

Otago Regional Council Submission

on the

Proposed National Environmental Standard for Plantation Forestry

This is a submission to the Ministry for Primary Industries on the Proposed National Environmental Standard for Plantation Forestry.

The Otago Regional Council wishes to be heard in support of this submission. If others make a similar submission, the Otago Regional Council would not consider presenting a joint case with them at a hearing.

Signature of submitter (or person authorised to sign on behalf of submitter):



Fraser McRae

Director Policy, Planning and Resource Management

11 August 2015

Address for service:

Otago Regional Council

[REDACTED]
DUNEDIN 9054

Telephone:

Fax:

Email:

Contact person:

[REDACTED]
Fraser McRae, Director Policy, Planning and
Resource Management

Executive Summary

The Otago Regional Council (ORC) supports the work of the forestry industry in addressing the adverse effects of forestry activities and recognises the need for greater consistency in managing the effects of activities to achieve good environmental, economic and community outcomes. ORC notes that while some modifications have been made to the originally Proposed National Environmental Standard for Plantation Forestry (NesPF) in the light of submissions made in 2010, the proposal remains fundamentally flawed, being counter to the effects and activity-neutral basis of the Resource Management Act 1991 (RMA).

The proposal states that it would 'establish a technical standard for forestry activities'. It remains unclear whether the proposal relates to restrictions on use of land; on certain uses of beds of lakes and rivers; to water; or to discharges of contaminants.

The proposal presumes all district and regional plans require land use controls on plantation forestry, which is not the situation in Otago. Here, most land use controls are contained within district plans. ORC advocates for the 'one stop shop' principle, with district councils being responsible for controls on land use activities.

The proposed standard sets both more and less restrictive standards for those matters regulated under Otago plans, and it is unclear how the land use controls relate to Otago's effects-based regional policies and rules. The proposed NesPF creates even more rules, and it is very likely the proposal will be difficult to administer, creating inconsistent provisions relating to environmental effects, setting inappropriate rules for particular situations and leading to difficulties in taking compliance and enforcement action. ORC submits that regional rules should be able to be more stringent than the proposal.

The proposed permitted activity regime requires regional council monitoring but there is no opportunity for recovering the costs of maintaining records for permitted activities, or monitoring their performance. RMA cost recovery is related to consent administration. Additional costs for ensuring good environmental management are transferred to the local government sector, and consequently, to the public.

There is no difference between plantation forestry and any other activity in terms of the need to manage adverse environmental effects. Any other land use activity, whether dairying, deer farming, horticulture, or anything else, could develop its own national environmental standard, risking further inconsistencies in managing adverse environmental effects.

In summary, ORC queries whether a national environmental standard is the best technique for forestry, and submits that the proposed standard fails to achieve many of the principles that underpin sound resource management. Accordingly, it should be withdrawn. Alternatively, if the proposed standard is not withdrawn, then it should be amended to address all the issues raised in this submission.

Finally, ORC supports the submission of Local Government New Zealand.

NB: All page references are to the NesPF consultation document June 2015

Full Submission

1. Relationship of NESPF to RMA and restrictions for land use, water and discharges

- 1.1 The proposal states that the NESPF would ‘establish a technical standard for forestry activities’ [page 7]. It remains unclear whether the proposal relates to RMA section 9 (restrictions on use of land), or sections 13 (restrictions on certain uses of beds of lakes and rivers), 14 (restrictions relating to water) or 15 (discharges of contaminants into environment).
- 1.2 The proposal also states that the provisions address perennial river or streams [e.g. pages 52, 67], rather than rivers as defined in the RMA. This introduces confusion around the definition of a river, and fails to address managing adverse environmental effects and risks for rivers, and beds and banks of rivers, that are not ‘perennial rivers’.
- 1.3 The proposal also presumes all regional plans require land use controls on plantation forestry. This is not the situation in Otago, where most land use controls are contained within district plans.
- 1.4 Within Otago, ORC and the city and district councils already have a ‘one stop shop’ approach to managing RMA responsibilities, with the local councils addressing land use activities and their effects.
- 1.5 ORC advocates for:
- the ‘one stop shop’ principle for managing land use activities;
 - district rules to address land use activities, as far as possible; and
 - clarity and consistency in use of key resource management terms, such as ‘river’, both within and between regions.

2. Ability to have more stringent, consistent provisions

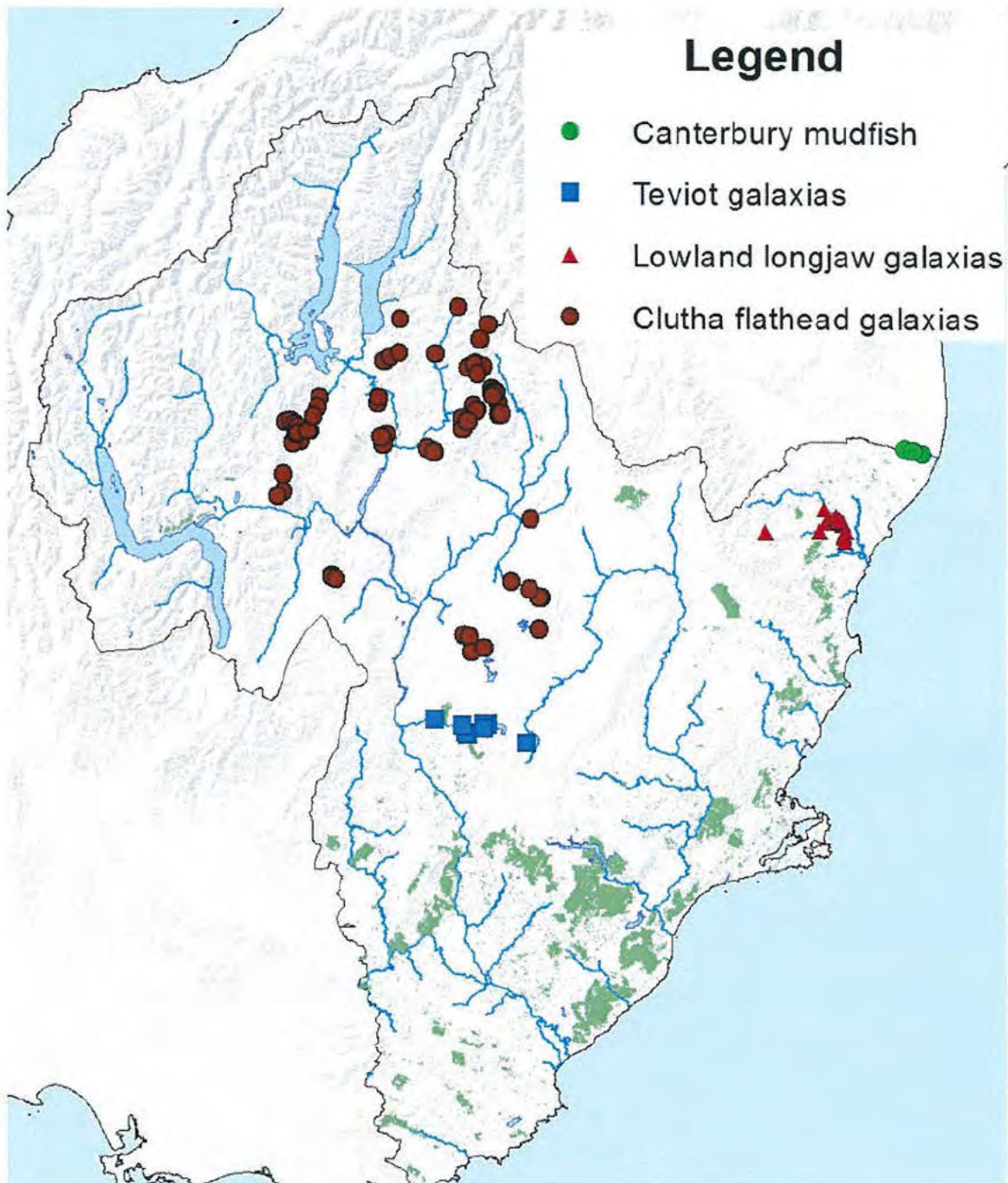
- 2.1 ORC has had an operative Water Plan since 2004, which has been progressively changed to give better effect to the National Policy Statement for Freshwater Management. The freshwater limits set for Otago are generally more stringent than those set for the ‘A’ attribute state for water in the National Objectives Framework.
- 2.2 The proposed standard sets both more and less restrictive standards for those matters regulated under Otago regional plans, and it is unclear how the land use controls relate to Otago’s effects-based regional policies and rules. It is very likely the proposal will create inconsistent provisions relating to environmental effects, set inappropriate rules for particular situations and result in difficulties in achieving compliance or taking enforcement action.

- 2.3 For example, it is unclear how more stringent rules may apply with regard to ‘freshwater objectives not being met’ [page 23]. It is also unclear whether or not outstanding water bodies may be protected by more stringent rules.
- 2.4 ORC has identified its freshwater limits in the Regional Plan: Water for Otago. Those water bodies that do not meet particular freshwater limits are identified, and instream limits set but not met are expected to be met by 1 April 2025. Many rivers and lakes do not currently meet at least one of the five freshwater limits set.
- 2.5 ORC supports a clear and consistent approach to managing adverse environmental effects, which clearly allows for more stringent regional/district objectives, policies and rules, and not just for specific matters.

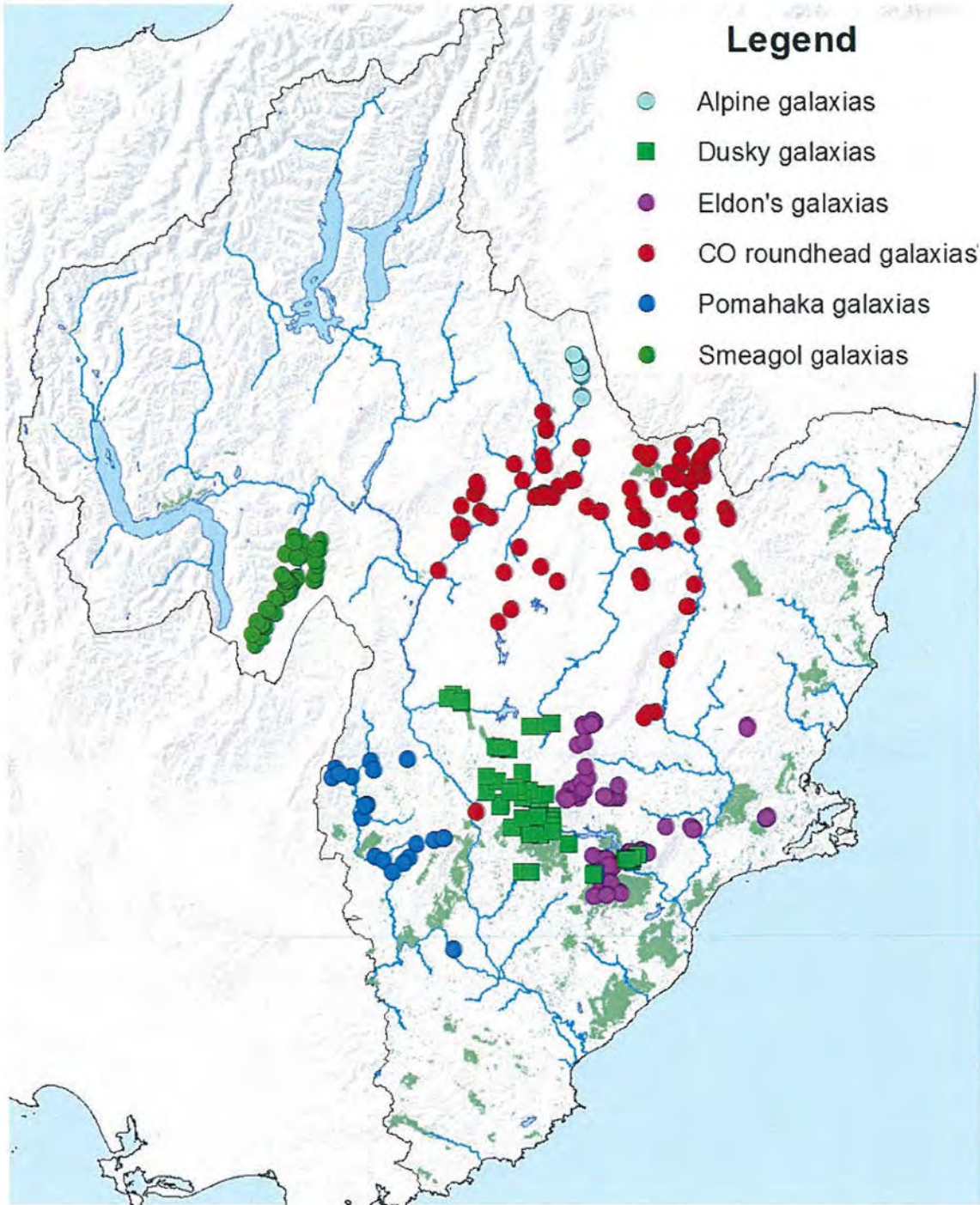
3. Threatened fish species in Otago

- 3.1 This section provides a practical illustration of how difficult it could be to administer the proposed standard in Otago in terms of threatened fish species.
- 3.2 Otago has a rich fish resource base, which includes some of the most threatened fish species [galaxiids] in New Zealand:
- Nationally critical: 4 out of 5 species (3/5 only Otago)
 - Nationally endangered: 6 out of 6 species (6/6)
 - Nationally vulnerable: 3 out of 10 species (1/10)
 - “At risk” – declining: 9 out of 14 species
- 3.3 The next three maps show the distribution of these threatened species relative to existing forestry. The mapped areas shaded in green are forestry. The only area in Otago with few known significant fish is the limited stretch of coastal forestry between the Clutha Mata Au and Tokomairiro Rivers.
- 3.4 Several species (e.g. dusky galaxias, Eldon’s galaxias) are found in areas with a lot of forestry. The fish distribution model developed by NIWA predicts the distribution of these species.
- 3.5 Practically, it is hard to predict from a model what the site specific effects from harvesting or fallow ground might be.
- 3.6 Further, these fish may spawn at any time of the year, and many are found in those reaches of water that fall outside the scope of the proposed NESPF, being under 3 metres in width and not ‘perennial’.
- 3.7 Accordingly, ORC submits that its effects-based framework for managing discharges to water, or to land in a manner that may enter water, is more effective in addressing the unique and varying features of freshwater fisheries and rivers across the region than the method in the proposed NESPF.

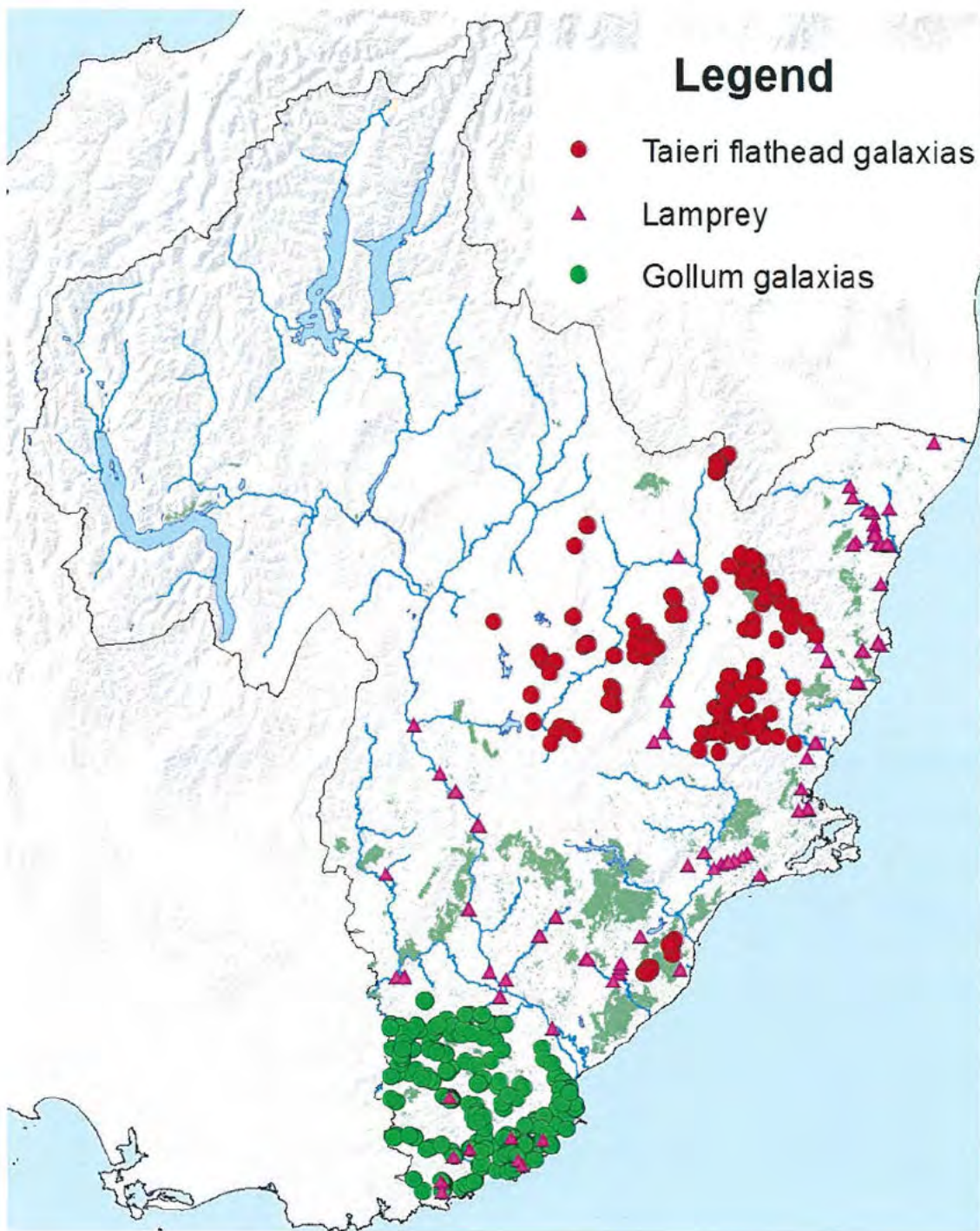
Map 1: Distribution of nationally critical fish species in Otago



Map 2: Distribution of nationally endangered fish species in Otago



Map 3: Distribution of nationally vulnerable fish species in Otago



4. Sediment management

4.1 ORC notes that for sediment, national guidance has never been provided as a blanket approach has been considered inappropriate. Rather, sediment was seen as better managed at a catchment level as there is so much variability between different catchments.

4.2 ORC opposes the use of the suite of erosion risk assessment tools [pages 25-28] as they are based on modelling risk, rather than assessment of effects.

4.3 One of the greatest risks for small rivers, shallow lakes and estuaries is from sediment produced during forest harvesting. Sediment discharges can lead to:

- sedimentation on the river, lake or estuary bed;
- more turbid (cloudy) water; and
- may result in significant inputs of phosphorus into aquatic systems.

These changes can lead to changes in the quality of available habitat, reduce the cover and biomass of macrophytes (water weeds), and increase the risk of nuisance algal growths (e.g. cyanobacteria), affecting ecological health, aesthetic appeal and suitability for recreation (e.g. fishing, swimming).

4.4 For earthworks, the proposed controls relate to the construction of sediment control measures rather than their operation. Conversely, the harvesting provisions prevent sediment entering any water body, which is an extremely tight control.

4.5 Further, the proposed permitted activity standards appear to enable both dragging logs and vehicle movements through ephemeral rivers and smaller rivers, both of which are highly likely to generate sediment which in turn can disturb and smother fish and fish habitat, particularly that of the species discussed earlier.

4.6 ORC considers that sediment entering rivers, lakes and estuaries is one of the main environmental threats from forestry activities, including during harvesting and the fallow period, and before ground cover has been re-established. The proposed provisions are too lenient, even though they may represent an improvement for practice in some parts of the country.

4.7 Regional discharge rules should clearly be able to be more stringent than the proposed standard, in order to deal effectively with adverse effects and site specific matters.

5. Monitoring and enforcement

5.1 ORC has a programme for monitoring and enforcing its regional plans which:

- Is able to respond quickly to actual events;
- Addresses high risk activities, such as dairy farm effluent management;
- Ensures major consents are checked regularly;
- Provides research data on specific topical matters;

- Contributes towards ongoing state of the environment reporting and development of policy.
- 5.2 The proposed permitted activity regime requires regional councils receive, assess and monitor particular forestry activities at times of greatest risk of damage to the environment. The effect is to create another set of rules: it doesn't take rules away, it just adds more complexity.
- 5.3 The forest management plan is lodged, but there is no cost recoverable mechanism for assessing the quality of that plan, or developing an appropriate monitoring response.
- 5.4 There is also no clear mechanism for enforcement. While it may be clear that environmental damage has occurred, it is unclear how enforcement action can be taken. For example:
- If it is unclear how the NESPF relates to an operative regional plan, which standard is breached – that of the regional plan, or that of the NESPF?
 - What weight is attached to the forest management plan and the proposed management of risks?
 - What weather events would constitute an 'Act of God' and therefore be beyond the ability of the forester to foresee and manage? During the NESPF public meeting at Telford, a 1:10 or 1:20 year event was suggested. This is a fairly common and foreseeable scale of event.
- 5.5 ORC submits that if regional rules are able to be more stringent than the NESPF, then those rules will prevail and enforcement uncertainty is removed.
- 5.6 Further, the creation of an additional set of rules is not efficient, and the rules themselves are unlikely to be effective in minimising environmental damage.

6. Transfer of cost and liability

- 6.1 The proposal provides no opportunity to recover the costs of maintaining records for the permitted activities, or monitoring their performance. RMA cost recovery is more clearly related to consent administration.
- 6.2 Once a council has received a forest management plan, there is an implicit assumption that it accepts the quality of that plan in that it is expected to monitor compliance with that plan [rather with any adverse effect on the environment]. Accordingly liability for ensuring good environmental outcomes is unclear, notwithstanding the proponents of the proposal stating that liability remains with the forester.
- 6.2 The proposal has the effect of pushing additional costs for ensuring good environmental management onto the local government sector, and consequently, onto the public. The submission of Local Government New Zealand sheds more light on this matter.

- 6.3 ORC submits that the proposal has the effect of transferring costs and liability for forest environmental performance to the local government sector, without being clear that this is the situation, or having regard to the additional costs falling on local government.

7. Precedent effect

- 7.1 There is no difference between plantation forestry and any other activity in terms of the need to manage adverse environmental effects. Any other land use activity, whether dairying, deer farming, horticulture, or anything else, could develop its own national environmental standard, risking further inconsistencies in managing adverse environmental effects.

8. Conclusion

- 8.1 The proposed NESPF attempts to provide an industry-based single code of practice which involves a variety of procedural and substantive matters. This approach remains counter to sound resource management practice as it is not effects based, nor does it reflect risks of damage to local environments from the use and development of land for forestry. It is falsely founded on the premises that 'one size fits all regions', and that because the risk of most environmental damage occurs at particular times, then it is acceptable to allow more than minor effects at those times as part of a permitted activity regime.
- 8.2 ORC recognises the value of the work undertaken by the NESPF group towards improving forestry practices, and suggests that the proposed standards would be better applied and monitored by the forestry industry itself, through self-auditing.
- 8.4 ORC submits that the proposed NESPF is neither efficient nor effective in addressing environmental effects of certain forestry activities. Accordingly, it should be withdrawn, or at the very least, amended to address the concerns raised in this submission.
- 8.5 Further, ORC supports the submission of Local Government New Zealand.

11 August 2015
Document: 1542870

Spatial, Forestry and Land Management
Ministry of Primary Industries
PO Box 2526
Wellington 6140

Attention: Stuart Miller

Dear Sir

Submission on a National Environmental Standard for Plantation Forestry

Introduction

1. The Taranaki Regional Council (the Council) thanks the Ministry for Primary Industries for the opportunity to make a submission on the proposed National Environmental Standard for Plantation Forestry (NES-PF).
2. The Council makes this submission in recognition of its:
 - resource management responsibilities under the Resource Management Act 1991 and general advocacy responsibilities under the Local Government Act 2002, and
 - regional advocacy responsibilities whereby the Council represents the Taranaki region on matters of regional interest and concern.
3. The Council acknowledges the intent of the NES-PF to resolve industry concerns about the variation in regulatory controls in district and regional plans concerning the forestry sector and the operational uncertainty that this generates for the sector. The Council also acknowledges the potential benefits of forestry, particularly on marginal hill country land, and supports proposals that would encourage forestry as a sustainable land use on such land.
4. The Council appreciates that the proposal for a national environmental standard for plantation forestry as outlined in the consultation document may well change as a result of comments received during public meetings and hui as well as the submissions received.
5. An evaluation report under section 32 of the Resource Management Act 1991 (RMA) will also be required and this report will need to examine the extent to which the objectives of the proposed NES-PF are the most appropriate way to achieve the purpose of the RMA. The Council considers this evaluation to be a particularly

important part of testing whether there are other reasonably practicable options for achieving the objectives and identifying and quantifying, as accurately as possible, the likely environmental, economic, social and cultural benefits and costs of the proposal.

6. It is vital that the assumptions and the economic drivers that underpin the NES-PF are correct and that this can be demonstrated with confidence. It will also be important once the NES-PF is approved (if this is the decision), that the assumptions and the economics of proceeding with the NES-PF remain over time i.e. monitoring of the cost-effectiveness of the NES-PF should be a strong feature of any feedback loop from the beginning.
7. The remaining parts of this submission make some general comments on the NES-PF in relation to its effects on local decision-making and the expected benefits and costs of the current proposal, before addressing specific aspects of the proposal.

General comments

Undermining local decision making

8. It is the Council's view that the NES-PF undermines fundamental principles in relation to local governance. These include:
 - Local autonomy and decision-making: communities should be free to make decisions that directly affect them and councils should have the autonomy to respond to community needs;
 - Accountability to local communities: councils are accountable to communities, and not to central government, for the decisions they make on behalf of those communities; and
 - Local differences means local solutions are the best fit: One-size-fits-all solutions such as those promoted by the current NES-PF, are over-engineered to meet all circumstances and create unnecessary costs for local communities.
9. The Council agrees with the forestry sector and the Ministry for Primary Industries that consultation and participation in RMA processes may be time consuming and costly. However, an examination of virtually any environmental issue is likely to show variation among councils. Dealing with this variation is a large part of giving effect to core principles of local government relating to democracy, community and public participation in local decision-making.
10. Having said this, there are clearly some matters that can be standardised across the country but the Council questions whether the full range of forestry related activities proposed in the NES-PF are necessary and appropriate for national consistency reasons. Both the Local Government Act 2002 and the Resource Management Act 1991 recognise the role of local government and the relationship they have with their community and provide for variation in resource management issues.
11. Despite the NES-PF giving councils the ability to apply more stringent rules in specific circumstances than what are provided for in the current proposals for the NES-PF, these are limited to certain matters only and have been quite tightly

prescribed. Most rules will apply to forestry activities no matter where they are undertaken.

Recommendation 1:

That the diminution of local decision-making be factored in to the report to the Minister for the Environment and in the section 32 report.

Uncertainty over costs and benefits

12. The consultation document (page 31) refers to two reports previously prepared by the New Zealand Institute for Economic Research (NZIER) in 2011 and 2012 which showed that the costs of an NES-PF outweighed the benefits. The Consultation document states that since 2011 there have been changes that have altered the findings of the previous cost benefit analysis and it outlines what these are.
13. The overall conclusion from recent work by NZIER is that now the benefits outweigh the costs and fall within a range of 1.41 and 2.98. Costs would mainly fall on both small and large forest owners and local government because of increases in consents and associated compliance monitoring as well as increased requirements for permitted activity monitoring and auditing. Benefits to a range of stakeholders are expected from a reduction in plan advocacy costs and a reduction in plan development costs for councils.
14. A separate analysis of environmental impacts by Scion concluded that there would be environmental benefits from the proposed NES-PF that would increase NZIER's benefit-cost ratio. However, some of these environmental benefits, such as avoided erosion as a result of greater control of harvesting practices on highly erosion-prone land vary greatly – from \$466,000 to \$10.6 million per year – which reflects the range of assumptions about the amount of avoided erosion that is likely to occur under the NES-PF.
15. The Regulatory Impact Statement notes that uncertainty remains about the size of some expected costs and benefits. As noted in the Regulatory Impact Statement (page 2), this uncertainty primarily relates to:
 - assumptions about the extent to which trends in variation and stringency in district and regional planning rules would increase;
 - assumptions about the effect of the NES-PF, for example on the number and cost of consents, the extent to which councils will use their ability to develop more stringent rules in certain areas and the extent to which plan advocacy costs will decline; and
 - quantification of costs and benefits – not all benefits can be quantified and some quantified values have a large uncertainty range.
16. The Regulatory Impact Statement goes on to note that the marginal effects of the NES-PF have been analysed at a national level and have not been assessed against the existing plan rules of every district and regional council. As a result the localised impacts of the policy are uncertain due to differences in local topography and operating rules.

17. While opportunities for increased stringency have been limited to certain matters, the Council believes that in many cases councils will look to put more stringent rules in place to account for and protect local values that they consider have not been adequately covered by the NES-PF. This has the potential to seriously undermine the balance of costs and benefits by increasing the costs associated with plan development and plan advocacy from those that are assumed under the NES-PF.
18. The Council submits that the section 32 evaluation report should look to re-examine all costs and benefits and attempt to quantify these with some accuracy (as far as possible), given the relatively low benefit cost ratios that the NZIER work has produced and the uncertainty around a number of important assumptions made in the Consultation document that have been previously referred to. Certainly in the Taranaki context, the Council believes the NES-PF will lead to an increase in regulation of forestry in this region, and to increased costs to both the forestry sector and to this Council through increased compliance monitoring of resource consents and monitoring of permitted activities. The Council further does not believe there will be a commensurate increase in benefits such that benefits exceed costs.
19. The Council questions whether this increased regulatory imposition on forestry in Taranaki is consistent with Government calls for less unnecessary regulation across all sectors of the economy. Further comment is provided on this issue later in this submission.

Recommendation 2:

That the section 32 report re-examine all costs and benefits associated with the proposed NES-PF and attempt to quantify these wherever possible.

Specific comments

Increased costs of permitted activity monitoring

20. One of the underlying tenets of the NES-PF is that, where possible, activities should be permitted (i.e. not require a resource consent), provided permitted activity conditions can be met.
21. Eight different production forestry activities have been identified and all are permitted in Green, Yellow and Orange Zones except earthworks in the Orange Zone on land that is over 25 degrees in slope where a restricted discretionary consent is required. Even in the Red Zone, which has a very high susceptibility to erosion, there is a mix of permitted, controlled and restricted discretionary activities. This permissive regime is supported by a raft of conditions that have to be complied with if the activity is to remain permitted. Forest owners will have to prepare a Harvest Plan, an Erosion and Sediment Control Plan and a Forestry Quarry Management Plan, as well as comply with a number of other conditions, to remain within the permitted activity classification.
22. The proposed NES-PF is clear that it will be councils who will be required to monitor permitted activity conditions. However, there is no ability under the Resource Management Act 1991 for the Council to recover the reasonable costs associated with

monitoring permitted activities and so the costs will have to be met by general ratepayers.

23. The cost to the Council is potentially large. Our current plans do not regulate some activities (e.g. mechanical land preparation), and for other activities, the number and complexity of the conditions that have to be met under the NES-PF is significantly greater than our current plan provisions.
24. Furthermore, the lack of certainty in some of the permitted activity conditions creates difficulties for the Council when it comes to compliance and enforcement. For example, in the harvesting rules one of the permitted activity conditions for 'slash and debris management' is that wherever it is safe and practicable to do so potentially unstable slash that has the potential to mobilise under flood flows must be removed. These matters involve a degree of subjective discretion that take them beyond what can be legally required as conditions of a permitted activity and will result in more time and cost for Council staff in assessing compliance, especially if forest owners disagree with the Council assessment.

Recommendations 3 & 4:

Amend the proposed NES-PF so that:

- consideration be given to making some activities 'controlled activities' to enable local authorities to recover some of the costs associated with the proposed NES-PF (or alternatively amend the RMA to allow costs to be charged for permitted activity monitoring),
- the subjective discretion from permitted activity conditions be removed.

Scale of mapping not appropriate

25. The Erosion Susceptibility Classification (ESC) is fundamental to the NES-PF. However, the maps on which the ESC are based are at a scale of 1:63, 600 or 1:50, 000 which in the Council's view are far too broad and inaccurate for addressing adverse effects from forestry activities in the field. The Council raised this issue during the 2010 consultations. The response has been to contract Landcare Research Ltd to update the ESC but this has been done at the same scale. This has resulted in some significant changes ranging from 3.6% to 40.8% in land that has been reclassified. The extent of the reclassification confirms the Council's earlier concerns regarding the accuracy and reliability of the ESC.
26. In addition it is proposed that a formal process will be implemented to enable councils (and others) to have an existing ESC classification reassessed if there are concerns about accuracy. This process will allow land to be mapped at a finer scale to more accurately reflect the erosion features of the land concerned. Once re-mapped there would be a requirement for the NES-PF to be amended to bring the re-mapped area within the NES-PF.
27. The Council understands that it would be up to councils to pay for this re-mapping if they thought larger scale mapping was required.

28. In Taranaki, some 65% of the privately owned land in the eastern hill country has been mapped at a scale 1:5,000 or 1:10,000 following the New Zealand Land Use Capability methodology. This mapping has been done as part of the Council's sustainable land management programme where individual farm plans have been prepared in conjunction with landowners to put erosion-prone land in the eastern hill country on a sustainable footing. The Council plans to eventually extend its sustainable land management programme to all privately owned land in the eastern hill country.
29. In the Council's experience, mapping down to 1:5,000 or 1:10,000 is essential if all erosion-prone land is to be picked up and sustainably managed. Mapping at 1: 63,600 or 1:50,000 will simply not identify all erosion-prone land within the relevant units – particularly Class 7 and 8 land.
30. The Council would like to see all land that it has currently mapped at 1:5,000 or 1:10,000 included within the NES-PF prior to it coming into effect and a methodology approved and also included within the NES-PF to allow future mapped areas to be included.
31. Alternatively, if larger scale mapping was not considered necessary, the Council considers that at least afforestation and harvesting activities should become controlled, restricted discretionary or discretionary activities in the Orange Zone rather than the currently proposed permitted activity. This would enable the Council to consider an application for resource consent more closely and potentially exclude pockets of land of high erosion susceptibility from the consent.

Recommendations 5 & 6:

Amend the proposed NES-PF ensure that:

- land already mapped at 1:5,000 or 1:10,000 and a methodology for future mapped areas, be included within the NES-PF prior to it coming into effect or alternatively
- afforestation and harvesting activities in the Orange Zone become controlled, restricted discretionary or discretionary activities.

Links with the National Policy Statement for Freshwater Management

32. The Council is currently giving effect to the National Policy Statement for Freshwater Management (NPSFM).
33. The NES-PF allows councils to make more stringent rules to manage the impacts of forestry activities in tightly defined circumstances. These include: the need to meet the requirements of the NPSFM and to meet Freshwater Management Unit limits; to prevent adverse effects on the significant values of an outstanding waterbody that have been specified in a Water Conservation Order or regional plan; to establish appropriate setbacks for outstanding freshwater bodies as defined in the NPSFM and identified in a regional policy statement or regional plan; to manage impacts on the significant value of wetlands identified under the NPSFM and specified in a regional plan; and to manage risks to groundwater systems, specifically only in relation to

quarrying activities occurring over shallow aquifers within a drinking water protection zone identified in a regional plan.

34. However, the provisions outlined above apply only to specific values, water bodies and locations identified in plans. A number of the provisions refer to 'outstanding' water bodies. The Council is in the early stages of identifying outstanding or significant values of water bodies and is aware that other councils around the country are at different stages of this process. Councils have until 2025 to give effect to the NPSFM. Identifying outstanding water bodies is time consuming and expensive and involves possible appeals to the Environment Court. The Proposed NES-PF has the potential to cut across this work.
35. In addition to this, the Council's regional policy statement and regional plans take a wider view of the importance of other water bodies and wetlands for sustainable management, not just those that are outstanding or significant. The proposed NES-PF provisions in relation to the ability to be more stringent are limited to these narrowly defined areas or sites identified in plans and therefore other important areas that the Council considers might warrant more stringent protection from forestry activities will not have the same level of protection.

Recommendation 7:

Amend the proposed NES-PF to include provision for regional councils to make more stringent rules for the management of the potential adverse effects of plantation forestry on a broad range of regionally determined freshwater management priorities to give full effect to the NPSFM.

Biodiversity

36. The specific matters that allow more stringent rules to be made in relation to biodiversity are limited to mapped areas of significant indigenous vegetation and significant habitats of indigenous fauna identified in a regional policy statement, regional plan or district plan pursuant to section 6(c) of the Resource Management Act 1991 (Appendix 3 page 98). These areas may include wetlands.
37. Mapping is just one form of identifying such areas and it would be problematic for this Council if mapping was required before more stringent rules could be applied. This is because in our *Draft Freshwater and Land Management Plan* the Council has identified significant values of wetlands (for example by reference to nationally threatened or regionally distinctive species that are present in wetland habitats in Taranaki) but have not mapped them. The cost of ground-truthing and mapping thousands of quite often small (but significant) wetlands and/or other significant habitats of indigenous flora and fauna would be prohibitive for regions and districts and the mapping is likely to be an incomplete representation of the values sought to be protected.
38. The Council submits that more stringent rules should be able to be made for the protection of indigenous biodiversity without these areas having to be mapped. The application of criteria such as 'threatened' or 'at risk' or 'regionally distinctive' species would assist in this task.

Recommendation 8:

Amend the proposed NES-PF to clarify that regional councils and territorial authorities may make more stringent rules for the management of the potential adverse effects of plantation forestry on a broad range of regionally and locally determined management priorities for indigenous biodiversity.

River crossings

39. The Council questions whether the proposed rules dealing with river crossings are necessary as the effects of river crossing rules will vary from region to region because of differing topography and climatic regimes. Within regions, there will also be similar rules for many activities which are not limited to production forestry. This raises the possibility of conflict between users as some would be faced with more stringent conditions than what is permitted under the NES-PF. For example, in our *Draft Freshwater and Land Management Plan* the contributing catchment area for a bridge (as a permitted activity) is less than 200 ha whereas under the NES-PF the contributing catchment area for battery culverts and drift decks is less than 500 ha for a permitted activity. The lower contributing catchment area in Taranaki reflects our high rainfall and steep catchments. The more permissive regime for production forestry activities creates inconsistencies that are not based on adverse effects in the Taranaki situation.
40. Given the variation in hydrogeologic conditions around the country the Council submits that councils be allowed to manage river crossings under existing legislation which is better suited to local conditions.

Recommendation 9:

That the proposed NES-PF be amended to allow councils to manage the adverse effects of river crossings under current legislation which is better suited to local conditions.

Standard templates for harvest plans and erosion and sediment control plans

41. The requirement for an Erosion and Sediment Control Plan and a Harvest Plan to be submitted to the Council before earthworks and harvesting operations begin is a positive step forward in managing the effects of production forestry operations.
42. The Council supports the development of standard templates for harvest plans and erosion and sediment control plans. This will help in reducing litigation for the Council and in ensuring consistency of treatment among forest companies.
43. However, it is important that regional councils are closely involved in the development of such templates and that the templates contain specific requirements for forestry operators. They will spell out the details to be complied with and provide an opportunity for councils to seek changes to harvest plans and erosion and sediment control plans before operations commence. They will also determine (in part) whether the activity remains a permitted activity or whether consent will be required.

Recommendation 10:

That regional councils be closely involved in the development of templates for erosion and sediment control plans and harvest plans.

Setbacks

44. The Council generally supports the setback distances set for afforestation, harvesting and replanting activities in the proposed NES-PF. These have the potential to reduce litigation for the Council in relation to setbacks from rivers and streams, wetlands, lakes and the coastal marine area.
45. The Council supports the specific, detailed comments made by Local Government New Zealand on setback distances contained in the Schedule to its submission.

