysis, understating total commercially feasible capacity.

Standard Values

- 90. Mr Thompson uses a basic approach with standard values for unit size, sales price, construction costs. There is little differentiation to reflect diverse, siteby-site features.
- 91. This approach does not recognise important nuances in the development process where developers seek to optimise potential returns relative to costs site size has a direct bearing on costs. Further, the size of the dwelling (and construction costs) relative to land values is an important driver of the return profile.
- 92. Mr Thompson uses a scenario approach with three size bands and a single level retiree unit scenario. A scenario approach is entirely appropriate, but it must be framed with care. I have applied the minimum lot sizes as per the Operative District Plan and the Proposed District Plan to the examples Mr Thompson provides²⁴. This shows that the number of potential units that could be delivered on his example sites. Mr Thompson allows for 26 dwelling across the five examples for detached typologies this is an average lot size of 1,757m² across the examples. The minimum lot size for the zone is 600m². Using a minimum lot size of 600m² and allowing for a portion of the lots to be used for amenities and infrastructure (e.g., roads, storm water etc), I estimate that the example sites could accommodate up to 37 units 42% more than Mr Thompson's assumed yield. Using a low yield has a material impact on the development economics the costs (land, infrastructure, and development) are distributed over a smaller number of dwellings.
- 93. Mr Thompson indicates in his report that he considers the minimum lot sizes for each parcel. However, this approach is not evident in the examples he

 $^{^{\}rm 24}$ I note that the 65 Hone Heke Road example appears to be a lodge (visitor accommodation). $\mbox{BF}\space{-}\else{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space{-}\space^{-}\space{-}\space{-}\space{-}\space^{$

lists. Mr Thompson does not provide any justification for using such low yields.

- 94. Crucially, the feasible capacity assessment must be based on plan enabled capacity. The scenarios Mr Thompson assesses appear to only reflect different dwelling sizes, but it is unclear if lot sizes are also adjusted.
- 95. Other standard values that Mr Thompson applies are:
 - (a) Development costs of \$80,000 per dwelling,
 - (b) Constant sales price (per typology).
- 96. The constant sales price is linked to the dwelling size, but it is not appropriate because it does not reflect different land area-dwelling size combinations. Mr Thompson's approach to setting dwelling sizes (fixed values) removes any ability to capture a developer's actions to optimise returns of costs, e.g., adjusting the number/size of dwellings across parcels.
- 97. Mr Thompson includes a development cost of \$80,000 per lot. However, a description, breakdown of the component parts or a source for the value is not provided.
- 98. I contrast Mr Thompson's development cost value with information about costs items published in QV Cost Builder and other construction cost sources. My analysis shows that the 'per lot cost' appears to be slightly high for redevelopment options with the cost estimates varying between \$71,000 and \$78,000. However, for infill opportunities, Mr Thompson's development cost assumption appears high against my estimates of around \$50,000.
- 99. Using the standard values, especially constant size and sales prices undermines the robustness of Mr Thompson's approach. It is likely to misstate the overall feasible capacity. In addition, the development cost used for infill opportunities is significantly higher than other sources and will reduce the feasible capacity associated with the infill development pathway.

COMMERCIAL AND EMPLOYMENT CENTRE

100. As part of assessing the economic effects of the proposed development, Mr Thompson considers the demand for additional commercial and employment land²⁵. It appears that existing supply is excluded from his analysis. That is, he does not present a 'net position' as part of this analysis – the existing (before growth) population is already serviced but his analysis does not include this element. Mr Thompson evaluates different commercial and business land uses. I comment on these below.

- 101. For his analysis relating to convenience retail, Mr Thompson uses population projections and applies a conversion ratio to translate population totals into supportable GFA (m²). He makes assumptions about the share²⁶ of demand in each subarea/catchment that will be captured by the proposed centre. The shares are as follows:
 - (a) Kerikeri Urban 10%
 - (b) Kerikeri Rural 40%
 - (c) PPC Area²⁷ 90%
 - (d) Secondary Rural 30%.
- 102. It is unclear what these shares are based on. These shares suggest that a portion of demand (current and future) will be diverted away from existing centres.
- 103. It appears that Mr Thompson allocated 100% of the PPC²⁸ area population to proposed development, and not 90% as indicated in his text. Using Mr Thompson's parameters suggest that the existing population in the catchments currently generates demand/can support GFA of 24,940m². Establishing the proposed retail area will divert a quarter (24%) of demand (2022) away from the existing retail centres. Based on Mr Thompson's estimates²⁹, this share increases over time as growth occurs, rising to 33% by 2042. Yet, despite the size of demand that will be diverted away from the existing centres (based on his assumptions), Mr Thompson asserts that the centre would not adversely compete with existing centres³⁰.
- 104. To put this in context, I convert the proposed retail area into employment and then compare it against current retail employment in Kerikeri and Waipapa. The results show that the number of jobs associated with the proposed area

²⁵ Section 7 on page 37.

