

**ENVIRONMENT COURT OF NEW ZEALAND  
WELLINGTON REGISTRY**

**I MUA I TE KOOTI TAIAO O AOTEAROA  
TE WHANGANUI-A-TARA**

**ENV-2023-WLG-000005**

**Under** the Resource Management Act 1991

**In the matter of** the direct referral of applications for resource consent and notices of requirement under sections 87G and 198E of the Act for the Ōtaki to North of Levin Project

**By** Waka Kotahi NZ Transport Agency

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**STATEMENT OF EVIDENCE OF JAMES DOUGLAS MARSHALL FAIRGRAY  
ON BEHALF OF WAKA KOTAHI NZ TRANSPORT AGENCY**

**ECONOMICS AND TOWN CENTRE IMPACTS**

Dated: 4 July 2023

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**BUDDLE FINDLAY**

Barristers and Solicitors  
Wellington

Solicitor Acting: **David Allen / Thaddeus Ryan**  
Email: david.allen@buddlefindlay.com / thaddeus.ryan@buddlefindlay.com  
Tel 64 4 044 620450 Fax 64 4 499 4141 PO Box 2694 DX SP20201 Wellington 6011

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## INTRODUCTION

1. My name is **Dr James Douglas Marshall Fairgray**.
2. I am a principal and director of Market Economics Limited, an independent research consultancy. I hold a PhD in Economic Geography from the University of Auckland.
3. I prepared Technical Assessment O: Economics and Town Centre (**Technical Assessment O**) as part of Volume IV of the Assessment of Environmental Effects (**AEE**), which accompanied the application for resource consents and notices of requirement for designations (**NoRs**) lodged with Manawatū-Whanganui Regional Council (**Horizons**), Greater Wellington Regional Council (**GWRC**), Horowhenua District Council (**HDC**) and Kāpiti Coast District Council (**KCDC**) in November 2022 in respect of the Ōtaki to north of Levin highway Project (**Ō2NL Project** or **Project**).
4. My qualifications and experience are set out in paragraph 30 of Technical Assessment O. My evidence is supplementary to Technical Assessment O.
5. In preparing Technical Assessment O and my evidence:
  - (a) I have provided advice on economics matters related to the Project to Waka Kotahi since August 2021.
  - (b) I have examined the Horowhenua District economy as well as the Greater Wellington and Manawatū-Whanganui regional economies, and analysed the likely effects of the proposed Ō2NL Project, in regard to both the development phase and the longer term implications for the functioning of those economies.
  - (c) I have examined the likely effects on the Levin CBD and other centres, and implications for the retail and service sectors in particular. My analysis has assessed, and updated where appropriate, the quantitative assessment of construction and rural production effects, and review of impacts on centres along the Ō2NL Project route (work which was initially done under my direction by Derek Foy and Rodney Yeoman (then senior consultants employed by Market Economics Ltd)).

6. Since the consent applications and NoRs were lodged I have:
  - (a) assisted with the response to a number of questions in the section 92 further information requests from the Councils related to Technical Assessment O; and
  - (b) considered submissions made on the Project, and offered comment where appropriate.

**Code of conduct**

7. I confirm that I have read the Code of Conduct for expert witnesses contained in section 9 of the Environment Court Practice Note 2023. This evidence has been prepared in compliance with that Code. In particular, unless I state otherwise, this evidence is 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 I express.

**Purpose and scope of the evidence**

8. Technical Assessment O assesses the economic effects of the Ō2NL Project, both locally and regionally, with a particular focus on the implications for the Horowhenua District (and, to a lesser extent, the Kāpiti Coast District). It provides quantitative and qualitative evidence on the positive and negative effects that are expected to accrue to the economies and communities along, and influenced by, the Ō2NL Project corridor.
9. My evidence does not repeat in detail the matters discussed in Technical Assessment O. Rather, in this evidence I:
  - (a) present the key findings of Technical Assessment O in an executive summary, updated to factor in the additional work carried out since lodgement;
  - (b) provide a more detailed description of the additional work carried out, which included reviewing (and providing comments on) the section 198D report of Michael Cullen prepared on behalf of HDC and KCDC; and
  - (c) comment on issues raised in submissions received in respect of the Project.