Conclusion

46. The Council thanks the Ministry for Primary Industries for the opportunity to make a submission on the proposed NES-PF.
47. Given the uncertainty and wide variation in the benefits and costs of the proposed NES-PF, the Council considers that considerably more attention needs to be given to the likely costs and benefits of the proposal during preparation of the section 32 report under the RMA. In the case of Taranaki, the Council is in no doubt that as currently formulated, the proposed NES-PF would lead to an increase in the costs both to industry and to the Council in regulating forestry activities in the region with little commensurate benefit.
48. It is important that the economic drivers that underpin the NES-PF can be demonstrated from the outset to be correct and that once in place, monitoring of its cost-effectiveness occurs.
49. In relation to specific matters, the Council has concerns regarding the increased costs of permitted activity monitoring, the scale of mapping, links to the National Policy Statement for Freshwater Management, biodiversity and river crossings. While the Council supports aspects of the proposed NES-PF such as setbacks and templates for harvest and erosion and sediment control plans, these do not outweigh the disadvantages of proceeding with the proposed NES-PF.
50. The Council considers that one of the alternatives to be considered during the section 32 process should be that the Ministry for Primary Industries and the Ministry for the

Environment use the work they have done to date to promote best practice guidelines in regions where this is needed.

Yours faithfully
BG Chamberlain
Chief Executive

A handwritten signature in black ink, appearing to read 'A D McLay', with a long horizontal flourish extending to the right.

per: A D McLay
Director - Resource Management

7 August 2015

Stuart Miller
Spatial, Forestry and Land Management
Ministry for Primary Industries
PO Box 2526
Wellington 6140

Sent by email to NES-PFConsultation@mpi.govt.nz

Dear Stuart

Tasman District Council submission on NES for Plantation Forestry

Please find attached Tasman District Council's submission on the NES for Plantation Forestry.

We appreciate the opportunity to comment on the proposed National Environmental Standard for Plantation Forestry and draft regulations. We would like to be further engaged as these regulations and the associated guidance materials are developed.

If you have any questions regarding our submission please contact Environmental Policy Planner Lisa McGlinchey on direct dial 03 543 8409 or email lisa.mcglinchey@tasman.govt.nz

Yours sincerely



Dennis Bush-King
Environment & Planning Manager

P:\Policy\NESP Feedback\FINAL SUBMISSION SENT\Plantation Forestry - August 2015 docx

Tasman District Council
Email info@tasman.govt.nz
Website www.tasman.govt.nz
24 hour assistance

Richmond
189 Queen Street
Private Bag 4
Richmond 7050
New Zealand
Phone 03 543 8400
Fax 03 543 9524

Murchison
92 Fairfax Street
Murchison 7007
New Zealand
Phone 03 523 1013
Fax 03 523 1012

Motueka
7 Hickmott Place
PO Box 123
Motueka 7143
New Zealand
Phone 03 528 2022
Fax 03 528 9751

Takaka
14 Junction Street
PO Box 74
Takaka 7142
New Zealand
Phone 03 525 0020
Fax 03 525 9972

Tasman District Council submission on NES-Plantation Forestry, 11 August 2015

Contents

1	Contact Details	4
2	Summary of submission - general position on NESPF	4
3	Problem Definition	6
3.1	Obtaining greater consistency and reducing uncertainty.....	6
3.2	Suggested Rule Cascade.....	7
3.3	Ensuring Effective Best Practice.....	7
3.4	Large and small forestry operators.....	9
3.5	NESPF Scope.....	9
3.6	Environmental Outcomes	10
4	Permitted Activity Conditions Effectiveness	11
4.1	Permitted Baseline.....	11
4.2	Good practice guidance and industry capacity.....	12
5	Enforceability of conditions	13
5.1	Rule interpretation, clarity and consistency	14
5.2	Terminology consistency and definitions	14
5.3	Amendment to Management Plans.....	16
5.4	Cascade diagrams	17
6	Matters for Greater Stringency	18
6.1	Scope of matters for greater stringency	18
6.1.1	Inclusion of Erosion and Land Instability Risks as matters.....	18
6.1.2	Scope of matters for outstanding water bodies, landscapes and features	19
6.1.3	Scope of Karst Protection Areas.....	19
6.1.4	Scope for Other Geologies	19
6.2	Mapping of areas or features for greater stringency	20
6.3	Relationship with Water Conservation Orders	20
6.4	Shallow aquifers – drinking water protection zones	21
6.5	Natural character and visual effects	21
7	Environmental Risk Assessment Tools.....	21
7.1	Erosion Susceptibility Classification	21
7.1.1	Undefined land.....	22
7.1.2	Erosion zones used in rule regime	23
7.2	Fish Spawning Indicator	23

8	Comments on Specific Activities and Rules	25
8.1	Notification requirements	25
8.2	Property setbacks – Afforestation and Replanting	25
8.3	Genetically Modified Tree Stock	26
8.4	Water body setbacks	26
8.4.1	Setbacks as intact buffers	26
8.4.2	Setback widths	27
8.4.3	Setbacks for Outstanding Freshwater Bodies	28
8.4.4	Basis for 10m setback	28
8.4.5	Setback operational costs	29
8.4.6	Setbacks for wetlands, small lakes and streams less than 3m wide	29
8.4.7	Coastal Setbacks	30
8.5	SNA setbacks	30
8.6	Earthworks and erosion and sediment control planning	31
8.6.1	Risk based approach to sediment control design	33
8.6.2	Issues with specific earthworks conditions	33
8.7	Slope thresholds	35
8.8	Forestry quarrying	36
8.9	Slash in rivers	36
8.10	Crossings through wetlands	37
8.11	River crossings – rule useability and scope	37
8.12	River crossings - fish passage	38
8.12.1	Assessing and Remediation of Existing culverts	38
8.13	General noise conditions	38
8.14	General refuelling	38
8.15	Nesting sites	39
8.16	Sediment Discharge Performance Based Criteria	39
9	Is the NES the Best Option?	39
10	Costs and Benefits	40
11	Implementation Issues	41
11.1	General comments	41
11.2	Permitted Baselines Created	41
11.3	Cost recovery - recording, assessment and monitoring	41
11.4	Regional and District apportionment of rules	42
11.5	Consistency with the NZCPS	42
11.6	Linkages with NPSFM	42
11.7	Relationship with Water Conservation Orders	43

11.8	Time allowance for plan assessments and update	43
11.9	Management plan scope and good and best practice guidance	43
12	Risk and Opportunities	44
12.1	Impacts on council capacity	44
12.2	Further engagement	44
12.3	NPSFM.....	45
12.4	Management of wind throw	45
13	Support of NPSFM	45
14	Implementation Support	46
15	Other Issues	47
15.1	Future consultation – making feedback easier.....	47

1 Contact Details

Submitter: Tasman District Council

Key Contact: Lisa McGlinchey

Email: [REDACTED]

Phone: [REDACTED]

Post: [REDACTED]

Tasman District Council - Submission on National Environmental Standard for Plantation Forestry

Closing Date: 11 Aug 2015 – Submission sent by email to NES-PFConsultation@mpi.govt.nz

Please note: page numbers referred to in this submission in square brackets [] relate to the page numbers in the online PDF version of the consultation document named “National-Environmental-Standard-book-interactive” available at: <http://www.mpi.govt.nz/document-vault/8220>

2 Summary of submission - general position on NESPF

Tasman District Council appreciates the opportunity to comment on the proposed National Environmental Standard for Plantation Forestry and draft regulation. We would like to be further engaged as these regulations and the associated guidance materials are developed.

Tasman District Council agrees with the principles of reducing complexity in regulation and providing greater certainty of environmental outcomes, but **opposes** the NESPF as currently structured and worded. We do not believe the NESPF in its current state will achieve the objectives and we do not support the objectives as currently worded.

An acceptable alternative is for this NESPF to deal only with those activities that are carried out within the plantation forest industry.

There is concern about the economic cost benefit assessment – both in terms of the marginal and uncertain outcomes reached (how big are the error bands on these estimates?), and also in terms of whether the costs are spread in an equitable manner. If the NESPF could potentially result in a negative net result, or if costs are skewed towards councils and ratepayers, then it is particularly important that improved environmental outcomes can be ensured through the NESPF to make this effort worthwhile to the non-forestry sectors of regional communities. However it is uncertain if the NESPF could achieve this and the NZIER report suggests “*there is no evidence that provides clear support for the assertion that the proposed standard provisions will result in material gains for the environment*”.

There are several significant issues with the proposed NESPF regime that make it unworkable for Council, these include:

- The use of uncertain permitted activity conditions, many of which require evaluation and subjective decisions on the part of the forestry operators, often requiring specialist expertise in non-forestry fields. The proposed regime places significant uncertainty on council’s ability to effectively enforce many of the permitted activity conditions. This is unlikely to promote good environmental outcomes and is likely to result in increased litigation in the future as councils attempt to enforce the rules.
- The proposed regime adds more forestry specific regulation than currently exists in Tasman, and will place an unacceptable burden of increased costs onto Councils’ and their rate payers for plan review to address issues out-of-scope, as well as permitted baseline

implications, and compliance monitoring and enforcement, with no efficient mechanism for recovery of compliance costs.

- Some of the specific conditions, while a potential improvement on the status quo, are unlikely to achieve the desired environmental outcomes and there is insufficient evidence to support these aspects in the draft regulations. For example the water body setbacks are insufficient and unlikely to be consistent with the objectives of the NPSFM. The NESPF is a good opportunity to seek to achieve better environmental outcomes for water quality and aquatic and riparian habitats across the country to assist in implementing the NPSFM.

Tasman District Council considers that greater use of controlled activity status would reduce the inconsistency across council boundaries sought by the industry, but will also remove the uncertainty and practicability for both the industry and councils in determining activity status and enforcement that is present under the draft permitted activity regime. This will also provide a mechanism for ensuring best practice is occurring through audit and compliance monitoring by Councils, as well as the means for costs for compliance assessment and monitoring to be recovered from applicants rather than shifted to ratepayers.

If controlled activity status is not provided, then a robust industry-led guidance, certification, audit and compliance monitoring system needs to be created to support the permitted regime and to avoid additional cost and resource burden to councils.

The Council also seeks a further consultation round on the proposed rules to enable Councils to review the implications of the proposed rules once these are amended to remove the uncertainty and complexity created by the existing problematic language.

In order to resolve the rule validity issues, new conditions or new approaches will be required and councils need an opportunity to consider and input into these prior to progression of the NESPF to gazettal.

In addition, best practice guidance material will be vital to the implementation success of the NESPF and this needs to be developed and reviewed prior to the rules coming into force. Such guidance should also be included in a future engagement round to allow for council and other stakeholder involvement.

The reasoning behind council's submission position is further outlined in our answers to the specific submission questions below.

Summary - Relief sought:

1. Undertake a review of the underlying objectives and principles of the NESPF to ensure it addresses both economic and environmental outcomes, including:
 - a. assessment of the option to widen the NES to include a land use based approach
 - b. assessment of the option to limit the NESPF to cover just activities that are relevant only to plantation forestry - or for these to be described in such a way as to be only applicable to plantation forestry (e.g quarrying where the material is for the construction of forest roads)
 - c. further assessment of ways the NESPF can support implementation of the NPSFM and NZCPS.
 - d. a review of the economic cost benefit analysis to better reflect the environmental outcomes, including revised water body setbacks informed by environmental outcome assessments
2. Review and amend the rule cascade to:

- a. meet any new objectives or principles identified as a results of the reassessment in relief point 1,
 - b. better reflect and manage the increasing natural erosion risk regarding water and ground conditions and slope, and erosion risk upon disturbance, making greater use of controlled, restricted discretionary and discretionary activity status,
 - c. reduce evaluation and subjective discretion, improve consistency and reduce ambiguity.
3. Initiate a further round of engagement and submission on the revised rules prior to amendment and gazettal of the NESPF.
 4. Implement an industry-led good practice guidance, certification, audit and compliance monitoring system, prior to rules coming into force, to support forestry operators, particularly if a permitted regime is retained.
 5. Involve Councils, MPI/MfE, forestry operators and other stakeholders in development of good practice guidance, prior to the rules coming into force.

3 Problem Definition

Do you think section 2.1 and 2.2 of the consultation document accurately describe the problem facing plantation forestry?

No, in that this is only part of the question that needs to be asked. Tasman District Council supports the principals of reducing complexity and indefensible inconsistency in regulation and providing greater certainty of environmental outcomes. It does not support an industry focussed approach that potentially leads to creation of further variability and inconsistency between industries.

This industry based approach to regulation undermines effects based management of activities.

If the focus of the NES must be on Plantation Forest, other unanswered questions are:

- What problems are facing Councils and communities in managing adverse effects of plantation forestry?
- What should the NESPF seek to achieve for environmental, cultural, social and economic outcomes?

3.1 Obtaining greater consistency and reducing uncertainty

The forest industry concern was based on experiences where multiple consents with differing conditions being needed for different blocks of the same forestry operation (NZIER 2014) across council boundaries and different consent status for apparently similar activities.

However, the first principle under which the NESPF has been developed [page 8] is stated as “*where possible, activities should be permitted*”.

The goal of the forestry industry and this NES consequently appears to be about less regulation, rather than more robustly considering indefensible (unwarranted) variation between different councils.

More consistency in regulation across council jurisdictions and greater certainty is not necessarily the same as a goal of mostly permitted activities.

The key objective should be consistency between councils and an appropriate level of regulation in relation to the risks of (forestry) activities, while having efficient and effective processes.

An alternative that should be considered is a greater use of controlled, restricted and discretionary activity status applied consistently through the NESPF so that single consent applications could be made for forestry operations spanning multiple council jurisdictions. Ironically, the use of permitted status has led to a level of both compliance and monitoring that is no less stringent and onerous than more consented requirements, but without the benefit of tuned site by site management flexibility with consenting.

Better specification of limits or performance standards could be developed for the matters for control to provide greater certainty for operators and efficiency of the process, and agreements between councils regarding assessment and compliance responsibilities could resolve jurisdictional process issues.

This approach would also provide the necessary mechanism for council to assess and amend applications and management plans to ensure best practice occurs and provides an efficient mechanism for assessment and compliance costs to be recovered.

Given the issues raised in this submission on problems of the validity, uncertainty and subsequent enforcement arising from the permitted activity status of nearly all forestry activities, further consideration needs to be given to the approach in order to avoid further uncertainty being placed on forestry operators and councils.

Relief sought:

6. [repeat of relief point 2b] Review and amend the rule cascade better reflect and manage the increasing natural erosion risk regarding water and ground conditions and slope, and erosion risk upon disturbance, making greater use of controlled, restricted discretionary and discretionary activity status,
7. Include specification of limits or performance standards within rules, in particular sediment discharge performance standards.

3.2 Suggested Rule Cascade

Council suggests the following amendments to the rule cascade:

- Operators should be able to apply for global consents for:
 - land disturbance (track/landing construction);
 - ground based harvesting; and for
 - river crossings involving structures (not fords) where the bed width is less than 6 meters. This width is the standard single precast concrete span and is considered a pragmatic width to use as for streams below this other methods will be required that need greater control to ensure significant adverse effects are avoided.
- All tracking / landing formation in ESC areas high and very high should be controlled with no global consent for the very high ESC.

Relief sought:

8. [repeat of relief point 2b] Review and amend the rule cascade better reflect and manage the increasing natural erosion risk regarding water and ground conditions and slope, and erosion risk upon disturbance, making greater use of controlled, restricted discretionary and discretionary activity status.

3.3 Ensuring Effective Best Practice

There is a lack of specification or understanding about the nature of environmental outcomes able to be met by what is identified currently as good practice for the forestry industry. This sets up

uncertainty about what form or degree of environmental state improvement is aimed at for the NESPF.

This is particularly relevant to maintenance and enhancement of water quality and water body habitats, and for management of forestry debris washed into receiving floodplains during storms.

A key part of the implementation process will need to be the development of robust good and best practice guidance, by the plantation forestry sector, councils and MfE/MPI, that is underpinned by practical research that shows practices are effective in specific, comparative terms. Ideally this guidance and an industry support network for this should be developed prior to the regulations coming into effect.

In addition, the proposed NESPF appears based more on forestry “good practice” than “best practice” and no environmental monitoring is offered to indicate that practices used in the industry to date have been good or otherwise. The permitted activity regime and lack of this level of specificity provides no incentive for ‘better’ practices where there are more sensitive receiving environments.

Tasman has numerous examples of where ‘good practice’ has led to dubious or negative environmental outcomes. For example slash and debris traps used in the water bodies to trap debris, also retained many cubic meters of sediment resulting in hundreds of meters of waterway being dammed and a significant adverse effect occurring.

Council’s experience has generally been one of reactive response to poor practice, once the environmental damage has been done.

Council’s experience is that the large forest companies with good resourcing are likely to follow good practice and adopt processes to ensure good environmental outcomes according to industry good practice. Not all forest operations have that level of support and the lack of co-ordination between different forest activities and small scale nature of some operations mean these are considered by Tasman to be a higher risk.

We have been seeking to build relationships with forestry operators to make this more proactive and to promote better practice. The NESPF in its current form further promotes an ‘ambulance at the bottom of the cliff’ approach for councils, with respect to the inability for council to audit and amend insufficient management plans and limits involvement to more ‘after the event’ compliance monitoring.

If there was sufficient capacity, support and motivation throughout the forestry industry (for both large and small operators) to reach good or best practice with regard to environmental outcomes then the permissive regime underpinned by good and best practice guidance and support could shift this to a more proactive ‘fence at the top’ outcome. Council is not confident such capacity, support or motivation exists for all sectors of the industry.

Relief sought:

9. [repeat of relief point 2b] Review and amend the rule cascade better reflect and manage the increasing natural erosion risk regarding water and ground conditions and slope, and erosion risk upon disturbance, making greater use of controlled, restricted discretionary and discretionary activity status.
10. [repeat of relief point 5] Involve Councils, MPI/MfE, forestry operators and other stakeholders in development of good practice guidance, prior to the rules coming into force.

11. Ensure the good practice guidance reflects the increasing risk within the different erosion susceptibility and slopes and allows for localised consideration of receiving environment sensitivity.

3.4 Large and small forestry operators

The scope of the NESPF development appears skewed towards the larger operators who most likely already have systems in place to ensure good practice. Smaller operators may lack this and may therefore struggle to achieve compliance and best practice without some industry led support.

To reduce compliance difficulties and subsequent costs for both forestry operators and councils, the need for both adequate guidance and a support system for the early transition period for more problematic segments of the forestry sector is essential.

The assessment of costs and benefits for providing the necessary support and guidance is not well addressed by the NESPF. Current proposals shift the cost burden to Councils, not the industry.

Relief sought:

12. [repeat of relief point 5] Involve Councils, MPI/MfE, forestry operators and other stakeholders in development of good practice guidance, prior to the rules coming into force.
13. [repeat of relief point 4] Implement an industry-led good practice guidance, certification, audit and compliance monitoring system, prior to rules coming into force, to support forestry operators, particularly if a permitted regime is retained.

3.5 NESPF Scope

Council has concerns over the scope of the NESPF and its sole focus on forestry, but including specific activities that are generic to a number of other industries including farming and land development – for example river crossings, tracking, soil disturbance, earthworks and vegetation damage or removal.

Council considers that the consideration of flow-on effects to other land disturbance activities with similar erosion, vegetation and sediment effects has been inadequate.

It will cost TDC significant resources to sort out the out-of-scope items to ensure these are adequately addressed. It is unclear if this flow-on effect has been included in the assessment of costs to councils.

Council does not agree that the potential for permitted baselines is insignificant [page 37]. Staff are anticipating that if the NESPF was progressed as currently worded that other industries will seek to replicate the permitted status of activities identified in the NESPF and we do not see how this can be avoided. Both aligning the NESPF with plantation forestry-specific regional rules and deciding on extending to the same activities not for plantation forestry will engage all regional councils in significant plan change effort.

The NESPF is effectively an NES for land disturbing activities. If it is progressed further it would be beneficial to consider it in this wider scope to better identify and address the full implications of the rules. This wider scope is more efficient for environmental improvements across the same catchments as the resource values at stake.

An acceptable alternative is for this NESPF to deal only with those activities that are carried out within the plantation forest industry.

Much is made of the need to manage the effects of plantation forestry in a consistent way. Activities like stream crossings are common across a range of land uses and the effects are similar.

Relief sought:

14. [repeat of relief point 1] Undertake a review of the underlying objectives and principles of the NESPF to ensure it addresses both economic and environmental outcomes, including:
 - a. assessment of the option to widen the NES to include a land use based approach
 - b. assessment of the option to limit the NESPF to cover just activities that are relevant only to plantation forestry - or for these to be described in such a way as to be only applicable to plantation forestry (e.g quarrying where the material is for the construction of forest roads...)
 - c. further assessment of ways the NESPF can support implementation of the NPSFM and NZCPS.
 - d. a review of the economic cost benefit analysis to better reflect the environmental outcomes, including revised water body setbacks informed by environmental outcome assessments

3.6 Environmental Outcomes

Achieving better environmental outcomes (as opposed to the certainty of outcomes) does not appear to be a driver in development of the NESPF. This seems to be a lost opportunity, particularly with respect to the objectives of the NPSFM. For forestry, as well as other industries with similar land disturbing activities, the NESPF could provide an implementation tool for catchment management under the NPSFM, however in its current structure and wording it fails to do this.

The consultation report suggests forestry operators are already undertaking best practice and that adverse environmental effects are well managed as a result of good practice and existing plan rules [page 17], however Tasman has numerous examples where current practices – including those considered to be within current best practice – have not resulted in good environmental outcomes.

There was no supporting information about current level of plantation forestry practice. The NESPF proposal does not provide any assessment of existing performance or compliance action across councils or provide any support to the industry claim [section 2.2 on page 17] that current practice is good because of voluntary adoption of industry codes of practice. There is little evidence to guide understanding about the current level of performance.

In addition, the assumption that the current rules and practices are adequately addressing the issues seems at odds with the status quo assumption in the economic analysis that Councils will continue to amend plans and increase consenting requirements for forestry over the next 30 years (NZIER 2015). Instead, this suggests the current rules are not achieving the desired environmental outcomes and councils will seek to amend them accordingly.

At the very least the anticipated environmental outcomes expected from the NESPF should be better investigated and understood to provide for a more informed debate. Council understands the difficulty in including environmental outcomes within economic cost-benefit assessments, but this does not mean they should be excluded from the process.

Relief sought:

15. [repeat of relief point 1c and 1d] Undertake a review of the underlying objectives and principles of the NESPF to ensure it addresses both economic and environmental outcomes, including:

- a. further assessment of ways the NESPF can support implementation of the NPSFM and NZCPS.
- b. a review of the economic cost benefit analysis to better reflect the environmental outcomes, including revised water body setbacks informed by environmental outcome assessments

4 Permitted Activity Conditions Effectiveness

Do you consider that the conditions for permitted activities will manage the adverse environmental effects of plantation forestry?

There are issues with the way the proposed permitted conditions are worded. Legal advice obtained by LGNZ supports Council's view that some conditions are likely to include too much evaluation and subjective discretion that creates uncertainty and so be invalid as permitted conditions. In some cases the cascade of permitted conditions that are not complied with is unclear (for example the conditions on use of GM trees). As currently written it would be very difficult for staff to use the PA rules in issuing a Certificate of Compliance.

In addition, for many of the conditions – whether they will effectively manage the adverse environmental effects of plantation forestry will be entirely dependent on the provision of effective good practice guidance and on the ongoing effective implementation of those good practice methods by the forestry operators. The very general approach to the permitted activity conditions and the lack of environmental performance outcomes does not clearly enable Councils or operators to account for site specific constraints or sensitive receiving environments by adopting a higher standard of performance if necessary.

Relief sought:

- 16. [repeat of relief point 2c] Review and amend the rule cascade to reduce evaluation and subjective discretion, improve consistency and reduce ambiguity.

4.1 Permitted Baseline

The RMA provides no guidance about the content of permitted activities. They must however achieve the purpose of the Act and enable objectives to be met. It is important that the NESPF provides confidence that compliance with any requirements, conditions, and permissions will adequately manage the effects expected (including cumulative effects).

Good planning practice also requires that any permitted conditions provide certainty and enable compliance to be objectively assessed.

An NESPF objective that seeks to permit plantation forest activities where possible, arguably does not achieve the purposes of the Act.

The RMA refers to the permitted baseline specifically in three situations relevant to plan development and which are useful guidance for developing permitted activities in an NES;

1. Section 104(2) states: "When forming an opinion for the purposes of subsection (1)(a), a consent authority may disregard an adverse effect of the activity on the environment if a national environmental standard or the plan permits an activity with that effect."

2. Section 95D(b) provides that a consent authority when deciding if adverse effects will be minor "may disregard an adverse effect of the activity if a rule or national environmental standard permits an activity with that effect."
3. The consent authority may disregard an adverse effect of the activity on the person if a rule or national environmental standard permits an activity with that effect (s95E(2)).

We acknowledge that use of the word 'may' in these sections conveys an element of discretion and it is therefore up to the decision-maker as to whether the permitted baseline test is used when assessing effects and identifying affected parties. However, given that it is a NES for an activity with similar effects across a range of land use activities, the NES will carry considerable weight.

It is impossible to distinguish some of the generic activities as being solely relevant to Plantation Forest. Stream crossings and earthworks are carried out across a range of industries. The activities being permitted in the NESPF must therefore be further refined and described to ensure they only apply to these activities as they are carried out by Plantation Forest. We suspect this may be near impossible to do with any certainty or clarity.

In deciding on whether activities should be permitted, the NES analysis should have included assessment as to whether the effects resulting from Plantation Forest to the maximum limit permitted are acceptable and whether the permitted activities may achieve the purpose of the Act.

Current Plan practice is normally to provide permitted activity status for activities with no more than minor effects – which also account for the degree of compliance monitoring and risk of adverse effects occurring.

Some specific conditions, as currently written, are unlikely to achieve management of effects on the environment. In particular the setbacks for water bodies are insufficient (refer section 8.4 for further detail on this).

Relief sought:

17. [repeat of relief point 1] Undertake a review of the underlying objectives and principles of the NESPF to ensure it addresses both economic and environmental outcomes, including:
 - a. assessment of the option to widen the NES to include a land use based approach
 - b. assessment of the option to limit the NESPF to cover just activities that are relevant only to plantation forestry - or for these to be described in such a way as to be only applicable to plantation forestry (e.g quarrying where the material is for the construction of forest roads)
 - c. further assessment of ways the NESPF can support implementation of the NPSFM and NZCPS.
 - d. a review of the economic cost benefit analysis to better reflect the environmental outcomes, including revised water body setbacks informed by environmental outcome assessments

4.2 Good practice guidance and industry capacity

The approach of relying on good practice requirements within the permitted activity conditions as proposed, raises process and legal issues around the ambiguity, lack of clarity and certainty of these conditions.

There will be compliance challenges, as well as for the forest managers, in ascertaining whether forestry operators are complying with these conditions and the extent to which conditions are being

complied with. This may result in enforcement action and subsequent litigation due to the uncertainty.

Lack of certainty about the extent to which conditions are to be complied with may also lead to under-investment into management methods to reduce environmental effects and risk of compliance action and costs, or over-investment. Both can be significant costs to the forest managers.

For such a system to work, TDC believe a robust industry-led guidance, certification and auditing system needs to be in place to support forestry operators in ensuring they are achieving sufficient levels of good or best practice – and that the good practice is achieving the desired outcomes – in order for the forestry operators to be confident that they are complying with the permitted activity conditions.

Good and best practice needs to be well defined and this will require further significant work to do. This may be a better place to put effort and resources rather than pursuing an NES.

Tasman District Council, in conjunction with MfE, have initiated a nationally focused project looking at the available science that underpins good practice guidance for land disturbing activities. It is anticipated that the outputs from this project may be used to help inform development of good practice guidance for forestry, as well as other industries, and assist in identifying research gaps where there is insufficient information on the effectiveness of practices. Outputs from this project are expected in July 2016 and this should be included in further development of the NESPF and associated guidance material.

It is difficult to see how some of the permitted activity conditions will ensure there is “no more than minor effects”. Many of the NESPF conditions and requirements relate to the need to manage sedimentation and erosion effects on water bodies. Without clearer specification about how water quality impacts of Plantation Forestry activities are to be managed, it is difficult to see that the requirements of s70 of the Act can be able to be complied with and what this does to subsequent regional plans.

Relief sought:

18. [repeat of relief point 4] Implement an industry-led good practice guidance, certification, audit and compliance monitoring system, prior to rules coming into force, to support forestry operators, particularly if a permitted regime is retained.
19. [repeat of relief point 5] Involve Councils, MPI/MfE, forestry operators and other stakeholders in development of good practice guidance, prior to the rules coming into force.
20. Include the results from the Erosion and Sediment Control Science Review project (MfE CEF Round 6 funded project) to inform further development of the NESPF and good practice guidance.

5 Enforceability of conditions

Are the conditions for permitted activities clear and enforceable? Can you suggest ways of making the rules clearer and more enforceable?

No, as currently written the conditions for permitted activities are not clear or readily enforceable. As currently written it would be very difficult for staff to use the PA rules in issuing a Certificate of Compliance.

Consideration should be given to making greater use of controlled, restricted discretionary and discretionary activity status, rather than permitted, to better reflect and manage the increasing natural erosion risk regarding water and ground conditions and slope, and erosion risk upon disturbance. This would also allow audit and cost recovery.

In either case, a legal planning review is required of all text in the draft rules to:

- Complete all incomplete cascades
- Assign a regional or district rule status to all activity rules and every condition
- Remove inconsistencies and employ consistent terminology
- Remove conditions which require too much evaluation and subjective discretion
- Provide definitions or improved definitions for currently ambiguous terms
- Address enforcement and compliance challenges in relation to discretionary aspects of good management practice

5.1 Rule interpretation, clarity and consistency

The rules as currently worded do not provide sufficient clarity and consistency. There is too much ability for variable interpretation of conditions and this makes it impossible to clearly determine compliance. Many of the conditions require specialist knowledge and qualifications to assess and there may not be sufficient capacity within some industry sectors to support this.

A few of the conditions seem to be inconsistent with each other. For example the condition for harvesting [top of page 72] includes one condition which refers to a trigger when there is 'significant adverse effects on aquatic habitat'. This suggests effects up to a 'significant' level are allowed. There is uncertainty in what is 'significant' in this context and what adverse effects are actually being managed in any case? Another trigger given is when there is 'sedimentation' on the bed of any surface water body -how much sediment and to what extent or depth is the trigger?

It is inappropriate to leave the decision of compliance on highly specialised aspects up to the forestry operators who may or may not have the specialist expertise to identify compliance – for example who determines if the edge of a Significant Natural Area will be readily recoverable within five years [page 84] to ensure compliance with conditions under the general rules?

Relief sought:

21. [repeat of relief point 2b and c] Review and amend the rule cascade to
 - a. better reflect and manage the increasing natural erosion risk regarding water and ground conditions and slope, and erosion risk upon disturbance, making greater use of controlled, restricted discretionary and discretionary activity status,
 - b. reduce evaluation and subjective discretion, improve consistency and reduce ambiguity.

5.2 Terminology consistency and definitions

From an enforcement perspective there are potential issues regarding inconsistent references. For example the document initially talks about "rivers" under RMA, but then later refers to rivers in a number of other ways, including 'stream', 'surface water body', 'perennial stream', 'perennial flowing river', 'permanently flow river' and 'flowing water body'. Either more consistency or more explanation will be required if references to river are to be used in different ways.

Other terms that require definition or more clear definitions include:

- **Riparian Zone** – the terms riparian area, riparian habitat and riparian margin are also used – often in the context of discussing water body setbacks, which are also termed buffers, however each of these aspects can have differing interpretations and purposes – are they no-

go areas, or something else? The definition of setback suggests these areas to be exclusion zones where certain activities cannot take place, however the use of the terms listed above in the draft regulations is not consistent with this - eg allowing for damage during harvesting.

- **Riparian vegetation** – further definition of this is required to clarify its use within the conditions and its relationship to riparian zones and buffers.
- **Water body setbacks** – further definition is required regarding how these are determined and where they are measured from. Should it be from the edge of the river bed or the outer edge of a riparian buffer?
- **Temporary** – the definition for temporary activities should be clarified in the glossary – currently definitions are given for temporary bridges (2 years) and temporary river crossings (2 weeks or less), however these are only listed in the crossing-specific conditions for river crossings body, yet the term temporary is used in other areas (eg temporary tracks under earthworks).
- **Plantation Forestry** – [definition box 7 page 19 / glossary page 50]
 - Currently the definition for this includes that forests are deliberately established for commercial purposes and ‘...has been planted and...’. Tasman has observed a practice locally where cut-over areas are left to naturally regenerate in self-seeded pine and then are effectively managed into a plantation forest through thinning practices. These appear to fall into a grey area of whether or not they will be considered plantation forest. We suggest the definition could be modified by adding “has been planted or managed for subsequent harvest”.
 - The use of the phrase “of forest cover” doesn’t add much – unless it was in order to provide some idea of canopy closure – which it doesn’t really do.
 - Introducing a new term “shelter belt” might introduce potential new uncertainty
 - In exception (ii) “forest species” can also be planted in ‘rural areas’ - the key determinant is the 1ha area not the species.
 - Regarding exceptions (v) and (vi) - how does one prove or disprove this status?

A suggested amended definition is show below:

Plantation Forest means a native or exotic forest: ~~deliberately established for commercial purposes:~~

- (a) with at least 1 hectare of ~~forest cover~~ of forest species that:
 - ~~a-~~ i) has been planted, or managed, for subsequent harvest, or
 - ~~b-~~ ii) has been harvested within the previous 5 years
- (b) includes all associated internal forestry infrastructure; but
- (c) not including:
 - (i) an area a shelter belt of forest species where the tree crown cover has, or is likely to have, an average width of less than 30 metres (this includes areas planted for amenity or to protect an area from weather or spray drift);
 - ~~(ii) forest species in urban areas;~~
 - (iii) nurseries and seed orchards;
 - (iv) fruit and nut crops;
 - (v) trees planted for long term ecological restoration purposes that will not be harvested planting of forest species;
 - (vi) trees willows and poplars space planted for soil conservation, land stability or erosion control purposes that will not be harvested

- **Harvesting** definition could be simplified to: felling and extracting trees or tree trunks from any plantation forestry site and includes production thinning.

- **Slopes (>25 degrees)** – is this the predominant slope or something else? The NESPF needs to define how the slope is to be calculated to ensure consistency of use (refer section 8.7 for further discussion on this). It is also helpful if this is consistently listed with the grade and percentage – eg 25 degrees (2.14h:1v; 46.6%).
- **River, perennial river, perennial flow and surface water body** – clarification is required on why these different terms are used in different ways in the rules – is this intentional and if so what is the justification? Either more consistency or more explanation will be required if references to river are to be used in different ways.
- **Activity Area (and Activity Site)** – currently the definition of this term is too vague to be useful. For example it could be taken advantage of within the Forestry Quarrying conditions to undertake multiple adjacent ‘activity sites’ to allow multiple lots of 5000m³ of material to be removed within the same 5 year time frame rendering the volume condition obsolete. In addition, the term is used inconsistently with ‘site’ used in the rules and ‘area’ used in the definitions.

Relief sought:

22. Review, amend or create definitions for the terms identified above, in line with the suggested changes.

5.3 Amendment to Management Plans

As highlighted previously, the success of the NESPF will be dependent on forestry operators implementing good or best practice. To meet compliance with the permitted activity condition for ESCP, only the submission of the ESC plan (or the harvest plan or the quarry plan respectively) to Council (if required) is needed.

Ability to ensure compliance with any measures stated in that plan is extremely uncertain and potentially unable to be enforced.

In addition, there are no provisions for councils to test the adequacy of these management plans and the appropriateness of any measures to be adopted.

Currently there is no plan approval process prior to commencement of activities. There is no requirement for any formal agreement or certification to ensure the appropriateness of proposed methodologies and controls are consistent with ‘good practice’ standards, nor any audit to confirm that any such methodologies can also meet any other relevant regulations.

One situation that may arise is where any forestry activity may be near a river subject to a Water Conservation Order or other sensitive environment subject to more stringent regional regulation. It’s not clear whether this stringency can override the activity status of permitted for the operation.

There is also no mechanism for auditing any amendments to plans that may be required during the course of the activity.

Presently, without any required formal agreement of plans and particularly if environmental concerns remain (that is if a plan has been provided) then the regulatory authorities will be left with little option other than looking to use formal enforcement tools to address any outstanding environmental concerns. With this approach where significant effects do occur as a result of shortfalls in any ESC plan then there may be an increased likelihood of formal court action to address any significant effects whether through orders and/or prosecution. Neither option is conducive to good council-industry relationships.

In terms of enforcement, a distinction needs to be made between the condition requiring the ESCP, and all other permitted activity conditions. If any of the other permitted activity (operational or environmental) conditions are breached, then enforcement action can be taken to either require compliance or to obtain a consent. But with the ESCP condition, compliance is limited to confirming the procedure of adequately completing it and providing it to the council on request or as agreed, and to ensuring that the intended programme of measures as set out in the ESCP is carried out.

This will mean significant effort to monitor. This is a key regional council issue, and is likely to lead to pressure for RMA reform to recover costs of permitted activity monitoring through charging, for example under s36 RMA.

Relief sought:

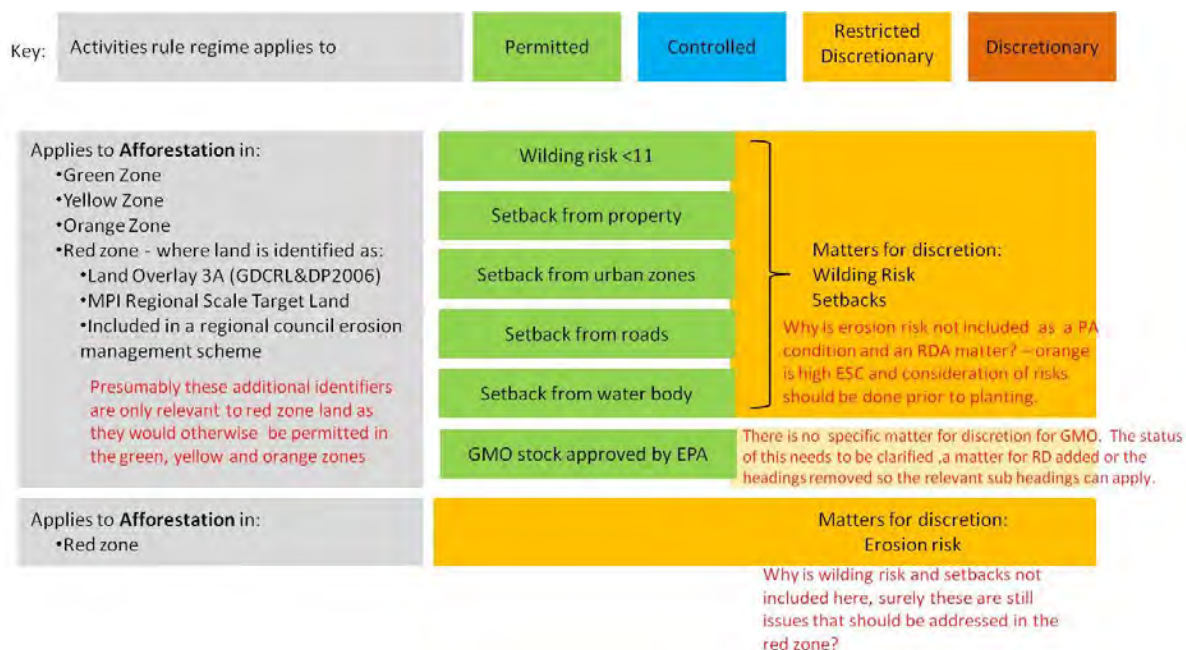
23. Within areas of high and very high ESC, better reflect and manage the increasing natural erosion risk regarding water and ground conditions and slope, and erosion risk upon disturbance by making greater use of controlled, restricted discretionary and discretionary activity status to enable councils to audit management plans and recover costs of compliance monitoring.