²⁶ Listed in Figure 36, page 38.

²⁷ It is unclear what this relates to, but I suspect that it is the proposed development area.

²⁸ This is undefined in Mr Thompson's evidence and I assume it is 'proposed plan change'.

²⁹ Data in Figure 36 on page 38.

³⁰ Page 38.

is in the order of 160. Currently, there are between 290 and 310 relevant retail employment in the Kerikeri-Waipapa area³¹. Based on these conversions, the proposed development (retail component) will be broadly 75% of the existing retail employment in Kerikeri and Waipapa (combined). These high-level conversions³² illustrate the scale of the proposed development – it is difficult to see such a large development not having an adverse effect on the existing centres.

- 105. Mr Thompson outlines other components that will be included in the proposed development, i.e.:
 - (a) 5,000m² for Large Format Retailing (LFR),
 - (b) 15,000m² for light industrial,
 - (c) Other activities (e.g., commercial services, offices, recreation and health and some residential space that is above grade).
- 106. Unfortunately, no analysis of the current or future demand for this space is included in Mr Thompson's analysis. He does not offer any assessment about the potential effects, adverse or otherwise, that could be expected with these land uses.
- 107. Mr Thompson covers two other activities:
 - (a) Retirement villages,
 - (b) Hotel and tourism accommodation.

I comment on each activity below.

Retirement villages

- 108. Mr Thompson considers the retirement village sector and its supply and demand patterns. He notes that there are four retirement villages in Kerikeri-Waipapa³³. He then estimates the vacancy rates using information about these villages.
- 109. He uses a penetration ratio of 25% to estimate demand. Essentially, he applies this ratio to households aged 65 years and older his entire assessment of retirement village demand is based on these two assumptions

³¹ Spatial area aligning with the Kerikeri area as defined by Mr Thompson in Figure 35 on page 37.

 ³² I did not undertake a retail distribution analysis because my brief is a review of Mr Thompson's assessment.
 ³³ Section 8.1 on page 39.

(penetration ratio and age cohorts). He does not offer a source for these critical assumptions.

- 110. Using information from the Retirement Village Association³⁴ shows that more appropriate industry ratios are:
 - (a) The +75 years age cohort is the appropriate household segment to use (not the +65 years cohort),
 - (b) The national penetration rate is 14% (not 25%).
- 111. These two assumptions, as applied by Mr Thompson, will compound to overstate his demand projections and growth outlook.
- 112. I have used Mr Thompsons projections³⁵ and adjusted these to capture:
 - (a) the +75 years age cohort,
 - (b) a more moderate growth pathway and
 - (c) the lower penetration ratio.
- 113. After these adjustments, the average annual demand for retirement village units is between 7 and 13 units/year. Combining this annual change against the 260 units that are planned, shows that there is sufficient capacity (planned) for the next 20 years.
- 114. In my view, these adjustments highlight that the deficit as anticipated by Mr Thompson (expected over 5/6 years), is inaccurate.

Hotel and Tourism Accommodation

- 115. Basic data about the tourism and accommodation sector is provided and the strong growth in tourism GDP is highlighted. Mr Thompson reports historic patterns and the estimated room numbers (of new developments in consents) and accommodation provider numbers.
- 116. He highlights the total size (rooms) of accommodation providers. Based on his data³⁶, the average number of rooms per establishment in Kerikeri is circa
 14. For comparison, MBIE's Accommodation Data Programme reports that

³⁴ Based on the JLL report, and nationally. The penetration ratio for Northland is not reported. (New Zealand Retirement Villages and Aged Care Database (New Zealand Retirement Village Database and Aged Care Database (New Zealand Retirement Village Database and Aged Care Database (New Zealand Retirement Village Database and Aged Care Database (New Zealand Retirement Village Database and Aged Care Database (New Zealand Retirement Village Database and Aged Care Database (New Zealand Retirement Village Database and Aged Care Database (New Zealand Retirement Village Database and Aged Care Database (New Zealand Retirement Village Database and Aged Care Database (New Zealand Retirement Village Database and Aged Care Database (New Zealand Retirement Village Database and Aged Care Database (New Zealand Retirement Village Database and Aged Care Database (New Zealand Retirement Village Databas

³⁵ Outlined in Figure 40, page 42.

the average number of stay units³⁷ in the Far North is 35.3 units. However, this definition includes holiday parks and campgrounds. Using Northland Regional Tourism Organisation (**RTO**) information shows that the average size of hotels in Northland is 54.4 stay units.

