In the matter of The Resource Management Act 1991

And

In the matter of Proposed Waikato Regional Plan Change 1 –

Waikato and Waipā River Catchments

Hearing 2

Statement of Primary Evidence of **Bridget Robson**for
CNI Iwi Holdings Limited (CNIIHL)
Submitter number 74026

3 May 2019

Qualifications and experience

- 1. My name is Christine Bridget Robson. I specialise in RMA environmental management, with particular interest in the effectiveness of the entire policy cycle, from the science supporting policy development to compliance with that policy.
- 2. I hold a Bachelor of Agricultural Science and a Master of Philosophy in Resource and Environmental Planning, both from Massey University. My 35 years of work experience spans government (central and local), industry, and providing technical advice to lwi land owners. My work most relevant to this plan includes Land Use Capability assessment, RMA policy development and review of both Regional Policy Statements and regional plans. My experience ranges from the "ground zero" decisions on acquiring raw science for policy development, through policy design and policy implementation. An eight-year role developing and managing the Bay of Plenty Regional Council (BOPRC) geothermal programme required familiarity with conceptual and reservoir modelling.
- 3. As well as roles in regional councils I have held environmental advocacy and implementation roles in the forestry and energy sectors. I managed environmental operations for the 330,000ha Carter Holt Harvey Forests' estate, which required interaction with planning documents for 39 regional and district councils. I ran hydro and geothermal environmental compliance programmes for what is now Mercury Energy Limited. I was principal policy advisor to MPI for the development of the National Environmental Standards for Plantation Forestry.¹ I provided technical advice to Te Arawa River Iwi Trust for the latter part of the Waikato Healthy Rivers Collaborative Stakeholder Group (CSG) process, which I observed, as well as input to Te Rōpū Hautū.

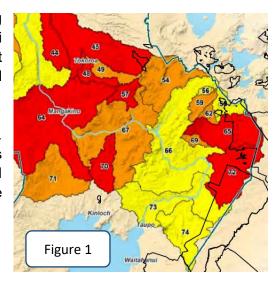
- 4. On behalf of CNIIHL I was the expert planner in the Environment Court proceedings for Proposed Plan Change 10 (PPC10) to the Bay of Plenty Regional Natural Resources Plan. PPC10 proposes a nitrogen allocation and trading regime for land use in the Lake Rotorua groundwater catchment. That hearing was 4-9 March 2019.
- 5. In preparing this evidence I have reviewed the plan change, supporting reports and relevant background documents and technical reports, including:
 - (a) Written material from the CSG process
 - (b) Waikato Regional Council's proposed Plan Change 1 and Variation 1;
 - (c) Waikato Regional Council's s32 report;
 - (d) Waikato Regional Council's s42A report;
 - (e) Vision and Strategy for the Waikato River;
 - (f) CNIIHL submission on PC1 and Variation.
- 6. Although this is a Council Hearing, I have read the December 2014 Environment Court Practice Note Code of Conduct for Expert Witnesses. I have complied with that Code when preparing my written statement of evidence and I agree to comply with it when I give any oral presentation.

Summary of Evidence

- 7. I provide analysis on the appropriateness of Officers' proposed responses on PC1 issues relevant to Hearing 2 for policy and planning, and structure my statement accordingly. This evidence covers an analysis of the appropriateness of policy and rule design and the appropriateness of the use of Overseer as a decision support tool.
- 8. I conclude that Waikato Regional Council's policy that has an intended direction of "setting up for allocation" for N leach management, is flawed. My argument is that it will lead to inefficient use of administrative resources by requiring a very large effort is expended on developing and using data, rather than that effort being expended on causing and supporting obvious behavioural interventions that would reduce diffuse contaminant discharges. I further contend that it will lead to inefficient use of natural and physical resources, because the direction of allocation is in accordance with current use, not in accordance with the suitability of the land for such use. That makes it inconsistent with the efficient use of natural and physical resources and with the integrated management of land and water. If Council considers that it must allocate, I consider that a natural capital approach more appropriately reflects the need for integrated management of land and water.
- 9. I support elements of the policy and rule redrafting set out in the s42A report that increase emphasis on a best management practice approach (BFP framework). I consider that due to a focus on continuous reductions in contaminant discharge, an ability to use national research and because it provides for response tailored to the property and land use, it provides a more appropriate policy framework than one based on meeting pollutant limits. There are still some elements that need further consideration in rule design. In Annex A I suggest changes to PC1 policy, rules and the glossary. In Annex B I suggest changes to better reflect the relationship between PC1 and the rules in section 3.5 of the Waikato Regional Plan.

CNIIHL's interest in Plan Change 1

- 10. CNI lwi Holdings Limited (CNIIHL) land holding is 34,000 Hectares, returned to the CNI lwi collective in 2008¹. The sub catchments that overlap with this land are 56, 65, 72, 73, and 74. See Figure 1.
- 11. Crown Forest Licences encumber this land. These progressively terminate over 35 years ending in 2044. The PPC1 design will constrain future land use to forestry, despite parts of this land being suitable for other uses.