5.4 Cascade diagrams

Council suggests cascade diagrams are developed for each rule cascade including each activity and its conditions and assessment matters, and all default activities to illustrate each activity cascade. This will help identify conditions where cascades are currently unclear or where conditions are inconsistent, and can visually aid in reader understanding of how the cascades work.

An example of unclear cascade is the Genetically Modified Trees (GMT) condition under afforestation, if non-complying, this cascades to restricted discretionary, however there are no clear matters for discretion listed under the cascade. In addition, the GMT condition under replanting, if non-complying, cascades to a controlled activity meaning councils must grant consent and can only impose conditions. Both of these situations are unacceptable.

An example cascade diagram for Afforestation, including some questions (in red text) on the cascade, is shown below:



Relief sought:

24. Develop cascade diagrams to help clarify and communicate how the regime works and where the gaps are.
25. Complete all incomplete cascades.

6 Matters for Greater Stringency

Are the matters where local authorities can retain local decision-making appropriate?

The matters for greater stringency are too narrow in focus and as currently worded will negate councils' ability to be more stringent for those aspects not already identified and mapped in resource management plans.

6.1 Scope of matters for greater stringency

Section 6 (Table 4 – page 23) of the discussion document identifies three situations where greater stringency would be allowed that are not listed in the later table on pages 98 and 99. This should be clarified into a consistent single correct list.

In the consultation document, Table 4 [page 23] should have an additional note identifying that the matters in Table 2 (matters out-of-scope) [page 20] may be addressed with additional rules.

Relief sought:

26. Clearly and accurately communicate the matters where greater stringency can be applied.

6.1.1 Inclusion of Erosion and Land Instability Risks as matters

Both erosion and land instability risks need to be added as matters where councils can have greater stringency. This is because the matter of meeting NPSFM objectives is very broad and it is uncertain whether it is sufficiently linked with erosion and sedimentation risk. A second reason is that erosion risk has soil related risks that are beyond the scope of sediment contamination management as arguable under the NPSFM matter for greater stringency. A third reason is that the ESC is used in a

very simple way, where existing regional rules tuned to particular styles or degrees of erosion risk will not continue if there is no such matter for greater stringency (RMA s43B(1)).

Relief sought:

27. Include both erosion and land instability risk as matters for greater stringency.

6.1.2 Scope of matters for outstanding water bodies, landscapes and features

The greater stringency is limited in the case of outstanding freshwater bodies to 'setbacks' and in the case of outstanding natural features and landscapes to 'afforestation'.

Other activities permitted under the NES-PF (eg earthworks) may have significant impacts on these types of environments particularly in relation to the adequacy of sediment and erosion controls.

The scope of matters for greater stringency needs to be widened to include all plantation forestry activities within outstanding water bodies, landscapes and features that may adversely affect outstanding water bodies, landscapes and features.

Relief sought:

28. Widen the scope of matters for greater stringency to include all plantation forestry activities within outstanding water bodies, landscapes and features that may adversely affect these.

6.1.3 Scope of Karst Protection Areas

Tasman has areas of karst, including allogenic non-karst catchments which can affect karst landscapes. Both karst landscapes and contributing allogenic catchments are not currently mapped in our Plan.

The tables on matters for greater stringency currently include Karst Protection Areas and karst land forms. It is important that Karst Protection Areas be clarified to also include non-karst catchment areas that can affect karst landscapes. Tasman has examples in Golden Bay of forestry on Separation Point Granites that are upslope of karst landscapes and have the potential to affect karst through changes in hydrology and sedimentation inputs into karst streams and overland into dolines and cave entrances. Council's ability to be more stringent in these situations must extend to contributing non-karst catchment areas.

Relief sought:

29. Extend the definition of the term Karst Protection Area to include non-karst catchments that can affect karst landscapes.

6.1.4 Scope for Other Geologies

Tasman District contains some geologies that are particularly sensitive to either erosion or sediment transport which require specific management techniques. Tasman examples of this are the Moutere Gravels, Separation Point Granites and Pakawau group sandstones.

Moutere Gravels are classified as low to moderate in the Erosion susceptibility Class, however it has a high proportion of very fine clays which are particularly difficult to manage once entrained in water and can require chemical flocculation to effectively address sediment discharges off-site.

Similarly, Separation Point Granites have specific management methods required due to their high erodibility, in certain situations and slopes, to both avoid erosion and prevent increased land instability risks. In particular, Separation Point Granites have been of particular focus in Tasman due

to a death resulting from a landslide in 2013 that was considered exacerbated by side-casting on an access track above the slip site (GNS Science Report 2013/44 August 2013).

Further stringency may be required for such geologies and specific management techniques may be required to manage such areas. At the very least these will need to be reflected in good practice guidance material, but a mechanism to ensure they are complied with will also be required.

Provision should be made for Council to identify geologies and slopes where greater stringency can be imposed if required. For example Council already identifies some geologies and slopes with increased risks of land instability hazard in our Plan (Slope Instability Risk Areas) and are currently reviewing the extent of this.

Relief sought:

30. Include provision in the matters for greater stringency for councils to create more stringent rules for specific geologies and soils with specific erosion, land instability and sedimentation risks not adequately addressed by the ESC.

6.2 Mapping of areas or features for greater stringency

The NESPF requires areas such as SNAs (or similar), outstanding water bodies, etc to be included in a plan before any greater stringency can be required.

This requirement will create extra costs to council and rate payers to identify, map and incorporate these aspects into our resource management plan to enable the greater stringency to be applied.

For example, in agreement with owners of SNAs in a locally developed strategy to manage these areas, Tasman Council specifically does not provide publically available maps of SNAs and they are not included in our Plan. As such, under this continuing agreement Tasman will be unable to be more stringent with SNAs due to the need in the NESPF for these to be identified and mapped in the Plan.

As well as this, the areas covered by zone rules that protect types of natural areas, are not clearly linked with the specification of the matter of SNA even though they form “areas”.

In addition Tasman has not yet included any outstanding freshwater bodies and outstanding natural features and landscapes in the Plan.

The wording of the sections on greater stringency should be amended to allow for more descriptive means of identifying SNAs and outstanding freshwater bodies and natural features and landscapes in plans.

Relief sought:

31. Reword the identification and mapping requires for matters of greater stringency so that features such as SNAs can be identified descriptively in the plan text, as well as in maps.

6.3 Relationship with Water Conservation Orders

The NESPF needs to be clear on the relationship with Water Conservations Orders with reference to section 43C of the RMA. Namely, that the stricter of the two standards prevails.

Relief sought:

32. The NESPF needs to be clear on the relationship with Water Conservations Orders with reference to section 43C of the RMA. Namely, that the stricter of the two standards prevails.

6.4 Shallow aquifers – drinking water protection zones

The scope for stringency [page 23] refers to protection of shallow aquifers. The rules then reduce the scope for stringency to where drinking water is being protected. There is a range of end uses of water for which quality must be maintained, including industrial, commercial and irrigation end uses. Limitation of the scope of protection for drinking water is not appropriate.

The NESPF also assumes all councils create drinking water protection zones. It is unclear if this is meant as a link to the NES for Sources of Human Drinking Water, as drinking water protection zones are not defined in either NES.

Council does not currently have any “Drinking Water Protection Zones” identified in the Plan, although it does have Water Management Zones that including protection of drinking water within their objectives. It is requested that the terminology and definition intended for shallow aquifer protection be improved to allow for protection of this water for any purpose.

As noted in relation to SNAs and outstanding water bodies, if the drinking water protection zones are not specifically included in a Plan, this provision imposes a further burden on council to fill the gap created.

Relief sought:

33. Replace the term “drinking water protection zones” with a term that better reflects the use of other zones by councils to manage water for a variety of uses and values – and define the subsequent term in a matching all-encompassing sense.

6.5 Natural character and visual effects

The NESPF is largely silent on the potential effects of plantation forestry on natural character and visual amenity. Council seeks clarification on the position of the NESPF on natural character and visual amenity effects by including these in the list of out-of-scope effects for the NESPF to enable councils to include rules in plans addressing these effects where required.

Relief sought:

34. Clarify that natural character and visual effects are out-of-scope for the NESPF.

7 Environmental Risk Assessment Tools

Will the environmental risk assessment tools appropriately manage environmental effects as intended?

Council has concerns over the accuracy and practical implementation of the tools. It notes the potential risks and confusion arising from the requirements of Part 3 of Schedule 1 and Schedule 1AA of the RMA concerning incorporation of documents by reference.

7.1 Erosion Susceptibility Classification

Council has some concerns over the accuracy of the Erosion Susceptibility Classification. There are geologies that are considered to be of a higher erosion susceptibility classification than that currently listed in the tool.

For example, rock type LUC 6e21 is described as “E and D” slopes, stable rock types. In Tasman it covers Separation Point Granite and Pakawau group sandstone which are known for their high erodibility. The original ESC classed them as “moderate”, however the new ESC classes them as low, these rock types should remain at least moderate.

In addition, rock type LUC 6e11 is described as Gw and St, F and E slopes. In Tasman it is predominantly Separation Point Granite, and should remain at least as moderate. The adjacent LUC polygons on the same geology and only differentiated by a steeper slope range is LUC 7e9 which has an ESC of high.

Both these LUC classes were recommended to be increased in ESC rating in previous Tasman feedback on the draft NESPF.

There needs to be a transparent and formally recognised process for the review and adjustment of land status under the ESC within the NESPF.

The accuracy of erosion risk prediction is fundamental to this NESPF. The accuracy of the “potential erosion” field used to derive the ESC may not be good enough on its own to define erosion and associated sediment delivery risks. There could be a need to use models, such as CLUES and SEDNET, to assist in defining risk of erosion, rather than just the erosion classes.

In addition, while council agree that erosion susceptibility is a useful means to identify erosion risk, it does not include consideration of geologies that while inherently stable, include a higher percentage of fine clays which can be particularly difficult to manage from a sediment delivery point of view and require specialist consideration and minimisation of land disturbance extent. An example of this in Tasman is the Moutere Gravels which can often require chemical flocculation to effectively manage sediment discharge. These aspects could be addressed in best practice guidance, but it is unclear how this might best be done for regional issues at a national level in the context of the NESPF.

Furthermore, poor practice can cause significant adverse effects on soil of any erosion susceptibility and Tasman has examples where exactly this has occurred on low risk land (eg Nelson District Court File: CRI-2013-042-759). This again highlights the need for robust good and best practice guidance, implementation and monitoring and audit to ensure good or best practice is business as usual for all forestry operators and their subcontractors.

Relief sought:

35. Clarify and formally recognise the process for review and adjustment of land status under the ESC within the NESPF.
36. Adjust the ESC classifications in Tasman for LUC categories LUC 6e21 and LUC 6e11 to at least moderate.
37. [repeat of relief point 30] Include provision in the matters for greater stringency for councils to create more stringent rules for specific geologies and soils with specific erosion, land instability and sedimentation risks not adequately addressed within the ESC.

7.1.1 Undefined land

Some areas of Department of Conservation land within Tasman District may be in plantation forestry land use. A recent case at Pakawau in Golden Bay of poor management practice in plantation forestry which resulted in significant adverse effects to a stream occurred on land partly owned by the Department of Conservation. The process for dealing with plantation forest on undefined land needs to be clear under the NESPF.

Relief sought:

38. Clarify the process to be used for regulation of currently undefined land that is in, or may become, plantation forestry land use. Alternatively do not exclude any land from the ESC mapping (as was done with earlier mapped versions).

7.1.2 Erosion zones used in rule regime

Council would prefer if the rule regime reflected greater linkage between the ESC zones and the increasing risk using greater consented activity status. However if this is not done, then consideration should be given to a simpler category system as there is no apparent regulatory difference between zones for Green, Yellow and Orange <25 degrees. There could be an alternative category system which is separated into four categories covering:

- Green, Yellow and Orange <25 degrees Zones;
- Orange >25 degrees Zone,
- Red Zone;
- Class 8e land.

This could potentially simplify the rule regime and avoid issues with identification of 25 degree sloped land, as this could be identified, agreed and mapped as a distinct zone as part of the NESPF development.

The practicality of requiring forestry operators to define orange zone areas with slopes greater than 25 degrees requires development of a specified methodology and data set for consistent application. This is discussed further in section 8.7.

Relief sought:

39. If the rule regime is not amended to reflect the increasing risk across the ESC zones, then consider simplification of the regulatory categories used, including specific mapping of the orange (and possibly red zone) greater and less than 25 degree slope and class 8e land.

7.2 Fish Spawning Indicator

Council has some questions regarding the Fish Spawning Indicator and how this will be used in a practical sense. Currently the rule regime does not specifically link to the fish spawning indicator tool, but links separately to the NZ Freshwater Fish Database and the REC Predictive Fish Model.

Council is concerned that use of a 0.5 probability in the REC Predictive Fish Model would likely exclude many rare species from consideration and a lower threshold is needed. For example in Tasman, Giant Kokopu has only been identified as a 0.2 probability in the Leathwick Predictive Fish Model and the proposed system would likely exclude consideration of this species. The Leathwick model is assumed to be the basis for the REC Predictive fish model, but no information on the REC Predictive Fish Model development and methodology could be found on the MPI website or online generally. This information needs to be made readily available so submitters can understand the model methodology and its limitations.

There are also gaps in the fish probability layer mapping available online, presumably due to the selective mapping of only probabilities >0.5. However, it is assumed this does not mean there will be no fish found in the, often short, distances between the river reaches with fish probabilities >0.5. For example it is assumed fish probabilities of 0.49 would not be mapped. It would be more helpful to map all probabilities, with a colour key, to help put these estimates in context of the surrounding water body network.

In addition, the accuracy of the fish probability layer on the “Fish Spawning Indicator” map is limited by the digital elevation model that underpins the River Environment Classification (2). The REC location of many rivers in the Tasman region is very different to the actual location (eg Motupipi, Aorere, Moutere). The map also does not include many spring-fed streams and includes fish values for streams that dry up for 98% of the time (and therefore have almost no fish value). Tasman District Council can supply this information to improve this accuracy (this has been offered to the Ministry for the Environment and NIWA in the past).

The NZ Freshwater Fish Database is also referred to in the general permitted conditions. This database holds records from a variety of sources for actual observations of fish species, however these records can be from some time ago and records of species, such as lamprey, can be as old as 50 years. In addition, sampling can be biased to easily accessed areas monitored as part of long term programmes so records can be unrepresentative in a catchment. There is concern over how this might affect which fish species must be taken into account in determining the appropriate spawning calendar applicable to a specific forestry operation.

There is also provision in the NESPF for one-off fish survey [fish spawning condition 3], which if it shows no fish species will affect the spawning calendar considered (ie condition 1c does not apply), however results from such sampling may be seasonally and yearly dependent, as well as influenced by the sampling methods used.

Council often observes records of ‘no fish’ for a species at river sites in years between there being fish present, so a single record of ‘no fish’ does not mean a river area no longer provides fish habitat or spawning habitat for the species.

In addition, if river habitats are being adversely affected by existing forestry operations, then finding no fish species present may be more of an indication of the adverse effects needing to be addressed, rather than an appropriate measure for determining whether forestry operations can continue throughout fish spawning seasons. This seems to be a supporting the somewhat perverse outcome of allowing degradation, if degradation already exists.

Further information and guidance must be provided on how site specific assessments should be made to determine compliance with the permitted activity conditions.

The “Nationally Endangered” Northern flathead galaxias and the “At Risk – Declining” Dwarf Galaxias (both recognised in Goodman et al 2014) and the NZ Freshwater Fish Database are missing from the spawning and migration guidance, and fish passage management in relation to forestry activities is critical for their protection. Some species currently listed as only moderately affected have already been specifically impacted by forestry (resulting in local extinctions) and need built barriers and other specific management in particular situations to protect them from invasive species.

The General Conditions list periods of time where beds of rivers cannot be disturbed in order to protect the spawning of fish species. These times do not however align with local spawning dates for those species. Fish spawn at different times in the Nelson region which renders some these dates ineffective.

The General Conditions do not provide for native non migratory fish species. For many non migratory fish species, such as dwarf galaxias or Northern Flathead Galaxias (and other species that can form non-migratory populations), that spend their adult life in one location and adverse impacts from forestry related activities presents a significant risk to the adult, its habitat, and lifecycle.

The review of harvesting effects on fish spawning and habitat provides a useful summary but does not fully take account of the significant increase in river water temperatures that occur when riparian margins are removed as part of the harvest. Increase in stream water temperature post harvest can have long term negative effects on freshwater invertebrate communities and fish spawning, which is well documented in NZ.

Relief sought:

40. Provide information on development and methodology of the REC2 Predictive Fish Model so that submitters can understand how the model has been developed, the methodology and the likely limitations of the model.

8 Comments on Specific Activities and Rules

Do you have any comments about any particular activity or draft rule?

Refer below to comments on specific activities and rules:

8.1 Notification requirements

The standard notification used through the rule regime should be at least 30 working days prior to works start, to allow for time between notification to council and council assessment as to whether to request management plans, and then to allow time for changes to be voluntarily made to plans if they are found to be inadequate to address adverse effects - without creating delay to scheduled commencement of works.

An exception to the harvest notification period should be included for management of wind throw and fire damaged trees. The need to rapidly recover trees from damaged area means that notification times may not be able to be met. In the case of wind throw and fire damage management notification should be reduced to 5 working days.

Relief sought:

41. Extend the notification requirement where referred to in the regime to at least 30 working days.
42. Include an exception to the harvest notification requirements for the management of wind throw and fire damaged trees to reduce the notification period to 5 working days.

8.2 Property setbacks – Afforestation and Replanting

The property and boundary setbacks conditions could be reworded to a more simplified structure.

Conditions associated with urban boundary affects should be clarified that these relate to areas adjacent to urban zones as the NESPF specifically excludes forest species within urban areas (although this part of the PF definition is somewhat obsolete – refer to section 5.2).

The provision for adjacent landowner consent for urban/residential zones needs to be removed. Setbacks from urban zones should be fixed and it is a basic planning principle that there are appropriate buffers between incompatible activities. There is no applicable owner of a “zone” and no one owner should have this authority for all future zone residents.

Relief sought:

43. Remove the provision for adjacent landowner consent to be obtained to reduce setbacks for urban /residential zones.

8.3 Genetically Modified Tree Stock

The condition on genetically modified tree stock under both the Afforestation and Replanting rules should be removed and the topic made out-of-scope of the NESPF to allow [councils to retain the ability to create rules around this issue](#). This position is supported by the recent Environment Court decision (2015 NZEnvC 89) (*Federated Farmers v Northland Regional Council*, decision Principal Environment Judge Newhook, 12 May 2015). That decision found that there is jurisdiction under the RMA for regional councils to make provision for control of the use of GMOs through regional policy statements and plans.

Relief sought:

44. Delete reference to genetically modified tree stock as a permitted activity, list this as out-of-scope and allow councils the full ability to put in place appropriate rules to manage the use of GMO species.

8.4 Water body setbacks

Council has several concerns with the water body setbacks regarding the widths selected and the manner in which these are used as buffers within the rule regime and the environmental outcomes that could be achieved. These comments apply to all instances where water body setbacks are included in the rules.

8.4.1 Setbacks as intact buffers

In the NESPF setbacks are defined as “The measured distance from a feature that creates a buffer within which certain activities cannot take place”. The proposed regime requires setback of planted trees, earthworks and mechanical land preparation outside of these ‘buffer’ areas, but then allows for the destruction of vegetation within these ‘buffer’ areas during harvest by allowing for machinery to operate within the buffer areas, where this is necessary for slash removal, control of direction fall of trees and extraction of trees [pg 72]. . In addition, there appears to be a conflicting general condition that allows for incidental damage to indigenous vegetation where this is adjacent to plantation forestry [pg 84]. Riparian zones are required to support healthy freshwater ecosystems.

The Scion report (2015) looked at the potential environment benefits from water body setbacks for intact riparian buffers. However the proposed rules and conditions allow for these buffers to be damaged during harvest and therefore they are not intact and the benefits suggested are unlikely to be realised during this time and over subsequent recovery periods with a greater risk of weed infestation occurring in this time.

A national review of riparian buffers is needed to determine the range of setback distances that will achieve environmental outcomes for maintaining and enhancing ecosystem health of water bodies to allow an informed debate on set back distances and methodologies for determining these in different contexts.

Once better understanding of the ecological requirements is obtained, then review of the economic opportunity cost of such setbacks can be undertaken and an informed and balanced debate over the compromise between economic and environmental outcomes can be had.

It is important that harvesting within the riparian zone does not degrade aquatic or riparian habitat to a “more than minor” degree.

Relief sought:

45. Undertake a national review of riparian buffers to determine the range of setback distances that will achieve environmental outcomes for maintaining and enhancing ecosystem health to allow an informed debate on set back distances.

8.4.2 Setback widths

The Brown and Pemberton report (2009) looking at district council rules identified that *“overwhelmingly, the plans provided conditions and controls on setbacks and shading controls with only two district plans, Kaipara and Southland providing no controls for the setback of plantation forestry activities”*. Furthermore they identified. *“the most common setback from a water body is an average of 20 metres.”* This would mean the proposed setback of 10m would be a reduction in protection for many areas which seems at odds with the status quo value of only 5m used to assess the setback opportunity cost to forestry operators.

The Brown and Pemberton report (2009) looking at regional council rules identified *“nine of these eleven regional plans provided for the particular forestry activities as permitted subject to conditions relating to setback distances. The most common permitted conditions included the following: ...Requiring a setback of 2 to 50 metres from water bodies or coastal marine areas for replanting of planted production forests and soil cultivation”*. The report also highlighted *“The varying setback distances from water bodies/coastal marine areas reflects that regional plans generally provide for wider setback distances where land adjacent to a water body has a steep slope or the water body is of a larger size...”*.

Two regional councils (EBOP, Horizons) utilised setbacks that were related to slopes – where wider setbacks were used for steeper slopes. This approach would seem to be consistent with the methodology forestry operators use as identified in the NZIER (2015) report that noted slopes over 15% were not valued as it is expected that under the status quo these would have setbacks at least ten metres to reflect forestry practicalities.

As mentioned previously further informed and balanced debate is needed on appropriate riparian setbacks.

TDC considers that the planting, replanting, earthworks and mechanical land preparation setbacks for water bodies need to be wider and should be linked to both the type of harvest method to be used (eg ground based vs hauler based) and the slope of the surrounding land in affecting the control over direction of felling.

For example buffer widths in steep areas should be wider than in flatter sites due to the increased need to fell trees across water bodies thereby causing damage to the riparian buffer during tree recovery and because the disturbance around a tree is often over 5m. This is in keeping with the findings of the Scion report which identified that *“a 10m buffer is likely to be more effective in protecting stream environments on flatter topography where there is greater control over tree felling and extraction within the stream and riparian environment and a low risk of sediment run-off from ground-based harvesting activities.”*

The Scion report also identified *“some overseas publications have highlighted the need for buffers much wider than 10m to maintain riparian biodiversity and instream habitat, water quality and biodiversity. A 10m buffer is therefore only likely to reduce the impacts of forestry activities to varying degrees and constitutes a compromise between environmental and economic considerations.”* This suggests even 10m buffers will not protect the values of riparian biodiversity and instream habitat, water quality and biodiversity in some areas which is inconsistent with the objectives of the NPS-FM which seeks to maintain and enhance ecological health and water quality.

Wider setbacks or setbacks measured from the edge of a separate no-go riparian buffer, rather than (presumably) from the edge of the river bed would assist in maintaining a zone of intact riparian vegetation to buffer forestry activities throughout the forestry lifecycle and improve the likelihood of achieving the benefits identified in the Scion report.

Relief sought:

46. [repeat of relief point 45] Undertake a national review of riparian buffers to determine the range of setback distances that will achieve environmental outcomes for maintaining and enhancing ecosystem health to allow an informed debate on set back distances.
47. Link water body setbacks to both the type of harvest method to be used and the slope of the surrounding land in affecting the control over direction of felling.

8.4.3 Setbacks for Outstanding Freshwater Bodies

It is inappropriate that setbacks for Outstanding Freshwater Bodies are the same as that for other 'ordinary' water bodies. If water bodies have been identified as outstanding, it implies they need a higher level of protection and a wider setback is needed to help ensure this protection is achieved.

Councils are likely to face increased litigation costs, as even with the ability to be more stringent, the process still needs to be undertaken to place additional setback rules in the Plan on top of the identification and mapping of these features.

Relief sought:

48. [repeat of relief point 45] Undertake a national review of riparian buffers to determine the range of setback distances that will achieve environmental outcomes for maintaining and enhancing ecosystem health to allow an informed debate on set back distances.
49. Increase the setbacks for Outstanding Freshwater bodies above that for other water bodies.

8.4.4 Basis for 10m setback

It is our understanding that the suggested setbacks are derived from work undertaken in the Coromandel. The Council queries the appropriateness of applying this limited work more widely without further assessment. In particular, braided river systems and larger south island rivers will require different management and may need wider setbacks.

Significant differences exist in the setbacks between the various types of water bodies. The discussion is based around the *"risk of [...] sedimentation and damage to riparian areas"* from forestry activities. As this risk would remain constant in a particular terrain the variation in setback width implies that these different sized water bodies must have different resilience levels to sedimentation and damage. Council queries if there is any science to back this up, as we would expect the effect on a wetland or lake to be similar.

Further work is required to determine the appropriate setback widths on differing slopes and under different forestry management regimes for maintaining and enhancing ecological health of different water bodies, including water quality and aquatic and riparian habitats. This could then be compared with the proposed setbacks and the operational costs of setbacks based on ecosystem health could be determined, which would allow for more informed debate of this issue.

Relief sought:

50. [repeat of relief point 45] Undertake a national review of riparian buffers to determine the range of setback distances that will achieve environmental outcomes for maintaining and enhancing ecosystem health to allow an informed debate on set back distances.

8.4.5 Setback operational costs

Council questions whether the accuracy of the setback operational costs calculated, given that the Brown and Pemberton report (2009) findings on common setback widths seems inconsistent with the status quo width used for the operational costs comparisons in the NZIER (2015) report (20m vs 5m). This suggests that the opportunity costs may be lower than identified, as operators may already be required to have setbacks at 10m or wider and are already voluntarily using wider setbacks in steeper areas. This is of particular importance as the Scion report identified that *“A 10m buffer is therefore only likely to reduce the impacts of forestry activities to varying degrees and constitutes a compromise between environmental and economic considerations”*.

The NZIER report identified that *“estimation of setbacks is a crucial cost in the analysis [...] any movement in the estimates has a significant impact on the net present value and the benefit cost ratio”*. Staff question the relative economic impact of \$280,000pa operational costs to an industry that generates over \$4.6 billion in export revenue [page 13]. Furthermore the NZIER review of the economic assessment sensitivity to setback costs identified that an increase in setback costs of 50% would result in a near neutral cost benefit ratio (1 to 0.97).

It is important in considering the trade-offs between setback widths that environmental benefits are also included in considerations, in addition to operational costs, however so far this does not appear to be the case in the NESPF.

Relief sought:

51. [repeat of relief point 45] Undertake a national review of riparian buffers to determine the range of setback distances that will achieve environmental outcomes for maintaining and enhancing ecosystem health to allow an informed debate on set back distances.
52. Following a review of riparian buffers (as above), review the economic opportunity cost assessment for resulting riparian buffers to allow further informed debate on both the economic and environment cost and benefits for various setback widths.

8.4.6 Setbacks for wetlands, small lakes and streams less than 3m wide

Smaller streams (less than 3m wide), particularly those nearer the coast, are extremely valuable ecologically. Setbacks should be provided for all rivers based on the river type and forestry context.

In addition many areas, like Tasman, have lost significant amounts of their original wetland cover and every wetland, even small ones, are considered important and wetlands which were once substantial are now represented by tiny remnants. In the draft 1999 Tasman District Freshwater Wetland Inventory (Preece 1999) 64% of wetlands were less than 1ha, 56% were less than 0.5 ha, 45% were less than 0.1ha and 24% were less than 0.01ha.

The setback for wetlands is also too narrow. This risks a lot of damage to the wetland and planted trees could potentially suck water out of adjacent wetlands changing their hydrology or drying them completely. A wider setback similar to rivers over 3m wide would be an improvement.

Small lakes (including karst sinkhole lakes) can also be ecologically important and are subject to the NPSFM objectives for ecosystem health and should not be excluded from setback provisions.

The NPSFM specifically requires the protection of the significant values of wetlands. The discussion document does not specifically identify wetlands and their riparian areas as being a matter over which councils can be more stringent. All of the forestry activities identified within the rule tables have the ability to affect the significant values of wetlands. For example in relation to setbacks the NESPF rule tables reference wetlands only greater than 2500m². In many instances the setbacks proposed may be insufficient to protect a wetland's significant values – for example by altering the water table.

Relief sought:

- 53. [repeat of relief point 45] Undertake a national review of riparian buffers to determine the range of setback distances that will achieve environmental outcomes for maintaining and enhancing ecosystem health to allow an informed debate on set back distances.
- 54. Reconsider the setbacks for wetlands and lakes.
- 55. Increase setbacks for all wetlands to at least the same setbacks as used for rivers over 3m wide.

8.4.7 Coastal Setbacks

. Presumably the setback for the coastal marine area would be measured from Mean High Water Springs and in many areas 30m may barely reach into adjacent coastal environments, with the added issue of being eroded by sea level rise over time. Council currently has coastal setbacks of 50 and 200m (for earthworks).

Plantation forest on dunelands on exposed coasts should consider larger buffers, particularly in areas where this ecosystem has been greatly diminished due to human land use. The dynamic coastline in duneland areas needs to be understood and managed accordingly in order to retain a balance of biodiversity. Both back-dune and foredune need to be managed in an integrated way. It has been recommended to Tasman District Council (by experts such as Jim Dahm) that we consider about 100m for Rabbit Island.

Council is supporting a project to understand this system better and therefore refine the appropriate buffer. This then protects more of the back dune ecosystem which supports particular species often found nowhere else. With only a 30m buffer strip, starting from MHWS, only part of the fore-dune is likely to be protected.

Council supports coastal setbacks as a matter for greater stringency, but wonders if the issue of greater setbacks, and especially for areas such as dunelands, would be more efficiently addressed through the NESPF rather than by individual councils.

Relief sought:

- 56. Retain coastal setbacks as a matter for greater stringency.

8.5 SNA setbacks

Effects on SNA (or similar) should be avoided. Currently the rules allow for damage if areas are considered 'readily recoverable' [page 84]. Council questions what does this mean and who decides if it is readily recoverable or not?

There are also weed risks to damaged SNA areas and increased edge effects on the rest of the SNA over the 5 year recovery period. This could be significant, particularly for SNAs with a high perimeter to area ratio. In addition, what happens if recovery takes longer than 5 years? Will operators then be non-compliant after the fact and will they be required to undertake restoration in these areas? - and if so, how will this be enforced?

In order to enable greater stringency regarding SNAs councils must identify and map these which will create significant costs to Councils that have not already done so. In addition, in Tasman agreements have been made with landowners to keep any mapping out of the Plan, which negates our ability to be more stringent under the proposed NESPF wording requiring SNAs to be identified and mapped in the Plan.

Relief sought:

- 57. Delete bullet points four and six of the condition for vegetation clearance and disturbance [page 84] regarding SNAs. Consent should be required to damage or remove any indigenous vegetation within an SNA (or similar).
- 58. Delete bullet points four and six of the matters for greater stringency under SNAs [page 98]
- 59. Include a requirement for directional felling where practicable and adoption of appropriate harvesting techniques to be implemented to minimise incidental vegetation damage.

8.6 Earthworks and erosion and sediment control planning

As mentioned elsewhere in this submission council has concerns over the lack of audit (and amendment) powers over erosion and sediment control plans.

If council found a deficient plan, referral to third party auditors or Forest Stewardship Council or other certification system, could help promote better planning.

Staff are concerned that some forestry operators will create generic plans that tick all the compliance boxes, but they fail to ever really think about what methods they might use on a particular site to achieve the best environmental outcomes they can.

Development of erosion and sediment control planning should ideally be done in conjunction with consideration of harvest planning and of road and landing layout development. This can help to identify ways to minimise earthworks requirements in the first instance, and also to identify opportunities for cost efficiencies, such as location of sediment controls that could be used throughout the forestry lifecycle. For example locating a sediment retention pond so it can be used for earthworks sediment control, as well as during mechanical land preparation and harvest phases, and potentially providing a fire water reservoir during the growth phase.

It is important that guidance on erosion and sediment control planning cover not only the specific practices considered to be good and best practice, but also the process of erosion and sediment control plan development, including key management concepts as summarised below:

Pre-Planning	<ul style="list-style-type: none"> • Develop and implement an evolving ESCP <ul style="list-style-type: none"> ○ Determine the risks on and off site ○ Utilise a treatment train approach ○ Make sure the plan evolves
	<ul style="list-style-type: none"> • Plan to minimise extent and duration of disturbance <ul style="list-style-type: none"> ○ Stage and sequence construction
	<ul style="list-style-type: none"> • Experience and Training <ul style="list-style-type: none"> ○ Use suitable qualified personnel to develop and implement the ESCP ○ Ensure all contractors understand the ESCP before their work begins
Before work begins	<ul style="list-style-type: none"> • Install perimeter controls <ul style="list-style-type: none"> ○ Control upper catchment water
	<ul style="list-style-type: none"> • Protect watercourses
During work - Erosion Control	<ul style="list-style-type: none"> • Protect the land surface from erosion <ul style="list-style-type: none"> ○ Protect steep slopes ○ Separate onsite clean water from disturbed areas ○ Stabilise exposed areas rapidly
During work - Sediment Control	<ul style="list-style-type: none"> • Prevent sediment from leaving the site <ul style="list-style-type: none"> ○ Employ detention devices ○ Assess and adjust
Stabilise the site	<ul style="list-style-type: none"> • Stabilise all exposed areas with permanent stabilisation

Relief sought:

60. Ensure good practice guidance includes the process of developing plans incorporating the key management concepts as listed above.

8.6.1 Risk based approach to sediment control design.

In developing good practice guidance Tasman suggests considering a risk based approach to sizing of sediment controls for specific design storm frequencies, based on receiving environment sensitivity, duration of disturbance and a desired level of residual risk. An example of this approach is included in the table below. This provides a means to achieve a consistent level of risk management across the country while taking into consideration the variation in rainfall across regions and localised context in terms of receiving environment types.

Category	Receiving system type	Potential for Adverse Effects from Erosion and Sedimentation	Desired design risk (chance of event occurring during works)		Storm frequency (Average Recurrence Interval) to design for (1 hour duration) (Years)				
			%	chance	Site disturbance Duration				
					up to 2 weeks	up to 1 mth	up to 3 mths	up to 6 mths	up to 12 mths
A	Estuaries	Highest	<2.5%	1 in 40	2 yr	5 yr	10 yr	20 yr	40 yr
A	Water Conservation Order Areas	Highest	<2.5%	1 in 40	2 yr	5 yr	10 yr	20 yr	40 yr
A	Spring fed streams	Highest	<2.5%	1 in 40	2 yr	5 yr	10 yr	20 yr	40 yr
B	Streams and Rivers	High	<5%	1 in 20	*85% of 2yr	2 yr	5 yr	10 yr	20 yr
B	Wetlands	High	<5%	1 in 20	*85% of 2yr	2 yr	5 yr	10 yr	20 yr
B	Karst	High	<5%	1 in 20	*85% of 2yr	2 yr	5 yr	10 yr	20 yr
B	Lakes	Moderate	<5%	1 in 20	*85% of 2yr	2 yr	5 yr	10 yr	20 yr
C	Open coast	Low	<10%	1 in 10	*85% of 2yr	*85% of 2yr	2 yr	5 yr	10 yr
C	Land	Low	<10%	1 in 10	*85% of 2yr	*85% of 2yr	2 yr	5 yr	10 yr

Relief sought:

61. Ensure good practice guidance considers a consistent risk based approach to erosion and sediment control design and management.

8.6.2 Issues with specific earthworks conditions

Specific issues with the earthworks conditions include:

- The reference in the road widening condition [page 66 bullet 5] should read 'less than' 5000m³. It is unclear how the figure of 5000m³ relates to environmental risks or if this is a practice related figure.
- The reference to the NZFOA road engineering manual needs to be supported by a review and consultation process to ensure the content of this manual is fit for purpose and supported by councils, forestry operators and other stakeholders.
- Regarding spoil [page 67] - what does 'readily enter' mean and how is it assessed?
- Reference should be made under the spoil conditions to avoid side-casting of spoil in areas along the outer edges of tracks above steep slopes, where the formation of any track or road crosses any unstable site or crush zone or in areas of convergent drainage – this is consistent with GNS and the Coroners recommendations following a fatal landslide in Tasman in 2013 (GNS Science Report 2013/44 August 2013).

- The rule cascade may be clearer and simplified if earthworks associated with maintenance of forestry infrastructure was separated out into its own permitted activity cascade. This activity can occur throughout the forestry lifecycle and has different implications and risks than bulk earthworks required for initial creation of landings and roads. Currently the note identifying this is also permitted in all zones including red zone is potentially confusing and requires a robust definition of what is and is not maintenance particularly in the red zone. The use of the term 'upgrade' in the note also suggests improvement or change over and above that originally existing, as opposed to maintenance to reinstate that originally done. The term upgrade should be removed or specifically defined.
- There appears to be a conflict in the conditions in that presumably earthworks for a new road are permitted under the conditions, yet under the road widening conditions, the upgrade to increase carrying capacity is not permitted and moves this to a restricted discretionary activity. It would seem this is attempting to ensure all roads are designed to the heaviest class of vehicle expected, however it creates an odd situation where a new road would be permitted, but upgrade of an existing one might be a Restricted Discretionary Activity. This condition needs to be reworded for example adding the text "unless the design of the road is suitable for the heavier vehicle class;"
- References to sediment transport should be widened to include sediment and debris transport
- The scope of content required for ESCPs [page 66] should include:
 - identifying and mapping the risk areas, including the identification of water bodies and pathways for sediment transport as this is a key step to understanding the risks of a site
 - any staging and evolution of erosion sediment controls if required
 - methods to monitor achievement of the plan and review of the ESCP;
- the stabilisation and containment condition should refer to "must be installed and maintained in an effective state for all..."
- Stabilisation needs to recognise the difference between temporary and permanent stabilisation. Straw mulch can be an effective temporary stabilisation technique, but is not appropriate for permanent long term stabilisation as it eventually rots (within approx 5 months). Provision must be made for permanent stabilisation to be done on exposed areas, particularly in harsh areas where natural regeneration may be very slow or unsuccessful over the drier summer months. Tasman has a suggested standard for achieving stabilisation of 80% effective cover of bare areas.
- The design condition should include reference to: "locate and align tracks and landings to minimise exposed areas and minimise erosion risk wherever possible"
- The matters for restricted discretion should also include:
 - setbacks
 - design and method of works
 - erosion and sediment control planning
 - methods of stabilisation and containment;

Relief sought:

62. Undertake a review and consultation process of all guidance material to be incorporated by reference (eg NZFOA road engineering manual) to ensure the content is fit for purpose and supported by councils, forestry operators and other stakeholders.
63. Amend the spoil conditions to avoid side-casting of spoil in areas along the outer edges of tracks above steep slopes, where the formation of any track or road crosses any unstable site or crush zone or in areas of convergent drainage.
64. Review and amend the conditions and matters for discretion to remove inconsistencies and uncertainties, and to include the additions as identified in the list above.

65. Amend the stabilisation condition to recognise the differences between temporary and permanent stabilisation.
66. Amend the scope of content required for ESCPs to include:
 - a. identifying and mapping the risk areas, including the identification of water bodies and pathways for sediment transport as this is a key step to understanding the risks of a site
 - b. any staging and evolution of erosion sediment controls if required
 - c. methods to monitor achievement of the plan and review of the ESCP.