- 117. Mr Thompson's data shows that the largest local hotel/motel in Kerikeri is 37 units. Three large hotels³⁸ in the Far North include:
 - (a) Kingsgate (Paihia) 113 rooms
 - (b) Scenic (Paihia) 114 rooms
 - (c) Copthorne (Waitangi) 184 rooms.
- 118. Surprisingly, Mr Thompson does not draw on employment data to highlight the size or trends in the hotel sector. StatsNZ reports that accommodation related employment in Kerikeri-Waipapa has remained rangebound between 55 and 80 since 2010 – with a peak pre-Covid but falling during Covid and not recovering since.
- 119. The proposed hotel will have between 80 and 120 rooms. Compared to the existing offer in Kerikeri-Waipapa the scale of the proposed development is significant. Mr Thompson does not provide any demand projections or estimates to justify the scale. Importantly, the large hotels are in Paihia and Waitangi and are not in Kerikeri.
- 120. The information³⁹ in Mr Thompson's report appears to be from several sources, including MBIE's Accommodation Data Programme. It is unclear if the information he reports is for the Northland RTO area or for the Far North. For example, 'type of establishment' information is not reported at a territorial authority level. Yet, Mr Thompson reports the number of hotels in the Far North. He reports the 2022 number of hotel establishments as 118⁴⁰. However, total includes all establishment-type not just hotels. It includes:
 - (a) Hotels.
 - (b) Motels & apartments (>20),
 - (c) Motels & apartments (6-20),

³⁷ Stay unit is a unit of accommodation that is available to be charged out to guests (such as a room in a hotel or motel, a bed in a backpacker establishment, or a site in a caravan park.

³⁸ Mr Thompson's information, Figure 46 on page 46.

³⁹ Figure 41, on page 43.

⁴⁰ Mr Thompson provides a different definition about what is included in the category, but I cannot reconcile it directly with official statistics.

- (d) Backpackers,
- (e) Holiday parks & campgrounds,
- (f) Lodges & boutique accommodation.
- 121. The average number of rooms per establishment is also across all the above categories. Using the Northland RTO data suggests that hotels have an average of 54 to 55 stay units each. Similarly, the occupancy figures appear to align with official data, but it is for all establishment types and not solely hotels. Therefore, the data Mr Thompson presents is not an accurate reflection of the hotel sector in Far North the way he reports and interprets the data is incorrect. It appears he applies regional data to the district level.
- 122. Applying the Northland establishment structure⁴¹ to the Far North data suggests that there are in the order of ten hotels in Far North twelve times less than Mr Thompsons' suggested 118 (Figure 41⁴²). The number of hotels in the Far North are declining and Mr Thompson asserts that this is due to short-term accommodation (e.g., AirBnB). I note that another reason not canvassed by Mr Thompson could be using hotels and motels for social housing.
- 123. Occupancy metrics suggests that visitation to the Far North was trending up pre-Covid, reaching 107,000 in 2019. However, the numbers are struggling to return to those levels with the slowing economy suppressing demand and are currently around 69,000 visitors (occupied rooms).
- 124. I illustrate the potential impact on the occupancy rates of the existing providers if the proposed development proceeds. The illustration considers the hotel sub-market as well as the Kerikeri location and is based on the information in Figure 44.⁴³
- 125. The envisaged hotel will add between 80 and 120 rooms. As mentioned, this scale is similar to that observed in Paihia, but greater than Kerikeri-Waipapa areas where the average size is 13.8 rooms per establishment. Adding 80-120 rooms to the existing market will increase annual capacity to 84,700 and 99,280 stay units (rooms per night per year and depending on how many rooms are developed).

⁴¹ This is the percentage share of hotels relative to all accommodation establishments (8.5%).

⁴² On page 43.

⁴³ I have reviewed the data in this table, and it is accurate. It appears that the information in Figure 43 includes data for all 'Hotels, Motels and other Short-term accomodation', not just hotels as reported by Mr Thompson.

126. I estimate the implied demand for rooms based on average occupancy rates (29%) and occupied units. Adding the proposed hotel will lower occupancy rates across the rest of the market to between 15% and 18%. Using a higher occupancy rate (36%) to reflect a recovery in tourism activity suggests that occupancy rates would still decrease, falling to between 20% and 22% of current levels.

EMPLOYMENT AND GDP ANALYSIS

- 127. Mr Thompson includes an analysis of the GDP⁴⁴ and employment impacts associated with the construction and ongoing phases of the proposed development.
- 128. Mr Thompson states that he uses New Zealand-wide ratios and apply these in the Far North context. The source of these ratios is not indicated. It is inappropriate to use 'whole of New Zealand ratios' in the Far North. The ratios he uses reflects the economic relationships between employment and economic activity at a New Zealand-level. Applying national ratios in the Far North is inappropriate because:
 - (a) The economic structure (type and size of economic activity) in the Far North differs significantly from the New Zealand economy,
 - (b) The economic structure and relationships of businesses in the Far North include trade occurring with other regions – national ratios do not capture interregional import or export patterns. The Far North imports goods from Auckland and Whangarei. At the same time Far North sends goods and products to the rest of Northland and New Zealand. National ratios do not capture such relationships. For example, residential construction in the Far North imports 24% of the inputs used⁴⁵.
- 129. Therefore, the results reported by Mr Thompson are not an accurate reflection of the likely economic outcomes (GDP and employment impacts).
- 130. When assessing the GDP and employment effects, or when undertaking and economic assessment, an essential part of the assessment is to define the counterfactual. The assessment should only capture changes that are

⁴⁴ MR Thompson uses Value Added and GDP. The technical difference relates to how some taxes are treated, but at a practical level the differences are minor.