Hearing Part 2 – Parts C1-C6: Policies, Rules and Schedules

Policy framework

- 12. Plan Change 1 intends to improve the Waikato and Waipa water quality. It requires improved diffuse discharge management at an individual property level for four contaminants. The primary mechanism to achieve this is tailored property environmental plans. It seeks a "hold the line" approach at FMU, sub catchment and enterprise level followed by "sinking lid" for N leach management.
- 13. In the Waikato the most significant water quality deterioration at the largest number of sites is that of total nitrogen².
- 14. Overall the proposed approach of PPC1 has two distinct elements. For N leach a land use intensity approach is used, with an intent to lead to a numeric allocation regime in a subsequent plan change. PPC1 thus is "setting up" for allocation. For phosphorus, pathogens and sediment a (largely) Critical Source Area (CSA) approach is used, via tailored good practices. These are not linked to a numeric allocation regime.
- 15. I am not aware of any explanation for the difference in approach between N and the other three contaminants and it does appear possible that this distinction may not adequately capture the nitrogen contamination from overland discharges.
- 16. Each property is required to develop a Farm Environment Plan (FEP). For N leach management each FEP must establish a Nitrogen Reference Point (NRP) which sets

¹ Deed of Settlement of the historical claims of CNI (Central North Island) Forests Iwi Collective to the Central North Island Forests Land 25 June 2008

² Trends in river water quality in the Waikato region, 1993-2017 ISSN 2230-4363

- their N leach baseline. The proposal is that the NRP is derived from land use of 2014-2016 i.e. the N leach capacity per property is set, thus it is a grandparenting approach.
- 17. The intent is then to use the NRP to require all properties, depending on their leach level, to either not exceed their NRP or to make reductions. I.e. The NRP is used to define the start point of a hold-the-line followed by sinking-lid approach to N leach. The proposal is that the tool used to establish the NRP is Overseer.
- 18.I cannot find much analysis on whether the methodology proposed in PPC1 will be efficient, effective or appropriate, to achieve an outcome of improved water quality, while managing land and water in an integrated way. It is not clear to me why it was considered necessary to use a numeric allocation approach for N leach, but the other contaminants could be managed without requiring numeric allocation. This numeric approach will have a high administrative load to develop the data set without necessarily leading to good progress on water quality improvement. I.e. the methodology will require a large resourcing commitment to generate the N leach numbers and this could well distract effort from the objectives of the plan change. It may also not pay sufficient attention to N pollution that is occurring as overland flow from critical source areas or from infrastructure failure such as effluent irrigation system malfunction. It does not actively consider the integrated management of land and water, in which the land is regarded as a resource in its own right. In my opinion, this would require that any allocation approach was based on natural capital.
- 19. The objective is water quality improvement from its present deteriorated state, due (in part) to diffuse agrarian contaminant discharges. For N leach these trigger conditions relate to land use intensity and to land use practices, as N contamination can enter water directly and reach water through groundwater. The policy tools need to:
 - a. identify trigger conditions that will require a behaviour change by land users (rules and their status) and
 - b. identify what behaviour change is required (rule content) to reach the objective,
 - decide what descriptor should be used to identify the trigger conditions for that rule hierarchy.
- 20. Policy would then scrutinise what trigger to use for behaviour change. A series of logical questions could be: How is the trigger related to the objective? What data informs it? Is it numeric? If so, what is the confidence in it accurately representing the problem? What resourcing is required to implement it?
- 21. I cannot find evidence that this type of analysis occurred. Instead what appears to have happened is that:
 - a. a decision was made to use an allocation approach,
 - b. a decision was made to use a tool that produced a numeric output with a relationship to the diffuse discharge of concern (thus superficially at least supporting an numeric allocation concept),
 - c. Policy was designed around numeric allocation using this tool.

- d. Because of the nature of the tool and a desire to measure what "hold the line" meant, the allocation approach distributes the resource according to current use, which is grandparenting.
- 22. I cannot find analysis that checks were made so that the process described above avoided the risk of the tail (measurement tool) wagging the dog (policy design). Nor can I find comprehensive analysis of the capabilities or limitations of the instrument used to deliver the policy trigger, to confirm that it can be implemented successfully. This would include analysis on the degree of confidence in that instrument and thus the specificity with which it can reasonably be used in the policy. Instead it appears that the ability to produce numbers has led to a sense of accuracy with which the problems can be represented that is misplaced. Lack of awareness of false precision issues has led to policy design that relies on inappropriate numeric components.
- 23. The policy and rule design sets in train a process to prepare for allocation in a subsequent plan change. The proposed nature of the allocation process should therefore colour the nature of the rules and methods. Policy 7, due to be heard in Hearing 3, sets out the principles for allocation, however the Policy 7 approach is markedly different from the approach set out in policies 1 and 4, in which the NRP derived from current use sets the trajectory for change at an individual property level. The parameters being measured in PPC1 (indicated in the methods) and the parameters that would need to be measured to support policy 7, (which would relate to land use suitability) show little commonality. To bridge that gap requires attention is paid to the process by which *present* land use will make a transition to *appropriate* land use, with a clear indication of how land use intensity will be reduced when it is clearly beyond the assimilative capacity of the land.