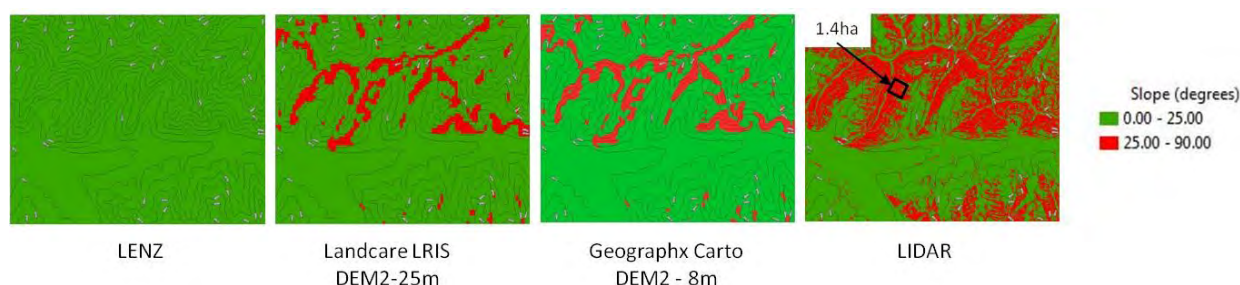
8.7 Slope thresholds

The use of the 25° slope threshold requires clarification of where and how this is to be measured and how this is to be used – ie does it relate to the site of the earthworks or a particular area? - what data is to be used and what method is to be used to calculate the slopes?

In a defined area slopes can be expressed in a number of ways – average, predominant, maximum, etc (single span bridges under river crossings uses the undefined term “prevailing slope”), which can result in differing outcomes for compliance. These aspects need to be clearly defined to ensure consistency of application.

Of the national datasets that exist, the NZLRI provides a slope layer which, from council staff experience, is too inaccurate to be used for the purpose of NESPF. The slope layer derived from the LENZ dataset is derived from coarse topomap series contour information and it is likely to be as inaccurate.

For example below is a comparison of the 25 degree slopes (red) from differing data sources, using the same ArcGIS 3D Analyst Slope tool which determines the rate of maximum slope change (except for the LENZ dataset which is post-processing and is based on a filtered Landcare LRIS DEM).



The practicality of requiring forestry operators to define orange and red zone areas with slopes greater than 25 degrees suggest access to good detailed contour data, such as LIDAR. Council does not hold LIDAR for the entire district or for inland hill areas where forestry typically occurs. It is unknown whether larger forestry operators already hold such detailed contour data, but it is likely to be an additional cost, particularly for smaller operators to identify this aspect for determining compliance with the rule regime.

Alternatively the identification of Orange and Red Zones >25 degree sloped land could be mapped and agreed as distinct zones as part of the NESPF development to avoid the need for individual operators and Councils to make this distinction on a case-by-case basis, however it is unclear what national data could be used that is sufficiently accurate for this purpose.

Relief sought:

67. Develop a methodology and specified dataset for determination of 25 degree slopes that can be consistently applied, OR map these areas as distinct zones as part of the NESPF. Either approach should use a methodology and dataset that is sufficiently accurate to reflect the risks.

8.8 Forestry quarrying

The NESPF addresses only two of the six potentially adverse effects of forestry quarrying with the remaining four listed as being out of scope. This seems to be an ad hoc way to manage the effects of forestry quarries and adds a layer of complexity for forestry operators who may expect to be permitted under the NESPF, but may be a consented activity under one or more Plans due to rules on issues that are out-of-scope. It would seem simpler if either all effects of forestry quarrying were addressed in the NESPF or this activity was entirely excluded from the scope of the NESPF. In this way the effects of this activity could be addressed in a holistic integrated manner.

Council query how will the effectiveness of the provisions in the Quarry Management Plan be assessed and checked? Currently there is no provision for Councils to be able to audit or amend non-complying QMPs and enforcement action is the only available route for Council to ensure good practice is followed.

Relief sought:

68. Exclude forestry quarrying from the scope of the NESPF (preferred), or include consideration of all forestry quarry effects within the NESPF to allow integrated consideration of effects.

8.9 Slash in rivers

Some slash is important for the ecological health of streams, particularly where riparian vegetation is lacking and unable to provide a source of woody material into stream habitats. However too much slash is undesirable due to the risk of debris dams forming.

Staff have seen considerable damage to streams due to cleaning out of slash and in some cases it would have been better not to remove it. The permitted activity conditions currently say “*whenever safe and practical to do so, remove potentially unstable slash that has the potential to mobilise under flood flows from water bodies and ... block/dam/divert flow*”. Bigger logs and branches should be removed if there is a high risk of damaging property downstream, but for smaller material adverse impacts on the stream from removal should also be taken into consideration.

In smaller streams with good riparian vegetation a river bed cover of 20-40% of woody debris is considered good for ecosystem health in providing aquatic habitat. In streams where riparian cover is lacking and where setbacks are insufficient to provide ongoing riparian cover, then a similar amount of slash would help mimic the natural benefit of woody debris. In preference, Council would prefer adequate water body setbacks were imposed to ensure an intact riparian buffer is retained so that slash is not required ecologically in rivers and the buffer help to keep slash out of rivers.

In addition, the method of removal of slash is very important to determining the impacts on stream areas. Where possible, slash should be carefully removed to avoid further disturbance of the bed and riparian vegetation. Suitable methods should be encoded into the good practice guidance material.

Council also suggests the consideration of wind throw management be included with consideration of slash management, as this is a risk not currently addressed by the NESPF (refer section 12.4 for further comment on this)

Relief sought:

69. Include in conditions relating to slash removal, consideration of adverse impacts on streams of removal where there is not an intact riparian buffer.
70. Encode suitable methods for slash removal that avoid disturbance to the river bed and riparian vegetation within the good practice guidance material.
71. Include consideration of wind throw management in conditions for slash and debris management.

8.10 Crossings through wetlands

Tasman has lost much of its wetlands in the district and as such any remaining wetlands, even small ones, are considered important. Currently the rules allow crossings through wetlands under 2500m² and temporary crossings through any wetland.

There is nothing stopping the draining of wetlands using a culvert which could irreversibly occur even from temporary crossings. Council is unclear how the NESPF would relate to our current draining of wetland rules. Given this uncertainty and the need for the values of wetlands to be protected under the NPSFM we consider wetlands may be best addressed out-of-scope of the NESPF.

Relief sought:

72. The rules in relation to wetlands are deleted in their entirety and councils retain the ability to be more stringent around the management of wetlands and their riparian areas across all activities.

8.11 River crossings – rule useability and scope

The River Crossings Rule is not useable. It needs a full redraft with examples worked through. An example of this is the controlled activity refers to permitted activity conditions 2, 3 and 4, however condition 2 is used 10 times in the PA rule. Another example allows the construct of a culvert without any heading up – this stops most culverts from being built.

There needs to be a sense check of these rules once they are correctly drafted. Each rule should have several real life examples run through it to ensure that the rule actually works. If MPI does not do this the only winners will be the lawyers.

There are significant risks not addressed within the river crossing rule. The rule needs to address the following issues:

- Overtopping of the culvert could cause flooding to nearby buildings. The rule only refers to dwellings.
- Upstream flooding. Where the crossing point is within 1 km of a residential area where the backup of flow behind the culvert could cause flood problems.
- In areas where high debris loads are likely, eg significant gravel bed load, flood debris such as trees or logs. Culverts may not be an appropriate form of crossing.
- Land stability in steep hill catchments. The PA only talks about the 6% slope of the river within +/- 50m of the structure. There are other parts of the NESPF that map these catchments, this same mapping should be carried on to this rule.
- Wetlands are not protected. Nothing is stopping the draining of wetlands using a culvert.

- The rule makes no reference to existence of Water Conservation Orders. In accordance with 43C of the RMA these may override the rules.

Relief sought:

73. Review the river crossing rules for clarity and useability and to address those issues not already covered as listed above.

8.12 River crossings - fish passage

8.12.1 Assessing and Remediation of Existing culverts

Deadlines are required for assessing and remediating existing structures (mainly culverts) for fish passage.

Whilst the NESPF says that crossings must provide for fish passage, this does not actively promote the practical implementation of identifying and dealing with a legacy of existing culverts. It will take time and money to do this work and forestry companies must be prompted to produce a plan to achieve this. Consideration will be needed for mechanisms to achieve this where the forestry operator is not the land owner and may only have cutting rights to the wood.

It is suggested that a deadline of two years following the NESPF becoming operative be imposed for the completion of this assessment of all culverts and five years for the remediation of all culverts. Based on experience in some regions five years is considered long enough to do all the remediation within the forestry setting. However, forestry companies should be able to apply to the regional council for an extension in exceptional circumstances -ie when the number of fish passage barriers is so large that they cannot cope in that time period (for example if the company have more than 100 culverts requiring major remediation). A report on the assessment and remediation programme must be provided to the regional council.

Relief sought:

74. Add provision in the NESPF to address the assessing and remediating of existing structures for fish passage with appropriate deadlines (eg 2 and 5 years respectively) for implementation.

8.13 General noise conditions

The duration of day and night time decibel noise limits seems particularly skewed toward evening hours. This is not conducive to relaxation in the evening for those living adjacent to forestry operations. It is recommended that the times be changed to between 6am and 6pm and 6pm and 6am respectively. This would not preclude works being undertaken, as with an 'hours of operation approach', but would ensure reduced noise in evening periods, as well as over night.

Relief sought:

75. Amend the noise time periods to between 6am and 6pm and 6pm and 6am.

8.14 General refuelling

The proposed permitted activity rule allows refuelling of machinery adjacent to surface water provided this does not occur within the water body. To reduce the risk from any accidental spills, a minimum distance for refuelling should be specified.

Relief sought:

76. Require that all machinery on the work site shall be refuelled at least 20 metres away from any open watercourse. If spillage of any contaminants into any watercourse or onto land occurs,

this shall be adequately cleaned up so that no residual potential for contamination of land and surface water runoff from the site occurs. If a spill of more than 20 litres of fuel or other hazardous substances occurs, the Council shall be immediately informed.

8.15 Nesting sites

The General Conditions provide for protection of nesting sites from disturbance for Nationally Critical or Nationally Endangered species. This does not provide for regionally threatened species or stronghold populations.

Relief sought:

77. Councils are able to be more stringent where they have identified regionally threatened species or stronghold populations

8.16 Sediment Discharge Performance Based Criteria

Consideration should be given to providing a sediment discharge performance criteria within the NESPF (eg. a percentage increase in fine sediment bed load or bed surface coverage -downstream compared to upstream or neighbouring catchment). This will result in forestry operators having a defined target to monitor and assess the success or otherwise of their management regimes against, and trigger review and adaptation of management to at least meet the bottom line.

Management of erosion and sediment control should also be done using a risk based approach as outlined in section 8.6.1.

Relief sought:

78. [repeat of relief point 7] Include specification of limits or performance standards within rules, in particular sediment discharge performance standards.

9 Is the NES the Best Option?

Is the NES–PF the best option to meet the assessment criteria?

As a legal process and instrument an NES is expected to be the best option for imposing consistent regulation across the country, however council questions the need for a plantation forestry specific NES, and also questions the wide use of permitted activity status (as discussed elsewhere in our submission).

In addition, staff wonder if putting greater effort into development of industry good and best practice guidance and an industry lead certification and audit process might be money better spent in terms of gaining more certain and better environmental outcomes.

As addressed elsewhere in this submission, council also questions the scope of the NESPF and its sole focus on plantation forestry, when much of the rule regime effectively provides an NES for land disturbance generally.

Relief sought:

79. [Repeat of relief point 1] Undertake a review of the underlying objectives and principles of the NESPF to ensure it addresses both economic and environmental outcomes, including:
- a. assessment of the option to widen the NES to include a land use based approach
 - b. assessment of the option to limit the NESPF to cover just activities that are relevant only to plantation forestry - or for these to be described in such a way as to be only applicable to

- plantation forestry (e.g quarrying where the material is for the construction of forest roads)
 - c. further assessment of ways the NESPF can support implementation of the NPSFM and NZCPS.
 - d. a review of the economic cost benefit analysis to better reflect the environmental outcomes, including revised water body setbacks informed by environmental outcome assessments
80. [Repeat of relief point 2] Review and amend the rule cascade to:
- a. meet any new objectives or principles identified as a results of the reassessment in relief point 1,
 - b. better reflect and manage the increasing natural erosion risk regarding water and ground conditions and slope, and erosion risk upon disturbance, making greater use of controlled, restricted discretionary and discretionary activity status,
 - c. reduce evaluation and subjective discretion, improve consistency and reduce ambiguity.
81. [Repeat of relief point 3] Initiate a further round of engagement and submission on the revised rules prior to amendment and gazettal of the NESPF.

10 Costs and Benefits

Have the expected costs and benefits of the NES-PF been adequately identified?

Costs identified in the NZIER report are considered to be under representative of the likely cost to councils. In particular, it is unclear if all costs associated with the following have been included in assessment of costs to councils and their ratepayers:

- Assessing and amending plan rules that may affect existing forestry operations, but are not specific to forestry – for example Tasman’s land disturbance rules (district rules) which affect forestry, as well as farming and land development and which were not apparently included in the district review undertaken by Brown and Pemberton (2009).
- Assessing and amending plan rules to take into consideration permitted baselines created – in particular for river crossings and roading or tracking on farms.
- Assessing and amending plan rules to adequately address those aspects that require greater stringency.
- Identifying, assessing, mapping and incorporation into Plans of SNAs (or similar), karst protection areas, water protection areas and other aspects that are required to be mapped in plans to enable rules with greater stringency.
- Assessing and amending plan rules to adequately address those aspects that are out-of-scope of the NESPF.
- Ongoing informal audit of ESCP, Harvesting and Quarry management plans to determine if monitoring and/or enforcement is required.
- Ongoing compliance and monitoring costs - the NESPF will effectively impose compliance monitoring costs onto council and local rate payers when this should be paid for by forestry operators. Councils may attempt to set up cost recovery rating systems with associated administration costs and inherent difficulties.
- Potential for increased litigation where councils views on compliance differ from forestry operators, particularly under a permitted regime largely reliant on operators following good practice - that is as yet undefined.

- Education of forestry operators on additional plan rules that will need to be complied with in addition to the NESPF.

The economic assessments assumes costs across various numbers of regional and district councils, however this skews the business case as in practice the majority of rules are apportioned to regional councils.

Relief sought:

82. Clarify the scope of the costs to councils covered in the economic assessments, including all aspects of plan review and compliance monitoring costs and including those aspects identified above.
83. Revise the economic assessment for costs to councils, including all costs not previously covered and provide a per council estimate of likely costs.

11 Implementation Issues

Are there any issues that may affect the successful implementation of the NES-PF (such as decision-makers applying the permitted baseline test more frequently)?

11.1 General comments

The NESPF is complex and adds more forestry specific regulation than currently exists in Tasman. The proposed wording of the rules is challenging and likely to be very difficult to implement, both for forestry operators – in them determining compliance adequately, and for councils in terms of assessment, monitoring and enforcement.

11.2 Permitted Baselines Created

Council expects that there will be a number of permitted baselines created by the NESPF. We have yet to undertake a sufficiently robust review to determine the full extent of these. We do not agree with the statement that this does not present a significant risk [page 37]. Refer also discussions in section 4 of this submission.

11.3 Cost recovery - recording, assessment and monitoring

The NESPF is very onerous on local government – who will record, assess, monitor the various activities and plans and then report back every 5 years? And who will pay for it?

For compliance monitoring and audit for permitted activity conditions - some system (ie a change to sec 36 of the RMA) is needed to recoup permitted activity monitoring costs (or a robust industry based self-audit system) as it will push compliance costs from forestry owners to ratepayers – this aspect did not seem to be considered in the evaluation of options criteria.

We do not believe a targeted rate approach provides a viable alternative to cost recovery due to the logistical issues of ensuring relevant persons are registered to pay the targeted rate.

Refer also discussions on this issue in other sections of this submission.

11.4 Regional and District apportionment of rules

As a unitary authority we do not have issues with procedural jurisdiction of who enforces the rules within our district, however there is some concern over which rules are deemed regional vs district and in particular the ability to retrospectively apply some rules under s 20A RMA.

Relief sought:

84. Complete regional and district rule status for all activity specifications, conditions and assessment matters in all cascades.

11.5 Consistency with the NZCPS

Council queries how well the NESPF takes into account the NZCPS. Currently it recognises only the need for coastal setbacks in the context of the NZCPS, however policy 22 quite clearly identifies the need for council to require that ‘*subdivision, use, or development*’ will not result in a significant increase in sedimentation in the CMA or other coastal waters, and specifically identifies the control of impacts of vegetation removal and sediment, including those from harvesting of plantation forestry.

NZCPS Policy 22 states: “*Sedimentation (1) Assess and monitor sedimentation levels and impacts on the coastal environment. (2) Require that subdivision, use, or development will not result in a significant increase in sedimentation in the coastal marine area, or other coastal water. (3) Control the impacts of vegetation removal on sedimentation including the impacts of harvesting plantation forestry. (4) Reduce sediment loadings in runoff and in stormwater systems through controls on land use activities.*”

Relief sought:

85. [repeat of relief point 56] Retain coastal setbacks as a matter for greater stringency.
86. Review and amend the matters for greater stringency regarding the CMA to be consistent with the wider scope of the NZCPS, including provision for greater stringency to better protect sensitivity coastal receiving environments such as estuaries.
87. [repeat of relief point 1c] Undertake a review of the underlying objectives and principles of the NESPF to ensure it addresses both economic and environmental outcomes, including further assessment of ways the NESPF can support implementation of the NPSFM and NZCPS.

11.6 Linkages with NPSFM

It is imperative that the NESPF be able to be influenced by future revisions of the NPSFM, in particular for any limits or attribute states on sediment discharges. Council supports that meeting objectives of the NPSFM is included as a matter for greater stringency.

Achieving better environmental outcomes (as opposed to the certainty of outcomes) does not appear to be a driver in development of the NESPF. This seems to be a lost opportunity, particularly with respect to the objectives of the NPSFM. For forestry, as well as other industries with similar activities, the NESPF could provide an implementation tool for the NPSFM, however in its current structure and wording it fails to do this.

Relief sought:

88. Retain meeting the objectives of the NPSFM as a matter for greater stringency.
89. [repeat of relief point 1c] Undertake a review of the underlying objectives and principles of the NESPF to ensure it addresses both economic and environmental outcomes, including further assessment of ways the NESPF can support implementation of the NPSFM and NZCPS.

11.7 Relationship with Water Conservation Orders

The NESPF needs to be clear on the relationship with Water Conservations Orders with reference to section 43C of the RMA. Namely, that the stricter of the two standards prevails.

A Water Conservation Order can prohibit or restrict a regional council issuing new permits, although it cannot affect existing permits. Regional policy statements, regional plans and district plans must be consistent with the provisions of a water conservation order. WCO's are effectively legislation in their own right and their interplay with the proposed NESPF is not completely described in the consultation document. The existence of a WCO should not result in the Council having to justify why rules need greater stringency. The WCO is effectively another hurdle that any applicant needs to pass over. For example an application for works could be a controlled activity under the NESPF, yet the WCO may prohibit the activity, in this case the activity would be prohibited.

Specific mention of Water Conservation Orders should also be included in Table 4 [page 23] not just referred to section 6.1 [page 42].

Relief sought:

90. [repeat of relief point 32] The NESPF needs to be clear on the relationship with Water Conservations Orders with reference to section 43C of the RMA. Namely, that the stricter of the two standards prevails.

11.8 Time allowance for plan assessments and update

Councils will need a sufficient amount of time following gazettal for assessment of the full effects of the NESPF on existing rules and the need for new rules in the case of greater stringency or matters out-of-scope. At the present time we are unsure how the NESPF in its current form will impact on parts of our plan, including how it will affect our current definitions and how it will relate to our discharge rules and standards.

Council feels it will be better placed to provide comment on a sufficient amount of time for plan assessment and update following further engagement on a proposed set of NESPF rules.

Relief sought:

91. [repeat of relief point 3] Initiate a further round of engagement and submission on the revised rules prior to amendment and gazettal of the NESPF.

11.9 Management plan scope and good and best practice guidance

A key part of the implementation process will need to be the development of robust good and best practice guidance, by the plantation forestry sector, councils and MfE/MPI, that is underpinned by practical research that shows practices are effective. Ideally this guidance and an industry support network for this should be developed prior to the regulations coming into effect.

Further guidance is also required on the scope of management plans (ie ESCP, Harvest Plan, Quarry Management Plan) within the NESPF, as well as promotion of an integrated planning approach to consider impacts at all forestry stages.

Best practice guidance could also be linked to the Erosion Susceptibility Classes, with specific guidance for suitable methods and techniques appropriate to the four zones, as well as specific issues posed by differing geologies and soils (such as Separation Point Granites and Moutere Gravels).

Relief sought:

92. [repeat of relief point 4] Implement an industry-led good practice guidance, certification, audit and compliance monitoring system, prior to rules coming into force, to support forestry operators, particularly if a permitted regime is retained.
93. [repeat of relief point 5] Involve Councils, MPI/MfE, forestry operators and other stakeholders in development of good practice guidance, prior to the rules coming into force.

12 Risk and Opportunities

Please describe any risks or opportunities that you consider have not been identified or addressed in the proposal.

12.1 Impacts on council capacity

There is no analysis that confirms a PF focussed approach was the best place to start. It means the assessment criteria are also flawed as they continue to focus only on the impacts on PF, but not on the wider issues of consistency, applicability or industry expectations about how councils manage adverse effects of activities common across a range of industries.

All councils will need to “transition from their current plan” framework within a fairly short time-frame being indicated.

The Government has subjected councils to quite a wide range of new national regulatory instruments. This is on top of on-going work programmes dealing with the regular business of plan making and plan review work.

This NESPF, because of its scope and industry focussed permitted activity approach, as well as the complexity involved in detangling existing plans, is a huge addition to already resource constrained councils – especially smaller councils. Implementing the NESPF will divert resources from other tasks and stretch already over-loaded systems.

Councils will need a sufficient amount of time following gazettal for assessment of the full effects of the NESPF on existing rules and the need for new rules in the case of greater stringency or matters out-of-scope. At the present time we are unsure how the NESPF in its current form will impact on parts of our plan, including how it will affect our current definitions and how it will relate to our discharge rules and standards.

Council feels it will be better placed to provide comment on a sufficient amount of time for plan assessment and update following further engagement on a proposed set of rules.

Relief sought:

94. [repeat of relief point 3] Initiate a further round of engagement and submission on the revised rules prior to amendment and gazettal of the NESPF.

12.2 Further engagement

It is vital that a further engagement process is undertaken once the proposed rules are developed and prior to gazettal of the NESPF. Council has found it particularly difficult to assess the impact of the NESPF in its current form, particularly including the various legal inconsistencies and difficult language used. Provision of further engagement on the proposed rules could avoid risks of further difficulties at implementation and subsequent operation under the NESPF.

Relief sought:

95. [repeat of relief point 3] Initiate a further round of engagement and submission on the revised rules prior to amendment and gazettal of the NESPF.

12.3 NPSFM

It is unclear what impact future changes to the NPSFM will have on the NESPF and it is important that the NESPF recognise and allow for this.

Relief sought:

96. [repeat of relief point 88] Retain meeting the objectives of the NPSFM as a matter for greater stringency.
97. [repeat of relief point 1c] Undertake a review of the underlying objectives and principles of the NESPF to ensure it addresses both economic and environmental outcomes, including further assessment of ways the NESPF can support implementation of the NPSFM and NZCPS.

12.4 Management of wind throw

Currently the NESPF is silent on the issue of wind throw management. Consideration needs to be made for this, perhaps in alignment with slash management.

Wind throw can cause serious problems in a stream bed when they migrate there in a rain event. For example where wind throw occurs mid slope prior to a forest reaching maturity, and it is not managed following the event, after some time (eg five years) the wind thrown trees have no value, and do not have the tensile strength to allow them to be removed without breaking. In Tasman wind throw was a major factor in the Wangapeka event of 2010.

Refer also section 8.1 on reduced notification period of 5 working days for management of wind throw and fire damaged trees.

Relief sought:

98. Include consideration of wind throw management in conditions for slash and debris management.

13 Support of NPSFM

Will the proposed NESPF support regional councils to implement the NPSFM?

It is imperative that the NESPF be able to be influenced by future revisions of the NPSFM, in particular for any limits or attribute states on sediment discharges.

Achieving better environmental outcomes (as opposed to the certainty of outcomes) does not appear to be a driver in development of the NESPF. This seems to be a lost opportunity, particularly with respect to the objectives of the NPSFM. For forestry, as well as other industries with similar activities, the NESPF could provide an implementation tool for the NPSFM, however in its current structure and wording it fails to do this. In particular, as discussed in section 8.4 the water body setbacks are insufficient and are unlikely to result in benefits to water bodies in maintaining and enhancing ecosystem health, including water quality and aquatic and riparian habitats.

Relief sought:

99. [repeat of relief point 88] Retain meeting the objectives of the NPSFM as a matter for greater stringency.

100. [repeat of relief point 1c] Undertake a review of the underlying objectives and principles of the NESPF to ensure it addresses both economic and environmental outcomes, including further assessment of ways the NESPF can support implementation of the NPSFM and NZCPS.
101. Provide a more detailed description of local authorities ability to impose more stringent requirements in relation to implementing the NPS-FM. Further include the ability for Councils to be more stringent in relation to all water quality limits set in order to maintain and improve water quality as required by the NPS-FM. Ensure that this ability to be stricter to meet NPSFM objectives and limits is included in the rules and in the table on page 99 under 'Matters where councils can apply more stringent rules'.
102. The rules in relation to wetlands are deleted in their entirety and councils retain the ability to be more stringent around the management of wetlands and their riparian areas across all activities.

14 Implementation Support

What resources or other implementation activities would help you to prepare for and comply with the proposed NES-PF? How should these activities be delivered (for example, training, online modules, guidance material)?

Council identifies the following resources and activities to assist in implementation:

- Engagement on development of industry best practice guidance to assist in staff understanding of these documents, as well as using a collaborative approach in their development to ensure they address the issues of good and best practice from both forestry efficiency and environmental outcomes.
- Training on the implications of the subsequent proposed rule regime will also be helpful in staff assessing the impacts on plans for subsequent review within set timeframes.
- Consideration could also be made of MPI/MfE commissioning legal advice on specific issues that are likely to affect most councils, to avoid duplication of costs where this might be required. Councils could be surveyed for issues that remain unclear for scoping of such advice or derive this from submission points.

Relief sought:

103. [repeat of relief point 1] Undertake a review of the underlying objectives and principles of the NESPF to ensure it addresses both economic and environmental outcomes, including:
 - a. assessment of the option to widen the NES to include a land use based approach
 - b. assessment of the option to limit the NESPF to cover just activities that are relevant only to plantation forestry - or for these to be described in such a way as to be only applicable to plantation forestry (e.g quarrying where the material is for the construction of forest roads)
 - c. further assessment of ways the NESPF can support implementation of the NPSFM and NZCPS.
 - d. a review of the economic cost benefit analysis to better reflect the environmental outcomes, including revised water body setbacks informed by environmental outcome assessments
104. [repeat of relief point 2] Review and amend the rule cascade to:
 - a. meet any new objectives or principles identified as a results of the reassessment in relief point 1,

- b. better reflect and manage the increasing natural erosion risk regarding water and ground conditions and slope, and erosion risk upon disturbance, making greater use of controlled, restricted discretionary and discretionary activity status,
 - c. reduce evaluation and subjective discretion, improve consistency and reduce ambiguity.
105. [repeat of relief point 3] Initiate a further round of engagement and submission on the revised rules prior to amendment and gazettal of the NESPF.
 106. [repeat of relief point 4] Implement an industry-led good practice guidance, certification, audit and compliance monitoring system, prior to rules coming into force, to support forestry operators, particularly if a permitted regime is retained.
 107. [repeat of relief point 5] Involve Councils, MPI/MfE, forestry operators and other stakeholders in development of good practice guidance, prior to the rules coming into force.
 108. Identify consistent issues of concern across multiple councils and seek to address these at a national level to avoid costs to individual councils having to address these individually.

15 Other Issues

Are there any other issues that you would like to raise?

15.1 Future consultation – making feedback easier

In future it would be helpful to use a numbering system to ensure each rule and condition has a unique number (eg as in council plans), rather than rely on heading and page number, to allow for easily identification of the rule or condition being submitted on. Furthermore this system needs to be consistent between the electronic and hard copy versions available.

In addition, it would be helpful, particularly for NES with draft or proposed regulations, that documents be made available for download in MSWord format, as well as in PDF, to allow for track-change copies to be made to illustrate desired changes to rules and conditions, particularly where these are complex. This would also assist those developing the proposed rules to easily amalgamate agreed amendments into the final documents.

Relief sought:

109. If future engagement rounds are undertaken, use unique numbering for rules and conditions, as well as associated text paragraphs, to enable easier submission on specified points.

File No: 22 02 83
Document No: 3476028
Enquiries to: Megan Kettle



11 August 2015

s 6(b)(i), s 6(a)

Attention: Stuart Miller
NES-PFconsultation@mpi.govt.nz
Spatial Forestry and Land Management
Ministry of Primary Industries
PO Box 2526
WELLINGTON 6140

Dear Mr Miller

Waikato Regional Council Submission to the Consultation Document (June 2015) - A National Environmental Standard for Plantation Forestry

Please find attached Waikato Regional Council's submission to the "Consultation Document (June 2015) – A National Environmental Standard for Plantation Forestry".

This submission was approved by Waikato Regional Council's Strategy and Policy Committee on the 11th of August 2015.

If you have any questions or require any further information please contact the writer directly on (07) 8590760 or by email s 6(b)(i), s 6(a)

Yours faithfully

A handwritten signature in blue ink, appearing to read "Megan Kettle".

Megan Kettle
Acting Team Leader, Policy Implementation

s 6(b)(i), s 6(a)

SUBMISSION

A National Environmental Standard for Plantation Forestry Consultation Document June 2015

TO: NES-PF Consultation
Ministry of Primary Industries
PO Box 2526
Wellington 6140
NES-PFconsultation@mpi.govt.nz

FROM: The Chief Executive Officer
Waikato Regional Council
s 6(b)(i), s 6(a)

Introduction

1. Waikato Regional Council (WRC) has taken the opportunity to provide a submission on the National Environmental Standard for Plantation Forestry – June 2015 (NESPf). We thank you for that opportunity.

General Feedback

2. WRC does not oppose the introduction of the NESPf subject to amendments proposed in this submission.
3. WRC is supportive of a continuing strong forestry sector and is of the opinion that the provisions of the NESPf (as requested to be amended) will be appropriate in the majority of low – moderate risk situations. Although parts of this submission are likely to be seen as critical of the NESPf and the process taken for its development Council would like to take this opportunity acknowledge the positive benefits of plantation forestry. These benefits are well documented and include:
 - contribution to employment and the economy
 - reducing flood peaks / soil erosion and improving / or maintaining water quality
 - providing recreational activities
 - climate change and carbon sequestration
 - contributing to biodiversity and landscape values
 - maintaining cultural, historic and heritage values.
4. WRC understands the role and importance of mechanisms such as National Environmental Standards in providing national consistency for key topics. WRC however does not support the process taken to prepare the NESPf. Given the significant implications of the NESPf on the core business of local authorities – managing resources and land use; we would have expected a higher level of engagement with the sector more generally as well as specific offers of collaboration with interested parties. We recognise that the working party included members that worked within local

authorities; however these people should not be considered to be “local government representatives”. It is our understanding that these people were not charged with providing a broad regional council / territorial authority context nor with advancing conversations with other local authorities - both elements that should be included in consultation processes. WRC would strongly urge the Minister to reconsider the process for developing future National Environmental Standards to ensure that not only those most affected but that the implementers and the community have appropriate opportunity to input into their development in the future.

5. Following conversations with staff from the Ministry of Primary Industries (MPI), WRC understands that the final wording of the NESPF will likely differ from that provided for comment. WRC strongly requests that the final wording of the provisions be provided for comment to those charged with implementing the document. Resource management plan drafting is a specialist skill and in providing the document to local authorities, it is hoped that implementation concerns, issues and technical inconsistencies would be able to be removed prior to the NESPF being put in place. We understand that there is no place in the current submission process for this final review to take place and request that this is amended and opportunity provided.

Waikato Regional Council requests that:

- a. The Minister reconsiders the process for developing future National Environmental Standards to ensure that the implementers have appropriate opportunity to input into their development in a meaningful way, and
- b. Opportunity be provided in this submission process for local authorities to provide comment on the final proposal for the wording of the NESPF.

Competing Central Government Direction

6. The NESPF needs to be drafted in such a way as to provide for the stated objective of the NES – ‘to provide certainty to the forestry sector’; however this should not be at the expense of WRC being able to deliver on other commitments to the regional community or achieve other central government directions such as Ture Whaimana o Te Awa o Waikato – the Vision and Strategy for the Waikato River, the National Policy Statement for Freshwater Management, or the New Zealand Coastal Policy Statement.
7. WRC supports including provisions in the final drafting of the NESPF to allow for councils to be more stringent than the NESPF where it is for the purpose of achieving a National Policy Statement - including but not limited to the National Policy Statement for Freshwater Management.
8. With regard to the National Policy Statement for Freshwater Management, the consultation document specifically requests feedback on “*Will the proposed NES support regional councils to implement the NPS Fresh Water Management?*” WRC is of the opinion that over the longer term it may not hinder WRC’s ability to implement the NPS; however an NESPF had not been identified by WRC as a tool that was necessary to ensure successful implementation of the NPS. In the short term the NESPF may hinder improvements to water quality as it is assumed that WRCs current water quality standards would become irrelevant to forestry activities once the NESPF becomes operative. In this situation there would be potential gap in regulatory guidance for the forestry sector until such time as WRC had undertaken the process of limit setting across the entire region. WRC has an adopted and budgeted programme of regional plan

review. The limit setting processes for freshwater bodies are currently programmed to be completed (draft plans notified) through a rolling review through to 2022. To address this gap WRC requests that the NESPF provides for the continuation of existing water quality limits until such time as local authorities have undertaken the process of limit setting as provided for by the National Policy Statement for Freshwater Management.

9. Section 6.3 of the consultation document relates to the New Zealand Coastal Policy Statement (NZCPS). In comparison to the flexibility that appears to be intended to be given to provisions that relate to achieving the National Policy Statement for Freshwater Management, the flexibility provided to achieve the NZCPS is extremely limited and focuses purely on planting setbacks from the coastal marine area. WRC submits that the coastal environment warrants consideration in its own regard and not just as the ultimate receiving environment for freshwater contaminants. Coastal environments – including wetlands, harbours and estuaries and the ecological communities they support, are sensitive to different activities and contaminants. WRC submits that flexibility equivalent to that intended for implementing the National Policy Statement for Freshwater Management is incorporated into the NESPF to allow for appropriate implementation of the NZCPS.
10. It is understood that construction of the proposed activity cascade is based on what is currently considered to be environmental and industry best practice and that this approach will ensure that the environmental standards applied to forestry may on average across the country increase. In many situations WRC agrees that this may be the case. However WRC is concerned that over recent years we have seen increasing community concern and interest in environmental compliance and improvement. We have seen several reports published critical of the management of natural resources - including freshwater, the coastal environment and biodiversity. For this reason WRC questions the appropriateness of anchoring current good practise in a national regulation. Potentially this could hinder continued environmental performance improvement and / future innovation.

Waikato Regional Council requests that:

- a. The NESPF is drafted in such a way as to provide for the objective of the NES - the wanted certainty to the forestry sector; while also allowing for WRC to deliver on existing commitments as to the community and achieve other central government directions such as Ture Whaimana o Te Awa o Waikato – the Vision and Strategy for the Waikato River, the National Policy Statement for Freshwater Management, the National Objectives Framework or the New Zealand Coastal Policy Statement;
- b. The NESPF provides for the continuation of existing water quality limits until such time as local authorities have undertaken the process of limit setting as provided for by the National Policy Statement for Freshwater Management;
- c. Flexibility equivalent to that intended for implementing the National Policy Statement for Freshwater Management is incorporated into the NESPF to allow for appropriate implementation of the NZCPS.
- d. If the Minister is to approve the NESPF then certainty is required that the standards proposed will not only achieve current environmental objectives, but will also be suitable and responsive enough to address a changing environment.

Implementation

11. It is the objective of the NESPF to remove uncertainty where possible for the forestry sector. WRC have reviewed the draft activity cascade and submit that this cascade requires quite extensive and detailed amendment to improve the provisions if uncertainty is to be addressed. In many cases the provisions are not worded to provide for certainty in their application. Without this certainty there will continue to be questions raised during implementation of these provisions as to their meaning, scope and intention. This could mean that the provisions could be interpreted differently depending on the landowner, council or officer that was implementing them at the time. This would clearly be inconsistent with the NESPF objective to remove unnecessary variation. WRC have undertaken a review of the cascade and comments are provided in the form of track changes as Attachment One to this submission. WRC understands that these provisions do not represent the final proposed wording. We reiterate our request to be provided the opportunity to review and provide feedback on the final wording of the provisions of the NES and in particular the Activity Cascade.
12. There are significant issues concerning the scale and boundary identification on the ground of the Erosion Susceptibility Classification mapping provided. These maps need to be sufficient so that a land owner or resource consent officer standing on a property can determine what erosion classification is applied to that exact spot where a forest is proposed, track is to be constructed or harvesting is to take place etc. Without this level of detail uncertainty is created for both the land owner and implementers. WRC staff have accessed and attempted to apply the web based version of the mapping and found it to be insufficient for determining resource consents. In addition, there appeared to be several situations where officers familiar with the local terrain questioned the classification applied to different land areas. These discrepancies could be due to the high scale of mapping / information used. Waikato Regional Council submits that this tool requires further refinement before it will be suitable for its intended purpose. As this tool forms the basis for the activity cascade it is essential that this tool is perfected as far as possible prior to the implementation of the NESPF.
13. It is noted that it is the intention of the NESPF to as far as practicable remove the need for resource consent. WRC submits that this passes costs from the land owner / developer to the broader community. In order to ascertain compliance with the NESPF Council would need to maintain and some areas enhance its existing permitted activity monitoring programme. These costs would be unable to be passed to the entity causing the need for the programme and therefore would be passed / spread to others in the community. WRC notes it is important to acknowledge that the quest to remove restrictions and compliance cost on the forestry sector may cause an increase in cost to others.
14. WRC submits that the NESPF needs to retain a process to allow councils to step outside of the NESPF provisions if a localised environmental issue is determined and it is found that forestry activities are contributing to that problem. We expect that such instances will be infrequent; however without such flexibility included then Councils will be left unable to address these problems without proposing amendments to a national standard to address what may be a very localised environmental issue. Providing scope or a process for local variation where proven need exists would avoid this issue. One of the potential drivers of these environmental problems is likely to be historical planting patterns. Over the years not all forests have been planted on land that allows for low risk harvesting. Whilst it is recognised that new plantations will need to comply with the NES locational

provisions, legacy issues related to existing plantations could quite likely pose specific and localised environmental concerns that may not warrant national attention.

15. Two examples of what is described in 14. above are:

- a) WRC currently oversees resource consents for significant forestry holdings in the Coromandel Peninsula. The Coromandel is nationally and internationally renowned for its scenic beauty and ecological significance. Due to the consent process WRC can recognise this and the particular weather conditions often experienced on the Peninsula (short and intense weather events) and require appropriate conditions through the consent to mitigate the risk from forestry activities. For example, limits are put on the total area of a catchment that can be harvested at any one time. This comprehensive consideration of risk and effect is not practical or reasonable through a permitted activity framework. Council's ability to recognise and respond to local conditions will be considerably constrained under the NESPF.
- b) The west coast catchments of the Region contain historical forestry plantations that if harvested incorrectly could release sediment into those catchments at a rate and in a manner that severely impacts on seagrass beds located in those catchments. Seagrasses play an important role in coastal ecosystems. Not only do seagrass beds accumulate and stabilise sediments and contribute to food sources for other estuarine animals, but they also act as nursery areas for juvenile fish and serve as an important grazing area for water fowl.