¹⁵ M.E Multi-regional Input-Output model for the Far North.

directly related to, or dependent on, the proposal. If a change would have occurred regardless of the proposal, then it should be excluded from the assessment.

- 131. Mr Thompson assumes that half (50%) of the effects are attributed to the proposed development i.e., these effects would not be achieved/materialise without the proposed development. While his methodology is appropriate, the 50% appears subjective and he does not explain his rationale for use this share. Accommodating the growth could occur in several ways and in different locations, including:
 - (a) Through intensification,
 - (b) Other greenfield developments,
 - (c) A mix of intensification and greenfields.
- 132. This means that the residential growth could be accommodated elsewhere, through alternative means. Therefore, the potential economic impacts could also be achieved through another development and not solely through the proposal development. It would be misplaced to assume that only the proposed development could deliver the anticipated economic impacts. They are not unique to the proposed development.
- 133. Mr Thompson summarises⁴⁶ the employment and GDP effects of the proposed development. He frames GDP as a benefit. However, GDP includes items such as salary and wages, and consumption of fixed capital which are costs to a business. The salaries and wages are a benefit to workers meaning that in economic terms, these are transfers. GDP is a measure of economic production and should not be equated as a benefit. GDP can be used to illustrate the potential impacts on the size of the economy, and a larger economy, it can be argued, has benefits, but simply equating GDP to benefits is not fitting⁴⁷.
- 134. I have identified several other issues and limitations in Mr Thompson's analysis:
 - (a) It is unclear how, or if, Mr Thompson treated financing costs. The financing mechanisms normally reduces GDP and employment effects.

⁴⁶ Section 10.4 and Figure 50 on page 49.

⁴⁷ GDP can be deconstructed into its component parts to aid in understanding the costs and benefits (not only the benefits).

- (b) Household spending is translated into GDP, which is then treated as a benefit. This approach assumes that without the proposed development this spending would not occur, and there would not be any GDP and employment effects. However, these households (or the growth) would not be lost to the district, the growth can occur elsewhere in the district.
- (c) Rates are treated as a benefit and Mr Thompson indicates that a significant 'quantity of rates are kept within the Far North'. In contrast with the other items, he does not translate the rate spending into a GDP/VA equivalent. Rates are a cost to households and a revenue source for Councils. It is unclear why Mr Thompson treats it as a benefit.
- (d) Mr Thompson estimates the present value of the rates spending as \$58.2m. I am unable to replicate Mr Thompson's calculation, but based on my calculation, using Mr Thompson's variables, I estimate the value at \$50.0m. Regardless, rates should not be included in the assessment because it is a transfer. Including it overstates the benefits.
- (e) The economic activity associated with agriculture is subtracted from the other benefits. This approach correctly reflects opportunity costs. I note that on page 47, GDP associated with current agriculture activity is presented as \$3.5m and the annual value is estimated at \$0.1m per year. Mr Thompson does not provide any information about how he estimated this value or what agriculture land uses he applies. In addition, the discounting process and the staging of the opportunity costs are unclear.
- (f) The discount rate underpinning the analysis is stated as 4%. Selecting the discount rate is important because discounting can often have a larger impact on the outcome than any other factor⁴⁸. The NZ Treasury's current guidance on the discount rate to use in economic analysis is 5%. Using the default rate lowers Mr Thompson's results by 15%. Mr Thompson does not provide a motivation for using a 4% discount rate.
- 135. In my view, the GDP and employment contribution section in Mr Thompson's report has several issues that undermines its usefulness. The key benefits of the proposal, providing accommodation, can also be achieved through developing other sites, or via intensification. To appreciate the economic effects (in terms of GDP and employment) of the proposed development it needs to be considered against those alternatives.

⁴⁸ NZ Treasury. Guide to Social Cost Benefit Analysis. July 2015. Para 148 BF\64392716\2

136. The summary of GDP and employment effects inappropriately includes transfers as benefits, overstating the potential effects. Mr Thompson's counterfactual is a 'do nothing' scenario that is unrealistic because alternative development options are available.