## EXECUTIVE SUMMARY

10. The Ō2NL Project is a major transport development, and an integral part of the Wellington northern corridor infrastructure investments. The technical assessment for the Ō2NL Project showed there would be positive economic effects and benefits to the wider economy from improved connections between Wellington and the rest of the North Island, particularly the Horowhenua District as a key beneficiary of the Project.
11. Across the southern North Island, the Ō2NL Project will be a key link in the northern corridor projects, providing faster and more reliable connections at the interface between the large Wellington economy and the Manawatū-Whanganui and Hawkes Bay regional economies.
12. Ō2NL is a very large project in the context of the Horowhenua District economy, both as a short-term stimulus to activity, and for its anticipated long-term effects on the economy from faster population growth (due especially to better accessibility to Wellington), and the performance and opportunities for the Levin town centre.
13. Technical Assessment O assesses the potential economic effects of the proposed Ō2NL Project, covering:
  - (a) the economic contribution of the Ō2NL Project's construction to the Horowhenua, Manawatū-Whanganui, Wellington and New Zealand economies;
  - (b) the effects on the Levin town centre (and other commercial centres) arising as a result of changes in patronage and accessibility;
  - (c) the effects on agricultural and horticultural activity in and around the Ō2NL Project corridor;
  - (d) the positive effects of stronger population and economic growth in the Horowhenua District; and
  - (e) a qualitative assessment of the wider economic benefits (**WEBs**) of the Ō2NL Project, and an indicative quantification of their potential scale.
14. The economic effects have been examined using both an Economic Impact Assessment (**EIA**) and Retail Impacts Assessment (**RIA**). The assessment of wider benefits relies on analyses done for other major transport infrastructure projects in the southern North Island. Both aspects –

economic and wider benefits – are drawn on for consideration of the broader economy impact.

15. A key part of the assessment is the potential effect of the Ō2NL Project on Horowhenua's population growth. In addition, the assessment also considers improved accessibility from the Project and its impact on the larger Wellington economy.

#### **Positive effects – construction activity**

16. The Multi-Regional Input Output model (**MRIO**) approach examines interactions among industries to assess the effects of additional activity (construction) across the wider economy. The EIA shows a positive contribution to the Horowhenua District economy from the construction works required by the Ō2NL Project, which will vary in degree depending on what share of the construction activity is undertaken by businesses in Horowhenua District.
17. The expected net GDP impact on the Horowhenua economy from the construction phase is between \$59 million (medium local economic activity) and \$139 million (high local economic activity) in present value (**PV**) terms. That would represent an uplift in the District economy of 0.5% to 1.1% in the medium term (10 years), and it would see between 5% and 14% of the total construction-related GDP impact of the Project accrue to the Horowhenua economy.
18. The overall net GDP impact of the Ō2NL Project is estimated at \$1.166Bn to \$1.293Bn, which equates to approximately 11,000 to 12,400 person years of employment. Major shares of these overall impacts would accrue to the Wellington region (30% to 39% of the total) and the Manawatū-Whanganui region (14% to 22%), with most of the balance accruing to the rest of the North Island (31% to 38%). Its current role within the Wellington regional economy suggests that the Kāpiti Coast economy may see an increase of \$45- \$60m, and employment of 350-500 person years.

#### **Positive effects – population growth**

19. The Ō2NL Project is projected to stimulate additional population growth in Horowhenua, as the enhanced accessibility to the large Wellington economy would make Horowhenua more attractive as a place to live and work. For this assessment (consistent with the transport evidence of **Mr Philip Peet**), HDC's medium growth population and related household projections have

been used, which allow for faster growth than the Statistics NZ (SNZ) projections. The additional population growth would mean a larger Horowhenua District economy, with more economic activity and employment, into the long term.

20. Although it is difficult to estimate precisely the additional population growth in the Horowhenua District should the Project proceed, the medium and long-term effects on the Horowhenua economy would be substantial and positive. To illustrate, the difference between the SNZ high growth and the Council's higher projection would be in the order of \$3Bn of GDP for the Horowhenua District economy in PV terms. I consider that a proportion of this growth would be attributable to the Ō2NL Project. If it was 50% of the growth, that would mean that the positive effects of population growth would themselves be considerably greater than the positive impacts of construction activity, and would far offset the effects of loss of agricultural activity. Even on a conservative basis, then, I would expect substantial positive effects on the Horowhenua economy arising from Ō2NL.