Suitability of Overseer for use as a policy trigger

- 24. The s42A report makes a number of statements about the appropriate use of Overseer. In my opinion only some of these are correct. The s42A report correctly identifies that:
 - a. Overseer was not designed to be used in an absolute sense³.
 However it does not identify that the NRP is an attempt to use Overseer in an absolute sense⁴.
 - b. Overseer was designed to be used in a relative sense only. However "relative" has further riders that the s42A does not note, meaning that the s42A report is incorrect about the extent to which Overseer can reliably be used in a relative sense.
- 25. Overseer was designed so that a single and particular farm system could run alternative scenarios to identify what effect each scenario had on N leach. It was designed to make a comparison at that particular time. Each version change, which happens quite frequently, modifies the algorithms. These changes have varying effects, but mean that

2

³ s42A report paragraph 19

⁴ s42A report paragraph 21, recommendation 3

between-farm differences will alter. The relationship is not constant for either physiography or land use. i.e. It was not designed to be used to compare:

- a. properties on different types of land. E.g. the way it represents N leach effects on peat or pumice soils will vary in different versions.
- b. different land uses. E.g. the N leach effects of different stock types will vary with different versions. Overseer was not designed to compare
- c. effects over several time periods. The version changes refine the model's reflection of reality.
- 26. As has already been commented on extensively, different versions of Overseer produce considerably different outputs, despite no change in action on the ground. I therefore consider that the s42A report wrongly characterises that the relative use of Overseer in PPC1 is in accordance with the intended use of Overseer.
- 27. Despite it being clear that Overseer does not have a constant longitudinal (over time), lateral (to other properties) or land uses (different stock types) relationship, PPC1 anticipates using it for these three comparisons. Specifically I believe the s42A report elides the limitations of Overseer in making these statements:
 - ⁵1. Two farms with the same Overseer estimate are likely to be leaching broadly similar amounts of N, **irrespective of differences in land use or physiography**.
 - 3. A farm with a higher Overseer estimate is likely to be leaching more than a farm with a lower Overseer estimate, **irrespective of differences in land use or physiography**.
- 28. Further, suggesting that "Overseer can be used to estimate catchment level N leaching, by accumulating property level estimates of N leaching⁶" gives an impression that use of Overseer in this absolute sense will provide meaningful information. For the reasons noted above that is highly unlikely.
- 29. If use of Overseer was able to provide accurate data that could be definitely linked to outcomes in groundwater and in-stream N levels I would have fewer reservations. My concern is that intent to use Overseer in a pivotal way for the NRP has not adequately recognised the limitations of this model for use in this context.
- 30. In the meticulously studied (and relatively homogenous) catchment of Lake Rotorua the guesstimates of N leach are substantial. Scaling this exercise up to the entire Waikato and Waipa catchment with its huge variety of landforms and soil types will take on a whole new level of error. PPC1 therefore lacks a mechanism to accurately assess N leach contribution of all properties in the catchment or in sub catchments in a numeric accounting sense. I would therefore disagree that "This can be useful for helping to build understanding of the relationships between catchment land use and receiving water body N concentrations" to any meaningful extent. This throws into question the entire point of the exercise. If it's not possible to numerically characterise N leach, done to create an

5

⁵ s42A report paragraph 49

⁶ s42A report paragraph 49 page 14 point 7

⁷ s42A report paragraph 49 page 14 point 7.

- allocation system, then why make the policy instrument to drive N leach reduction an allocation regime?
- 31. Council lacks a compliance-grade numeric mechanism to assess land use intensity. It will therefore need to rely on other techniques to address over-intensive land use. Fortunately there are a number of studies that identify land uses, land use practices and stocking rates that would provide triggers and cause to apply close scrutiny regarding these properties likely leach output. I.e. rather than attempting to achieve a full numeric stocktake of all sources by requiring all land users to complete a NRP exercise, it would be a more appropriate use of resources to actively target known high intensity activities. The revisions to the policy to use stocking rates as a trigger seem to be an appropriate technique although the plan still needs to describe how stocking rate intensity will be measured. For example would this be across an entire property? If so it is likely to encourage retirement from grazing of unsuitable areas. If it was effective area only, that would discourage such land retirement.

Proposed alternative to numeric pollution limits

- 32. The consequence of abandoning the idea of full accounting-style coverage would require changes to policy 1(b1), rule 3.11.1A, rule 3.11.5.2A, rule 3.11.5.3, rule 3.11.5.4 and the Glossary, as these all refer to matters that explain or rely on target percentiles of the NRP leach total. The upshot of such a change is that the enormous effort required to develop a full data set from which to derive the percentile values could instead be usefully directed to action on the high risk activities. No time would need to be wasted arguing whether the data are correct either.
- 33. In my opinion such an approach is likely to be a more effective, efficient and appropriate policy regime. On a related note, the existing Waikato Regional Plan has two rules for diffuse farming discharges in section 3.5. Full compliance with these rules would make a very large difference to water quality, yet compliance with these two rules regularly eludes Council. It is difficult to see the value of creating a much more complex rule environment when the challenges of implementing the existing rules remain to be overcome.
- 34. The hearing splits meant that Hearing 2 considers most policies, rules and schedules, with some deferred to Hearing 3 for consideration. From a volume-of-material perspective these splits make the hearing process more manageable. However there are aspects of the material that will be covered in the third hearing that affect the response to material covered in the second. Policy 7 which sets out broad considerations for allocation is in this category, as it would revise elements of the rules. i.e. the design of this policy interacts with the results of hearing 2 rather than being consequential in hearing 2. I hope that should we find that we have to circle back to material in hearing 2 as a consequence of seeing what is recommended for hearing 3, that the hearing process can accommodate that.