STATEMENT OF EVIDENCE AND KERIKERI-WAIPAPA AS AN URBAN AREA

- 137. In his statement of evidence, Mr Thompson provides updated population figures. He also provides the updated projections as prepared by Infometrics and StatsNZ. All projection sets are higher than those presented in his 2022 report. However, Mr Thompson takes an even more aggressive growth pathway with the updated projections showing a steeper growth curve. His 2022 medium projections showed a 37% change between 2023 and 2033. This has been upgraded to 52% in his evidence. Apart from the reference to strong international migration, Mr Thompson does not provide other reasons for the high(er) growth.
- 138. I acknowledge that there has been information released after Mr Thompson submitted his evidence. However, international migration statistics released by StatsNZ in the period leading up to Mr Thompson finalising his evidence clearly shows a slowing migration picture. Migration was reported to have peaked around November 2023, and the net trend was clearly reversing (in the April 2024 release). Subsequent releases have confirmed the slowdown in net migration with the peak pushed back to October 2023.
- 139. The observed patterns do not support Mr Thompson's position of very strong, migration driven growth. While migration is at historic highs, the trend is clearly downwards. It is difficult to see such strong migration continueing over the medium to long term.
- 140. Mr Thompson correctly identifies the criteria outlined in the National Policy Statement on Urban Development (NPS-UD) that are used to identify 'urban environments'. According to the NPS-UD, an urban environment means any area of land (regardless of size, and irrespective of local authority or statistical boundaries) that:
 - (a) is, or is intended to be, predominantly urban in character; and
 - (b) is, or is intended to be, part of a housing and labour market of at least 10,000 people.

- 141. Mr Thompson provides his views about these two criteria. The populationbased criterion is relatively straightforward. Mr Thompson draws on his population projections and sets a spatial extent of four SA2s in his analysis (Figure 5 in his EIC). The different sources/population projections show that currently, there are 9,200 people in the Kerikeri-Waipapa area – below the 10,000 threshold.
- 142. Looking forward, the population is projected to grow with the 10-year outlook across the different project sets reported by Mr Thompson showing the 2033 position as:
 - (a) Infometrics 11,000,
 - (b) StatsNZ Medium 10,100,
 - (c) StatsNZ High 10,600,
 - (d) UE Medium 14,000, and
 - (e) UE High 16,400.
- 143. I view Mr Thompson's projections as aggressive and based on very high growth projections (discussed in para 26 to 34 above).
- 144. Mr Thompson describes the spatial interaction patterns, specifically those related to the labour market i.e., where people live and work. He then identifies the number of workers living in the surrounding areas and adds these individuals to his population estimates for the Kerikeri-Waipapa area. He states⁴⁹ that he combines the resident population with the workforce that commutes to Kerikeri from the surrounding areas. Mr Thompson does not define 'surrounding area'. In addition, he does not list a source for his commuter patterns.
- 145. Mr Thompson's approach is to identify the housing and labour markets as two separate parts, and to then add them together. The 'workers' commuting to Kerikeri are already counted as 'people' in surrounding areas. However, for this approach to be consistent, he needs to subtract people living in Kerikeri but working elsewhere. It appears that Mr Thompson does not make this adjustment.

- 146. The population growth projections prepared by Infometrics and StatsNZ as quoted by Mr Thompson show that over a 10-year period, the population can be expected to grow to around the 10,000 population threshold. However, there is uncertainty around this level being achieved. In my view, a strict binary view about when the Kerikeri-Waipapa area will achieve the threshold (10,000 people) is not critical at this stage. In my view, the location will achieve the threshold but based on currently observed growth patterns, the specific point/date when the threshold will be achieved is likely to be in the 10-15 year timeframe.
- 147. Under the NPS-UD, the second criterion is about the character of an area as the NPS-UD refers to 'predominantly urban in character'. I note that defining and evaluating 'character' element is outside my field of economic expertise. I have reviewed Mr Thompson's evidence where it is within my expertise, and from an economic perspective.
- 148. Mr Thompson provides commentary about large lot residential properties surrounding Kerikeri and Waipapa⁵⁰. It appears that Mr Thompson focuses on the function, or land use, occurring on these parcels. He uses a sample of parcels to explain his position. The sample includes six blocks with 124 properties⁵¹.
- 149. His selected sample is not representative. In Figure 7, Mr Thompson lists the number of Rural Residential properties as 1,985. To generate a representative sample, 322 parcels would need to be included in the sample. This means that Mr Thompson's sample is too small to draw any inferences from.
- 150. It is unclear how Mr Thompson identified and selected the candidate parcels. The spatial distribution around Kerikeri-Waipapa of the samples is not reported. Five of the blocks are east of Kerikeri, and one is to the northern edge of Kerikeri (see Appendix 2). The Rural Residential zone around Waipapa, or the land to the north of Kapiro Road are not captured by the samples. The sample is not spatially distributed and therefore likely to be biased.
- 151. Mr Thompson considers the selected parcels and asks if the properties are of 'urban or rural in function'. His assessment does not consider the spatial context within which the parcels sit i.e., the neighbouring land uses, or the

⁵⁰ Para 48 to 51 of his EIC.

wider zone. This limitation undermines Mr Thompson's analysis. Mr Thompson's assertion that the Rural Residential properties surrounding Kerikeri-Waipapa are 'almost entirely residential, with practically no rural activities occurring' is difficult to reconcile with observed patterns.