16. There is the potential for the NESPF to provide a presumed permitted baseline for all activities of that type regardless of the land use. For example – it is difficult to argue that tracking to provide for a forestry vehicle should be managed differently to tracking to provide for another type of vehicle. We understand and recognise that this would not be the intention for interpretation of the NESPF however; WRC feels that it is important that it is recognised as potentially precedence setting outside the NPSPF process. The problem is that the NESPF focuses on one land use rather than the effects of undertaking a particular activity. We would recommend that sufficient information is provided in the section 32 document to demonstrate why the effects of forestry related land uses should be differentiated from other land uses.

17. This NESPF represents a substantial change in approach, where limited opportunity has been afforded to those who will implement the NESPF. To understand the success or other of this approach WRC submits that it will be essential that a robust monitoring, review and amendment process is built into the implementation plan.

Waikato Regional Council submits that:

- a. Further work is required to improve the drafting of the activity cascade.
- b. The Erosion Susceptibility Classification tool requires further refinement before it will be suitable for its intended purpose.
- c. That taking an approach of preferring permitted activities over resource consents passes costs from the land owner / developer to the broader community.
- d. The NESPF needs to retain a process to allow councils to step outside of the NESPF provisions if a localised environmental issue is determined and it is found that forestry activities are contributing to that problem.
- e. Sufficient information is provided in the section 32 document to demonstrate why the effects of forestry related land uses should be differentiated from other land uses.
- f. It will be essential that a robust monitoring, review and amendment process is built into the implementation plan for the NESPF.

Comments on draft activity cascade provisions and implementation tools

18. The intention of the rules and conditions to manage the adverse effects of plantation forestry is supported. It is acknowledged that the activity cascade conditions are 'draft' the compliance conditions in many cases are not considered to be robust or enforceable. Detailed comments on the provisions of the activity cascade are included in Attachment 1 to this submission.
19. Whilst detailed comments are provided in Attachment 1 on the requirement for Harvest Plans, WRC would like to highlight an area of concern with the process associated with these plans. As proposed the NESPF requires plans to be provided to councils however in the majority of cases councils would have little real ability to influence these plans, other than to point out any obvious non-compliance. If the operator chooses not to engage with Council then Council would need to wait until a non-compliance with the permitted standards had occurred and could then take enforcement action. This reactive approach would lead to a sub-optimal approach to addressing risk to the environment. WRC submits that the NESPF include provisions that would allow for Council to intervene where evidence supplied to Council indicated that non-compliance with the NESPF was occurring, or had a high probability of occurrence.
20. The erosion risk calculator should include both rill and sheet erosion which commonly occur in areas of cut over forest and road side batter slopes where the soil is exposed to rainfall and or storm water drainage. The erosion from exposed soil is cumulatively a significant source of sediment supply into road side water tables and consequently water bodies.
21. The fish spawning calculator targets only the peak of the spawning periods and does not provide for seasonal variation of fish spawning that can be influenced by weather patterns affecting stream flow. The peak periods should be extended out to allow for this variation. It is also noted that the NESPF does not make allowance for juvenile fish post spawning or the welfare of resident fish with the exception of drowned culvert inverts.
22. Due to the complicated nature of many of the permitted activity standards and conditions, WRC submits that MPI will need to implement a comprehensive education and extension campaign, will be needed and trusts this will be sufficiently resourced. In the absence of improving sector understanding, councils may be placed in a position of needing to take compliance and enforcement action, as permitted activities leave little ability to meaningfully influence decision making.
23. Certainty is needed so that the permitted activity conditions / standards are sufficiently certain and allow for a simple yes / no or met / not met answer with no other assessment. If this is not the case then WRC submit that the permitted activity conditions / standards are either too complicated or the activities should be reclassified as controlled activities. This reclassification would still provide certainty that the activity could take place but would require more detailed and proactive conversations to occur that could address some of the complexity currently contained in the standards / conditions.

Waikato Regional Council submits that:

- a. While it is accepted that the activity cascade conditions are 'draft' the compliance conditions in many cases are not considered to be robust or enforceable. WRC requests that at least the amendments provided in Attachment 1 to this submission are considered for improving the Activity Cascade.
- b. The NESPF include provisions that would allow for Council to intervene where evidence supplied to Council indicated that non-compliance with the NESPF was occurring or had a high probability of occurrence.
- c. The erosion risk calculator should include both rill and sheet erosion.
- d. The fish spawning calculator targets only the peak of the spawning periods and does not provide for seasonal variation of fish spawning that can be influenced by weather patterns affecting stream flow. The peak periods should be extended out to allow for this variation.
- e. A comprehensive education and extension campaign, particularly to target the many small operators in the forest industry will be required, and WRC trusts sufficient resourcing from the ministry exists to provide for this.
- f. The permitted activities are reviewed to ensure that they are sufficiently certain and if not the applicable standards are either simplified or the activity is reclassified as a controlled activity.

Conclusion

Thank you for the opportunity to provide comment on the NESPF.

We would welcome further discussions with MPI representatives to discuss this submission. Please direct any requests or information to Megan Kettle; Senior Policy Advisor, Policy Implementation S
6/6



Signed:

Vaughan Payne, Chief Executive

Date: 11 August 2015

Attachments

1. Requested changes to the draft rules of the Proposed NES-PF

Activity Status Cascade - Afforestation

Objective: To introduce a consistent set of afforestation controls that manage the risk identified below in a manner that is in-line with good forest management practice.

Scope: Afforestation is the act of planting a production forestry crop on land that is not currently in forest and has not been under plantation forestry cover within the last 5 years.

Risk: Risks associated with afforestation are primarily;

- Unintended spread of plantation species into areas not intended for forest production, including indigenous habitats such as tussock grassland and neighbouring properties. Wilding spread can affect landscape values, conservation and biodiversity values, existing and future land uses and catchment hydrology.
- The establishment of forests in areas which are likely to have heightened risks during subsequent production forestry activities such as earthworks and harvesting.

Activity Status	ESC zones	General Guidance
Permitted	Green Zone	Afforestation is a Permitted activity in Green, Yellow and Orange zones where conditions relating to setbacks and wilding tree risk are met.
	Yellow Zone	
	Orange Zone	
Controlled		
Restricted Discretionary	Green Zone	Afforestation is a Restricted Discretionary activity and a consent is required in; <ul style="list-style-type: none">• Red Zone.• Any zone where permitted activity conditions cannot be met.• Any zone where the wilding tree risk calculator score is 12or greater. If consent is applied for the council can decline or grant the consent and impose consent conditions however the council's decision making power is restricted to the "matters over which discretion is restricted" which are listed in the table below.
	Yellow Zone	
	Orange Zone	
	Red Zone.	

Conditions/Standards

Status	Conditions	Intent/Rationale [identify the rationale for each of the proposed conditions, i.e. what risk is it trying to avoid, remedy or mitigate and how does it propose to achieve this]		
Jurisdiction				
Permitted				
District ¹	<p>Afforestation is permitted in:</p> <ul style="list-style-type: none">• Green, Yellow and Orange Zones or• where the land is identified as:<ul style="list-style-type: none">○ Land Overlay 3A under the Gisborne District Combined Regional Land and District Plan 2006 (or any subsequent versions) or○ MPI Regional Scale Target Land○ Land that is included within a regional council erosion incentive scheme and is recognised by notice in the New Zealand Gazette• where the following wilding tree risk and setback conditions are met.	<p>The intent of the LO3A provision is to ensure that the Afforestation controls do not act as a barrier to afforestation initiatives such as Gisborne’s Sustainable Hill Country Project. Where other regions wish to adopt similar treatment for erosion control purposes the NES will should allow a gazettal process for an exemption to be granted o incorporate that land.</p>		
District	<p>Conditions</p> <p>1. Wilding tree risk conditions Afforestation of conifer species in an area with a wilding tree risk calculator score of 11 or less.</p> <p>2. Setback conditions Afforestation must not occur within the following setbacks.</p> <table><tr><td>Setback from</td><td>Minimum horizontal distance (m)</td></tr></table>	Setback from	Minimum horizontal distance (m)	<p>This condition seeks to allow as permitted the afforestation of areas and/or species that have a low risk of wilding spread. It is intended that the wilding tree conditions only apply to conifer species because the wilding risk calculator only applies to conifer species. This condition seeks to ensure that species that do not pose a wilding risk are not affected by the wilding risk conditions. It is considered that the Biosecurity Act and Regional Pest Management Plans provide sufficient control of wilding risk of non-conifer species.</p>
Setback from	Minimum horizontal distance (m)			

¹ "District" denotes that this condition relates to the functions of a territorial authority under section 31 of the Resource Management Act and therefore monitoring and enforcement is the responsibility of the relevant territorial authority.

Regional ²	Adjoining property under different ownership	10 m – unless approval of the adjoining owner has been obtained.	<div>Advice Note: Guidance with examples to be developed demonstrating how the wilding calculator is to be applied</div> <div>This conditions aims to establish setbacks so as to avoid effects of forestry on adjoining properties, including urban zones, residential sites and public roads</div> <div>Advice Note: guidance may be helpful to determine “where topography already causes shading” refer to Diagram A Ruapehu district rule RU3.4.1</div> <div>Road setbacks aim to avoid the excessive shading of paved roads because this can led to increased or more frequent icing of the road which is a safety risk.</div> <div>Advice Note: Guidance with examples to determine shade setback to be developed.</div>																						
	Adjoining existing dwelling under different ownership	The greater of; i. 40 m; or ii. Where vegetation could shade the dwelling between 10 am and 2 pm on the shortest day of the year (except where topography already causes shading). unless approval of the adjoining owner has been obtained.																							
	Urban/residential zone	30 m – unless approval of the adjoining owner(s) has been obtained.																							
	Road setbacks	Where vegetation could shade a paved public road between 10 am and 2 pm on the shortest day of the year; except where: <ul style="list-style-type: none">Topography already causes shading;Icing does not occurWritten consent obtained from the road-controlling authority confirming it is satisfied the vegetation does not pose a safety risk, having had regard to:<ul style="list-style-type: none">the physical characteristics of the road;the degree of potential shading of the road;the nature and extent of the vegetation;the surrounding topography; andpotential weather effects on the road, including consideration of icing risk.																							
District	<table><tr><th colspan="2">Setback from</th><th>Minimum horizontal distance (m)</th></tr><tr><td rowspan="3">Perennial River or Stream</td><td>Bank full channel width (m)</td><td></td></tr><tr><td><3m</td><td>5m</td></tr><tr><td>>3m</td><td>10m – except where a smaller setback is required to meet the conditions of a regional pest management strategy</td></tr><tr><td colspan="2">Wetlands larger than 0.25 ha</td><td>5m set back one tree length</td></tr><tr><td colspan="2">Lakes larger than 0.25 ha</td><td>10m set back one tree length</td></tr><tr><td colspan="2">Coastal Marine Area</td><td>30m set back one tree length</td></tr><tr><td colspan="2">Outstanding Freshwater Bodies [As defined in the NPS Freshwater Management (2014)] or surface water bodies subject to a Water Conservation Order (WCO).</td><td>10m set back one tree length</td></tr></table>		Setback from		Minimum horizontal distance (m)	Perennial River or Stream	Bank full channel width (m)		<3m	5m	>3m	10m – except where a smaller setback is required to meet the conditions of a regional pest management strategy	Wetlands larger than 0.25 ha		5m set back one tree length	Lakes larger than 0.25 ha		10m set back one tree length	Coastal Marine Area		30m set back one tree length	Outstanding Freshwater Bodies [As defined in the NPS Freshwater Management (2014)] or surface water bodies subject to a Water Conservation Order (WCO).		10m set back one tree length	<div>This conditions aims to establish appropriate setback distances from water bodies to reduce the risk of future operations such as harvesting or earthworks causing sedimentation or damage to riparian areas that have the potential to degrade water quality and instream habitats.</div> <div>NB: Councils have the ability to be more stringent in relation to Outstanding Freshwater Bodies and WCOs. It is intended that this additional stringency should only be used to impose greater setbacks where that is justified to protect the specific character(s) of the waterbody that is considered outstanding.</div> <div>This condition recognises that the EPA is best placed to evaluate the risks of genetically modified organisms and that approval and conditions imposed under the EPA regime will be sufficient to ensure that any risks associated with the deployment of the tree stock are managed.</div> <div>Advice Note: guidance should direct landowners to existing regulations relating to Electricity networks including the Electricity (Hazards from Trees) Regulations and Electricity Code of Practice for electrical safe distances (ECP34)</div>
	Setback from		Minimum horizontal distance (m)																						
	Perennial River or Stream	Bank full channel width (m)																							
		<3m	5m																						
		>3m	10m – except where a smaller setback is required to meet the conditions of a regional pest management strategy																						
	Wetlands larger than 0.25 ha		5m set back one tree length																						
	Lakes larger than 0.25 ha		10m set back one tree length																						
	Coastal Marine Area		30m set back one tree length																						
	Outstanding Freshwater Bodies [As defined in the NPS Freshwater Management (2014)] or surface water bodies subject to a Water Conservation Order (WCO).		10m set back one tree length																						
	<div>WRC Comment:</div> <ul style="list-style-type: none">Stream width variation is not appropriate given the variation in channel width in any given reach. The provision should be based on a catchment area. 0-50 ha 5 m set back and >50 ha 10 m set back.Planting setbacks shall be a minimum of one tree length back from lakes and wetlands.Planting close to lakes wetlands or rivers where there is typically a high water table results in shallow rooted trees that frequently wind throw. Wind thrown trees are not merchantable and are not salvaged at harvest resulting in large volumes of wood debris from these trees entering water bodies.																								
Afforestation using genetically modified tree stock is permitted where the tree stock has gained the appropriate approval for deployment from the Environmental Protection Authority (EPA), and being subject to conditions imposed by the EPA																									
Controlled	NA																								
Restricted Discretionary	Afforestation is Restricted Discretionary in Red Zone and all other zones where permitted conditions relating to wilding tree risk and setback conditions (other than road setbacks) are not met.																								
	Afforestation is a Restricted Discretionary activity and a consent is required if <ul style="list-style-type: none">in Red Zone; orin Green, Yellow or Orange Zones where permitted activity conditions cannot be met;conifer species is being planted and wilding tree risk calculator score is 12 or greater																								

² “Regional” denotes that this condition relates to the functions of regional councils under section 30 of the Resource Management Act and therefore monitoring and enforcement is the responsibility of the relevant regional council.

District Regional District Regional	<p>If a consent is applied for the council can decline or grant the consent and impose consent conditions. However the council's ability to decline or grant the consent and to impose consent conditions is restricted to the matters listed below; Discretion shall be restricted to the effects that the specific permitted activity condition(s) that could not be met was attempting to avoid.</p> <p><u>Wilding Risk</u></p> <ul style="list-style-type: none">• Forest species.• Mitigation action to restrict wilding tree spread. <p><u>Setbacks (regional matters)</u></p> <ul style="list-style-type: none">• Aquatic and terrestrial biodiversity effects <p>Setbacks (district matters)</p> <ul style="list-style-type: none">• The effects on immediately adjacent neighbouring landowners, dwellings or urban/residential zones.• icing or shading effects on the road. <p>Where <i>afforestation</i> is Restricted Discretionary because it is located on Red Zone land then discretion shall be restricted to the matters which address Erosion Risk.</p> <p><u>Erosion Risk</u></p> <ul style="list-style-type: none">• Effects of afforestation on land with severe to extreme erosion susceptibility <u>under standard plantation forest regime</u>, including effects on aquatic ecosystems.• <u>Effects on rivers, lakes, wetlands and estuaries,</u>• Measures to avoid, remedy or mitigate erosion <u>flooding and sedimentation</u> including:<ul style="list-style-type: none">• planting location and species,• requirements to address geotechnical and slope stability effects of infrastructure location• sequencing of harvesting,• Requirements to re-establish effective vegetation cover post-harvest through re-planting or other means,• Provision of downstream debris retention structures.• Future harvesting and earthworks effects. <p><i>Note - consents in orange zone to be non-notified.</i></p> <div><p>WRC Comment:</p><ul style="list-style-type: none">• There is potential confusion around the definition of “standard forest regime”. This can vary depending on tree species and crop management.• Add new consideration in regard to the effects on rivers lakes wetlands and estuaries.• Amend to include consideration of measures to avoid remedy or mitigate flooding and sedimentation.</div>	<p>These matters seek to restrict the discretion of the decision maker to the specific effects of the permitted activity condition(s) which could not be met.</p> <p>These matters seek to ensure that following risks are considered and appropriate conditions to mitigate these risks are imposed:</p> <ul style="list-style-type: none">• The spread of wilding tree species;• The effects on aquatic environments when forests are established within regional setbacks; and• Erosion risk when forests are planted in the Red Zone.
Discretionary		

Activity Status Cascade – Forestry Earthworks

Objective: To introduce a consistent set of forestry earthworks controls that manage the risks identified below in a manner that is in-line with good forest management practice.

Scope: The disturbance of the land surface by machinery, including blading (including V-blading), boring, contouring, drilling, moving, removing, placing or replacing soil or earth; or by excavating; or by a cutting or filling operation. It excludes soil disturbance due to the movement of wheeled or tracked machines used in or around cut-over areas at time of harvest, these activities are considered under the harvesting controls.
NB: Quarrying and Mechanical Land Preparation do not fall within the scope of these earthworks controls. Quarrying and Mechanical land Preparation are defined activities and are subject to specific controls.

Risks: Some of the most significant potential effects arising from forestry operations are associated with the construction of roads or infrastructure (such as landings) for harvesting operations. These effects are usually related to erosion or the products of erosion (i.e. sediment). Sediment has two main impacts:

- it can increase the turbidity of river water (decrease clarity), and
- it can also clog riverbeds and downstream receiving environments such as estuaries and lakes.

Both of these impacts affect the biological community and health of an ecosystem.

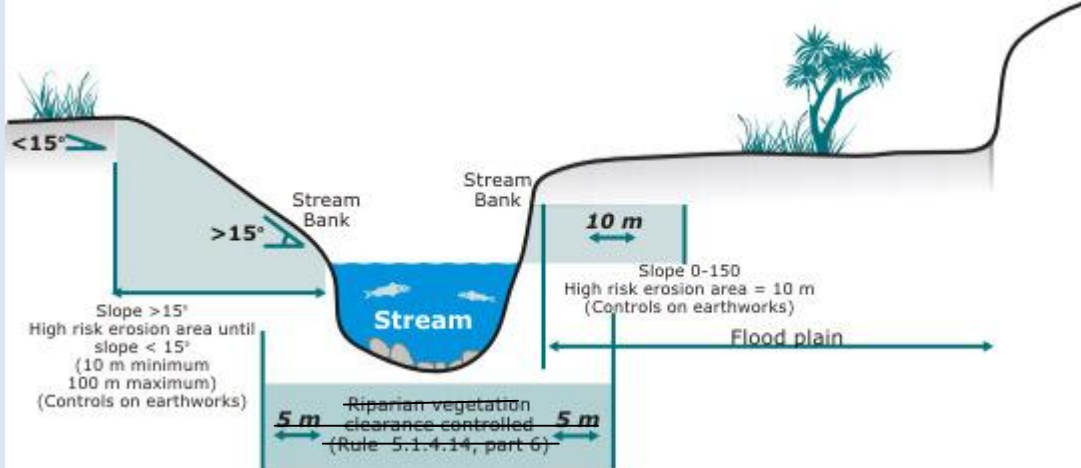
Specifically, erosion or excessive earthworks have the potential to reduce on-site productivity and cause loss or damage to forest infrastructure.

Activity Status	ESC zones	General Guidance
Permitted	Green Zone	Earthworks are permitted in Green and Yellow Zones, and in Orange Zones where the slope of the land is less than 25-20 degrees. Maintenance and <u>upgrade</u> of existing earthworks is permitted in all zones (including Red Zone) provided permitted activity conditions are met. WRC comment <ul style="list-style-type: none"> • Request amendment to 20 degrees which is consistent with the Department of Labour requirement for machines working on slopes not on tracks and WRC plan for soil disturbance on the Coromandel Peninsula. Slope failure in the Coromandel Peninsula plantation forests is well researched and documented with 20 degrees being the angle at which slope failure typically commences; This is further supported by the following: - <i>NZ Steepland Logging harvest area (slopes over 20 degrees) is currently 41% of the harvest and is expected to increase to 53% by 2016 and over 50% by 2025</i> (Friday Off Cuts 13th February 2015) • Amend upgrade to exclude reconstruction
	Yellow Zone	
	Orange Zone (where the slope of the land is < 25 degrees)	
Controlled		N/A
Restricted Discretionary	Green Zone where permitted conditions cannot be met	Earthworks are a Restricted Discretionary activity and a consent is required if: 1. any of the permitted conditions are not met; or 2. if the slope of the land in the Orange Zone is greater than 25-20 degrees; or 3. if the land is categorised as Red Zone. If consent is applied for a council can decline or grant the consent and impose consent conditions. However a council's decision making power is restricted to the "matters over which discretion is restricted" which are listed in the table below.
	Yellow Zone where permitted conditions cannot be met	
	Orange Zone (where permitted conditions cannot be met or slope is > 25 degrees)	
	Red Zone	
Discretionary	Green Zone	N/A
	Yellow Zone	
	Orange Zone	
	Red Zone	

Conditions/Standards

Status Jurisdiction	Conditions	Guidance
Permitted	Maintenance and Upgrade of existing Earthworks	
Regional	The maintenance or upgrade of existing earthworks is permitted in all zones (including Red) provided all permitted activity conditions are met.	It is intended that such earthworks involve only works such as re-shaping of road surfaces including for drainage purposes. Refer to Glossary for definition of <i>Maintenance and Upgrade</i> . <i>Maintenance and Upgrade</i> does not include road widening or realignment, <u>reconstruction or alteration of an existing road grade</u> WRC Comment <ul style="list-style-type: none"> Include a definition of 'maintenance' in the Glossary.
Regional	Green and Yellow Zones and where the slope of the land is less than 25 20degrees provided permitted activity conditions can be met.	
Regional	Earthworks shall not be undertaken as a permitted activity: <ul style="list-style-type: none"> in the Red Zone; or in the Orange zone where the slope is greater than 25 20degrees 	These conditions seek to ensure that where earthworks are undertaken erosion prone areas that the specific risks of the activity on that site can be managed via consent conditions.
District/Regional	Notice of commencement Regional and District Council must be notified at least 20 <u>not less than 20</u> and no more than 60 working days prior to earthworks operations commencing unless this requirement is waived by the relevant council. Councils may reduce this notice period at their discretion	This rule seeks to ensure that relevant councils are notified in a timely manner of earthworks commencing so that they are aware of operations occurring and can schedule monitoring programmes if necessary.
District/Regional	Road widening and realignment for safety purposes Road widening or realignment for safety purposes is permitted in <u>Green and Yellow Zones and where the slope of the land is less than 25 20 degrees provided permitted activity conditions can be met.</u> all zones where; <ul style="list-style-type: none"> The road is not being upgraded to increase its carrying capacity or allow use by a heavier class of vehicle Road widening and realignment use best practice benching and compaction techniques in accordance with NZFOA Road Engineering Manual 2012. <u>Where</u> Road widening and realignment <u>occurs</u> on slopes over 35 <u>20</u> degrees <u>or greater</u> slope, <u>all soil not used as structural fill must be end hauled to a suitable lay down area</u> fill material must be end hauled, in accordance with NZFOA Road Engineering Manual 2012 section 4.3.1-3; <i>and</i> - <u>Soil disturbance activities shall be undertaken in general accordance with the contents in the document titled NZFOA Road Engineering Manual 2012.</u> Overburden is placed in a way that meets the Spoil conditions The volume moved is <5000m3 per <u>activity area</u>. A record of any road widening or realignment for safety purposes is maintained and is available for inspection by the relevant council. 	Narrow roads with poor visibility may increase the risk of accidents occurring, this conditions seeks to ensure that the operation of these earthworks controls do not discourage works which would reduce health and safety risk. <div>Advice Note: The intent of this rule is to allow upgrade for safe use by the same class of vehicle. Where the road has not been previously designed to carry fully loaded logging trucks these vehicles should not be able to use the road following the widening or realignment.</div>
Regional	WRC Comment: <ul style="list-style-type: none"> There is no section 4.3.1.3 in the NZFOA Road Engineering Manual. Delete reference or insert correct reference. Each site (activity area) of soil disturbance should be not be directly linked to another. Clearer definition of activity area required. 	
Regional	Requirement to prepare a Erosion and Sediment Control Plan (ESCP) <ul style="list-style-type: none"> An <i>Erosion and Sediment Control Plan (ESCP)</i> must be prepared Earthworks must be undertaken in accordance with an <i>ESCP</i> which must be made available to the council upon request at least <u>not less than</u> 20 working days prior to commencement of operations. The scope of an Erosion and Sediment Control Plan must be matched to the scale and complexity of the operation. All Earthworks activity must be carried out in accordance with this plan. Material amendments to the earthworks plan must be documented and available to relevant council <u>on request</u>. Material amendments are significant changes, such as relocation of roads or landings, changes to proposed controls to manage environment impacts <u>or proposed rehabilitation works</u>. 	The requirement to prepare an ESCP seeks to ensure that the risks of undertaking earthworks in the specific location are identified and measures to manage these risks have been considered and implemented. <div>Advice Note: Make reference to earthworks guidelines for ESCP</div> <div>WRC Comment Use the Waikato Regional Council (WRC) document titled Erosion and Sediment Control Plan</div>

	<p>The ESCP shall include but not be limited;</p> <p>I. A description of the nature, scale, timing and duration of activities including construction, roading, the formation of any new track, earthworks and stabilisation</p> <p>II. The erosion and sediment control measures to be employed and indicative locations, including</p> <p>i. Water runoff controls</p> <p>ii. Methods to limit slumping of batters, cuts and side castings,</p> <p>iii. Measures to maintain slope stability,</p> <p>iv. Methods of sediment retention and control of sediment run off,</p> <p>v. Methods to avoid effects on riparian margins and water bodies,</p> <p>III. Detail heavy rainfall response and contingency measures,</p> <p>IV. Identify maintenance and monitoring procedures</p> <p>V. Methods to monitor achievement of the plan, and</p> <p>VI. Revegetation requirements</p>	<p>Preparation Guideline and the WRC document titled Erosion and Sediment Control Guidelines for Soil Disturbance Activities (January 2009) as the reference guidelines.</p>		
	<p>WRC Comment:</p> <p>The following are considered to be appropriate requirements for an erosion and sediment control plan:</p> <p><u>The erosion and sediment control plan shall include but not be limited to the following:</u></p> <p>i) <u>A written methodology for undertaking the works</u></p> <p>ii) <u>Details of all principles, procedures and practices that will be implemented to undertake soil disturbance including soil fill activities, methods to prevent soil erosion, debris avalanches and sediment discharge from each site</u></p> <p>iii) <u>The design criteria of all erosion and sediment control structures</u></p> <p>iv) <u>Construction timetable for the erosion and sediment control works and proposed site disturbance</u></p> <p>v) <u>Timetable for site rehabilitation, rehabilitation methods and maintenance of rehabilitation works</u></p> <p>vi) <u>Maintenance, monitoring and reporting procedures</u></p> <p>vii) <u>Contingency measures including procedures to minimise adverse effects of failure of any erosion and sediment control works</u></p> <p>viii) <u>Identification and contact details of personnel responsible for the operation</u></p> <p>ix) <u>Maintenance of all key erosion and sediment control structures</u></p> <p>x) <u>Rehabilitation of disturbed sites</u></p>	<p>Advice Note: guidance should direct landowners to existing publications relating to clearance required from power lines and associated structures, including Electricity Code of Practice for electrical safe distances (ECP34). This relates to earthworks undermining structures as well as the clearance of vehicles and machinery using roads once they are constructed.</p>		
Regional	<p>Operation</p> <p>Temporary tracks and other earthworks that are not required for future operations must be deactivated and stabilised to control run-off within 10 working days of their last use</p> <p>Land disturbance in ephemeral stream channels must be managed to avoid the obstruction of natural water flow or diversion of water to the extent that no more than minor damming, flooding or soil erosion is avoided. occurs.</p> <p>WRC Comment</p> <ul style="list-style-type: none">Ten days is an industry standard and therefore should be applied.Damming and diversion of water are subject to regulations in regional plans and the RMA. Both damming and diverting of watercourses are not a forestry activity, but can result from poor forestry management.‘No more than minor’ as referenced cannot be measured.Include in the glossary a definition for land disturbance..Ephemeral watercourses in the Central North Island typically contain coarse yellow brown pumice soils that are susceptible to severe gully and rill erosion. Soil disturbance should not be a permitted activity on the floor of an ephemeral watercourse especially in any ‘zone’ and especially in the CNI and vegetation removal should be a controlled activity.Note an ephemeral watercourse is a ‘river’ under the provisions of the Resource Management Act. Soil disturbance on the bed of a river is subject to regulations in regional plans and the RMA. Soil disturbance on the bed of a river is not a forestry activity, but can result from poor forestry management.	<p>This condition seeks to ensure that where temporary tracks have been created that they are stabilised as soon as they are no longer required in order to decrease the risk of the disturbed area leading to increased run-off or erosion.</p>		
Regional	<p>Setbacks</p> <p>Earthworks shall not be undertaken within these setbacks</p> <table><tr><td>Setbacks for new earthwork construction also apply to temporary tracks,except where topographical constraints leave no alternative.</td><td>Minimum horizontal distance (m)</td></tr></table>	Setbacks for new earthwork construction also apply to temporary tracks,except where topographical constraints leave no alternative .	Minimum horizontal distance (m)	<p>These setback conditions aim to keep earthworks activities and machinery away from surface water bodies in order to reduce the risk of sedimentation or damage to riparian areas that have the potential to degrade water quality and in-stream habitats.</p>
Setbacks for new earthwork construction also apply to temporary tracks,except where topographical constraints leave no alternative .	Minimum horizontal distance (m)			

Regional	WRC Comment			
	<ul style="list-style-type: none">A measureable parameter is required for soil disturbance adjacent to watercourses. Adopt the Waikato Regional Council Plan slope angle setback for soil disturbance and vegetation removal from a river.The term 'No alternative' is difficult to quantify and is therefore open to interpretation. More certainty around this terminology is required.			
	Perennial River or Stream	Bank full channel width		Except during construction and maintenance of water-body crossing or a debris trap
		<3m	5m	
		>3m	10m	
	Wetlands larger than 0.25 ha		5m	
	Lakes larger than 0.25 ha		10m	
	Coastal Marine Area		30m	
	Outstanding Freshwater Bodies as defined in the NPS Freshwater Management (2014) or surface water bodies subject to Water Conservation Orders.		10m	
	WRC Comment:			
				
Regional	Waikato Regional Plan application of rules adjacent to water bodies			
	Note <u>soil disturbance associated with constructing and maintaining a legal in stream structure is permitted within 20 metres of a river.</u>			
Regional	Fill Fill material must contain no more than 5% (by volume) of vegetation and wood, except for tracked areas or when wood is used as corduroy <u>No vegetation shall be placed in structural fill or in cut to waste soil where decomposition may result in land instability.</u>			
	Spoil Spoil shall not be deposited: <ul style="list-style-type: none">where it may cause failure of the deposited material or the underlying landinto a surface water body, <u>natural water</u> or in a position where it can readily enter a surface water body <u>natural water</u> or in a position where it can deliver sediment <u>directly or indirectly</u> into <u>natural water</u> a surface water body.over logging slash or woody vegetationoutside of a production area.			
		This condition seeks to ensure that excess spoil is not deposited where it increases the risk of slope instability.		

Regional	<div>WRC Comment</div> <ul style="list-style-type: none">Natural water includes surface and ground water and is important in karst landscapes	
	<div>Sediment and stormwater control measures</div> <p>Stormwater and sediment control measures must be installed and maintained including;</p> <ul style="list-style-type: none">Water Erosion and sediment run-off-controls-to shall be installed and maintained for on-all sites of disturbed soil including roads tracks, landing sites and fire breaks.Batter, cuts, fill batter slopes, and side-castings cast soil must be established rehabilitated and maintained by methods that prevent slumping-soil erosion and sediment export.	These conditions seek to ensure that specific erosion and sediment controls are adopted on order to prevent sediment discharge to surface waterways and off-site erosion.
Regional	<div>Stabilisation and containment</div> <p>As soon as practicable Following completion of the activity, and no later than 12 one months from the date of construction exposed disturbance areas of exposed soil that have the potential to discharge to water must shall be;</p> <ul style="list-style-type: none">contained within the site, andstabilised and maintained to prevent soil erosion and sediment export directly or indirectly into natural water.contain sediment by measures such as:<ul style="list-style-type: none">seeding, Seeding is the wrong terminologyEstablish vegetative cover (including revegetation through natural regeneration) a maintenance free sward of vegetation of not less than an 80% cover on all exposed soil,Use of recognised methods to stabilise exposed soil and manage sediment including but not limited to:<ul style="list-style-type: none">vegetative (e.g., hay, straw or slash cover,Sowing of grass seed, hydro seeding hydro mulching and seedingcompacting, drainage, or roughening,engineering techniques, such as rock armouring .sediment sumps and silt fences <p>Stabilisation requirements do not apply to firebreaks.</p>	<p>These conditions seek to ensure that measures are taken following that completion of earthworks to stabilise disturbed areas in order to reduce the ongoing risks of the disturbed areas causing increased erosion or sedimentation of surface waterways.</p> <div>Advice Note: re-vegetation is an appropriate stabilisation measure in some circumstances</div> <div>Advice Note: Not all exposed soil needs to be stabilised. Only exposed areas of soil that have the potential to discharge to water for soil erosion.</div>
	<div>WRC Comment</div> <ul style="list-style-type: none">The Waikato Regional Plan contains permitted activity rule compliance conditions 5.1.5. Condition m) provides a 6 to 12 month timeframe for the establishment of ground cover vegetation on areas of exposed soil. This rule is intended to apply to establishing ground cover on exposed areas of soil in cut over. It is not intended to apply to forestry earthworks.One month to comply with this condition is required because the proposed 12 month timeframe is too long to leave soil exposed to erosion and sediment export. It enables a woodlot contractor to harvest a plantation and leave the property without stabilisation and containment, but still be compliant due to the 12 month timeframe. Once a woodlot contractor has left the property getting them to return to undertake the works in the allowable 12 month timeframe is not going to happen. It can be a challenge to get a forest manager to return to an earthworks site to carry out rehabilitation works in a timely manner, i.e. before the onset of winter conditions.The rule is worded for a reactive response. The enforcement officer has to wait until there is a measureable adverse effect to identify non compliance. This condition, like all conditions should be worded proactively with the objective on the prevention of soil erosion and sediment discharge.Stabilisation requirements do not apply to firebreaks.- This is a contradiction with the previous requirement for sediment and storm water control measures on fire breaks.Support is given for establishing and maintaining erosion and sediment controls on fire breaks.	
Regional	<div>Design</div> <ul style="list-style-type: none">Align and manage tracks to divert run-off, to disperse flows.Bench and compact landing fill areas and road line fills on slopes 20 degrees and over-25 degrees	<p><u>These conditions seek to ensure that track and roads are designed constructed in a manner that reduces the risks of surface water flows leading to increased erosion or sedimentation of surface waterways.</u></p> <p>Advice Note: Maximum water table drainage culvert spacings should not to exceed values given for various road gradients and soil types in the table below from the NZFOA Road Engineering Manual (2012). With road water table culverts having a minimum internal diameter of 325 mm.</p>

WAIKATO REGIONAL COUNCIL CHANGES TO THE DRAFT ACTIVITY CASCADE

Changes identified in red text or strikethrough
Comments highlighted in blue

		<table><tr><th rowspan="2">Road Grade</th><th colspan="4">Soil or rock erodibility</th></tr><tr><th>High</th><th>Moderate</th><th>Low</th><th>Non-erosive rock</th></tr><tr><td>18% (1 in 6)</td><td>40</td><td>80</td><td>120</td><td>200</td></tr><tr><td>14% (1 in 7)</td><td>50</td><td>90</td><td>140</td><td>220</td></tr><tr><td>12% (1 in 8)</td><td>55</td><td>100</td><td>160</td><td>240</td></tr><tr><td>11% (1 in 9)</td><td>60</td><td>115</td><td>180</td><td>260</td></tr><tr><td>10% (1 in 10)</td><td>65</td><td>130</td><td>210</td><td>300</td></tr><tr><td>8 % (1 in 12)</td><td>80</td><td>165</td><td>250</td><td>350</td></tr></table> <p>Recommended maximum spacings (m) for water table culverts located on roads traversing mid and lower slopes.</p>	Road Grade	Soil or rock erodibility				High	Moderate	Low	Non-erosive rock	18% (1 in 6)	40	80	120	200	14% (1 in 7)	50	90	140	220	12% (1 in 8)	55	100	160	240	11% (1 in 9)	60	115	180	260	10% (1 in 10)	65	130	210	300	8 % (1 in 12)	80	165	250	350
	Road Grade	Soil or rock erodibility																																							
		High	Moderate	Low	Non-erosive rock																																				
	18% (1 in 6)	40	80	120	200																																				
	14% (1 in 7)	50	90	140	220																																				
	12% (1 in 8)	55	100	160	240																																				
	11% (1 in 9)	60	115	180	260																																				
	10% (1 in 10)	65	130	210	300																																				
	8 % (1 in 12)	80	165	250	350																																				
Controlled																																									
Restricted Discretionary	Earthworks is Restricted Discretionary in Orange Zone where the slope of the land is greater than 25<u>20</u> degrees and <u>greater</u> Red Zone or where the permitted activity conditions could not be meet	These matters are intentionally broad to reflect the broad range of potential impacts from earthworks operations.																																							
	Earthworks are a Restricted Discretionary activity and a consent is required in Orange Zone where the slope of the land is greater than 25 <u>20</u> degrees and <u>including the</u> Red Zone.																																								
	<p>If consent is applied for a council can decline or grant the consent and impose consent conditions. However a council’s decision making power is restricted to the matters listed below.</p> <p>Where earthworks is restricted discretionary because it could not meet the permitted activity conditions;</p> <ul style="list-style-type: none">Discretion shall be restricted to the effects that the specific permitted activity condition(s) that could not be met was attempting to avoid <p>Where earthworks is restricted discretionary because it is located in Orange Zone >25 <u>20</u> degrees or Red Zone discretion shall be restricted to the following matters</p> <ul style="list-style-type: none">timing, location and duration of works;ecological and aquatic effects;method of stabilisation of soil disturbance;method of sediment retention and run-off stormwater control effects on riparian vegetation.Method of minimising erosionPlacement and management of cuts and fill likely to cause slope instability<u>Construction method</u><u>Use and maintenance of erosion and sediment controls.</u><u>Timing of works (the winter season is excluded for construction earthworks)</u><u>Rehabilitation of disturbed sites</u>																																								
	Consents in Orange Zone shall be non-notified.																																								
Discretionary																																									

Activity Status Cascade - Harvesting

Objective: To introduce a consistent set of Harvesting controls that manage the risks identified below in a manner that is in-line with good forest management practice.

Scope: Harvesting is the act of felling and extraction of trees and the associated soil disturbance.

Harvesting includes:

- discharges of slash and contaminants to land and water associated with harvesting.
- *production thinning*,
- *soil disturbance* associated with *harvesting* including disturbance by harvesting machinery,
- damage to *indigenous vegetation* adjacent to the plantation forest where necessary to remove the production crop. [Advice note: this is intended to include temporary edge damage to SNAs that is likely to readily recover]
- riparian vegetation disturbance.
- the damaging or removal of *indigenous vegetation* within a *plantation forest*, where its removal is necessary to harvest a *plantation forest*, including *vegetation associated with plantation crop* ,that is vegetation that;
 - has grown up under (or may have overtopped) production species; or
 - is within an area of failed planting (within the last rotation); or
 - is within an area of regenerating *cutover*, or
 - occurs on an existing access road.