Consequential amendments to Waikato Regional Plan

- 35. A number of consequential amendments to Waikato Regional Plan are proposed, however I have been unable to find the analysis that supports or explains the rationale for the proposed changes in the s42A report. The section 32 report advises that:
 - Plan Change 1, which focuses on the Waikato and Waipa Rivers, will be incorporated into the Regional Plan as a new chapter, and with consequential changes to embed this new chapter into the overall plan. The new chapter is catchment-specific **and is complementary to existing provisions** in the Regional Plan.
- 36. In my opinion the extent and nature of the changes proposed to the existing plan are not always appropriate. The inappropriate amendments are those to the rules of section 3.5. For example rule 3.5.5.1 has been through the rigour of the Schedule One process, provides for sound effluent irrigation discharge management practice in a uniform manner throughout the region, it is specific, it is effects based and it provides performance certainty. The amendment to this rule means that it will now only apply to point source discharge of contaminants in the Waikato and Waipa catchments. There are no parameters of a similar nature proposed for use in the FEPs so it is not being replaced with anything of similar certainty. I further note that if the provisions of this rule were adhered to systematically a large improvement to water quality would be evident. The Waikato Regional Council's attitude to compliance and enforcement of this rule has varied, but generally has erred on the side of a low proportion of sites being checked and on some occasions advising farmers that no compliance assessments would be occurring (in extended wet periods). I consider that this is inappropriate abrogation of responsibility.
- 37. The changes proposed for rule 3.5.5.2 discharge of feed pad and stand-off pad effluent to land, rule 3.5.5.3 Discharge(s) of Effluent from Pig Farms onto Land and the related discretionary activity status for both are also inappropriate. In my view the content of these rules, which require standard good practice, is entirely appropriate. It appears that the changes sought could be due to rule status conflict issues, because of the PPC1 rule structure vis a vis the existing plan structure for which this is a permitted activity. Certainly these status conflict issues need to be resolved, however other options exist for resolving them than obliterating the substance of the rule. I consider that the content of the rules needs to remain, and the conflict of rule frameworks be resolved through carveout and cross reference. This could be via inclusion in the generic discharge rule 3.11.5.8 (see Annex 2)

Conclusion

38. In my opinion Waikato Regional Council lacks the tools to put in place an allocation approach for the capacity to leach nitrogen. In my view signalling such an approach, in the absence of such tools and data, is imprudent. The present policy approach will result in grandparenting at the enterprise and sub-catchment level. This will not lead to the efficient use of land, thus is not an appropriate option for the integrated management of land and water while meeting water quality goals. It will also consume an inordinate proportion of the Council's and community resources, which would be better used in developing and implementing targeted good management practices.

- 39. I consider that much greater progress would be made towards the objectives of the Vision and Strategy, and the objectives of PPC1 if the policies, rules and schedules were modified to:
 - strengthen the provisions for creating and implementing farm environment plans,
 - use stocking rates, being a close proxy for land use intensity, for the rule hierarchy,
 - retain the effluent management rules already in place in the Waikato Regional Plan section 3.5 and
 - provide the political will and resources to implement these provisions fully.
- 40. The suggested changes to the text in Annexes A and B are to support that outcome.

Annex A - changes sought to PPC1 provisions, further to those in the s42A report

Policy 1: Diffuse discharge management

Reduce catchment-wide and sub-catchment-wide diffuse discharges of nitrogen, phosphorus, sediment and microbial pathogens, by:

- a1. Requiring all farming activities to operate at Good Farming Practice, or better; and
- a2. Establishing, where possible, a Nitrogen Reference Point for all properties or enterprises <u>for withinenterprise</u> diffuse discharge management only; and
- a. Enabling activities with a low level of contaminant discharge to water bodies; and
- b. Requiring farming activities with moderate to high levels of contaminant discharge to water bodies to reduce their discharges proportionate to the amount of (2016) discharge and the water quality improvements required in the sub-catchment; and
- b1. Calculating the 75th percentile and 50th percentile nitrogen leaching values and requiring farmers with a Nitrogen Reference Point greater than the 75th percentile to reduce nitrogen loss to below the 75th percentile and farmers with a Nitrogen Reference Point between the 50th and 75th percentile to demonstrate real and enduring reductions of nitrogen leaching, with resource consents specifying an amount of reduction or changes to practices required to take place; and
- b2. Where Good Farming Practices are not adopted, to specify controls in a resource consent that ensures contaminant losses will be reducing;
- b3. Except as provided for in Policies [1(a) and] 16, generally granting only those land use and discharge consent applications that demonstrate clear and enduring reductions in diffuse discharges of nitrogen, phosphorus, sediment and microbial pathogens; and
- b4. Except as provided for in Policies [1(a) and] Policy 16, generally not granting land use consent applications that involve a change in the use of the land, or an increase in the intensity of the use of land, unless the application demonstrates clear and enduring reductions in diffuse discharges of nitrogen, phosphorus, sediment and microbial pathogens; and
- c. Progressively excluding cattle, horses, deer and pigs from rivers, streams, drains, wetlands and lakes.