#### **Net positive effects – centres**

21. One direct effect of additional population is an increase in spending power in the Horowhenua District, a substantial share of which is expected to accrue to the Levin town centre as the main retail and service hub. That is expected to more than offset reduction in town centre sales that would occur as a result of SH1 traffic no longer passing through the centre.
22. The current SH1 passes through the Levin town centre, providing direct access to, and visibility of, businesses for which passing motorists are potential customers.
23. A large share (79%) of Levin town centre current sales are made to consumers who reside in Horowhenua District. The shopping patterns of those local shoppers are unlikely to change substantially as a result of the Ō2NL Project because Levin will remain their primary shopping destination, irrespective of the changed route of SH1. Horowhenua residents may increase the share of their spend directed to Levin if the town centre becomes more attractive (i.e., as a result of less traffic and easier car parking) and offers a wider range of goods and services.
24. People from outside Horowhenua who visit Levin as a destination are also unlikely to change their shopping patterns significantly. Patronage from that

segment (14% of the total patronage figures) is not closely related to whether or not the state highway passes through the town centre. These non-local consumers spend more than pass-through shoppers, spending larger amounts, staying longer, and making multiple visits.

25. The group most likely to change their patronage of Levin town centre businesses are those non-local “passers-through”. However, this group contributes only 6% of total spending in town centre businesses, and their shopping is characterised by lower average spend per person than other consumer segments. Patronage of town centre businesses by these non-local, pass-through consumers is likely to reduce as a consequence of the Ō2NL Project.
26. Total annual Levin town centre retail sales are currently estimated at \$269m, with anticipated growth to between \$435m (low) to \$527m (medium) and \$625m (high) by 2043. At least part of that growth can properly be attributed to the Ō2NL Project as discussed above.
27. Two scenarios of potential impact from loss of passing trade show short term impacts of between -3.3% (if half of the passing trade is lost) and -6.1% (if all the trade is lost, i.e., a worst-case scenario). The worst-case scenario effects are expected to be offset by market growth quite quickly – up to 2.7 years in a low growth future, between 1 and 2 years (medium growth future), or less than 1.5 years (high growth future).
28. Those relatively fast recovery periods, combined with the strong underlying market growth (which would see town centre sales some 31% above current levels by 2029 in the medium growth scenario), indicate that adverse effects on Levin town centre's economy will be minor and temporary.
29. Further, the strong growth in the Horowhenua economy would mean significant potential for new retail businesses to establish and for the town centre's role to expand to better serve the future Horowhenua community.
30. The short-term direct and indirect adverse effects are sought to be minimised by the design and placement of interchanges along the Ō2NL Project corridor, with three interchanges servicing Levin, and facilitating access to the town centre.
31. Effects on other centres in Horowhenua District or Kāpiti Coast District are expected to be very small. Foxton to the north is on SH1, while Shannon is located on State Highway 57 (**SH57**) and is expected to be largely

unaffected. In the Kāpiti Coast District, the effects of trade being diverted from Ōtaki have already occurred as a consequence of the Peka Peka to Ōtaki project. The Ō2NL Project is not expected to increase diverted trade, although will make it faster to travel to Ōtaki from Levin, so there may be some positive economic effects for the centres in Ōtaki as a result of the Ō2NL Project.

32. Manakau and Ohau, located south of Levin, have a small number of retail and hospitality businesses which serve the local community, as well as passing SH1 traffic. The drop in sales to customers from SH1 is expected to be pro-rata with the reduction in traffic volumes (around -91% at Manakau and -68% at Ohau). The significance of such reduction will reflect those outlets' dependence on passing trade, in combination with the positive effects of market growth. For café and takeaway outlets, direct sales impacts of -15% to -25% may be expected in the future. However, market growth in the medium term will act to offset much of that effect, and any adverse effects would be minor, especially given the long advance notice of effects. The retail and hospitality sector as a whole in these locations can expect to have substantial growth.