Harvesting does not include:

- earthworks (such as earthworks to establish temporary or permanent access roads tracks or landings)

Risk: Risks particular to Harvesting operations are primarily:

- Sediment transport to water bodies,
- Slash transport into surface water bodies
- Soil erosion
- Deposition of slash in watercourses

Sediment and slash can degrade water quality and instream habitats via increased sediment concentration, habitat destruction, and can cause downstream infrastructure damage.

Activity Status	ESC zones	General Guidance
Permitted	Green Zone	Harvesting is a Permitted activity in Green, Yellow and Orange Zones provided permitted activity conditions are met.
	Yellow Zone	
	Orange Zone	
Controlled	Green Zone where permitted conditions cannot be met	Harvesting is a Controlled activity and a consent is required in; <ul style="list-style-type: none">• Green, Yellow and Orange Zones where permitted conditions cannot be met; and• Red Zone that is not class 8e. If a consent is applied for the Council must grant the consent and can only impose consent conditions relating to the “matters over which control are reserved” listed in the table below.
	Yellow Zone where permitted conditions cannot be met	
	Orange Zone where permitted conditions cannot be met	
	Red Zone (that is not class 8e)	
Restricted Discretionary	Red Zone (that is class 8e)	Harvesting is a Restricted Discretionary activity and a consent is required in Red Zone (that is class 8e). If a consent is applied for the council can decline or grant the consent and impose consent conditions however the council’s decision making power is restricted to the “matters over which discretion is restricted” which are listed in the table below.
Discretionary	Green Zone	
	Yellow Zone	
	Orange Zone	
	Red Zone	

Conditions/Standards

	Conditions	Intent/Rationale [identify the rationale for each of the proposed conditions, i.e. what risk is it trying to avoid, remedy or mitigate and how does it propose to achieve this]
Permitted	Harvesting is Permitted in Green, Yellow and Orange Zones provided permitted activity conditions are met.	
Regional ³ /District	<p>Notice of Commencement</p> <p>Regional and district council must be notified not more than 60 and no less than 20₂ working days prior to harvesting operations commencing. Councils may reduce this notice period at their discretion.</p>	<p>This rule seeks to ensure that Regional Councils are notified in a timely manner of harvesting operations commencing so that they are aware of operations occurring and can schedule monitoring programmes if necessary.</p>
Regional	<p>Harvest Planning</p> <ul style="list-style-type: none"> A harvest plan must be prepared that assesses and addresses the operational risks to the environment. A harvest plan must be prepared in accordance with the template supplied as Appendix X (or similar). The harvest plan must be made available to the regional council <u>for comment</u> at least <u>not less than</u> 20 working days prior to commencement of harvesting operations. Either on request, or provided annually, upon agreement with the relevant council. The scope of a harvest plan must be matched to the scale and complexity of the operation. All harvesting shall be carried out in accordance with the harvest plan and any subsequent harvest plan changes. Any material amendments to the harvest plan must be documented and made available to the relevant council <u>for comment</u> upon request. If a council has previously requested a copy of the harvest plan, any subsequent amendments must be forwarded to the council <u>for comment not less than 20 working days before the changes are implemented</u>. <p>When undertaking harvesting in <u>Yellow, Orange and Red Zones</u> a documented Erosion and Sediment Control Plan must be prepared in conjunction with a Harvest Plan. An Erosion and Sediment Control plan must be prepared in accordance with the template supplied as Appendix X (or similar).</p> <p>Harvest Plan must include (but is not limited to):</p> <ul style="list-style-type: none"> mapping, environmental risk assessment and details of the management of risks relating to <u>ephemeral watercourses, rivers and</u> surface water bodies, wetlands and coastal and their riparian areas, including indigenous vegetation. a documented process for assessing and managing the effects and potential risks of slash entering water bodies , appropriate to the scale and level of risk. Slash storage sites identified and clearly documented, including using skid diagrams as part of the pre harvesting operation hazard identification process (as appropriate), Slash management planning <u>for ephemeral watercourses</u>, and perennial water bodies, <u>and birds nests on slopes >20 degrees</u>. <u>Rehabilitation of disturbed sites and birds' nests</u> <u>Harvest planning notes at a compartment level</u>. <p><u>WRC Comment:</u></p> <ul style="list-style-type: none"> Waikato Regional Council would like to provide further comment once Appendix A has been prepared. The harvest plan template will be important and Waikato Regional Council would like to provide comment during its development. Proposed inclusions are provided below. <p><u>"The harvest plan shall include but not be limited to the following:</u></p> <ul style="list-style-type: none"> <u>Maps or aerial images of sufficient scale and detail to clearly show the nature and location of the vegetation removal operations, methods to be used to avoid soil disturbance and damage to riparian and vegetation in non stocked areas and shall additionally include but not be limited to the following matters:</u> <u>Compartment maps of sufficient scale and detail to clearly show:</u> <ol style="list-style-type: none"> <u>Perennial water bodies</u> <u>Contours at not more than 20 metre intervals</u> <u>Operational areas with slopes greater than 20 degrees</u> <u>Existing and proposed roads, tracks, pads and landings</u> <u>Existing and proposed river crossing structures and fords</u> <u>Areas of proposed soil disturbance</u> <u>Harvest areas, harvesting methods and setting level detail</u> <u>Stocked and non stocked land, wetlands and riparian zones</u> <p><u>Any changes to the Harvest Plan shall be confirmed in writing by the consent holder to the Council.</u></p>	<p>This rule requires foresters to prepare a harvest plan to ensure that the environmental risks associated with harvesting operations are identified and considered prior to operations commencing.</p> <div> <p>Advice note: Material amendments are significant changes, such as changes to the harvesting system, relocation of roads or landings, significant changes to proposed controls to manage environment impacts.</p> </div> <div> <p>Advice note: Harvesting in the green, yellow zone and orange zone should follow best practice for managing Erosion and Sediment as documented in the NZ Environmental Code of Practice for Plantation Forestry (E-COP) 2007.</p> </div>

³ "Regional" denotes that this condition relates to the functions of regional councils under section 30 of the Resource Management Act and therefore monitoring and enforcement is the responsibility of the relevant regional council.

Regional/District	<p>Ground Disturbance outside riparian zones</p> <p>During harvesting operations <u>shall be undertaken</u> to avoid, mitigate or remedy actions that accelerate erosion and minimise <u>avoid</u> the discharge of sediment to water bodies.</p> <p>Harvest systems shall be planned and located to achieve butt suspension wherever practicable. This condition does not apply to riparian zone.</p> <ul style="list-style-type: none"><u>Recovery of tree stems shall be planned and undertaken to provide for the suspension of tree butts above the land surface during transportation to avoid exposing sub soils, the formation of log chutes, scouring of the land surface, disturbance of intermediate ridges and water bodies.</u>All disturbed soil shall be stabilised or contained so as to prevent <u>soil erosion</u> movement <u>or export</u> of sediment into any water body, <u>wetland</u> or coastal water resulting in:<ul style="list-style-type: none">the diversion or damming of any <u>river</u> or stream,the sedimentation of the bed of any surface water body,significant <u>Measureable</u> adverse effects on aquatic, <u>coastal</u> and <u>or wetland</u> habitat .<u>Flooding</u>, Damage to downstream infrastructure, property or receiving environmentsAll temporary harvest tracking shall be stabilised with water controls or other means as required to minimise <u>avoid soil erosion</u>, sediment discharge in stormwater prior to <u>that may</u> discharge to a perennial water body <u>or wetland</u>.	<p>The removal of vegetation and the disturbance of the ground increases the risk of erosion and sediment discharge to waterways. These rules seek to;</p> <ul style="list-style-type: none">minimise the amount of ground disturbance that occurs as part of harvesting and tracking operations; andminimise the effects of ground disturbance that does occur by controlling water flows and avoiding the deposit of silt/sediment in <u>treating direct</u> pathways to surface water bodies <u>and wetlands</u> <p>These conditions apply to ground disturbance outside of riparian zones. Operations within riparian zones are subject to stricter controls.</p>
Regional/District	<p>Riparian Disturbance</p> <p>In order to limit riparian disturbance during harvesting fell away from the water body or riparian zone, except where unsafe and impractical to do so. If unavoidable, fell trees directly across the water body for full-length extraction before de-limbing or heading.</p> <p>No harvesting machinery shall operate within 5 m of perennial water bodies, except;</p> <ul style="list-style-type: none">at water-body crossing points,where slash removal is necessary, orwhere essential for assisting with directional falling and extraction of trees from the riparian margin. <p>When harvesting within or across a riparian zone, all disturbed vegetation, soil or debris is to be deposited or placed in a position where it will not enter any watercourse, <u>water body, wetland or coastal area to the extent that where it could result in one or more of the following causes more than minor adverse effects associated with:</u></p> <ul style="list-style-type: none">diversion, damming or erosion of any river or stream, ordegradation of any <u>coastal</u>, aquatic, <u>wetland</u> or riparian habitat, ordamage to downstream infrastructure, <u>property</u> or receiving environments.<u>Any impediment to fish passage</u> <p>Must have full suspension if pulling across streams greater than 3 m in width. <u>Harvest systems shall be planned and undertaken to avoid damage to riparian zones when recovering tree stems over riparian vegetation, any perennial or intermittent flowing watercourse. Where this is not achievable, tree stems may be recovered through designated corridors in riparian zones provided appropriate methods are used to minimise damage to riparian vegetation and avoid soil disturbance.</u></p> <p>WRC Comment</p> <ul style="list-style-type: none">Where is the channel width measured? Channel width can vary over any reach of a river. A river with a channel width <3 metres may have a community water supply or be a recreational fishery. Width has nothing to do with it.	<p>Riparian zones are particularly sensitive to harvesting activities. This rule seeks to ensure that harvesting techniques are adopted which minimise riparian disturbance such as felling trees away from riparian zones and keeping machinery out of these zones (where practicable).</p> <p>WRC Comment</p> <ul style="list-style-type: none">Who determines ‘where practicable’ applies? ‘Where practical’ cannot be measured <p>Advice note: Where extraction across perennial water bodies/ riparian vegetation is the best practicable option, use methods that minimise disturbance to the water body and riparian vegetation such as such as: hauling through corridors, butt extraction and butt suspension.</p>
Regional	<p>Slash and Debris Management</p> <p>Place slash onto stable ground and manage slash levels so that slash does not accumulate to levels that could cause collapse at skid sites. <u>Manage slash</u> To prevent <u>debris avalanche or</u> potential land <u>ing failure</u> collapse at skids, install and maintain water and sediment controls.</p> <p>Remove (potentially unstable slash from water bodies, whenever safe and practicable to do so, which have <u>has</u> the potential to <u>result in one or more of the following</u> mobilise under flood flows and:</p> <ul style="list-style-type: none">diversion, damming or erosion of any river or stream, ordegradation of any <u>coastal</u>, aquatic, <u>wetland</u> or riparian habitat, ordamage to downstream infrastructure, <u>property</u> or receiving environments.<u>impediment to fish passage</u> <p>WRC Comment</p> <ul style="list-style-type: none">WRC suggests an appropriate condition is:	<p>This rule seeks to;</p> <ul style="list-style-type: none">reduce the risk of slash from entering waterways; andensure that slash that does enter waterways is removed if its presence is likely to effect the flow or damage habitat or to property or the environment; andensure that the stability of land is not affected by slash accumulations.

Regional	<p><u>“Debris shall be removed from all watercourses except where it will not cause one or more of the following: diversion, damming, flooding, erosion, adverse effects on aquatic habitat, impediment to fish passage or damage to lawfully established structures.”</u></p> <ul style="list-style-type: none">Also Include:<ul style="list-style-type: none"><u>Where Kiwi are known to utilise habitat within a forest, the forest owners/managers shall have procedures in place to:</u><ul style="list-style-type: none"><u>identify, protect nest sites and provide for the welfare of nesting and fledging Kiwi.</u> <p>This rule is Intended to provide for the welfare of Kiwi during nesting and raising juvenile birds.</p>	<p>Advice note: this rule is intended to apply to flood flows up to a 10-year return period.</p> <p>WRC Comment It is flood flows>10 years in which debris is mobilised. This rule should apply to perennial and ephemeral watercourses regardless of flow.</p>
	<p>Slash Traps Where slash cannot be safely or practicably removed from water bodies, and there is an assessed risk of slash mobilising and causing the above effects, alternative measures, such as slash traps, being <u>may be</u> used to retain slash onsite as far as practicable.</p> <p>Constructed slash (debris) traps located across a waterbody being:</p> <ul style="list-style-type: none">designed and constructed to a standard appropriate for likely debris quantity and types and waterflowlocated so as to avoid flooding of adjacent land, and in a position that allows access for maintenanceregularly monitored for the build-up of debris and within 5 <u>3</u> working days following any rainfall event in the upstream catchment that is likely to mobilise debrismaintained free of accumulated debris – following storm events, accumulated debris being removed as soon as is practicable but no later than 20 working days of such accumulation occurring.<u>Maintained free of accumulated debris within 3 working days of debris accumulation</u><u>Debris removed from the trap shall be placed and managed in a position where the debris will not re enter a water body</u><u>Debris trap(s) shall be removed from the bed and flood plain of a watercourse once the threat of debris mobilisation in the catchment has past.</u> <p>WRC Comment</p> <ul style="list-style-type: none">Practical cannot be measured. Slash and resulting debris dam failures have a documented history of significant adverse environmental effects. The best method of avoiding the adverse effects of slash in watercourses is not to place slash in a watercourse or remove it concurrent with harvesting.The volume of debris captured by a debris trap in a single event can be significant. This material must be promptly removed as a further flood event with the debris insitu frequently results in the trap collapsing under the combined weight of water and debris because the trap becomes a significant debris dam in itself. Leaving a trap full or even partially full of debris for up to a month is considered high risk.	
Regional	<p>Timing Harvesting operations must not interrupt fish passage or disturb specified water bodies during fish spawning periods as specified in appendix/schedule X.</p>	<p>This rule seeks to ensure that harvesting operations that may have instream effects are not carried out during known fish spawning periods.</p> <p>WRC Comment The proposed 20 working days to remove debris from a trap during fish spawning is unacceptable due to the debris forming a barrier to fish migration.</p>
Controlled	<p>Harvesting is Controlled in Green, Yellow and Orange Zones where permitted conditions cannot be met and Red Zone that is not class 8e</p>	
Regional	<p>Harvesting is a Controlled activity and a consent is required if;</p> <ul style="list-style-type: none">in the Green, Yellow and Orange Zones where permitted conditions cannot be met; andRed Zone that is not class 8e.	

	<p>If a consent is applied for the Council must grant the consent and its ability to impose consent conditions is restricted to the matters listed below;</p> <p>Green, Yellow and Orange Zone:</p> <ul style="list-style-type: none">• The effects that the specific permitted activity condition(s) that cannot be met was attempting to avoid. <p>Red Zone (that is not class 8e):</p> <ul style="list-style-type: none">• Harvest Plan and erosion and Sediment Control Plan,• method of harvesting,• the extent of operations ,• timing in relation to fish spawning ,• measures to address effects on water quality and riparian vegetation,• measures to address soil erosion during and after harvesting,• methods to manage and contain slash.• Rehabilitation of disturbed sites• Ecological values of the receiving environment	<p>These matters seek to ensure that consent conditions are imposed which directly relate to the permitted activity condition(s) which could not be met.</p> <p>These matters are intentionally broad to reflect the broad range of potential impacts from harvesting operations.</p> <div>Advice note: Slash containment structures may require resource consent for structures in river or stream beds.</div>
<div>Restricted Discretionary</div> <div>Regional</div>	<div>Harvesting is Restricted Discretionary in Red Zone that is class 8e</div> <p><i>Harvesting</i> is Restricted Discretionary activity and a consent is required in Red Zone that is class 8e.</p> <p>A consent is required and the council can decline or grant the consent and impose conditions however the council's ability to grant or decline the consent and to impose conditions is restricted to the matters listed below;</p> <p>Red Zone (that is class 8e):</p> <ul style="list-style-type: none">• Harvest Plan and Erosion and Sediment Control Plan,• method of harvesting,• the location, extent and timing of operations (including in relation to fish spawning),• effects on water quality and riparian vegetation,• soil erosion during and after harvesting,• containment of slash.• Rehabilitation of disturbed sites• Post harvest land management• Ecological values of the receiving environment	<p>These matters are intentionally broad to reflect the broad range of potential impacts from harvesting operations.</p>
<div>Discretionary</div>		

Activity Status Cascade – Mechanical Land Preparation

Objective: To introduce a consistent set of mechanical land preparation controls that manage the risk identified below in a manner that is in-line with good forest management practice.

Scope: Mechanical land preparation includes root raking, discing, mounding and spot mounding, contour and downhill ripping, roller crushing, other cultivation of land (including spot cultivation) and associated removal of vegetation. V-blading involving disturbance of subsoil will be considered under earthwork rules.

WRC Comment

- Down hill ripping is not supported especially in the yellow brown pumice soils of the Central North Island. This practice significantly increases the potential to create gully erosion which is an erosion type that the NES process has identified as an erosion feature common in plantation forests.
- Roller crushing of vegetation should be subjected to the activity rule and conditions for vegetation removal, because roller crushing is a method undertaken to remove vegetation.

NB: Earthworks and quarrying do not fall within the scope of these mechanical land preparation controls. Earthworks and quarrying are defined activities and are subject to specific controls.

Risks: The predominant risks are soil erosion, impacts on habitats and degradation of water quality due to sediment run-off to water bodies.

Activity Status	ESC zones	General Guidance
Permitted	Green Zone	Mechanical Land Preparation is permitted in all zones except; <ul style="list-style-type: none">Orange and Red zones where the slopes is greater than 25 <u>20</u> degrees and the technique used affects the subsoil (i.e. deep downhill ripping or giant discing) <div>Advice Note: Root raking, roller crushing, mounding, spot mounding or spot cultivation is not considered to affect the subsoil</div>
	Yellow Zone	
	Orange Zone	
	Red Zone	
Controlled		
Restricted Discretionary	Green Zone	Mechanical Land Preparation is a Restricted Discretionary activity where; <ul style="list-style-type: none">all zones where permitted activity conditions cannot be met; orOrange and Red areas with slopes greater than 25<u>20</u> degrees where the Mechanical Land Preparation technique used affects subsoil. If a consent is applied for the council can decline or grant the consent and impose consent conditions however the council's decision making power is restricted to the “matters over which discretion is restricted” which are listed in the table below.
	Yellow Zone	
	Orange Zone	
	Red Zone	
Discretionary		

Conditions/Standards

	Conditions	Intent/Rationale [identify the rationale for each of the proposed conditions, i.e. what risk is it trying to avoid, remedy or mitigate and how does it propose to achieve this]
Permitted	Mechanical Land Preparation is a Permitted Activity in all Zones provided the permitted activity conditions are met.	
Regional	The activity shall not be undertaken in Orange or Red Zone where the slope is greater than 25 <u>20</u> degrees if the technique being used affects the subsoil (i.e. deep downhill ripping or giant discing).	These conditions seeks to ensure that where mechanical land preparation is undertaken in locations and in a manner that carries the highest risks of environmental degradation (i.e. where it affects the subsoil in steep country) that these risks are managed through consent conditions. <div>Advice Note: Root raking, roller crushing, mounding, spot mounding or spot cultivation is not considered to affect the subsoil</div>
Regional	Clearance of indigenous vegetation, within a productive area, as a result of mechanical land preparation is limited to vegetation associated with the plantation crop, that is vegetation that; <ul style="list-style-type: none">has grown up under (or may have overtopped) production species; oris within an area of failed planting (within the last rotation); oris <u>regenerating vegetation</u> within an area of regenerating <i>cutover</i>, oroccurs on an existing access road <u>or track</u> .	This condition seeks to ensure that indigenous vegetation that is not part of the productive area of a forest (including access roads and areas of cutover) is not damaged by mechanical land preparation.
District	Nesting times	

Regional	<p>Where threatened indigenous bird species are known to nest in cutover, forest owners must have procedures in place to;</p> <ul style="list-style-type: none">• identify nest sites and/or the nesting season, and• protect these sites from disturbance by mechanical land preparation or undertake the activity outside of the nesting season.	These conditions seek to ensure that steps are taken to reduce the risk of damage to the nesting sites of threatened indigenous bird species.																												
Regional	<p>Methods</p> <p>Mechanical land preparation must be carried out parallel to the contour, where practical (except roller crushing)</p> <ul style="list-style-type: none">• Where mechanical land preparation does not follow the contour, run-off control measures must be provided to prevent sediment run-off to waterways.• For downhill ripping, individual sections of ripped soil must not exceed 50 m in length. No downhill ripping in soils shall be undertaken where there is evidence of <u>or potential for</u> gully erosion and tunnel gully erosion. <p>WRC Comment</p> <ul style="list-style-type: none">• The separation distance between each 50m length of ripping should be 50m between ripped sections to avoid any connection of ground water drainage and therefore potential tunnel erosion .	<div><p>Advice note: Mechanical land preparation parallel to the contour is considered impractical where:</p><ol style="list-style-type: none">1. it is required for frost protection or drainage, which need down-slope drainage paths to be effective; or2. topographical features, limited access points or protected areas (such as archaeological sites or reserves) make it impractical to run parallel to the contour; or3. machines cannot be safely operated across the slope.</div>																												
	<p>Setbacks</p> <p>Mechanical Land Preparation shall not be undertaken within these setbacks</p> <table><tr><th colspan="2">Setbacks</th><th colspan="2">Minimum horizontal distance (m)</th></tr><tr><td rowspan="3">Perennial River or Stream channel width (m)</td><td>Bankfull stream channel width</td><td></td><td rowspan="3"><u>Set backs should be based on catchment area 0-50 ha 5 m set back. In catchments >50 ha 10 m set back</u></td></tr><tr><td><3 m</td><td>5 m</td></tr><tr><td>>3 m</td><td>10 m</td></tr><tr><td colspan="2">Wetlands larger than 0.25 ha</td><td>5 m</td><td><u>One tree length</u></td></tr><tr><td colspan="2">Lakes larger than 0.25 ha</td><td>10 m</td><td><u>One tree length</u></td></tr><tr><td colspan="2">Coastal Marine Area</td><td>30 m</td><td><u>One tree length</u></td></tr><tr><td colspan="2">Outstanding Freshwater Bodies [as defined in the NPS Freshwater Management (2014)] or surface water bodies subject to a Water Conservation Order</td><td>10 m</td><td><u>One tree length</u></td></tr></table>	Setbacks		Minimum horizontal distance (m)		Perennial River or Stream channel width (m)	Bankfull stream channel width		<u>Set backs should be based on catchment area 0-50 ha 5 m set back. In catchments >50 ha 10 m set back</u>	<3 m	5 m	>3 m	10 m	Wetlands larger than 0.25 ha		5 m	<u>One tree length</u>	Lakes larger than 0.25 ha		10 m	<u>One tree length</u>	Coastal Marine Area		30 m	<u>One tree length</u>	Outstanding Freshwater Bodies [as defined in the NPS Freshwater Management (2014)] or surface water bodies subject to a Water Conservation Order		10 m	<u>One tree length</u>	<p>These conditions aim to establish appropriate setback distances from water bodies to reduce the risk damage to riparian areas that have the potential to degrade water quality and instream habitats.</p> <div><p>Advice note: Tracked/ wheeled machines (e.g. excavators) may reach in to remove invasive weeds as part of land preparation. This is preferred to the use of herbicides. However, where practicable, the 5 m minimum horizontal setback still applies to wheels or tracks of machinery <u>including gravity rollers used for</u> undertaking Mechanical Land Preparation.</p></div>
Setbacks		Minimum horizontal distance (m)																												
Perennial River or Stream channel width (m)	Bankfull stream channel width		<u>Set backs should be based on catchment area 0-50 ha 5 m set back. In catchments >50 ha 10 m set back</u>																											
	<3 m	5 m																												
	>3 m	10 m																												
Wetlands larger than 0.25 ha		5 m	<u>One tree length</u>																											
Lakes larger than 0.25 ha		10 m	<u>One tree length</u>																											
Coastal Marine Area		30 m	<u>One tree length</u>																											
Outstanding Freshwater Bodies [as defined in the NPS Freshwater Management (2014)] or surface water bodies subject to a Water Conservation Order		10 m	<u>One tree length</u>																											
Controlled																														
Restricted Discretionary	<p>Mechanical Land Preparation is a restricted discretionary activity in all zones where the permitted activity conditions cannot be met and in the Orange and Red Zones where slope is greater than 25 <u>20</u> degrees and the technique used affects the subsoil</p> <p>Mechanical Land Preparations is Restricted Discretionary and a consent is required if;</p> <ul style="list-style-type: none">• the permitted activity conditions cannot be met; or• the activity occurs in Orange or Red Zones where the slope is greater than 25 <u>20</u> degrees and the technique used affects the subsoil <p>If a consent is applied for the council can decline or grant the consent and impose consent conditions however the council’s ability to grant or decline the consent and to impose conditions is restricted to the matters listed below.</p> <p>Discretion shall be restricted to the effects that the specific permitted activity condition(s) that could not be met was attempting to avoid. Where the activity occurs in Orange or Red Zones where the slope is greater than 25 <u>20</u> degrees and the technique used affects the subsoil, Discretion shall be restricted to the following effects:</p> <ul style="list-style-type: none">• ecological and aquatic effects (including effects on water quality).• location of work in relation to coastal marine areas, rivers, streams, lakes and wetlands.• erosion and sediment run-off.• type of mechanical land preparation and method employed.• Changes to hydrological flows (e.g. from <u>downhill ripping</u> V-blading) [Advice note: V-blading that affects the subsoil is considered earthworks]	<p>These matters are intentionally broad to reflect the broad range of potential impacts from Mechanical Land Preparation operations.</p> <div><p>Advice Note: ecological effects includes effects on nesting of indigenous birds</p><p>WRC Comment</p><p>Ecological effects throughout the NESPF should also include the effects on indigenous animals; including bats, frogs, resident and migratory indigenous fish, trout and salmon.</p></div>																												

Discretionary		

Activity Status Cascade – Pruning and Thinning-to-Waste

Objective: To introduce a consistent set of pruning and thinning-to-waste controls that manage the risks identified below in a manner that is in-line with good forest management practice.

Scope:

Pruning involves the removal of branches from a tree. Thinning involves the selective removal of trees within a stand. Thinning operations must leave a minimum of 250 stems per hectare, thinning operations that thin in excess of this limit are likely to have similar effects to harvesting operations and fall within the definition of harvesting. NB: Production thinning involves the removal of thinned trees for sale and falls within the definition of *harvesting*. Thin-to-waste operations leave the felled trees *in situ*.

Risk:

Pruning and thinning typically have minor environmental effects limited to issues with where the pruned or thinned material is deposited. The deposition of pruned or thinned material such as branches, young trees or other woody debris into surface water bodies or where it has the potential to enter a surface waterbody is the primary risk as it can have detrimental effects on water flow, water quality, aquatic life, and in extreme cases property and infrastructure.

Activity Status	ESC zones	General Guidance
Permitted	Green Zone	<i>Pruning and Thinning</i> is permitted in all zones provided all permitted activity conditions are met. NB: <i>Production Thinning</i> is considered <i>Harvesting</i> .
	Yellow Zone	
	Orange Zone	
	Red Zone	
Controlled	Green Zone where permitted conditions cannot be met	<i>Pruning and Thinning</i> is controlled where permitted conditions cannot be met.
	Yellow Zone where permitted conditions cannot be met	
	Orange Zone where permitted conditions cannot be met	
	Red Zone where permitted conditions cannot be met	
Restricted Discretionary		
Discretionary		

Conditions/Standards

	Conditions	Intent/Rationale [identify the rationale for each of the proposed conditions, i.e. what risk is it trying to avoid, remedy or mitigate and how does it propose to achieve this]
Permitted	<i>Pruning and Thinning</i> is a Permitted Activity in all zones where the Permitted Activity condition can be met.	
Regional ⁴	Slash Debris from pruning and thinning must not be deposited in a perennial water body or where it may enter a perennial water body if it has the potential to mobilise under flood flows and: <ul style="list-style-type: none">block or dam stream flow, ordivert flow into stream banks in a way that is likely to cause erosion, ordamage downstream infrastructure, property or receiving environments, orcause significant adverse effects on aquatic habitat. Slash should only be removed from a waterbody if it is safe and practicable to do so. Thinning slash shall not be placed in a water body or in a position where it may enter a water body where it may cause adverse effects on aquatic habitat, damming, diversion, flooding, damage to downstream infrastructure or a barrier to fish migration.	This condition aims to ensure that slash and other debris is managed appropriately particularly in areas adjacent to surface water bodies so that it does not enter and damage these waterways or downstream infrastructure. <div>Advice note: this rule is intended to apply to flood flows up to a 10-year return period.</div> <div>WRC Comment Flows greater than a 10 year return period are the events that cause slash to be mobilised.</div>
Controlled	<i>Pruning and Thinning</i> is a Controlled Activity in all zones where the Permitted Activity conditions cannot be met.	
	<i>Pruning and Thinning</i> is a Controlled Activity and a consent is required in all zones where the	Matters of control are limited to the primary risk of pruning and thinning operations, that is damming, diversion,

⁴ “Regional” denotes that this condition relates to the functions of regional councils under section 30 of the Resource Management Act and therefore monitoring and enforcement is the responsibility of the relevant regional council.

Regional	<p>permitted activity conditions cannot be met.</p> <p>If a consent is applied for the Council must grant the consent and can only impose consent conditions relating to the matters listed below;</p> <ul style="list-style-type: none">• Aquatic effects.• Effects on stream flow, or• Erosion, or• Potential effects on downstream infrastructure, property or receiving environments, or• effects on aquatic habitat.	<p>flooding, or a barrier to fish migration damage to aquatic ecosystems and infrastructure assets.</p>
Restricted		
Discretionary		
Discretionary		

Activity Status Cascade – Forestry Quarrying

Objective: To introduce a consistent set of forestry quarrying controls that manage the risks identified below in a manner that is in-line with good forest management practice.

Scope:

Forestry Quarrying refers to the extraction of rock, sand or gravel for the formation of forest roads. These controls do not address noise, vibration, dust and vehicle issues associated with quarrying, councils retain their ability to address these matters. [Advice note: scope includes the extraction of alluvial gravel outside of river beds]
Earthworks and mechanical land preparation do not fall within the scope of these quarrying controls. Earthworks and mechanical land preparation are defined activities and are subject to specific controls.

Risks:

- Quarrying can have similar effects as earthworks activities in relation to soil/slope stability, water quality, landscape, and effects on cultural sites.
- These effects are usually related to erosion or the products of erosion (i.e. sediment) and the impact this has on water bodies.
 - Sediment has two main impacts: it can increase the turbidity of river water (decrease clarity), and it can also clog riverbeds and downstream receiving environments such as estuaries and lakes. Both of these impacts affect the biological community and health of an ecosystem. In red zone where quarry material is likely to be located in rocky outcrops the key risks relate to overburden disposal

Activity Status	ESC zones	General Guidance
Permitted	Green Zone	Quarrying is permitted in all zones except Red Zone where the ESC identifies land as having the potential for severe or very severe earthflow or slump erosion provided permitted activity conditions are met.
	Yellow Zone	
	Orange Zone	
	Red Zone (not susceptible to earthflow)	
Controlled	Green Zone	Quarrying is a controlled activity in all zones (except Red zone where the ESC identifies land as having the potential for severe or very severe earthflow or slump erosion) where permitted activity conditions cannot be met.
	Yellow Zone	
	Orange Zone	
	Red Zone (not susceptible to earthflow)	
Restricted Discretionary	Green Zone	Quarrying is restricted discretionary; <ul style="list-style-type: none">• in all zones where property setback conditions cannot be met; and• in Red Zone where the ESC identifies land as having the potential for severe or very severe earthflow or slump erosion
	Yellow Zone	
	Orange Zone	
	Red Zone (susceptible to earthflow)	
Discretionary	Green Zone	
	Yellow Zone	
	Orange Zone	
	Red Zone	

Conditions/Standards

Status Jurisdiction	Conditions	Intent/Rationale [identify the rationale for each of the proposed conditions, i.e. what risk is it trying to avoid, remedy or mitigate and how does it propose to achieve this]
Permitted	All zones except Red Zone where ESC maps identify land as having the potential for severe or worse earthflow or slump erosion	<div>Advice Note: Earthworks rules do not apply within the quarry area. Refer to permitted activity conditions for earthworks as associated ground disturbances activities outside of the quarry area such as road construction will be subject to earthworks controls.</div>
Regional	Quarrying shall not be undertaken in Red Zone where the ESC identifies land as having the potential for severe or very severe earth flow or slump erosion	This condition seeks to ensure that where land is susceptible to earthflow the risks of quarrying activities can be managed via consent conditions that are appropriate for the specific site.
District/Regional	Notice of commencement District and Regional Council must be notified at least <u>not less than</u> 20 and no more than 60 working days prior to first quarry	This rule seeks to ensure that relevant councils are notified in a timely manner of quarrying operations commencing so that they are aware of

	operations commencing.	operations occurring and can schedule monitoring programmes if necessary.
District	<p>Visibility</p> <p>Where a quarry is visible at the time of extraction from an existing dwelling, an adjoining property under different ownership or a formed public road, no more than 5,000 m³ of material shall be quarried per 5 year period, per activity site.</p>	<p>This rule seeks to ensure that where quarrying activities are likely to affect neighbouring properties that the effects are managed by limiting the magnitude of the quarry operations.</p> <div> <p>Advice Note – A screen of trees is sufficient to avoid visibility/line of sight issues.</p> </div>
District	<p>Property Setbacks</p> <p>Unless written approval from the owner and/or occupier has been obtained:</p> <ul style="list-style-type: none"> No quarrying shall be undertaken activity closer than 500 m to an existing dwelling under different ownership; and No excavated soil or overburden shall be deposited within 20 m of an adjoining property under different ownership. 	<p>These conditions seek to ensure that the effects of quarrying on neighbouring properties are adequately managed.</p> <p>Guidance note: Councils are encouraged to put in place no complaints covenants to address potential reverse sensitivity issues.</p>
Regional	<p>Regional Setbacks</p> <p>No quarrying shall be undertaken <u>and or related soil disturbance, overburden disposal, stock piling of quarried aggregate</u>, within 20 m of a surface water body.</p>	<p>This condition seeks to reduce the risks of:</p> <ul style="list-style-type: none"> sediment from ground disturbance activities entering surface water bodies; and riparian zones being disturbed or damaged by quarrying activities such as the operation of machinery.
Regional	<p>Fill or spoil</p> <p>Excavated soil regolith and overburden of the quarry product shall not be deposited:</p> <ul style="list-style-type: none"> within 20 m of a surface water body; or on the head of an active or relic earthflow, or other mass movement feature, where the deposition of spoil could lead to reactivation or exacerbation of the earthflow or mass movement. <u>No overburden material, quarried aggregate or quarry related activity shall be undertaken on the flood plain of a watercourse where it may adversely affect flood flows or result in damming or diversion of a watercourse.</u> <u>Overburden and exposed soil generated from quarrying activities shall be stabilised to prevent soil erosion and sediment export within six months of exposure.</u> 	<p>These conditions seek to reduce the risks of:</p> <ul style="list-style-type: none"> sediment entering surface water bodies from the deposition of fill or overburden; and the reactivation or exacerbation of earthflow or mass movement erosion.
District	Material must not be transported off the property on public roads.	This condition seeks to ensure that these controls only capture quarries that are being used for forestry related purpose, i.e. for the construction of access roads and river crossing within the forest. It is intended that councils retain the ability to regulate general purpose quarries.
Regional	<p>Restoration</p> <p>Within 2 months of the quarry being deactivated, the land shall be restored to a stable land form (including spoil, tailings and dump areas).</p>	<div> <p>Advice Note: Restoration condition is intended to apply only once a quarry has been permanently abandoned, not if it is still being used intermittently.</p> </div> <p>These conditions seek to ensure that adequate measures are taken following the completion of the quarrying activity to reduce any ongoing risks of slope instability or sedimentation of surface water bodies.</p>
Regional	<p>Water Table</p> <p>Quarry depth shall not go below the water table of any aquifer.</p>	<div> <p>Advice Note: It is intended that quarries which go below the water table of an aquifer are out of scope of these controls and that council's retain the ability to regulate such activities.</p> </div>
Regional	<p>Quarry Management Plan (QMP)</p> <ul style="list-style-type: none"> A Quarry Management Plan must be prepared Quarrying activities must be undertaken in accordance with a QMP which must be made available to the council upon request at least 20 working days prior to commencement of operations. The scope of the Quarry Management Plan (QMP)an Erosion and Sediment Control Plan must be matched to the scale and complexity of the operation. Material amendments to the earthworks QMP plan must be provided to the relevant council. Material amendments are significant changes, such as relocation of roads, an increase in the annual volume of aggregate extraction, stripping of overburden, opening of new benches or faces, changes to the hydrology of the quarry catchment, changes to the rehabilitation of disturbed sites, any increase in annual production of aggregate, use of new sotegage or the opening of new ground or landings, changes to proposed controls to manage environment impacts. 	<div> <p>Advice Note: Guidance to be developed to outline potential options when inadequate management plans are submitted.</p> </div> <p>Advice Note: Worksafe hope to finalise the new Guidelines for <i>Health and Safety at Surface Mines, Alluvial Mines and Quarries</i> before the end of 2014.</p>

	<p>The QMP shall include but not be limited;</p> <ul style="list-style-type: none"> • A description of the nature, scale, timing and duration of activities including construction, roading, the formation of any new track, earthworks and stabilisation, • The erosion and sediment control measures to be employed and indicative locations, including <ul style="list-style-type: none"> ◦ Water runoff controls ◦ Methods to prevent slumping of batters, cuts and side castings, ◦ Measures to maintain slope stability, ◦ Methods of sediment retention and control of sediment run off, ◦ Methods to avoid effects on riparian margins and water bodies, ◦ <u>Overburden and fill soil management</u> ◦ <u>Quarry catchment drainage</u> ◦ <u>Dust management</u> • Detail heavy rainfall response and contingency measures, • Identify maintenance and monitoring procedures • Methods to monitor achievement of the plan, and • Rehabilitation and revegetation requirements. 	
Controlled	Quarrying is a Controlled Activity where permitted conditions cannot be met in Green, Yellow, Orange Zones and Red Zone that is not susceptible to earthflow	
Regional/District	<p>Quarrying is a controlled Activity and a consent is required if:</p> <ul style="list-style-type: none"> • In Green, Yellow and Orange Zones where the permitted activity conditions cannot be met (except for property setbacks); or • In Red Zone that is not susceptible to earthflow where permitted activities cannot be met (except for property setbacks) <p>If a consent is applied for the council must grant the consent and its ability to impose consent conditions is restricted to the following matters;</p> <ul style="list-style-type: none"> • The effects that the specific permitted activity condition(s) that could not be met was attempting to avoid: 	These matters are intentionally broad to reflect the broad range of potential impacts.
Restricted Discretionary	Red Zone where susceptible to earthflow	
District/Regional	<p>Quarrying is a Restricted Discretionary activity and a consent is required;</p> <ul style="list-style-type: none"> • in all zones where property setback conditions cannot be met; • in Red Zone where ESC maps identify land as being susceptible to earthflow. <u>or has a an existing or potential for one or more of the following: earth flow, soil slip, tunnel, gully or debris avalanche erosion.</u> <p>If a consent is applied for the council can decline or grant the consent and impose consent conditions however the council's ability to grant or decline the consent and to impose conditions is restricted to the matters listed below.</p> <ul style="list-style-type: none"> • location and duration of works • the disposal of fill and overburden • area and volume of earthworks • dimensions of cut and fill • ecological and aquatic effects • method of stabilisation of earthworks • method of sediment retention and run-off stormwater control • effects on riparian vegetation • measures to rehabilitate land • Effects on traffic and roading infrastructure • <u>Effects on water quality</u> • <u>Effects on the receiving environment</u> 	<p>These matters are intentionally broad to reflect the broad range of potential impacts.</p> <div> <p>Advice Note: The disposal of fill or overburden is generally a high risk activity in Red Zone areas susceptible to earthflow. The activity of quarrying itself (i.e. excluding the disposal of fill or overburden) is usually of lower risk.</p> </div>
Discretionary		

Activity Status Cascade – Replanting

Objective: To introduce a consistent set of replanting controls that manage the risks identified below in a manner that is in-line with good forest management practice.