Policy 5: Staged approach

To recognise that:

- a. All farmers, businesses and communities will need to contribute to achieving the <u>improvement in</u> water quality attribute states in Table 3.11-1; and
- b. Changes in practices and activities need to start immediately; and
- c. The rate of change will need to be staged over the coming decades to <u>minimise mitigate</u> social, economic and cultural disruption and enable innovation and new practices to develop; and
- d. Responding to the reasonably foreseeable effects of climate change will mean that different regulatory and non-regulatory responses may be needed in future

Policy 16: Flexibility for development of land returned under Te Tiriti o Waitangi settlements and multiple owned Māori land

For the purposes of considering land use change applications under Rule 3.11.5.7, land use change that enables the development of tangata whenua ancestral lands shall be managed in a way that recognises and provides for:

- a. The relationship of tangata whenua with their ancestral lands; and
- b. The exercise of kaitiakitanga; and
- c. The creation of positive economic, social and cultural benefits for tangata whenua now and into the future;

Taking into account:

- i. Best management practice actions for nitrogen, phosphorus, sediment and microbial pathogens for the proposed new type of land use; and
- ii. The suitability of the land for development into the proposed new type of land use, reflecting the principles for future allocation as contained in Policy 7, including the risk of contaminant discharge from that land and the sensitivity of the receiving water body; and
- iii. The short term water quality attributes set out states to be achieved in Objective 3.

Rule 3.11.5.1A – Interim Permitted Activity Rule – Farming

The use of land for farming, which is not a permitted activity under Rule 3.11.5.2, is a permitted activity until:

- 1. The later of 1 September 2021 or 6 months after this Plan becomes operative, for properties in Priority 1 sub-catchments listed in Table 3.11-2, and all properties with a Nitrogen Reference Point greater than the 75th percentile nitrogen leaching value; and
- 2. The later of 1 March 2025 or 1 year after this Plan becomes operative for properties in Priority 2 subcatchments listed in Table 3.11-2; and
- 3. 1 January 2026 for properties in Priority 3 sub-catchments listed in Table 3.11-2; subject to the following conditions:
 - 1. The property is registered with the Council in conformance with Schedule A; and
 - 2. Cattle, horses, deer and pigs are excluded from water bodies in conformance with Schedule C; and
 - 3. No commercial vegetable production occurs; and
 - 4. A Nitrogen Reference Point is produced for the property in conformance with Schedule B; and
 - 5. Full electronic access to Overseer or any other software or system that models or records diffuse contaminant losses for the farming land use authorised by this rule is granted to the Council; and
 - 6. There has been less than a cumulative net total of 4.1 hectares of change in the use of land from that which was occurring at 22 October 2016 within a property or enterprise from:
 - 1. Woody vegetation to farming activities; or
 - 2. Any farming activity other than dairy farming to dairy farming; or
 - 3. Any farming activity to Commercial Vegetable Production

Rule 3.11.5.2A - Controlled Activity Rule - Medium intensity farming

The use of land for farming, which is not a permitted activity under Rules 3.11.5.1A to 3.11.5.2, is a controlled activity subject to the following conditions:

- 1. The property is registered with the Council in conformance with Schedule A; and
- 2. A Nitrogen Reference Point is produced for the property in conformance with Schedule B; and
- 3. Cattle, horses, deer and pigs are excluded from water bodies in conformance with Schedule C; and
- 4. The farming activities do not form part of an enterprise; and
- 5. No commercial vegetable production occurs; and
- 6. Full electronic access to Overseer or any other software or system that models or records diffuse contaminant losses for the farming land use authorised by this rule is granted to the Council; and
- 7. A Farm Environment Plan has been prepared in conformance with Schedule 1 and has been approved by a Certified Farm Environment Planner, and is provided to the Council at the time the resource consent application is lodged; and
- 8. Either:
 - a. The Nitrogen Reference Point is not exceeded; or
 - b. The stocking rate of the land is no greater than 18 stock units per hectare and has not increased above the stocking rate during the Reference Period in Schedule B; and
- 6. There has been less than a cumulative net total of 4.1 hectares of change in the use of land from that which was occurring at 22 October 2016 within a property or enterprise from:
 - 1. Woody vegetation to farming activities; or
 - 2. Any farming activity other than dairy farming to dairy farming; or
 - 3. Any farming activity to Commercial Vegetable Production

Waikato Regional Council reserves control over the following matters:

- i. The content, compliance with and auditing of the Farm Environment Plan.
- ii. The actions and timeframes to achieve Good Farming Practices or better in order to reduce the diffuse discharge of nitrogen, phosphorus, sediment or microbial pathogens to water or to land where they may enter water.
- iii. For enterprises, the procedures and limitations, including Nitrogen Reference Points, to be applied to land that enters or leaves the enterprise.
- iv. Where the Nitrogen Reference Point exceeds the 75th percentile nitrogen leaching value, actions, timeframes and other measures to ensure the diffuse discharge of nitrogen is reduced so that it does not exceed the 75th percentile nitrogen leaching value by 1 July 2026.
- v. The term of the resource consent.
- vi. The timeframe and circumstances under which the consent conditions may be reviewed.
- vii. Procedures for reviewing, amending and re-approving the Farm Environment Plan.