#### **Wider economic benefits**

33. In addition to the short term and one-off construction effects, improving the transport connections between Levin and elsewhere is expected to unlock or facilitate a range of other benefits.
34. These benefits can be regional or more localised. They arise primarily from improved accessibility for consumers and businesses having greater ability to 'connect' across space, which results in changes to the competitive landscape. Those changes have implications for businesses' cost structures, and ability to compete in different markets; and include effects on productivity, employment, competition, and regional development.
35. Those benefits are likely to be more than minor for the Wellington region, and reflect the significant development that the Ō2NL Project will facilitate for residential and business activities. The total economic value added from the Project is estimated at \$1.166Bn to \$1,293Bn, sustaining in the order of 11,000 to 12,400 person years of employment. Major shares would accrue to the Wellington region (30% to 39% of the total), Manawatū-Whanganui region (14% to 22%), and the rest of the North Island (31% to 38%). Part of the Wellington region impact can be expected to accrue to the Kāpiti Coast

District economy, which currently accounts for 12% of the region's total employment in key industries, such as road and bridge construction, and other heavy and civil engineering construction. This suggests that Kāpiti Coast may receive 4% to 7% of the total economic effects (value added of \$45-\$60m, and an employment effect of 350-500 person years).

### **Adverse effects– agriculture and horticulture activity**

36. The indicative Project alignment crosses substantial rural areas and will impact a number of farming operations. Some farms will lose productive land, and some land may no longer be viable for current farming activities. This may in turn lead to job losses through displacement of rural sector activity.
37. That will have a negative impact on the Horowhenua economy, but one which will be very small in scale when compared to the economic benefits (including overall growth) that the Ō2NL Project will bring.

### **Summary**

38. The Ō2NL Project will generate positive economic effects, especially through its long-term stimulus to growth in Horowhenua District, as well as during the construction phase.
39. Some adverse effects will arise during both the construction and implementation phases, however, these adverse effects on the economy will be less than minor, and measures (such as signage and way finding to Levin) are proposed to mitigate against any adverse effects that cannot be avoided.
40. Overall, and in the medium to long term, the Ō2NL Project is expected to stimulate strong population and economic growth, and enhance performance of Levin town centre – the Horowhenua District's main commercial hub – as well as the wider economy.

### **WORK SINCE LODGEMENT**

41. Since the application was lodged, I have been involved in further work related to the effects of the Project on the economy. My analysis of the Horowhenua District economy showed some growth but very small changes in the economy in the period 2019 to 2022.<sup>1</sup> On that basis, I conclude that all of the

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<sup>1</sup> This was an internal analysis that I undertook for completeness, as part of the usual checking and monitoring of information relevant to a hearing.

effects I considered in the work presented in Technical Assessment O are accurate, and would not have been affected by growth in the economy.

42. I have also reviewed the section 198D report appendix of Mr Michael Cullen (Urbacity). Mr Cullen is identified as the witness on economic matters engaged by HDC and KCDC.
43. Mr Cullen considers that my assessment of the effects on the economy is appropriate.<sup>2</sup> He agrees with my conclusions that the Ō2NL Project will generate positive economic effects, particularly because of its long term stimulus to growth in Horowhenua District, together with positive effects during the construction phase.<sup>3</sup> He also agrees with my views as to the likely effects on population growth and economic growth in the District, likely enhancement of Levin town centre performance, and likely small effects on other centres.<sup>4</sup>
44. However, an important focus of Mr Cullen's report is the selected route for Ō2NL (being the N4 option).<sup>5</sup> In his view this route will significantly detract from the growth potential of Levin because the Project does not recognise the East West Arterial (**EWA**) connection between the proposed Tara-Ika area and Levin,<sup>6</sup> and therefore the proposed Tara-Ika urban development area will not have efficient access to the CBD and other parts of Levin town.<sup>7</sup> He comments on the "*divorce caused by Waka Kotahi's choice of Ō2NL alignment*".<sup>8</sup>
45. It was not necessary, for the purposes of my assessment, to examine the specifics of the Ō2NL alignment, nor the potential effects on Levin's growth of any options for east-west road connections between Tara-Ika and the rest of Levin.
46. In this regard, I note that the evidence of **Mr Peet** states that the Project will reconnect Queen Street East and Tararua Road, and will not result in any existing connections in its vicinity being severed. These are the main existing direct road connections between Levin town centre and the area that is covered by the Tara-Ika plan change.