Scope: Replanting is the act of planting a site following the harvesting of a previous crop. For the activity to be considered replanting rather than afforestation the planting must occur on a site where plantation forestry has occurred within the past 5 years.

Risk: The primary risk associated with replanting is the re-establishment of forest in inappropriate areas where subsequent forestry activities carry an increased risk of causing adverse effects.

Activity Status	ESC zones	General Guidance
Permitted	Green Zone	<i>Replanting</i> is a permitted activity in all zones provided all permitted activity conditions are met.
	Yellow Zone	
	Orange Zone	
	Red Zone	
Controlled	Green Zone	<i>Replanting</i> is a Controlled activity in all zones where permitted activity conditions are not met.
	Yellow Zone	
	Orange Zone	If a consent is applied for the Council must grant the consent and can only impose consent conditions relating to the “matters over which control are reserved” listed in the table below.
	Red Zone	
Restricted Discretionary		N/A
Discretionary		N/A

Conditions/Standards

	Conditions	Guidance/Compliance
Permitted District ⁵	Replanting is permitted in all zones provided the conditions below are met.	
	Clearance of indigenous vegetation in preparation for replanting Clearance or conversion of <i>indigenous vegetation</i> is limited to <i>vegetation associated with plantation crop</i> , that is <i>indigenous vegetation</i> that; <ul style="list-style-type: none">has grown up under (or may have overtopped) production species; oris within an area of failed planting (within the last rotation); oris within an area of regenerating <i>cutover</i>, oroccurs on an existing access road <u>or track</u>.	This condition acknowledges that damage to vegetation in these circumstances is largely unavoidable. <div>Advice note: Councils retain the ability to be more stringent when indigenous vegetation clearance occurs within areas of significant indigenous vegetation or significant habitat of indigenous fauna as identified in district or regional plans, including significant natural areas.</div>

⁵ “District” denotes that this condition relates to the functions of a territorial authority under section 31 of the Resource Management Act and therefore monitoring and enforcement is the responsibility of the relevant territorial authority.

Regional ⁶	Replanting must not occur within the following setbacks.				<p>Replanting setbacks are the same as for afforestation. This is to maintain setback distances throughout subsequent rotations. As with the afforestation setbacks, the aim is to establish appropriate setbacks distances from surface water bodies to reduce the risk of future operations such as harvesting or earthworks causing sedimentation or damage to riparian areas that have the potential to degrade water quality and instream habitats.</p> <p>NB: Councils have the ability to be more stringent in relation to Outstanding Freshwater Bodies and WCOs. It is intended that this additional stringency should only be used to impose greater setbacks where that is justified to protect the specific character(s) of the waterbody that is considered outstanding.</p>																														
	<table><tr><td colspan="2">Setbacks</td><td colspan="2">Minimum horizontal distance (m)</td></tr><tr><td rowspan="2">Perennial River or Stream channel width (m)</td><td><3 m</td><td>5 m</td><td rowspan="2">except where a smaller setback is required to meet the conditions of a regional pest management strategy</td></tr><tr><td>>3 m</td><td>10 m</td></tr><tr><td colspan="2">Wetlands larger than 0.25 ha</td><td>5 m</td><td>One tree length</td></tr><tr><td colspan="2">Lakes larger than 0.25 ha</td><td>10 m</td><td>One tree length</td></tr><tr><td colspan="2">Coastal Marine Area</td><td>30 m</td><td>One tree length</td></tr><tr><td colspan="2">Outstanding Freshwater Bodies [As defined in the NPS Freshwater Management (2014)] or surface water bodies subject to a Water Conservation Order</td><td>10 m</td><td></td></tr><tr><td colspan="2"></td><td></td><td></td></tr></table>					Setbacks		Minimum horizontal distance (m)		Perennial River or Stream channel width (m)	<3 m	5 m	except where a smaller setback is required to meet the conditions of a regional pest management strategy	>3 m	10 m	Wetlands larger than 0.25 ha		5 m	One tree length	Lakes larger than 0.25 ha		10 m	One tree length	Coastal Marine Area		30 m	One tree length	Outstanding Freshwater Bodies [As defined in the NPS Freshwater Management (2014)] or surface water bodies subject to a Water Conservation Order		10 m					
	Setbacks		Minimum horizontal distance (m)																																
	Perennial River or Stream channel width (m)	<3 m	5 m	except where a smaller setback is required to meet the conditions of a regional pest management strategy																															
		>3 m	10 m																																
	Wetlands larger than 0.25 ha		5 m	One tree length																															
	Lakes larger than 0.25 ha		10 m	One tree length																															
	Coastal Marine Area		30 m	One tree length																															
	Outstanding Freshwater Bodies [As defined in the NPS Freshwater Management (2014)] or surface water bodies subject to a Water Conservation Order		10 m																																
WRC Comment Replanting of plantation trees shall be set back at not less than 5 m from perennial waterbodies in catchments 0-50ha and 10 m in catchments >50 ha																																			
District	Replanting adjacent to Significant Natural Areas When replanting immediately adjacent to indigenous vegetation identified, mapped or scheduled in a District or Regional Plan as a <i>Significant Natural Area</i> (or equivalent) replanting must take place no closer than the stump line of the previous crop.				<p>This condition seeks to ensure that when replanting occurs directly adjacent to identified areas of significant indigenous vegetation that the replanting does not encroach further into these areas than the previous crop was located. The aim is to ensure that any existing buffers between the plantation crop and indigenous vegetation are maintained in order to reduce the risk of future forestry operation causing damage to adjacent indigenous vegetation when machinery is operating and trees are felled and recovered in close proximity.</p> <p>This condition seeks to ensure that where harvesting consents require the replanting of specific areas that this can be undertaken without the need to apply for a further consent.</p> <p>This condition recognises that the EPA is best placed to evaluate the risks of genetically modified organisms and that approval and conditions imposed under the EPA regime will be sufficient to ensure that any risks associated with the deployment of the tree stock are managed.</p>																														
	Replanting is permitted in all circumstance where that replanting is required by harvesting consent conditions																																		
	<i>Replanting using genetically modified tree stock is permitted where the tree stock has gained the appropriate approval for deployment from the Environmental Protection Authority (EPA), and being subject to conditions imposed by the EPA</i>																																		
Controlled	Replanting is Controlled in all zones where permitted conditions are not met.				<p>The matters which a council's control is limited to reflect the specific risks of replanting and subsequent forest management activities, specifically the effects on surface water bodies or indigenous vegetation, from the re-establishment of plantation forest cover.</p>																														
Regional District and	Replanting is a Controlled activity in all zones where permitted activity conditions are not met.																																		
	If a consent is applied for the Council must grant the consent and can only impose consent conditions relating to the matters listed below; <ul style="list-style-type: none">Aquatic and terrestrial biodiversity effects,Species and location of <i>replanting</i>,Potential effects of future harvesting and associated earthworks, <u>soil erosion</u> activities on the adjacent or significant indigenous vegetation.<u>Riparian zones and</u><u>Surface water bodies</u> The consent shall only apply to the area that could not be planted as a permitted activity.																																		
Restricted Discretionary																																			

⁶ “Regional” denotes that this condition relates to the functions of regional councils under section 30 of the Resource Management Act and therefore monitoring and enforcement is the responsibility of the relevant regional council.

Discretionary		

Activity Status Cascade – Standard Terms and Conditions: All Activities

Objective: To introduce a set of controls in line with good forest management that apply across various plantation forestry activities. These apply in addition to specific activity controls .

Scope: All eight forestry activities.

Risks: the key risks that the generic conditions seek are manage are;

- Damage to archaeological sites
- Fuel entering surface water bodies
- Damage to indigenous vegetation outside of the productive area
- Effects on neighbouring landowners from dust or noise

Activity Status	ESC zones	General Guidance
Permitted	Green Zone	Notwithstanding specific activity rules all Forestry activities are permitted provided the Archaeological and Fuel conditions are met.
	Yellow Zone	
	Orange Zone	
	Red Zone	
Controlled	Green Zone	Notwithstanding specific activity rules all forestry activities are controlled if all permitted activity conditions are met except for those relating to nuisance dust, noise or nesting times.
	Yellow Zone	
	Orange Zone	
	Red Zone	
Restricted Discretionary		
Discretionary	Green Zone	All activities are discretionary where permitted activity conditions relating to archaeological sites or indigenous vegetation are not met.
	Yellow Zone	
	Orange Zone	
	Red Zone	

Conditions/Standards

	Conditions	Guidance/Compliance
Permitted	All Forestry activities are permitted (except where specific activity rules are more stringent) provided the Permitted Activity conditions are met.	
	Archaeological Known archaeological sites During <i>Afforestation, Replanting, Mechanical Land Preparation, Harvesting, Earthworks</i> and <i>Quarrying</i> activities the modification, damaging or destruction of an archaeological site, as defined by the Heritage New Zealand Pouhere Taonga Act 2014, may only occur if it is carried out on the authority of and in accordance with the Heritage New Zealand Pouhere Taonga Act 2014. Unrecorded archaeological sites The following procedures apply to any archaeological site exposed or identified before or during plantation forestry activities: <ul style="list-style-type: none">• All site works in the immediate vicinity of the discovery which will destroy, damage or modify the site shall cease immediately.• The area is secured to prevent further disturbance until relevant Heritage New Zealand Pouhere Taonga authorisation has been obtained.• Works are carried out in accordance with the authorisation.	NB: Not all recorded sites are in District Plans – NZ Archaeological Association data is more up to date and can be found at www.archsite.org.nz .
	Fuel During any plantation forestry activity there shall be no refuelling of machinery within surface water bodies or storing of fuel or refuelling where it might enter a surface water body.	
	Vegetation Clearance and Disturbance Indigenous vegetation may be damaged, destroyed or removed provided that it; <ul style="list-style-type: none">• has grown up under (or may have overtopped) managed forest species; or• is within an area of failed planting (within the last rotation); or	

	<ul style="list-style-type: none">• is within an area of regenerating cutover [within 5 years of the harvest of the previous crop]; or• is vegetation overgrowing a pre-existing access way, including an existing track or access way within an SNA (or similar); or• is incidental damage to riparian vegetation that will readily recover within 5 years; <u>or</u>• is incidental damage to indigenous vegetation this is adjacent to plantation forest, including indigenous vegetation at the edge of an SNA (or similar) or along an existing track that will readily recover within 5 years <div>WRC Comment</div> <div>Bullet point 6 is open to interpretation and therefore not measurable and it should be deleted.</div>	<div>Advice Note: “SNA (or similar”): refers to an area identified in a Regional Policy Statement, Regional Plan or District Plan pursuant to section 6(c) of the RMA.</div> <div>Readily recover refers to the recovery of the vegetation within the area.</div>								
	<div>Dust</div> <div>Discharge of dust to air from activities undertaken on the site is a permitted activity provided any nuisance dust is contained within the boundaries of the property or properties under the same ownership or under the same management.</div> <div>Noise</div> <div>The noise from forestry activities at the notional boundary of the nearest dwelling, where the dwelling is under different ownership except where approval from the adjoining owner has been obtained, does not exceed:<ul style="list-style-type: none">• 95dBA (L10) between the hours of 6am – 6pm; and• 75dBA (L10) between the hours of 6pm and 6am,<div>Note: notional boundary means, the legal boundary of the property on which any rural dwelling is located or a line 20m from the dwelling whichever point is closer to the dwelling.</div><div>Nesting Times</div><div>Where indigenous bird species with a classification of Nationally Critical or Nationally Endangered (Department of Conservation - Conservation <i>Status of New Zealand Birds</i>, 2012) are known to nest in areas where forestry operations are planned or underway, forest owners must have procedures in place to:<ul style="list-style-type: none">• Identify nest sites and the nesting season, and• Protect these sites from disturbance or undertake the activity outside of the nesting season.<div>Spatial Bundling</div><div>For the purpose of determining the activity status of a proposed activity in circumstances where an activity crosses multiple ESC zones, any overlap into a higher ESC zone must be disregarded provided that:<ul style="list-style-type: none">• The combined length of all section of road within the highest ESC zone is equal to or less than 150m (for earthworks)• the total area of the overlap is equal to or less than the smaller of: (all other activities)<ul style="list-style-type: none">○ 5 ha; <i>or</i>○ 15% of the total activity area.</div></div></div>	<div>Advice Note: This limit has been set in accordance with NZS6803:1999 Acoustics – Construction Noise</div> <div>Advice Note: s330 of the RMA allows for emergency works to be undertaken.</div> <div>Where practicable occupants of any dwelling within a 1km radius of the site of emergency work should be notified if this work is likely to breach the limit.</div>								
	<div>Fish Spawning</div> <div>A.) the bed of a permanently flowing river can be disturbed provided all other activity specific rules or consent conditions have been met, except where:<ul style="list-style-type: none">i. The New Zealand Freshwater Fish Database indicates that one of the following species is present within 1km of the reach of the stream where the disturbance is made; <i>or</i>ii. Where a catch has not been recorded in the New Zealand Freshwater fish Database, the probability of one of the above species being present is greater than 0.5 under the River Environment Classification Predictive Fish Model 2014; <i>and</i>iii. the disturbance occurs during the corresponding peak fish spawning period<table><tr><th>Species</th><th>Period</th></tr><tr><td>Redfin Bully</td><td>1 September to 31 October</td></tr><tr><td>Canterbury Galaxias</td><td>1 September to 31 October</td></tr><tr><td>Dwarf Galaxias</td><td>1 September to 31 October</td></tr></table></div>	Species	Period	Redfin Bully	1 September to 31 October	Canterbury Galaxias	1 September to 31 October	Dwarf Galaxias	1 September to 31 October	<div>The fish species listed have a Conservation Status of ‘At Risk’ or ‘Threatened’ as defined in “Conservation status of New Zealand freshwater fish, 2013” or are a salmonid sports fish, and a high sensitivity to Turbidity (Recruitment and Migration)</div>
Species	Period									
Redfin Bully	1 September to 31 October									
Canterbury Galaxias	1 September to 31 October									
Dwarf Galaxias	1 September to 31 October									

	Alpine Galaxias	1 September to 31 October	and Sediment (Spawning) as identified in Fish Spawning and Migration Report, NIWA 2014. Advice Note: Guidance should be produced for reducing impact of forestry for other species found in forest streams.		
	Lowland Longjaw Galaxias	1 September to 31 October			
	Dusky Galaxias	1 September to 31 October			
	Eldon’s Galaxias	1 September to 31 October			
	Roundhead Galaxias	1 September to 31 October			
	Bignose Galaxias	1 September to 31 October			
	Taieri Flathead Galaxias	1 September to 31 October			
	Gollum Galaxias	1 September to 31 October			
	Upland Longjaw Galaxias	1 September to 31 October			
	Koaro	1 April to 31 May			
	Giant Kokopu	1 May to 30 June			
	Stokell’s Smelt	1 December to 31 January			
	Atlantic Salmon	1 May to 30 June			
	Brook Char	1 May to 30 June			
	Brown Trout	1 May to 30 June			
	Chinook Salmon	1 April to 31 May			
	Rainbow Trout	1 April to 31 May			
	Sockeye Salmon	1 March to 31 March			
	B) For the purposes of this rule the following activities are not considered to be bed_disturbance <u>(Providing there is no concentration of suspended solids of more than 80 grams per cubic metre above background levels measured immediately upstream of the point of discharge and at a distance not greater than 100m downstream of the source of the discharge or the activity must comply with the discharge standards in the relevant Regional Council plan):</u> i. Fording by vehicles across the wetted river bed where the number of axle movements is less than 20 per day; and ii. Partially ¹ suspended logs are hauled across the bed of a river less than 3m wide C) Where a freshwater fish survey has been undertaken by a suitably qualified person within the last 12 months at the site and the species has not been found, (A)(iii) does not apply.			20 axle movements will allow 1 truck trailer unit and 1 light vehicle to make a return journey across the ford. 	

Activity Status Cascade –River Crossings

Objective: To introduce a consistent set of forestry river crossing controls that manage the risks identified below, in a manner that is in line with best practice.

Scope: River crossing involves the installation, construction, placement, use, maintenance, alteration, extension or removal of crossings defined as permanent or temporary structures in, on, under or over the bed of a river, lake, or wetland, and associated bed disturbance.

Risks: The predominant risks associated with the installation and use of river crossings are:

- sedimentation of the water column and bed of the river;
- disruption of fish passage;
- disturbance of fish spawning habitat;
- the activation or acceleration of bed erosion by concentrating flows or velocities
- damage to the river bed and downstream infrastructure
- Human safety.

General Conditions	Intent/Rationale, Advice and Guidance
<p>River crossings are permitted provided:</p> <ul style="list-style-type: none">• all the applicable general conditions are met; and• permitted conditions specific to the type of crossing (temporary crossings, culverts, single-span bridges, drift-decks and fords) are also met. <p>Any crossing existing as at [the date the proposed NES-PF comes into force] that was lawfully established, including under a rule</p> <ul style="list-style-type: none">• in a plan or by a resource consent, and that meets the following permitted activity rules is permitted:• effects on other structures and users (permitted activity conditions 2, 3 and 4 below);• fish passage;• erosion and sediment discharge from use;• maintenance;• single culverts – specific conditions relating to single culverts (permitted activity condition 7 below);• battery culverts – specific conditions relating to battery culverts (permitted activity condition 4 below).	<p>General conditions apply to all structures. These conditions must all be met for any crossing to be a permitted activity. Some general conditions continue to apply to controlled and restricted discretionary activities. Where this is the case, the controlled and restricted discretionary conditions will state which general conditions continue to apply.</p>
Permitted	
General Crossings Conditions	
<p>Notice of commencement</p> <p>The relevant regional council must be notified not less than at least 20 and no more than 60 more working days prior to commencing the construction, placement or removal of any class of river crossing in an ephemeral or perennial stream watercourse (except for a temporary crossing).</p> <p>The Council may waive, in writing, the requirement for notification for certain types of stream crossings, or the time restrictions for notification, upon request of the Forest Manager.</p> <p>WRC Comment</p> <ul style="list-style-type: none">• Include in the Glossary a description of a ‘temporary crossing.’ A suitable definition could be “Any structure is in place two weeks or less” <p>Flow Calculations</p> <p>To calculate the necessary culvert size one or more of the following methods must be used to calculate estimated flood flows;</p> <ol style="list-style-type: none">1. The Rational Method2. TM61	<p>This rule seeks to ensure that relevant councils are notified in a timely manner of river-crossing operations starting, so that they are aware of operations occurring and can schedule monitoring programmes if necessary.</p> <p>This condition seeks to ensure that all culverts that are installed are large enough for flood waters to pass through the culvert without damage to the crossing structure. Advice note: An online tool will be provided to assist foresters to</p>

<div>3. Pearson’s (1989) Regional Method⁷;</div> <div>4. An alternative method approved by the relevant regional council</div> <div>Records of the calculations must be available to the relevant council at the time of_ the ”Notice of Commencement”</div>	<div>undertake these calculations.</div>
<div>Effects on other structures and users</div> <div>1. The crossing does not alter the natural alignment of the river.</div> <div>2. The crossing does not compromise the structural integrity or use of any other authorised structure or activity in the bed of the river or lake.</div> <div>3. The crossing is constructed to ensure that the structure or any part cannot break free and cause a blockage or erosion.</div> <div>4. The crossing does not dam or divert water to <u>or</u> cause flooding or ponding on any property owned or occupied by another person.</div> <div>5. <u>The structure shall not directly or indirectly cause erosion of a river bed</u></div>	<div>This condition will apply to all structures. It seeks to ensure that the activity does not result in environmental damage, such as erosion, damage to other infrastructure or damage to property</div>
<div>Fish passage</div> <div>Except for any temporary crossing the</div> <div><u>Unrestricted fish passage shall be provided at all times</u></div> <div>1. crossing provides for the up and downstream passage of fish in perennially flowing rivers, except where the relevant statutory fisheries manager advises the council otherwise</div>	<div>This condition seeks to ensure that migration of freshwater fish species is not disrupted except where the fisheries manager stipulates that barriers should remain in place to protect sensitive freshwater ecosystems from predatory fish.</div>
<div>Contaminant discharges from the construction or removal of crossings</div> <div>1. Those constructing or installing the crossing must take all practicable steps to avoid placing <u>No</u> organic matter (other than logs used for temporary crossings) or soil shall be placed into a water body, or placing it <u>placed</u> in a position where it could readily enter or be carried into a water body.</div> <div>2. Those constructing or installing the crossing shall have a <u>site specific Erosion and Sediment Control Plan</u> must take all practicable steps to avoid the discharge of sediment, including by minimising the disturbance of the bed.</div> <div>3. No contaminants, other than sediment, are released to water from the activity.</div> <div>4. Any concrete pouring is to avoid wet concrete or concrete ingredients coming into contact with flowing or standing water.</div> <div>5. Sediment resulting from the construction, or installation or removal of the crossing is not discharged for more than at a concentration of more than 20% above the background level measured upstream of the discharge point and at a distance not greater than 100m downstream of the source of the discharge. <u>8 consecutive hours per structure</u> into any river, lake or wetland</div> <div>6. Except where it is necessary for machinery to cross a river bed, all machinery is kept out of flowing or standing water.</div> <div>7. Following the completion of construction or installation, all excess construction materials and equipment are removed from the bed of the water body <u>and flood plain</u> within 5 working days. <u>24 hours.</u></div>	<div>This condition seeks to minimise the effects of the construction or maintenance of river crossings on the environment, including:</div> <div><ul style="list-style-type: none">avoiding the sedimentation of water;ensuring pollutants other than sediment (for example, cement) are not released into water.</div>
<div>Erosion and Sediment discharge from use</div> <div>1. The on-going presence of the crossing for its normal operating use does not cause or induce scour erosion of the bed or erosion or instability of the banks of the surface water body and associated sedimentation.</div> <div>2. Approaches to and abutments of river crossings are stabilised to prevent scour and sedimentation.</div> <div>3. <u>There is no erosion of the river bed or channel as a result of the structure or vehicle passage.</u></div>	<div>This condition seeks to minimise the ongoing discharge of sediment resulting from the ongoing use of the structure, including any erosion to the river bed as a result of water being redirected by the structure.</div>
<div>Maintenance</div> <div><u>Fish passage shall be maintained at and through in stream structures.</u></div>	<div>This condition seeks to ensure that the crossing is maintained to ensure that the ongoing impact of the structure on water and the bed of the river is minimised</div>

⁷ Updates to this method can be found at Estimation of Mean Annual Flood in New Zealand”, G.A.Griffiths and A.I.McKerchar, Jnl of Hydrology NZ Vol 51 Number 2, 2012

<p>Except for any temporary crossing, the crossing is maintained to avoid aggradation or erosion of the bed of the water body.</p> <p>1. Except for any temporary crossing, the crossing is maintained to meet its design specifications for flow and fish passage.</p> <p>Placement</p> <p>1. Except for any temporary crossing, no crossing is installed or constructed in a wetland >2500m²; or < 500m upstream of a dwelling that is within 15m of a river bed >3 metres wide.</p>	<p>This condition seeks to ensure that permanent crossings are not installed:</p> <ul style="list-style-type: none"> on large wetlands, so seeks to protect the significant values of these wetlands; close to existing dwellings where their presence may result in damage to the dwelling during flood events.
<p>Crossing Specific Conditions (<u>Exclude crossings in wetlands</u>)</p> <p>Temporary crossings – specific conditions relating to temporary crossings</p> <p>1. Except as specified in Bridges - condition 3:</p> <ol style="list-style-type: none"> Any structure is in place two weeks or less. No excavation of the river banks or bed, unless a culvert is being used. Where logs are placed in the bed of a flowing water body, a 300 mm or larger culvert is first placed in the bed All crossing materials must be removed from the river bed within 24 hours of the completion of the operation for which the crossing was constructed or installed. <u>All disturbed sites shall be rehabilitated to prevent erosion of exposed soil and sediment export to the receiving water body.</u> 	<p>The following sections set specific design requirements for each type of crossing to ensure the design of the crossing does not result in:</p> <ul style="list-style-type: none"> damage to the environment as a result of sedimentation or bank erosion; damage to downstream infrastructure; damning of the crossing resulting in flooding or structural failure; disruption of fish passage; disruption to the navigability of rivers.
<p>Single Culverts – specific conditions relating to single culverts</p> <ol style="list-style-type: none"> There is only one culvert per crossing, of the appropriate length The culvers must pass a 5% AEP flood event of no greater than 5.5m³/s, with no heading up The minimum culvert diameter is 450mm The total height of the crossing crest is no more than 3.5 metres above the bed (measured from the inlet) and the fill depth and construction complies with the manufacturer's minimum height specifications <u>whichever is the less.</u> The culvert invert is at least 100mm below the level of the bed of a river or lake. For rivers where the bank full bed width is more than three metres, the river bed invert gradient is no greater than 6%, measured 50 metres either side of the crossing. The culvert inlet (entry point) and outlet (exit point) are protected against erosion. Culvert approaches and fill are built from soils free of organic matter. The fill is constructed using successively compacted layers each up to 200 mm loose depth and compacted. <u>Headwalls shall be constructed and maintained of permanent and erosion resistant materials.</u> <u>No flood water flow off over the crest of the structure is permitted.</u> 	<p>WRC Comment</p> <ul style="list-style-type: none"> Exclude the use of logs being placed in perennial watercourse due to the restriction on water flow, a barrier to fish migration, and they can result in flooding and a loss in water quality. Similarly, log crossings should also be excluded from ephemeral watercourses due to the risk of damming and flooding.
<p><u>WRC Comment</u></p> <p>Culvert is not an appropriate description for a structure in a lake.</p>	
<p>Battery culverts - specific conditions relating to battery culverts</p> <ol style="list-style-type: none"> The contributing catchment is less than 500 hectares; The diameter of each culvert diameter is between 450 mm and 800mm The invert of at least one culvert pipe is at least 100mm below the level of the bed of a river or lake to carry base flow. The culvert pipe inlets (entry point) and outlets (exit point) are protected against erosion. 	

<div>5. For rivers where the bank full bed width is more than three metres the river bed invert gradient, measured 50 metres either side of the crossing, is no greater than 6%.</div> <div>6. The culvert is sized to pass annual average flow. It must be constructed to allow greater flows to pass over it without structural failure</div> <div>7. <u>Fish passage shall be maintained at and through in stream structures.</u></div>	
<div>Drift-Deck - specific conditions relating to drift-decks</div> <div>1. The contributing catchment is less than 500 hectares;</div> <div>2. The inlets and outlets are protected against erosion, with designed protection works</div> <div>3. For rivers the bank full bed width is more than three metres and where the bed invert gradient, measured 50 metres either side of the crossing, is greater than 6%, two discrete footings are used to embed the drift deck in the substrate in order to maintain the natural bed material under the structure.</div>	
<div>Ford - specific conditions relating to fording of streams</div> <div>1. No ford is located in any river listed as a habitat for threatened indigenous <u>frogs</u>, fish or as an indigenous or sports fish spawning area in any relevant regional plan or Water Conservation Order</div> <div>2. Storm water and truck wash from any road surface is intercepted, diverted, and passed through a sediment treatment structure as close as practicable to but no closer than 5 metres to the river and is positioned above the annual flood flow level.</div> <div>3. Use of the ford does not cause conspicuous change in the visual clarity of the water beyond 100m downstream of the ford for greater than 1 consecutive hour after use of the crossing [guidance re 20 axels a day]. <u>result in a concentration of suspended solids of more than 20% above background level measured upstream of the point of discharge and at a distance not greater than 100m downstream of the source of the discharge.</u></div>	
<div>Specific conditions relating single-span bridges</div> <div>1. Bridges (except temporary bridges) are constructed to allow the flood flow from a 2% AEP (1 in 50 year) event to pass under with a clearance of at least 700mm above the design flood level.</div> <div>2. Temporary bridges are:<div>a. constructed to allow the flood flow from a 5% AEP (1 in 20 year) event and to enable the passage of bed material.</div><div>b. removed within 2 years of construction.</div></div> <div>3. Bridges are located so as to not decrease the natural active (bank-full) flow bed width by more than 10%;</div> <div>4. The bridge abutments or foundations are constructed parallel to the channel alignment.</div> <div>5. The crossing must maintain the ability for vessels to navigate a river.</div>	

Controlled	
<p>The installation, construction, placement, use, maintenance, alteration, removal or extension of a crossing in, on, under or over the bed of a river, lake, or wetland, and associated bed disturbance or contaminant discharge is a controlled activity.</p> <p>The activity is a controlled activity if it cannot meet one or more of the applicable permitted activity conditions, but meets the applicable controlled activity conditions.</p>	<p>Where activities are unable to meet the permitted activity conditions they will require resource consent and will be regarded as controlled activities, provided the conditions in the controlled activity section are met.</p>
Controlled activity conditions	
<p>The activity is as controlled activity, provided the follow conditions are met:</p> <ol style="list-style-type: none">1. The crossing is not a ford;2. The crossing complies with the following permitted general crossings conditions:<ol style="list-style-type: none">a. Notice of commencementb. Effects on other structures and users (permitted activity conditions 2, (permitted activity conditions 2,3, and 4 above)c. Fish passaged. Contaminant discharge from construction and removal activities (permitted activity conditions 2,3, and 4 above)e. Erosion and sediment discharge from usef. Maintenanceg. Placementh. <u>A spillway is provided</u>i. <u>Does not result in a concentration suspended solids of more than 20% above background level measured upstream of the point of discharge and at a distance not greater than 100m downstream of the source of the discharge.</u>	
<p>Culvert specific conditions</p> <ol style="list-style-type: none">1. The culvert must pass a 5% AEP flood event2. The total height of the crossing crest is no more than 4-<u>3.5</u>-metres above the bed measured at the inlet end and the culvert position complies with the manufacturer's minimum height specifications <u>whichever is the less.</u>	<p>Note: Guidance will be provided on calculating annual exceedance probability (AEP). This condition seeks to ensure the culvert is able to pass flood flows without heading up and reduce the risk of sediment and gravel entering water.</p>
<p>Bridge specific conditions</p> <ol style="list-style-type: none">1. The bridge crosses a river with a contributing catchment of < 5,000 hectares.	
<p>Matters over which control is reserved</p> <p>For culverts, control is reserved over:</p> <ol style="list-style-type: none">1. The timing of any disturbance of the bed of a surface water body in relation to adverse effects on aquatic ecosystems, including fisheries and indigenous biodiversity2. Measures to avoid, remedy or mitigate the adverse effects of the structure on:<ol style="list-style-type: none">a. Property owned or occupied by another person, including flooding or pondingb. Provision for natural water flow and flood flows3. Measures to minimise the duration and extent of bed disturbance4. Measures to avoid or mitigate the risk of soil or debris being deposited or carried into the surface water body5. Engineering design related to:<ol style="list-style-type: none">a. design flow of catchment above the culvert,b. culvert size, location,c. number of culverts in the cross-sectional area of the riverd. passage of debris and bed sediment in flood events exceeding the culvert design (<i>bypass/ overtop design</i>)e. structural stability of the culvert embankment.6. Measures to account for any adverse effects of the culvert arising from:<ol style="list-style-type: none">a. prevailing bed gradient and flow powerb. fill height above the culvert <i>for dam failure assessment</i>c. velocity of water from the culvert	<p>These matters are considered sufficiently broad to reflect the full range of potential impacts</p>

<div>d. design flood levels</div> <div>e. soil type and geology</div> <div>7. Construction standards (headwall, apron)</div> <div>8. Requirements for on-going monitoring and maintenance of the culvert</div> <div>9. <u>Stream bed erosion</u></div> <div>10. <u>Fish passage and</u></div> <div>11. <u>Fish spawning timeframes</u></div>	
<div>For single span bridges, control is reserved over:</div> <div>1. The timing of any disturbance of the bed of a surface water body in relation to adverse effects on aquatic ecosystems, including indigenous biodiversity</div> <div>2. Measures to account for:<div>a. prevailing slope stability [including local <i>stability of approaches and abutments</i>]</div><div>b. Soffit height above the watercourse</div><div>c. Design flood levels</div><div>d. Location, so as to not decrease the natural active (bank-full) bed width by more than 10%;</div><div>e. soil type and geology</div></div> <div>3. Erosion protection works</div> <div>4. Location of the bridge</div> <div>5. Requirements for on-going monitoring and maintenance of the bridge, including removal of structure if damaged or it becomes redundant</div> <div>6. Matters affecting navigation in navigable rivers and lakes</div> <div>7. <u>The affects of flood flow management</u></div>	These matters are considered sufficiently broad to reflect the full range of potential impacts
Restricted Discretionary - River crossings are a restricted discretionary activity if they are not provided for as permitted or controlled	
The installation, construction, placement, use, maintenance, alteration, removal or extension of a crossing in, on, under or over the bed of a river, lake or wetland, and associated bed disturbance or contaminant discharge is a restricted discretionary activity if it does not meet any of the applicable permitted or controlled activity conditions but it does meet the restricted discretionary activity conditions.	Where the controlled activity conditions cannot be met, consent is required and the activity will be regarded as a restricted discretionary activity, provided the conditions in this section are met.
<div>The crossing complies with permitted general crossings conditions for:</div> <div>1. Notice of commencement</div> <div>2. Effect on Structures and users (permitted activity conditions 2 and 3 above)</div> <div>3. Contaminant discharge from construction activities (permitted activity conditions 1 and 2 above)</div> <div>4. Erosion and Sediment discharge from <u>construction and</u> use</div> <div>5. Maintenance</div> <div>6. Placement</div> <div>7. <u>Result in a concentration suspended solids of more than 20% above background level measured upstream of the point of discharge and at a distance not greater than 100m downstream of the source of the discharge.</u></div> <div>8. <u>A spillway is provided</u></div>	
<div>Matters over which discretion is restricted</div> <div>Consent may be granted or declined and conditions imposed, only in respect of the following matters to which discretion is restricted:</div> <div>Culverts, drift decks and fords:</div> <div>1. Aspects of engineering relating to characteristics of the site of the crossing, the design, construction or installation of the crossing, to avoid:<div>a. causing flooding or ponding on any property owned or occupied by another person.</div><div>b. altering the natural course of the river.</div><div>c. causing or inducing erosion of the bed or instability of the banks of the surface water body.</div><div>d. instability of the structure and approaches, and obstructions to the passage of debris and bed sediment, in an event</div></div>	Consent may be granted or declined and conditions imposed, in respect of only the following matters to which discretion is restricted. These matters are considered sufficiently broad to reflect the full range of potential impacts.

- exceeding the crossing design, *[bypass/overtop design]*, including:

i. the number and capacity of culverts, where fill height is greater than 2.5 metres,

ii. the design flood level and design of protection works and upstream ramp for **Drift Decks**.

e. compromising the structural integrity or use of any other authorised structure or activity in the bed of the river or lake, including structures and activities downstream of the crossing, that are at risk if the crossing fails, including the composition and strength of the culvert embankment

f. Culverts heading up, in lesser events than 2% AEP

g. affecting navigation in navigable rivers and lakes.
2. Measures to:

a. minimise impacts on water quality, including from the release of sediment from the disturbance of the bed of the river, and avoidance of runoff from pouring of concrete and impediments to bed load sediment transport.

b. avoid or mitigate the deposition of soil or other debris in the surface water body, or where it could readily enter or be carried into a water body.

c. minimise the duration and extent of bed disturbance.

d. avoid, remedy or mitigate the adverse effects of the structure on:

i. Erosion or land instability, including erosion protection works

ii. Natural water flow and flood flows

iii. ~~The permanent passage of fish~~ **Ensure fish passage shall be maintained at and through in stream structures.**

iv. Aquatic ecosystems, including indigenous biodiversity

e. Maintain the structure, including removal of accumulated debris.

3. Monitoring requirements.
- Discretionary** - Crossings are a discretionary activity if they do not comply with any applicable restricted discretionary condition.
- The installation, construction, placement, use, maintenance, alteration, removal or extension of a crossing in, on, under or over the bed of a river, lake or wetland, and associated bed disturbance or contaminant discharge is a discretionary activity, if it does not comply with any applicable permitted, controlled, or restricted discretionary condition. Consent may be granted or declined and conditions imposed.
- Doc # 3476028
- 44

11 August 2015

NES-PF Consultation
Spatial, Forestry and Land Management
Ministry for Primary Industries
PO Box 2526
WELLINGTON 6140

Attn: Stuart Miller

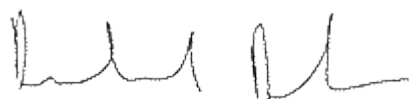
Dear Mr Miller

SUBMISSION ON PROPOSED NATIONAL ENVIRONMENTAL STANDARD FOR PLANTATION FORESTRY

The West Coast Regional Council wishes to thank the Ministries for Primary Industries, and the Environment for the opportunity to make a submission on the Proposed National Environmental Standard for Plantation Forestry (NESPf). Attached is the Council's submission.

As there is no opportunity for Council to attend a hearing in the NESPf process, we would be happy to answer any questions or clarify any matters regarding the points made in our submission.

Yours faithfully

A handwritten signature in black ink, appearing to read 'Michael Meehan', with a stylized, cursive script.

Michael Meehan
Planning and Environment Manager

WEST COAST REGIONAL COUNCIL 'S SUBMISSION ON THE PROPOSED NATIONAL ENVIRONMENTAL STANDARD FOR PLANTATION FORESTRY

General Comments

The West Coast Regional Council (WCRC or the Council) has highlighted their concerns to the Ministries of Primary Industries (MPI) and the Environment (MFE) regarding previous iterations of the Proposed National Environmental Standard for Plantation Forestry (NesPF) over the years it has been developed, through written submissions, and verbally through consultation processes.

The West Coast Regional Council supports in principle the concept of making regulatory frameworks more efficient to reduce delays and costs to resource users, so that their activities can contribute to regional economic growth, while ensuring that acceptable environmental outcomes are also achieved. The Proposed West Coast Regional Policy Statement (March 2015) recognises the importance of resource use activities such as forestry that contribute income and employment to the economic and social wellbeing of West Coast communities. The Objectives and Policies in Chapters 4 and 5 of the Proposed RPS reflect this direction, and will be implemented through regional plans and resource consents. Policy 2 of Chapter 4 seeks that regional and district plans shall only regulate activities "if it is the most effective and efficient way of achieving resource management objective(s), taking into account the costs, benefits and risks;....".

While plantation forestry is the third biggest export industry nationally, and is significant for several regions' economies, this has not been the case for the West Coast over the last 10-15 years. The three main economic drivers on the West Coast have been mineral extraction, dairying, and food and accommodation services associated with tourism¹. The steep topography, high rainfall², and poor soils provide particular challenges for growing plantation forests here. The WCRC welcomes further development in forestry as coal and dairy prices have recently dropped, with potentially significant implications for the region. Many forestry blocks planted in the late 1990's will be ready for harvesting from around 2020, and it is hoped that this will provide additional income and employment for West Coast communities.

The WCRC is not convinced that the Proposed NesPF is the most appropriate tool for managing environmental effects of forestry activities on the West Coast. The main goal of the NesPF is to provide a consistent set of controls in all districts and regions to manage the risk of adverse environment effects in a manner that is in line with good forestry management practice. While a national standard can provide consistent rules, the rules and conditions in this Proposed NesPF are very complex, creating considerable uncertainty about what rules apply, and the environmental outcomes of implementing the NesPF. This will lead to confusion and, where the NesPF is more stringent, the requirement on applicants for additional resource consents for no apparent benefit, adding costs to forestry operators and land owners in our region. Council is also concerned about the costs that ratepayers will bear for monitoring permitted forestry activities under the Proposed NesPF.

This submission discusses the following matters:

1. Assumptions behind the Proposed NES-PF that are outlined in the Consultation Document;
2. Problems with implementing the NES on the West Coast;
3. Complexities with the proposed rules.