- 152. In Figure 2, I present some examples showing the Rural Residential Zone and to illustrate the non-residential activities within the zone. The zone is shown in the semi-transparent/light grey areas (Appendix 3 reflects the spatial extent of the zone around Kerikeri and Waipapa).
- 153. Mr Thompson concludes that the Rural Residential properties have a residential function. The examples he presents supports that view. However, the samples are not representative and do not reflect the wider zone.
- 154. In addition to the sampling, Mr Thompson did not assess other metrics, such as employment or business counts, to enrich his analysis. I have isolated the employment patterns in the Rural Residential zone around Kerikeri and Waipapa. I have reviewed StatsNZ information and there is indeed rural-economy employment in the zone 3% of the district agriculture employment is in the Rural Residential Zone. Similarly, 8% of construction jobs, and 8% of professional services jobs are in these locations. The average size of the businesses in these sectors (and in the zone) is less than the district wide averages. This suggests that the businesses operating here are smaller, and consistent with a Working-from-home approach. Therefore, the function of the area is seen as wider than solely residential.
- 155. Mr Thompson comments that his assessment shows that the land use <u>function</u> [Emphasis added] is residential, not rural. This is, in my view, a moot point.
- 156. It is entirely possible to have a residential function in an area with a rural character. The residential function is provided by the dwelling or house. From an economic perspective, the attributes associated with the rural character (of the area) form the attributes that are capitalised in the property values. These attributes are often associated with a non-urban lifestyle and marketed as such. Fulfilling a residential <u>function</u> does not mean that a location has an urban <u>character</u>.
- 157. In my view, the way Mr Thompson's frames and undertakes his assessment of the residential function is misguided and his sampling is likely to introduce

bias. Regardless, his emphasis on the residential <u>function</u> does not provide insight relating to the NPS-UD criterion relating to with the urban <u>character</u>.



Figure 2: Non-residential use in Rural Residential zone

Date of satellite imagery: 16/07/2022-12/11/2023

158. I consider that, in this current context, an economic analysis of the attributes influencing and associated with an urban or rural character is unlikely to provide deep insights. Further, the merits associated with the 'character' considerations are unlikely to be determined by an economic assessment.

OTHER COMMENTS

- 159. As part of his analysis, Mr Thompson comments on the Infometrics methodology⁵². He states that Infometrics "relies on historical employment levels within the district to project the future population and household growth."
- 160. I have reviewed Infometrics' methodology as described in the appendix to their report titled: "Far North District population projections" dated June 2022.
- 161. The Infometrics methodology captures a wide range of factors. The approach includes employment and economic factors to help inform migration. Infometrics' population projections are based on:
 - (a) The existing population base,
 - (b) Fertility rates,
 - (c) Mortality rates,
 - (d) Migration.
- 162. Mr Thompson's assertions in fact relate to point (d) above, and he incorrectly applies his observations to the entire projection set. Infometrics consider employment and non-employment factors when estimating the migration component. This is entirely appropriate and not 'unconventional' as Mr Thompson suggests.
- 163. I also note that the Infometrics approach is consistent with StatsNZ approach as well as several consultancies around New Zealand, including M.E, Dot Loves Data, NIDEA and so forth.

⁵² Section 3.5 on page 25.

CONCLUSION

- 164. I have review Mr Thompson's report and his evidence in support of Kiwi Fresh Orange Company Limited.
- 165. In my view, there are several issues that undermine confidence in Mr Thompson's analysis and interpretation. These include:
 - (a) Aggressive assumptions underpinning migration, leading to bullish growth projections,
 - (b) Using a modelling approach that is inconsistent with that used elsewhere in New Zealand in terms of estimating commercially feasible capacity,
 - (c) Unexplained assumptions when translating commercial feasibility into realistically expected to be realised capacity,
 - (d) Using inappropriate economic ratios to estimate the Far North economic effects, and applying these without an appropriate counterfactual,
- 166. With reference to the question about whether the Kerikeri-Waipapa area is an 'urban environment' under the NPS-UD, Mr Thompson's analysis is narrow and unconvincing. In my opinion and from an economic perspective, his focus on function instead of character is misplaced. His analysis does not add to the evaluation about the degree to which the rural residential area is, or is not, part of the urban environment.