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<sup>2</sup> Technical report of Michael Cullen – urban economics (27 April 2023) at [34]-[36].

<sup>3</sup> Above n 2, at [18].

<sup>4</sup> Above n 2, at [18].

<sup>5</sup> As set out in section 3.2 (p15) of the AEE, "*This option is located to the east of SH1 and bypassed Levin to the east of SH57.*"

<sup>6</sup> Which Mr Cullen states at [25] is "*shown in bold on the Structure Plan accompanying Plan Change 4*".

<sup>7</sup> Above n 2, at [21(a)] and [21(b)].

<sup>8</sup> Above n 2, at [21(a)].

47. I do not agree with Mr Cullen's contentions. He has not offered an assessment to support his views, such as modelling of likely travel movements from Tara-Ika to and from other parts of Levin, to show any differences between connections through the existing roads, and the existing roads plus an EWA. I note that Levin has a largely rectangular grid roading pattern, and the road layout would suggest that Queen Street East and Tararua Road offer relatively straightforward access to Levin town centre direct on Queen Street or on Tararua Road and SH1. However, I have not specifically examined this matter, and in my view, it is able to be appropriately addressed by relevant traffic and transport experts.
48. Mr Cullen appears to have assumed that the development of the EWA or any other such links is the responsibility solely of Waka Kotahi. He does not consider the prospect that any other party might undertake provision of transport infrastructure to support housing and urban growth in Tara-Ika. In this regard, I note that the projected capacity for Tara-Ika of around 3,500 households and dwellings implies total built development and land value uplift over time in the range of \$3.5 to \$4.0Bn. That scale of private development in housing alone would suggest incentive and opportunity for private sector initiatives to construct an EWA or other similar connecting roads. I note that it is not uncommon for new urban developments with a long-term time frame (30+ years) to have their infrastructure – including transport infrastructure – provided progressively in anticipation of the medium-term prospects, rather than all occurring in the early years of development, well ahead of future demand.
49. Much of Mr Cullen's statement otherwise presents his views on the responsibilities of Waka Kotahi to provide east-west links between Tara-Ika and the rest of Levin.
50. In any case, however, the evidence of **Mr Lonnie Dalzell** confirms that Waka Kotahi has offered to fund the overbridge across the Ō2NL route, enabling the EWA.
51. Having reviewed the report of Mr Cullen, I consider there is no evidence there which alters my key conclusions identified above.

## COMMENTS ON SUBMISSIONS

52. I have reviewed the submissions relating to economic effects of the Project, all of which make positive remarks regarding the Project's economic benefits.<sup>9</sup> I note that one of those submitters – Adrian Gregory – endorses the findings in my technical assessment in general (including in terms of generally positive long-term effects on Levin town centre), however he also emphasises the importance of a proactive approach to offsetting adverse effects on trade, especially during the construction and development phase.
53. I agree that such offsetting will not necessarily occur 'naturally', and I recognise that a proactive approach will be important for minimising short- to medium-term adverse effects on trade and centre performance. In my view that proactive approach has already commenced through work undertaken by HDC.
54. As discussed in Technical Assessment O, HDC's *Transforming Levin, Levin Town Centre Strategy* is aimed at creating an evolving, vibrant, resilient, and sustainable centre while also providing guidance on dealing with challenges facing the town centre. This Strategy identifies Ō2NL as a "huge opportunity" for transformation, and aligns with HDC's *Horowhenua 2040 Strategy*, which is focussed on the Horowhenua District's growth and how to respond to opportunities arising from that growth.<sup>10</sup>

**James Douglas Marshall Fairgray**

**4 July 2023**

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<sup>9</sup> See the submissions of the Central Economic Development Agency (CEDA), Iā Ara Transporting NZ, The Horowhenua Company Limited, Antony and Nancy Young (who own Noho Farm in Levin), The Horowhenua New Zealand Trust, Lynette Bailey (of Foxton), Accelerate25, Adrian Gregory (of Ōtaki) and HDC elected members.

<sup>10</sup> [101]–[105] of Technical Assessment O.