OPTION Rule 3.11.5.3 - Restricted Discretionary Activity Rule – Farming with a Farm Environment Plan under a Certified Sector Scheme

The use of land for farming where the land use is registered to a Certified Sector Scheme is a restricted discretionary activity subject to the following conditions:

- 1. The property is registered with the Waikato Regional Council in conformance with Schedule A; and
- 2. A Nitrogen Reference Point is produced for the property or enterprise in conformance with Schedule B; and
- 3. Cattle, horses, deer and pigs are excluded from water bodies in conformance with Schedule C; and
- 4. The Certified Sector Scheme has been approved by the Chief Executive Officer of the Waikato Regional Council as meeting the standards criteria set out in Schedule 2; and
- 5. A Farm Environment Plan which has been prepared in accordance with Schedule 1 and has been approved by a Certified Farm Environment Planner, and is provided to the Waikato Regional Council at the time the resource consent application is lodged; and
- 5a. Full electronic access to Overseer or any other software or system that records farm data and models or records diffuse contaminant losses for the farming land use authorised by this rule is granted to the Waikato Regional Council; and
- 5b. There have been less than a cumulative net total of 4.1 hectares of change in the use of land from that which was occurring at 22 October 2016 within a property or enterprise from:
 - 1. Woody vegetation to farming activities; or
 - 2. Any farming activity other than dairy farming to dairy farming; or
 - 3. Any farming activity to Commerical Vegetable Production

Waikato Regional Council restricts its discretion to the following matters:

- i. The content, compliance with and auditing of the Farm Environment Plan.
- ii. The actions and timeframes to achieve Good Farming Practices or better in order to reduce the diffuse discharge of nitrogen, phosphorus, sediment or microbial pathogens to water or to land where they may enter water.
- iii. The effects, including cumulatively, of diffuse discharge of nitrogen, phosphorus, sediment and microbial pathogens, particularly where the activity may lead to an increase in the discharge of one or more contaminants.
- iv. For enterprises, the procedures and limitations, including Nitrogen Reference Points, to be applied to land that enters or leaves the enterprise.
- v. Where the Nitrogen Reference Point exceeds the 75th percentile nitrogen leaching value, actions, timeframes and other measures to ensure the diffuse discharge of nitrogen is reduced so that it does not exceed the 75th percentile nitrogen leaching value by 1 July 2026.
- vi. The term of the resource consent.
- vii. The timeframe and circumstances under which the consent conditions may be reviewed.
- viii. Procedures for reviewing, amending and re-approving the Farm Environment Plan.

Rule 3.11.5.4 – Restricted Discretionary Activity Rule – Farming with a Farm Environment Plan

The use of land for farming which is not a permitted activity under Rules 3.11.5.1A to 3.11.5.2, is a Restricted Discretionary activity subject to the following conditions:

- 1. The property is registered with the Waikato Regional Council in conformance with Schedule A; and
- 2. A Nitrogen Reference Point is produced for the property or enterprise in conformance with Schedule B; and
- 3. No commercial vegetable production occurs; and
- 4. A Farm Environment Plan has been prepared in conformance with Schedule 1 and has been approved by a Certified Farm Environment Planner, or prepared under a Certified Sector Scheme, and is provided to the Council at the time the resource consent application is lodged; and
- 5. Cattle, horses, deer and pigs are excluded from water bodies in accordance with Schedule C; and
- 6. Full electronic access to Overseer or any other software or system that models or records diffuse contaminant losses for the farming land use authorised by this rule is granted to the Waikato Regional Council; and
- 7. There have been less than a cumulative net total of 4.1 hectares of change in the use of land from that which was occurring at 22 October 2016 within a property or enterprise from:
 - 1. Woody vegetation to farming activities; or
 - 2. Any farming activity other than dairy farming to dairy farming; or

3. Any farming activity to Commercial Vegetable Production

Waikato Regional Council restricts its discretion to the following matters:

- i. The content, compliance with and auditing of the Farm Environment Plan.
 - ii. The actions and timeframes to achieve Good Farming Practices or better in order to reduce the diffuse discharge of nitrogen, phosphorus, sediment or microbial pathogens to water or to land where they may enter water.
 - iia. The effects, including cumulatively, of diffuse discharge of nitrogen, phosphorus, sediment and microbial pathogens, particularly where the activity may lead to an increase in the discharge of one or more contaminants.
 - iib. For enterprises, the procedures and limitations, including Nitrogen Reference Points, to be applied to land that enters or leaves the enterprise.
 - iv. Where the Nitrogen Reference Point exceeds the 75th percentile nitrogen leaching value, actions, timeframes and other measures to ensure the diffuse discharge of nitrogen is reduced so that it does not exceed the 75th percentile nitrogen leaching value by 1 July 2026.
 - v. The term of the resource consent.
 - vi. The monitoring, record keeping, reporting and information provision requirements for the holder of the resource consent to demonstrate and/or monitor compliance with the Farm Environment Plan.
 - vii. The timeframe and circumstances under which the consent conditions may be reviewed.
 - viii. Procedures for reviewing, amending and re-approving the Farm Environment Plan.
 - ix. Information to be provided to show that the property is being managed in a way that would not cause an increase in loss of contaminants, which may include annual Overseer modelling for the property or enterprise, or information on matters such as stocking rate, fertiliser application, imported feed and cropping

Schedule 2 - Certification of Sector Schemes for use with RD 3.11.5.3

The purpose of this schedule is to set out the minimum standards criteria for Certified-Sector Schemes to become certified.

Applications for approval as a Certified Sector Scheme shall be lodged with the Waikato Regional Council, and shall include information that demonstrates how the following standards criteria are met. The Waikato Regional Council may request further information or clarification on the application as it sees fit.