1 RMc Abrath

Lawrence McIIrath

Date: 23 June 2025

Appendix 1: Workings

			Infill	Greenfield	Infill	Infill	Greenfield	Infill	Greenfield	Infill	Infill	Greenfield
ltem	Code	Formula	46 Hall Road	19 Shepherd Road	65 Hone Heke Road	49 Amokura Drive	21 Peacock Garden Drive	46 Hall Road	19 Shepherd Road	65 Hone Heke Road	49 Amokura Drive	21 Peacock Garden Drive
Sales price	A		2,480,000	8,510,000	1,890,000	1,890,000	9,450,000	2,480,000	8,510,000	1,890,000	1,890,000	9,450,000
Costs	в	B = b1 + b2 + b3 + b4	2,498,400	5,667,300	2,482,700	1,692,700	6,123,500	2,498,400	5,667,300	2,482,700	1,692,700	6,123,500
Procurement cost	b1		960,000	1,020,000	1,450,000	660,000	960,000	960,000	1,020,000	1,450,000	660,000	960,000
Construction	b2		1,224,000	3,672,000	816,000	816,000	4,080,000	1,224,000	3,672,000	816,000	816,000	4,080,000
Development costs	b3		240,000	720,000	160,000	160,000	800,000	240,000	720,000	160,000	160,000	800,000
Sales Commission	b4		74,400	255,300	56,700	56,700	283,500	74,400	255,300	56,700	56,700	283,500
GST on Sales	с	A * 0.15	372,000	1,276,500	283,500	283,500	1,417,500	372,000	1,276,500	283,500	283,500	1,417,500
GST on inputs	D	B*0.15	-	-	-			374,760	850,095	372,405	253,905	918,525
GST (Net)	E	C - D	372,000	1,276,500	283,500	283,500	1,417,500	- 2,760	426,405	- 88,905	29,595	498,975
Gross Profit (before company tax)	F	A - B - E	Cost > Sales	1,566,200	Cost > Sales	Cost > Sales	1,909,000	Cost > Sales	2,416,295	Cost > Sales	167,705	2,827,525
Net Profit (after tax)	G	F * (1 - 28%)		1,127,664			1,374,480		1,739,732		120,748	2,035,818
Net Profit Margin (After tax)	н	F/A		13%			15%		20%		6%	22%
Mr Thompson's Margin			-3.0%	20%	-25%	-4%	22%	8.0%	20%	-9%	7%	21%

			Infill	Greenfield	Infill	Infill	Greenfield	Infill	Greenfield	Infill	Infill	Greenfield
ltem	Code	Formula	46 Hall Road	19 Shepherd Road	65 Hone Heke Road	49 Amokura Drive	21 Peacock Garden Drive	46 Hall Road	19 Shepherd Road	65 Hone Heke Road	49 Amokura Drive	21 Peacock Garden Drive
Sales price	A		2,960,000	8,870,000	1,970,000	1,970,000	9,850,000	2,960,000	8,870,000	1,970,000	1,970,000	9,850,000
Costs	В	B = b1 + b2 + b3 + b4	2,589,300	5,907,600	2,536,100	1,746,100	6,390,500	2,589,300	5,907,600	2,536,100	1,746,100	6,390,500
Procurement cost	b1		960,000	1,020,000	1,450,000	660,000	960,000	960,000	1,020,000	1,450,000	660,000	960,000
Construction	b2		1,300,500	3,901,500	867,000	867,000	4,335,000	1,300,500	3,901,500	867,000	867,000	4,335,000
Development costs	b3		240,000	720,000	160,000	160,000	800,000	240,000	720,000	160,000	160,000	800,000
Sales Commission	b4		88,800	266,100	59,100	59,100	295,500	88,800	266,100	59,100	59,100	295,500
GST on Sales	с	A * 0.15	444,000	1,330,500	295,500	295,500	1,477,500	444,000	1,330,500	295,500	295,500	1,477,500
GST on inputs	D	B*0.15	-	-	-			388,395	886,140	380,415	261,915	958,575
GST (Net)	E	C - D	444,000	1,330,500	295,500	295,500	1,477,500	55,605	444,360	- 84,915	33,585	518,925
Gross Profit (before company tax)	F	A - B - E	Cost > Sales	1,631,900	Cost > Sales	Cost > Sales	1,982,000	315,095	2,518,040	Cost > Sales	190,315	2,940,575
Net Profit (after tax)	G	F*(1-28%)		1,174,968			1,427,040	226,868	1,812,989		137,027	2,117,214
Net Profit Margin (After tax)	н	F/A		13%			14%	8%	20%		7%	21%
Mr Thompson's Margin			-2.0%	20%	-24%	-3%	22%	8.0%	19%	-8%	7%	21%

			Infill	Greenfield	Infill	Infill	Greenfield	Infill	Greenfield	Infill	Infill	Greenfield
	Cada	Formula	46 Holl Bood	19 Shepherd	65 Hone Heke	49 Amokura	21 Peacock	46 Hall Boad	19 Shepherd	65 Hone Heke	49 Amokura	21 Peacock
Item	coue	FUIIIuia	40 Hall Kodu	Road	Road	Drive	Garden Drive	40 Hall Kudu	Road	Road	Drive	Garden Drive
Sales price	A		3,080,000	9,230,000	2,050,000	2,050,000	10,250,000	3,080,000	9,230,000	2,050,000	2,050,000	10,250,000
Costs	В	B = b1 + b2 + b3 + b4	2,669,400	6,147,900	2,589,500	1,799,500	6,657,500	2,669,400	6,147,900	2,589,500	1,799,500	6,657,500
Procurement cost	b1		960,000	1,020,000	1,450,000	660,000	960,000	960,000	1,020,000	1,450,000	660,000	960,000
Construction	b2		1,377,000	4,131,000	918,000	918,000	4,590,000	1,377,000	4,131,000	918,000	918,000	4,590,000
Development costs	b3		240,000	720,000	160,000	160,000	800,000	240,000	720,000	160,000	160,000	800,000
Sales Commission	b4		92,400	276,900	61,500	61,500	307,500	92,400	276,900	61,500	61,500	307,500
GST on Sales	с	A * 0.15	462,000	1,384,500	307,500	307,500	1,537,500	462,000	1,384,500	307,500	307,500	1,537,500
GST on inputs	D	B*0.15	-	-	-			400,410	922,185	388,425	269,925	998,625
GST (Net)	E	C - D	462,000	1,384,500	307,500	307,500	1,537,500	61,590	462,315	- 80,925	37,575	538,875
Gross Profit (before company tax)	F	A - B - E	Cost > Sales	1,697,600	Cost > Sales	Cost > Sales	2,055,000	349,010	2,619,785	Cost > Sales	212,925	3,053,625
Net Profit (after tax)	G	F*(1-28%)		1,222,272			1,479,600	251,287	1,886,245		153,306	2,198,610
Net Profit Margin (After tax)	н	F/A		13%			14%	8%	20%		7%	21%
Mr Thompson's Margin			1.0%	20%	-24%	-2%	22%	-2.0%	20%	-24%	-2%	22%

			Infill	Greenfield	Infill	Infill	Greenfield	Infill	Greenfield	Infill	Infill	Greenfield
	Codo	Formula	46 Hall Boad	19 Shepherd	65 Hone Heke	49 Amokura	21 Peacock	46 Holl Bood	19 Shepherd	65 Hone Heke	49 Amokura	21 Peacock
	coue	Formula	40 Hall Kodu	Road	Road	Drive	Garden Drive	40 Hall Koau	Road	Road	Drive	Garden Drive
Sales price	A		2,160,000	6,480,000	1,440,000	1,440,000	7,200,000	2,160,000	6,480,000	1,440,000	1,440,000	7,200,000
Costs	В	B = b1 + b2 + b3 + b4	1,953,300	3,999,900	2,112,200	1,322,200	4,271,000	1,953,300	3,999,900	2,112,200	1,322,200	4,271,000
Procurement cost	b1		960,000	1,020,000	1,450,000	660,000	960,000	960,000	1,020,000	1,450,000	660,000	960,000
Construction	b2		688,500	2,065,500	459,000	459,000	2,295,000	688,500	2,065,500	459,000	459,000	2,295,000
Development costs	b3		240,000	720,000	160,000	160,000	800,000	240,000	720,000	160,000	160,000	800,000
Sales Commission	b4		64,800	194,400	43,200	43,200	216,000	64,800	194,400	43,200	43,200	216,000
GST on Sales	с	A * 0.15	324,000	972,000	216,000	216,000	1,080,000	324,000	972,000	216,000	216,000	1,080,000
GST on inputs	D	B*0.15	-	-	-			292,995	599,985	316,830	198,330	640,650
GST (Net)	E	C - D	324,000	972,000	216,000	216,000	1,080,000	31,005	372,015	- 100,830	17,670	439,350
Gross Profit (before company tax)	F	A - B - E	Cost > Sales	1,508,100	Cost > Sales	Cost > Sales	1,849,000	175,695	2,108,085	Cost > Sales	100,130	2,489,650
Net Profit (after tax)	G	F*(1-28%)		1,085,832			1,331,280	126,500	1,517,821		72,094	1,792,548
Net Profit Margin (After tax)	н	F/A		17%			18%	6%	23%		5%	25%
Mr Thompson's Margin			-4.0%	20%	-24%	-5%	31%	-2.0%	20%	-24%	-5%	31%



Appendix 2: Spatial distribution of Mr Thompson's samples



Appendix 3: Spatial Extent of Rural Residential Zone (Proposed District Plan)