Approval will be at the discretion of the Chief Executive Officer of the Waikato Regional Council subject to the Chief Executive Officer being satisfied that the scheme will meet the standards criteria set out in sections A to D below.

A. Governance and management

Applications must include:

- <u>6. A draft contractual agreement with the Waikato Regional Council that will require the Scheme, on certification, to meet and maintain the standards outlined in Section A to D below.</u>
- 1. A description of the <u>ownership structure</u>, governance arrangements <u>and management</u> of the Scheme <u>available for public viewing</u>;
- 2. The contractual arrangements between the Scheme and its members <u>in which the responsibilities of all</u> parties to the Scheme are clearly stated.
- 3. A description of the process for gaining and ceasing membership;
- 4. A description of the Scheme <u>membership including area, including land uses, key environmental issues, property boundaries</u> and ownership details of members' properties;
- 5. The methodology by which an accurate and up to date register of scheme membership is maintained and WRC are advised of changes.
- 7. the quality assurance to be used for data collection and management
- 5. A procedure for keeping records of the matters in (4) above and advising WRC of changes;
- 6. A draft contractual agreement with the Waikato Regional Council that will require the Scheme, on certification, to meet and maintain the standards outlined in Section A to D below.

B. Preparation of Farm Environment Plans

Applications must include:

1. A statement of the Scheme's capability and capacity The methodology to be used for preparing and certifying Farm Environment Plans that meet the requirements of Schedule 1, including:

- a. the qualifications and experience of any personnel employed by or otherwise contracted to the Scheme to prepare or certify Farm Environment Plans;
- b. The process to be used to moderate, to ensure that Farm Environment Plan preparation is consistent within the Scheme
- 2. An outline of timeframes for developing Farm Environment Plans for its members.

C. Implementation of Farm Environment Plans

Applications must include:

- 1. A statement of the Scheme's capability and capacity—The methodology to be used for monitoring and assessing the implementation of Farm Environment Plans.
- 2. , including the <u>The qualifications</u> and experience of any personnel employed by or otherwise contracted to the Scheme to monitor or assess implementation of Farm Environment Plans;
- 2. A description of the expectations and agreements around for landowner and property record-keeping;
- 3. A strategy <u>The process to be used to</u> identifying and managing poor performance in implementing Farm <u>Environment Plans</u> any corrective actions required, to check that they have been implemented and if not to refer to Waikato Regional Council.

D. Audit and Reporting

Applications must include a description of an annual audit process to be conducted by an independent body, including:

- 1. A process for assessing performance against agreed actions in Farm Environment Plans at an individual property level;
- 2. A statement of how The methodology for sharing audit results will be shared with Council, the Scheme's members and the wider community;
- 3. A process for assessing the performance of any personnel employed by or otherwise contracted to the Scheme to prepare, certify, and audit the implementation of Farm Environment Plans.
- <u>4. The process to be used to moderate, to ensure that Farm Environment Plan audit is consistent within the Scheme</u>

A summary audit report must be submitted to the Waikato Regional Council annually.

Glossary

Certified Sector Scheme/s: is a <u>scheme</u> group or organisation responsible for preparing and assisting with the implementation of Farm Environment Plans that has been certified by the Chief Executive Officer of Waikato Regional Council and listed on the Waikato Regional Council website as meeting the standards criteria set out in Schedule 2 of Chapter 3.11.

75th percentile nitrogen leaching value: The 75th percentile value (units of kg N/ha/year) of all of the Nitrogen Reference Point values for dairy farming properties within each river (including properties within any lake Freshwater Management Unit within the relevant river Freshwater Management Unit) Freshwater Management Unit^ and which is determined by the Chief Executive of the Waikato Regional Council and published on the Waikato Regional Council website and can be based on aggregated data supplied to the Waikato Regional Council and individual farm data139 received by the Waikato Regional Council by YYY.

Stocking rate calculation

There is no guidance at the moment. Recommend it is based on the entire property, rather than effective area.

Annex B –consequential changes to Waikato Regional Plan rules further to those recommended in the s42A report

3.5.5.1 Permitted Activity Rule – Discharge of Farm Animal Effluent onto Land

The <u>point-source</u> discharge of contaminants onto land outside the Lake Taupo Catchment from the application of farm animal effluent, (excluding pig farm effluent), and the subsequent discharge of contaminants into air or water, is a **permitted activity** subject to the following conditions:

- a. No discharge of effluent to water shall occur from any effluent holding facilities.
- b. Storage facilities and associated facilities shall be installed to ensure compliance with condition a).
- c. All effluent treatment or storage facilities (e.g. sumps or ponds) shall be sealed so as to restrict seepage of effluent. The permeability of the sealing layer shall not exceed 1x10⁻⁹ metres per second.
- d. The total effluent loading shall not exceed the limit as specified in Table 3-8, including any loading made under Rules 3.5.5.2 and 3.5.5.3, 3.5.6.2, 3.5.6.3 or 3.5.6.4.
- e. The maximum loading rate of effluent onto any part of the irrigated land shall not exceed 25 millimetres depth per application.
- f. Effluent shall not enter surface water by way of overland flow, or pond on the land surface following the application.
- g. Any discharge of contaminants into air arising from this activity shall comply with permitted activity conditions in Section 6.1.8 of this Plan.
- h. The discharger shall provide information to show how the requirements of conditions a) to g) are being met, if requested by the Waikato Regional Council.
- i. The discharge does not occur within 20 metres of a Significant Geothermal Feature*.
- j. Where fertiliser is applied onto the same land on which farm animal effluent has been disposed of in the preceding 12 months, the application must be in accordance with Rule 3.9.4.11.

3.5.5.2 Permitted Activity Rule - Discharge of Feed Pad and Stand-Off Pad Effluent onto Land

The <u>point-source</u> discharge of feed pad and stand-off pad effluent to land outside the Lake Taupo Catchment and the subsequent discharge of contaminants to air is a **permitted activity** subject to the following conditions:

a. The pad shall be sealed, ...

To capture the content of the existing plan rules in PPC1 two options are presented below:

Option 1 - import the content of rule 3.5.5.1 and 3.3.5.2 to rule 3.11.5.8 3.11.5.8 Permitted Activity Rule – Authorised Diffuse Discharges

The diffuse discharge of nitrogen, phosphorus, sediment and or microbial contaminants from farming onto or into land in circumstances that may result in a contaminant entering water that would otherwise contravene section 15(1) of the RMA is a permitted activity, provided the following conditions are is met:

1. the land use activity associated with the discharge is authorised under Rules 3.11.5.1 to 3.11.5.7; and for

- 2. the application of farm effluent to land:
 - a. No discharge of effluent to water shall occur from any effluent holding facilities.
 - b. <u>Storage facilities and associated facilities shall be installed to ensure compliance</u> with condition a).
 - c. All effluent treatment or storage facilities (e.g. sumps or ponds) shall be sealed so as to restrict seepage of effluent. The permeability of the sealing layer shall not exceed 1x10⁻⁹ metres per second.
 - d. The total effluent loading shall not exceed the limit as specified in Table 3-8, including any loading made under Rules 3.5.5.2 and 3.5.5.3, 3.5.6.2, 3.5.6.3 or 3.5.6.4.
 - e. <u>The maximum loading rate of effluent onto any part of the irrigated land shall not exceed 25 millimetres depth per application.</u>
 - f. <u>Effluent shall not enter surface water by way of overland flow, or pond on the</u> land surface following the application.
 - g. Any discharge of contaminants into air arising from this activity shall comply with permitted activity conditions in Section 6.1.8 of this Plan.
 - h. <u>The discharger shall provide information to show how the requirements of conditions a) to g) are being met, if requested by the Waikato Regional Council.</u>
 - i. The discharge does not occur within 20 metres of a Significant Geothermal Feature*.
 - j. Where fertiliser is applied onto the same land on which farm animal effluent has been disposed of in the preceding 12 months, the application must be in accordance with Rule 3.9.4.11.
- 3. The discharge of effluent from feed pad or stand off pad:
 - a. The pad shall be sealed, so as to restrict seepage of effluent. The permeability of the sealing layer for such treatment or storage facilities shall not exceed 1x10-9 metres per second.
 - b. There shall be no run-off or discharge of pad effluent into surface water.
 - c. Materials used to absorb pad effluent or the effluent itself when spread on land as a means of disposal shall not exceed the limit specified in Table 3-8 inclusive of any loading made under Rules 3.5.5.1, 3.5.5.3, 3.5.6.2, 3.5.6.3 and 3.5.6.4.The pad shall be located at least 20 metres from surface water.
 - d. Any discharge of contaminants into air arising from this activity shall comply with permitted activity conditions in Section 6.1.8 of this Plan.
 - e. <u>The discharger shall provide information to show how the requirements of this rule are being met, if requested by the Waikato Regional Council.</u>
 - f. The discharge shall not occur within 20 metres of a Significant Geothermal Feature*.
 - g. Where fertiliser is applied onto the same land on which farm animal effluent has been disposed of in the preceding 12 months, the application must be in accordance with Rule 3.9.4.11.
- $\underline{42}$. the discharge of a contaminant is managed to ensure that after reasonable mixing it does not give rise to any of the following effects on receiving waters:
 - (a) any conspicuous oil or grease films, scums or foams, or floatable or suspended materials; or
 - (b) any conspicuous change in the colour or visual clarity; or
 - (c) the rendering of fresh water unsuitable for consumption by farm animals; or
 - (d) any significant adverse effects on aquatic life.

Option 2 – modify rule 3.11.5.8 to refer to a requirement to also meet rule 3.5.5.1, 3.5.5.2 or 3.5.5.3

3.11.5.8 Permitted Activity Rule – Authorised Diffuse Discharges

The diffuse discharge of nitrogen, phosphorus, sediment and or microbial contaminants from farming onto or into land in circumstances that may result in a contaminant entering water that would otherwise contravene section 15(1) of the RMA is a permitted activity, provided the following conditions are is met:

- 1. the land use activity associated with the discharge is authorised under Rules 3.11.5.1 to 3.11.5.7; and
- 2. the discharge meets the conditions of Rule 3.5.5.1 to 3.5.5.3 (the original rules not modified by PC1)
- 2. the discharge of a contaminant is managed to ensure that after reasonable mixing it does not give rise to any of the following effects on receiving waters:
 - (a) any conspicuous oil or grease films, scums or foams, or floatable or suspended materials; or
 - (b) any conspicuous change in the colour or visual clarity; or
 - (c) the rendering of fresh water unsuitable for consumption by farm animals; or
 - (d) any significant adverse effects on aquatic life.