The relief sought is stated throughout the submission, and then summarised at the end of the submission.

1. Assumptions behind the Proposed NesPF

The main reason given for promoting the Proposed NesPF is that the regulatory framework for plantation forestry creates a barrier to forestry development. Certainly, resource consents were required in the late 1990's on the West Coast for forestry activities such as V-blading and agrichemical spraying of herbicides and fungicides, due to regional plans being in their early stages of development. However, since then the number of consents granted for forestry activities has reduced considerably, as shown in Table 1 below. This may be due in part to the current stage of the forestry cycle, where forests that were planted in the 1990's are growing with little earthworks or vegetation disturbance needed. It also reflects that Council's RMA plans,

¹ Infometrics, June 2012. "Labour market and economic profile: West Coast".

² The West Coast is the wettest region in New Zealand with rainfall ranging between 2-12 metres per annum.

particularly the Land and Water Plan (L&WP or the Plan), is/are now established with robust rules to manage the relatively small scale (compared to other regions) of forestry undertaken on the West Coast. V-blading, agrichemical spraying, and various scales of earthworks and vegetation on flat and sloping land are now permitted activities with no consent required provided that conditions are complied with.

Table 1: Number of forestry owners on the West Coast from 1994-2015

Period when forestry consents granted	No of forestry owners³
1994-1999	35
2000-2005	21
2006-2010	11
2011-2015	2

The other main reason given for the Proposed NESPF is that “because forest land often crosses multiple regional and district boundaries; as a result, forest owners are required to frequently engage in multiple council processes” (section 2.1.1, Consultation Document). We recognise that this adds time and costs to forestry companies involved in forestry in different regions, however we have had no indication from corporate forestry companies that this is an issue on the West Coast. Based on information in the Council’s consent files for forestry activities, between 11-19%⁴ of forestry owners/operators are companies who operate in other regions as well as on the West Coast. The majority of forestry owners (approximately 70%) are individuals or companies who only operate on the West Coast. These are mostly local people, two thirds of whom have small blocks between 1-40ha, and who only need to deal with one district council, and the Regional Council. The New Zealand Institute of Economic Research (NZIER) identified that the NESPF will mainly be beneficial for corporate forestry owners and operators who deal with forests in more than one region.⁵ For small forest owners only operating on the West Coast, the Proposed NESPF adds further complexity and potential costs.

Another reason put forward for developing the NESPF is that differences between councils’ plan provisions and the ongoing process of reviewing and changing plans over a 25-30 year period costs the forestry industry time and money undertaking advocacy on plan changes. Having an NESPF means that the industry will not need to be as involved in plan advocacy (section 2.1.1, Consultation Document). No submissions or further submissions were received from the forestry sector on the Proposed Regional Land and Water Plan when it was publicly notified in September 2010, and January 2011. The WCRC interprets this to mean that the forestry industry on the West Coast had no concerns with the L&WP provisions. The time and costs of RMA advocacy on plans appears to be a problem in some regions and not others. The WCRC has more knowledge and experience now with managing effects of forestry activities over the last 15-20 years, and there are better industry guidelines available for good forestry practice, so there may not necessarily need to be ongoing changes to regional plan provisions if the current rules are settled and working well, which they appear to be in the L&WP.

The Council questions how the Proposed NESPF will reduce consenting costs for the forestry sector on the West Coast. Under the NESPF rules there may potentially be more consents required for afforestation, replanting, pruning/thinning, and possibly for other forestry activities on steep slopes for erosion management and sediment control. Consent costs are likely to impact smaller forest block owners compared to larger block owners in terms of economies of scale. The WCRC’s fees for processing resource consents have increased since the 1990’s for all types of resource use, not just forestry, to reflect inflation and the increase in GST. This Council’s cost for a gravel extraction consent, for example, has risen from \$364 some years ago to \$520. We understand that this Council’s fees are generally standard compared to other regional councils. Realistically, consent charges may rise again over the next 30 years in line with inflation, and they will always vary depending on the scale of the proposed activity, its effects, and the sensitivity of the receiving environment.

³ The number of forestry owners is based on information from Council’s consent files.

⁴ 11.5% were clearly companies operating in more than one region. For another 18.5% of consent holders, it was unclear whether they operated in another region as well as the West Coast.

⁵ The NZIER Economic Analysis of the Proposed NESPF states (Pg i) that “ The NES will be the most beneficial for those companies with multiple holdings in different regions”.

In our view the results of the latest Cost-Benefit Analysis are not clear. The key findings of the NZIER report (Pg iii) are that *“net benefits marginally outweigh the costs in the central scenario....”*, and *“....the revised CBA shows the outcome of the adjustments to the Proposed NESPF have changed from “(strongly) negative to positive....”*. The NZIER report also includes caveats that: *“There are major differences between councils and foresters with topography and operating rules which makes the development of national cost and benefit averages difficult....”*, and *“....this brings considerable uncertainty about the baseline, likely impacts, and assumptions.”* The WCRC was not one of the councils interviewed by the NZIER, and these statements are of concern to us. We get a sense from the Consultation Document that the outweighing of benefits over costs is given more importance than the fact that the difference is slight. The WCRC considers that the latest CBA results are not compelling enough to confidently proceed with the NESPF.

It appears that the option of working with those councils who have variations between their plan provisions that are a problem for forest owners, has not been considered. The WCRC understands that problems with differences between plan provisions is only an issue for the forestry sector amongst a relatively small number of councils in New Zealand. For the other regions where there are generally no issues with plan provisions for forestry activities, an NES is not necessary. This Council’s understanding of the situation is based on comments made by colleagues at various regional council planning and consent managers’ meetings, where the NESPF has been discussed a number of times over the last eight or more years.

Relief sought:

Withdraw the Proposed NESPF, and use the rules in regions where there are issues with RMA regulatory frameworks for forestry.

2. Problems with Implementing the NESPF on the West Coast

Monitoring NESPF Permitted Activities

The WCRC is strongly opposed to the requirement to monitor compliance with the NESPF permitted rules (section 5.1.1, Consultation Document). The WCRC simply does not have the resources to absorb the costs of undertaking this monitoring, nor should it, and so the costs would have to be passed on to ratepayers. The Council has a small rating base drawn from its low population of 30,000. Only 14% of land on the West Coast is potentially rateable, however, not all of this is productive land. The WCRC’s budgeted expenditure for the 2015/16 year is \$3.55m. Additionally, the DLA Piper legal review⁶ indicates that there is no provision in section 36 of the Resource Management Act 1991 for councils to recover the costs of monitoring permitted activities from resource users. These additional costs are being passed from the forestry owner/operator to ratepayers. This is inconsistent with the users pays principle that councils operate by.

It is unclear precisely how much work will be involved with monitoring NESPF-permitted activities, and what this will cost. As well as checking compliance with individual conditions of rules, regional councils will be required to check that the mandatory Erosion and Sediment Control Plans (ESCP) for earthworks, Harvesting Plans, and Quarry Management Plans meet good practice guidelines and industry standards within 20 working days before operations start, and then monitor compliance with them. The NESPF also permits material amendments to be made to ESCP’s for significant changes such as relocating roads or controls to manage environmental impacts, which need to be documented. This amount of work equates to what the Council would undertake to monitor resource consents. Uncertainty around monitoring unclear permitted conditions could mean it takes longer to determine whether a forestry activity meets a permitted rule. The Proposed NESPF may not be reducing the RMA costs of forestry activities but rather transferring them to ratepayers.

Relief sought:

If the NES is approved:

- Remove the requirement for councils to monitor compliance with the NESPF permitted rules;
- Consideration should be given to allocating controlled activity status to provide a process for approval of management plans that enables local authorities to recover some of the costs associated with the NESPF, reflecting a user pays approach.

⁶ DLA Piper, 2015.” Legal review of the MFE/MPI Consultation Document: A National Environmental Standard for Plantation Forestry.”

Erosion Susceptibility Classification

The four low, medium, high, and very high erosion susceptibility classes for the NESPF rules are similar, but do not exactly correspond to, the three Non-Erosion Prone (less than 12° slope), Erosion Prone 1 (12-25° slope), and Erosion Prone 2 (greater than 25° slope) categories of rules for earthworks and vegetation disturbance in the Council's L&WP. It is unclear how well these two classification systems match, for example, whether earthworks on an 18° slope is in a medium or high erosion-susceptible zone under the NESPF rules. This makes it complicated to compare and assess if the NESPF permitted baselines for forestry earthworks and harvesting on slopes are appropriate in the West Coast conditions.

A good example of the uncertainty with comparing the ESC zones to the L&WP Erosion-Prone areas is with the Greymouth Earthworks Control Area (GECA). This is a steep hilly area behind Greymouth and Paroa that was identified in 1993⁷ as being prone to erosion due to the slope angle, soil stability profile, and past history of slope failure. Houses in Greymouth have historically been built right on the toe of the slopes long before the hazard was officially recognised. The ESC map classifies the GECA as having medium erosion susceptibility, however the permitted NESPF earthworks conditions for medium (yellow zone) erosion susceptible areas are the same as those for low erosion susceptible areas. While the NESPF anticipates that Erosion and Sediment Control Plans will be appropriate for the scale and complexity of forestry-related earthworks, the subjective assessment of what is acceptable as permitted earthworks in the GECA under the NESPF could be open to dispute. The L&WP rules for the GECA appear to be more stringent than the Proposed NESPF, with limits on the area/volume of earthworks that can be done as a permitted activity, to reduce the risk of adverse effects. The Council considers that the Plan rules for earthworks and vegetation disturbance are more straightforward and appropriate for managing the hazard risk on the GECA's steep slopes, especially where iron pans are present under the top soil.

Local Government New Zealand (LGNZ) raises concerns in its submission about the process for correcting errors and updating the ESC tool, and the WCRC endorses these concerns. LGNZ considers that there is a need for:

"...a transparent and formally recognised process for the review and adjustment of land status under the ESC. Ideally, any such process should be clear about:

- *Who can trigger it*
- *The circumstances in which that can occur*
- *How the costs of the process are to be borne, and*
- *Whether any appeal-objection rights are created....*

....the NESPF should (also) clarify the implications for activities that have commenced under previous versions of the risk assessment tools. Given the long-run nature of many forestry operations....this could be a significant source of uncertainty if it is not adequately addressed in the NESPF."

The Council is also concerned that specific hazard areas such as the GECA that are identified in regional plans are not listed as a matter that councils can apply site-specific controls to for forestry activities. The WCRC submitted on this in October 2010 on the first version of the Proposed NESPF. The issue with the GECA is that the soil type is papa, and this is the main source of the erosion risk. If the NESPF is approved, the permitted NESPF rules will override the Plan rules. It is uncertain whether the Erosion and Sediment Control Plans required as part of the NESPF permitted earthworks and harvesting rules will sufficiently address the risks of erosion and sediment discharges in the GECA. Consent was granted by the Council in 2013 to harvest a small, 4ha forestry block at the southern Paroa end of the GECA. Council had no complaints from the applicant about the Plan rules or the consent conditions.

Relief sought:

If the NES is approved:

- Review the Erosion Susceptibility Classification for the Greymouth Earthworks Control Area before the NESPF is approved;

⁷ Metcalf, 1993. "Landslide Investigation and Hazard Zonation in the Greymouth Urban Area".

- Make provision in the NESPF for a transparent and formally recognised process for the review and adjustment of the ESC system, to address the matters listed in relation to this point;
- Add “natural hazard areas identified in regional or district plans” to the matters where councils may apply more stringent rules.

Fish Spawning Indicator

The Council is uncertain about whether the Fish Spawning Indicator timeframes for large Galaxids (whitebait) on the West Coast are accurate. The proposed NESPF rules restrict forestry activities during April/May-June as the spawning period for large Galaxids. These timeframes were identified by NIWA for MPI, however they differ to the peak whitebait spawning period of February-May that the Department of Conservation (DOC) staff on the West Coast have provided to the Council. At a recent hui, Poutini (West Coast) Ngāi Tahu representatives indicated that they are aware of a different timeframe for whitebait spawning. The WCRC is in the process of amending the peak whitebait spawning period in rules in the Council’s L&WP and Draft Coastal Plan, to restrict land and vegetation disturbance activities that may affect spawning sites. Council staff have not viewed the full NIWA report, however, we are confident that the DOC staff and local tangata whenua have a reasonable knowledge of the peak whitebait spawning period from their years of involvement with monitoring spawning sites as part of managing the fishery. Council staff intend discussing whitebait spawning timeframes with DOC and Poutini Ngāi Tahu in the near future to confirm a more accurate timeframe.

The WCRC considers that it is important to clarify the timeframe for large Galaxid spawning prior to finalising the NESPF, if it is to be approved. If the proposed NESPF large Galaxid spawning timeframes are approved but are inaccurate, this means that forestry activities could potentially be undertaken with fewer controls during the peak West Coast spawning season, impacting the rate of successful spawning. Conversely, forestry may be more restricted during months when there is mostly no whitebait spawning occurring on the West Coast, with little environmental gain, and at a cost to foresters who have to limit their activities in riparian areas during this time.

If the NESPF timeframes for restricting forestry work during West Coast whitebait spawning periods are inaccurate, this creates uncertainty as to the environmental outcomes. The SCION Environmental Impact Assessment found that “the proposed NESPF will result in positive environmental benefits compared to the status quo”. This may be the case for other fish species that this submission has not considered. Whitebait spawning sites are listed in the West Coast L&WP because whitebait species are ranked in the DOC Threat Classification System as being in gradual decline. The Whitebait Spawning Indicator and rule needs further confirmation of its accuracy if these provisions of the NESPF are to be implemented effectively on the West Coast.

Additionally, Figure 3.2 in the NIWA report does not list Inanga spawning periods for the West Coast. Staff understand from local whitebait fishermen that Inanga form a large part of an average recreational whitebait catch.

Relief sought:

If the NESPF is approved:

- Prior to finalising the NESPF, consult with the WCRC to confirm if the timeframes for the large Galaxid spawning period on the West Coast need amending;
- Add Inanga as a species present on the West Coast.

Matters where councils may apply more stringent rules

Cultural and heritage values: Table 4 in the Consultation Document lists “Places and areas of known cultural or heritage value” as a matter that councils may apply more stringent rules for. This does not provide for the accidental discovery of human bones, artefacts, pounamu, or other cultural or heritage items of value to tangata whenua. Accidental discovery of cultural items is also not listed as a matter of discretion under the NESPF restricted discretionary rules for land and vegetation disturbance, so such items may be permanently lost or damaged under the NESPF framework. The NESPF should either include provisions to manage accidental discovery of cultural items, or enable councils to manage these potential effects. For discretionary

earthworks or vegetation disturbance consents on the West Coast, a standard condition is attached outlining a procedure to follow if any items of value to iwi are accidentally disturbed or discovered.⁸

Significant biodiversity: The Council supports having greater stringency over forestry activities potentially affecting areas of significant indigenous vegetation and significant habitats of indigenous fauna. The WCRC has been through an eight year Environment Court process to identify, map, and include significant wetlands in the West Coast L&WP. Another two years has been spent correcting errors with the mapped boundaries of some wetlands. The Plan now has comprehensive rules for activities in significant wetlands on the West Coast that are more stringent than the NESPF for crossings in wetlands. If the NES is approved, the Council would support having greater stringency to manage locally specific effects on significant biodiversity, including where these areas are both qualitatively defined as well as mapped in RMA plans.

Infrastructure: Councils should be able to apply local or regionally appropriate rules to manage effects of forestry activities on infrastructure. The West Coast L&WP has a standard condition on permitted earthworks rules on flat land, that the discharge of drainage water “does not increase the flow in the receiving waterbody to the extent that it exceeds the carrying capacity of existing infrastructure”. This is necessary given the high rainfall levels on the West Coast. Collected stormwater runoff discharges into existing council-owned roadside drains can increase the velocity of volumes of water beyond the capacity that drains are calculated to carry, potentially causing scouring of banks, ponding, and flooding of adjoining property. Sediment in stormwater discharges can exacerbate these effects. This may not be an issue in drier regions with less rainfall or waterways, however on the West Coast it is one of the more common water management issues that the Regional and District Councils deal with. It is likely to be an ongoing matter given the climate change predictions for more frequent and intense storm events on the West Coast.

Relief sought:

If the NES is approved:

- Either include a general condition for accidental discovery of cultural items during operations, or enable councils to require accidental discovery protocols to be followed by forestry operators;
- Enable councils to have more stringent provisions for both mapped and qualitatively defined significant biodiversity areas;
- Add regionally significant infrastructure to the matters that councils can apply more stringent rules, and add a definition of regionally significant infrastructure to the Glossary.

Provision of monitoring data to MPI

The WCRC considers that the MPI expectation that councils will collate monitoring data and provide it to MPI (Consultation Document (section 7.3) is unreasonable without any offer of assistance from the Ministry. Collating the data and forwarding it to MPI will be another unrecoverable cost to Council that will have to be passed on to ratepayers, with no benefit to the local populace. The New Zealand Productivity Commission, in its investigation into local government regulation, identified some weaknesses in central government assigning regulatory functions to local government, including a lack of rigorous analysis by central government of the fiscal and political impacts of national regulation on local government.⁹ This has been termed as local government becoming the ‘operational arm’ of central government. It concerns us that the cost of providing monitoring information to MPI is to be borne by ratepayers, however there is no indication that MPI will provide any financial or resourcing assistance for this. Additional costs for national reporting are a government cost, not a ratepayer cost.

Relief sought:

If the NES is approved, provide written confirmation that MPI will provide assistance to councils to cover the cost and/or resourcing to provide the Ministry with the monitoring data sought.

Timeframe for implementation

The Consultation Document (section 7.3) indicates that the NESPF would come into force (if it proceeds) 6-12 months after it is gazetted, approximately late 2016. The WCRC is unsure if this is enough time to adjust its existing

⁸ The Accidental Discovery Protocol is based on the Pounamu Accidental Discovery Protocol in Te Rūnanga o Ngāi Tahu’s “Pounamu Resource Management Plan”, October 2000.

⁹ NZ Productivity Commission, May 2013. “Towards better local regulation”, Pgs 67-69.

planning instruments and processes. It will partly depend on staffing resources, and how much the proposed rules and conditions are amended to be made more certain and viable. If the NESPF is approved with little change, the Ministries should consider extending the timeframe for implementation, as it will take this Council considerable time to work through the details of which NESPF and Plan rules have effect, how the NESPF provisions will impact other parts of regional plans, and how it will affect consent and compliance processes.

Relief sought:

Extend the timeframe for implementation to enable councils to work through the details of which NES and Plan rules have effect, how the NESPF provisions will impact other parts of regional plans, and how it will affect consent and compliance processes.

3. Complexities with the NESPF rules

The Proposed NESPF rules are complex in a number of ways that will make implementation problematic.

Objectives in Rules section

The Rules section has objectives for each of the eight forestry activity categories that are considered inappropriate in this part of the Proposed NESPF. These objectives appear to be worded as objectives for MPI to achieve, and they are virtually the same for each activity category, however, it is not clear what their legal status is in relation to council plan objectives. In our view they are unnecessary and confusing in the Rules section, since it is local authorities who must implement the rules, not MPI. The objectives should be removed as the Consultation Document already has objectives in section 2.3.

Consent requirements under NESPF and Plan rules

It is difficult to identify whether some of the NESPF rules are more stringent or lenient than the WCRC's regional plan rules. The eight types of forestry activities that the NESPF rules are structured around differs to the Council's Plan rules, which are structured around the RMA sections 9, and 13-15. This is further complicated by the fact that some of the NESPF conditions are general and not as specific as some of the conditions on Council's plan rules, especially for managing slope erosion and stability, and sediment discharges to land and water. These differences have made it difficult to accurately compare the rules within the submission timeframe for this proposed NESPF.

Appendix 1 of this submission gives an initial comparison between the NESPF rules and the Plan rules, to identify which of the Plan and NESPF rules will apply if the NESPF is approved, and where extra resource consents may be required under the proposed NESPF rules. This assessment shows that the following Proposed NESPF permitted rules may possibly be more restrictive for forestry activities on the West Coast than the L&WP rules, potentially requiring more resource consents if the permitted NESPF conditions are not complied with:

Afforestation and replanting: Under the NESPF forestry operators will require a consent if they want to plant closer than 10m to a river more than 3m wide. There are a lot of streams on the West Coast that are wider than three metres. Under the L&WP, operators can plant up to 5m from a stream wider than three metres without needing consent.

River crossings: The NESPF rule has more conditions for different types of crossings, compared to the permitted Plan rule for small-scale culverts, fords, and bridges. This could mean that more consents are needed if crossings do not comply with the permitted NESPF rules.

Harvesting: The NESPF rule appears to be more stringent for harvesting of small blocks on flat land, with requirements for a Harvesting Plan and management of erosion and sediment effects even though the risk of erosion, slope instability, and sediment movement is lower. Although the Harvest Plan must "match the scale and complexity of the operation", it must cover the same matters for harvesting on flat land as for harvesting on slopes with high erosion susceptibility, and will still be a cost to small block owners who may need to pay a contractor to prepare the plan. The permitted earthworks and vegetation disturbance rules on non-erosion prone land (less than 12° slope) and in riparian margins in the L&WP would apply to harvesting, and may not need consent if all conditions are complied with.

Dust: The NESPF rule for dust appears to apply to dust from trucks on roads. The West Coast Regional Air Quality Plan has no rules to manage dust from road use, on the basis that the West Coast's wetter climate means this is not a significant resource management issue. Any complaints about dust from forestry traffic would be dealt with on a case by case basis under the RMA section 17 duty to avoid, remedy, or mitigate adverse effects.

On the other hand, some of the NESPF rules appear to be potentially more lenient than the L&WP rules:

Mechanical land preparation (MLP): The NESPF has a permitted rule with five conditions. The L&WP does not have rules for the MLP activities listed in the NESPF, so they are permitted with no conditions under section 9 of the RMA. Staff understand that some of the MLP activities are less suitable on West Coast soils, for example, ripping, as this cannot break up an iron pan in the sub-soil, and is not favoured on wet ground or steep slopes. V-blading is a forestry preparation practice commonly used on the West Coast. The L&WP permits V-blading subject to conditions, while the NESPF classes this as earthworks.

Earthworks: The NESPF has no volume limit for earthworks on sloping land in moderate or high erosion susceptible zones. A volume limit is not a matter of discretion in the restricted discretion rule for earthworks in the high erosion zone on slopes over 25°, or in the very high erosion zone. The L&WP has volume limits of 500m³ on slopes between 12-25°; and 10m³ on slopes over 25°. Volume limits are considered appropriate as many areas on the West Coast are hilly and, combined with the rainfall, the risk of erosion and sediment movement is higher. These limits are also based on the fact that the larger the area is to be disturbed, the greater the risk of erosion and instability. It is unclear whether Sediment and Erosion Control Plans required by the NESPF permitted rule will adequately address these risks, as discussed further on in this submission.

Land-based quarrying: There is no upper volume limit, and no volume limit in relation to slope angle, only on certain types of very high erosion-susceptible land. It is uncertain whether any limits would be placed on volume in relation to slope angle in the Quarry Management Plan. The earthworks rules in the L&WP would apply for land-based quarrying, and these are discussed above.

On the West Coast, gravel is often extracted from river and creek beds for road formation and maintenance. Where this occurs it is appropriate that the Council's Plan rules apply. Volume limits are set on certain rivers based on the amount of gravel available, to avoid adversely affecting the hydrology and aquatic values. Gravel is permitted to be taken without consent within these volume limits, and subject to other conditions.

Pruning and thinning to waste: The NESPF permits pruning and thinning provided there is no deposition of slash into a water body. This appears to prompt a requirement for consent for non-compliance that is similar to the Council's Plan, which requires a consent for depositing slash into waterways as a discharge of a contaminant, although the controlled default status of the NESPF is more lenient than the Plan's discretionary rule status.

The NESPF slash condition for pruning and thinning is a harder test than the slash condition for harvesting, which does not require no deposition of slash into water bodies but only the removal of it. The slash condition for harvesting, and the general condition permitting slash traps, implies that it is acceptable to have slash in water bodies, but there is no clear, proportional baseline limit on the amount of slash that can be in water bodies. This seems to remove any incentive to avoid slash entering water bodies.

Harvesting: In medium and high erosion susceptible zones harvesting is a permitted activity under the NESPF, however under the L&WP rules harvesting may require a resource consent for more than 20m² of vegetation disturbed on a slope greater than 12°. The NESPF conditions require a Harvesting Plan, an Erosion and Sediment Control Plan, and management of riparian disturbance, slash, and debris. These requirements may equate to what would be required by the Council in a resource consent for harvesting on steep slopes, raising the question of whether meeting the NESPF permitted rule requirements will actually cost less than council consents. We think possibly not.

Replanting: Under the NESPF the default for non-compliance with the permitted rule is a controlled rule, compared to restricted discretionary in the Plan if the setback distance from streams wider than three metres is not complied with.

There is obviously a considerable level of uncertainty about what the impact will be of implementing the Proposed NESPF rules if they are approved. We oppose in principle a national standard that requires consents for forestry-related activities where there are existing and robust plan rules to manage effects, and where consent is not needed for some activities. This is not reducing “unnecessary bureaucracy” for the forestry sector, particularly for smaller operators, but creating more complexities and barriers. The West Coast L&WP has been through the RMA First Schedule process and is considered to be efficient and effective. Council has received relatively few complaints about forestry activities, 13 in total in the last 12 years, mostly regarding sediment and slash in waterways, and the use of odourous fertiliser. The last complaint was received in 2013. Recent feedback received from a large forestry operator was that they are satisfied with the WCRC’s level of regulation of forestry operations under the L&WP.

Much of the uncertainty for this Council lies with the use of management plans to manage adverse effects of permitted activities. There is no requirement for local authority approval or certification of Harvesting Plans, Erosion and Sediment Control Plans, or Quarry Management Plans. As conditions on permitted activities, the requirement for these plans creates considerable uncertainty about what is an acceptable plan that will ensure that adverse effects are no more than minor, which is the test for a permitted activity, and especially in moderate or high erosion-susceptible areas. Management plans may vary substantially across the country in order to be relevant to a wide range of topography and climatic conditions, and scale of activities. When checking management plans, Council staff may have to revert to using the permitted conditions in the L&WP or conditions on consents that are known to reflect an appropriate level of activity or effect, so there will be little benefit gained from having to implement the NESPF requirements. There is a risk that the management plans will not reflect a permitted level of activity, or they may broaden the permitted baseline in the Council’s permitted L&WP rules, possibly encouraging a “minimum necessary to achieve compliance”¹⁰ approach.

The general nature of the requirements for the management plans gives less certainty to forestry operators than this Council’s L&WP rules. As an example, the L&WP has conditions on permitted earthworks rules requiring a visual clarity limit in waterbodies measured by black disc for sediment entering water, drainage controls for formed surfaces, culverts, batters, and trenches, and no effects on surface water takes. These are specific, practical limits to protect water quality and quantity, however, these limits may not be reflected in the Sediment and Erosion Control Plans required under the NESPF earthworks and harvesting rules. Management plans are usually a tool that can be required as a condition of a resource consent, where there is uncertainty about the scale of adverse effects, and suitable remediation or mitigation. The appropriateness of requiring management plans as a condition of a permitted rule is questionable.

If the Proposed NESPF is approved and some of the rules result in being more lenient for forestry-related activities than the Plan rules, this may create potential inequities between the forestry sector and other resource users. As an example, earthworks and vegetation disturbance for farming and mining will still come under the L&WP rules, and if these are more stringent and require consents where forestry does not need consents, this is unfair and will generate a lot of confusion, dissatisfaction and anger. It also creates a lot of uncertainty regarding environmental outcomes, and goes against the principle of the regional plan rules reflecting the specific physical and environmental attributes of the Region, and the aspirations of the West Coast community.

Relief sought:

Withdraw the Proposed NESPF, and use the rules in regions where there are issues with RMA regulatory frameworks for forestry.

If the NESPF is approved, remove the objectives that are in the Rules section.

Specific problems with rule conditions

LGNZ commissioned DLA Piper to undertake an independent legal review of the Proposed NESPF rules and conditions. The WCRC generally agrees with DLA Piper’s comments in the Schedule of “Comments on specific aspects of draft rules” at the end of their report. Many of the comments are relevant to issues of

¹⁰ DLA Piper, 2015. “Legal review of the MFE/MPI Consultation Document: A National Environmental Standard for Plantation Forestry.”

implementing the NESPF rules for forestry on the West Coast. In addition to the DLA Piper comments, the following are some minor matters that need correcting or clarifying if the NES is approved:

Numbering of conditions: The rule conditions will be difficult for council compliance staff to refer to, and need to be numbered.

Road widening on steep slopes: In the Proposed NESPF permitted rule for earthworks in low, medium, and high erosion-susceptible zones, the third bullet point condition permits road widening and realignment for safety purposes on slopes over 35 degrees. However, the NESPF requires a resource consent for earthworks in very high erosion susceptible areas greater than 25 degrees. These provisions seem inconsistent, and need to be reviewed. Permitting road works on slopes over 35° carries a heightened risk of adverse effects, and the appropriateness of this is questioned, particularly with no limits on the volume.

Earthworks: Stabilisation and containment of exposed soil: The first part of the rule requires that “as soon as practicable after completion of the activity, and no later than 12 months....”. Allowing 12 months for bare soil to be protected from soil erosion is problematic on the West Coast. The high rainfall in the region increases the risk of soil erosion the longer that bare ground is left exposed. The West Coast L&WP requires bare ground and any stockpiles to be protected from erosion as soon as practicable, and in practice this means sooner rather than later.

Pruning and thinning: The slash management conditions for pruning/thinning to waste, and harvesting, should be the same.

Mechanical Land Preparation: The first part of the rule permits mechanical land preparation in high and very high erosion-susceptible areas on slopes greater than 25°, however the first condition appears to not permit it on slopes greater than 25°. This is confusing, and needs reviewing.

River crossings: The condition making **existing** crossings permitted subject to conditions is very confusing. These crossings may be used for access by the public for other purposes such as recreational, conservation, farming, or scientific activities. Such crossings that are already lawfully established would have an existing use right. This matter needs reviewing.

Relief sought:

If the NESPF is approved, amend the uncertainties and errors in the rules and conditions listed above.

Conclusion

The WCRC’s assessment of the latest version of the Proposed NESPF is that it is too complex, and creates too many uncertainties about its implementation and environmental outcomes for the Council to support it becoming a useful tool to manage plantation forestry activities on the West Coast. The main issues the Council has is that the NESPF rules are more complicated than the rules in the West Coast Land and Water Plan, and some of the permitted NESPF rules are potentially inappropriate. This will lead to substantial confusion, and the likely requirement of additional resource consents from more stringent rules on applicants for little or no benefit. The Cost Benefit Analysis work that has taken over a decade to produce has been fraught with problems. To achieve a positive Cost-Benefit result the costs of monitoring the NESPF are shifted from forestry operators to councils, which this Council is opposed to.

The assumptions underpinning the Proposed NESPF do not wholly reflect the situation with the planning framework for forestry-related activities on the West Coast. Council considers that the Land and Water Plan has robust rules to manage the relatively small scale (compared to other regions) of forestry undertaken on the West Coast, and the indications are that these are working well. A national standard is not an appropriate tool to address a problem that does not necessarily occur in all regions. Pursuing the Proposed NESPF is like trying to make “one size fits all” happen. We believe that the national standard is not a good ‘fit’ for most forestry activities on the West Coast. However, if the Government decides to proceed with this national standard, it will need considerable amendments to be able to be implemented effectively on the West Coast.

Summary of relief sought

- Withdraw the Proposed NESPF, and use the rules in regions where there are issues with RMA

regulatory frameworks for forestry.

If the NES is approved:

- Remove the requirement for councils to monitor compliance with the NESPF permitted rules;
- Consider allocating controlled activity status to provide a process for approval of management plans that enables local authorities to recover some of the costs associated with the NESPF, reflecting a user pays approach;
- Review the Erosion Susceptibility Classification (ESC) for the Greymouth Earthworks Control Area before the NESPF is approved;
- Make provision in the NESPF for a transparent and formally recognised process for the review and adjustment of the ESC system, to address the matters listed in relation to this point;
- Add “natural hazard areas identified in regional or district plans” to the matters where councils may apply more stringent rules.;
- prior to finalising the NESPF, consult with the WCRC to confirm if the timeframes for the large Galaxid spawning period on the West Coast need amending;
- Either include a general condition for accidental discovery of cultural items during operations, or enable councils to require accidental discovery protocols to be followed by forestry operators;
- Enable councils to have more stringent provisions for both mapped and qualitatively defined significant biodiversity areas;
- Add regionally significant infrastructure to the matters that councils can apply more stringent rules, and add a definition of regionally significant infrastructure to the Glossary;
- Provide written confirmation that MPI will provide assistance to councils to cover the cost and/or resourcing to provide the Ministry with the monitoring data sought;
- Extend the timeframe for implementation to enable councils to work through the details of which NES and Plan rules have effect, how the NESPF provisions will impact other parts of regional plans, and how it will affect consent and compliance processes;
- Remove the objectives that are in the Rules section.
- Amend the uncertainties and errors in the rules and conditions listed in this submission.

APPENDIX 1: COMPARISON OF PROPOSED NESPF RULES RELEVANT TO THE WEST COAST, AND THE WEST COAST REGIONAL LAND AND WATER PLAN RULES

Proposed NES-PF Rules (summarised)	Land and Water Plan Rules (summarised)	Comparison
<p>Mechanical Land Preparation Permitted in low and medium erosion-prone areas, in high erosion areas on slopes less than 25°, and in high and very high erosion areas on slopes greater than 25° where the techniques used will affect the subsoil, subject to conditions: For roller crushing and downhill ripping to follow slope contours. Setbacks from water bodies. Restricted Discretionary in high and very high erosion areas on slopes greater than 25° if permitted conditions not met.</p>	<p>Mechanical Land Preparation No specific rules for MLP activities, permitted under s9 RMA. V-blading up to 10 ha per landholding per year permitted subject to 12 conditions. Restricted discretionary if can't meet permitted rule.</p>	<ul style="list-style-type: none"> • L&WP more stringent for V-blading, permitted with a limit on the area, and several conditions for sediment movement, erosion, and slope instability. • NES permitted rule is for some MLP activities but unsure if these occur much on the West Coast. NES has no conditions for sediment movement, erosion, and slope instability. • L&WP has no rules for mechanical land preparation activities listed in the NESPF rule.
<p>Afforestation Permitted in low, moderate, high erosion susceptible areas, based on the regional Land Use Classification system, and in a recognised regional council erosion management scheme e.g. Greymouth Earthworks Control Area. Subject to conditions: Min 5m setback from river/stream less than 3m wide. Min 10m setback from river/stream greater than 3m wide. Setbacks from wetlands, lakes, CMA, outstanding waterbodies identified under the NPSFM, waterbodies with WCO's. Approved GM plants. Restricted Discretionary in very high erosion-prone areas, and where permitted conditions not met.</p>	<p>Afforestation Permitted if exotics planted more than 5m from any river greater than 3m wide (no rule, this is a presumption from Rule 14). No other conditions. Rule 14 Restricted Discretionary for exotic trees planted within 5m of a river greater than 3m wide, or a lake, provided it is outside a Schedule 1 or 2 wetland.</p>	<ul style="list-style-type: none"> • NES setback from rivers wider than 3m is larger, 10m, compared to 5m in L&WP. • Consent needed under NES if plant less than 10m from a river/stream 3+m wide. • NES rest disc rule addresses wilding risk, L&WP doesn't. • L&WP rest disc rule addresses effects on downstream affected parties, infrastructure, and iwi. NES doesn't. •
<p>Earthworks Permitted in low and medium erosion prone areas, and</p>	<p>Earthworks Permitted in non, and Erosion Prone Areas 1 and 2</p>	<ul style="list-style-type: none"> • NES appears to be more lenient as it has no limit on the volume of earthworks on slopes.

<p>in high areas where the slope is less than 25 degrees. Subject to conditions: Give notice to council Conditions for road works, incl widening/realignment on slopes over 35 degrees Must prepare an Erosion and Sediment Control Plan (ESCP) Material amendments to ESCP must be documented. Deactivate temporary tracks and earthworks in Orange Zone within 20 days of last use. No more than minor damming, flooding or erosion in ephemeral streams to avoid obstruction or diversion. Setbacks from water bodies for earthworks except during construction, maintenance of river crossing or debris trap. Fill material must have no more than 5% vegetation/wood. Spoil deposition Install sediment and s/water control measures. ASAP, and no later than 12 months after completion of the activity, exposed areas of soil must be managed.</p> <p>Rest disc on high erosion-prone land over 25 degrees, or on very high erosion-prone land, or permitted conditions are not met.</p>	<p>(2=greater than 25° slope), with reduced areas of disturbance permitted as the slope increases. Conditions managing erosion, sediment loss, effects on water bodies Not permitted within Schedule wetlands, and possibly not Sched 2 wetlands. Controlled if don't comply with permitted Rules 3 and 6 for earthworks on flat land, or for maintenance of infrastructure. Discretionary (Rule 16) if don't meet permitted or controlled rules.</p>	<ul style="list-style-type: none"> • Discretionary consent would be needed for forestry earthworks under the L&WP rules, as most forestry activities probably wouldn't comply with the volume limits in Rules 4 or 5 of 500m³ and 10m³ of earthworks on slopes between 12-25 degrees, and over 25 degrees. • NES condition for road widening and realignment permits the volume to be moved of more than 5,000m³ per activity area. This is hopefully an error, it is inappropriate for medium and high erosion-susceptible areas on the West Coast. • NES condition permitting road widening/alignment for safety purposes on slopes over 35° is inconsistent with the restricted discretionary status for earthworks on slopes greater 25°. • Difficult to compare conditions. Some NES earthworks conditions cover the same matters as the L&WP, but are not as specific e.g. L&WP condition of a visual clarity limit in waterbodies, measured by black disc for sediment entering water. L&WP also has conditions requiring drainage controls for formed surfaces, culverts, batters, trenches, and no effects on water takes.
<p>Forestry quarrying Permitted in all zones except very high erosion areas where the erosion classification identifies land as having potential for severe slumping. Subject to conditions: Give notice to Council. Setbacks from surface water bodies for site, and spoil deposition, and from groundwater. Restoration once deactivated. Quarry Management Plan required. Controlled where permitted conditions not complied</p>	<p>No specific rules for quarrying. Gravel extraction rules apply for extraction from a river or creek bed. Earthworks rules apply if taken from e.g. a hillside. Gravel extraction rules: Permitted if gravel is taken from a river/creek bed listed in Schedule 12, and up to a maximum volume of 300cubm per 12 months; or up to 10cubm per month from any river or creek. Subject to conditions: Give notice to Council. Manage effects on erosion, instability of banks, bed,</p>	<ul style="list-style-type: none"> • NES rules appear more lenient, they have no upper volume limit, and no volume limit in relation to slope angle, only in certain types of very high erosion Zone. • It is uncertain whether any limits would be placed on volume in relation to slope angle in the Quarry Management Plan. • NES rules for quarrying appear to only apply to quarries on land. There are no NES rules for gravel extraction from river and creek beds, so

with. Consent restricted to matter(s) not complied with. Restricted discretionary in very high erosion areas susceptible to earthflow. Matters of discretion include volumes.	channels. Sediment dx to water bodies. No damage to structures. Setbacks from structures, CMA, wetlands. No introduction of pest plants. Discretionary if don't meet permitted rule.	assume the L&WP rules apply if gravel is taken from riverbeds for forestry activities.
River crossings Permitted subject to conditions: Give notice to CI. Flow calculations for suitable culvert size. Doesn't change alignment of river, is secure, doesn't dam or divert water. Provide for fish passage. Avoid dxs of organic matter or soil into rivers. Use of crossing doesn't cause erosion or scouring. Approaches and abutments are stabilised to prevent scour and sedimentation. Maintain to avoid aggradation or erosion of bed, and to maintain flow and fish passage. Not in a wetland of more than 2500m ² No closer than 500m upstream of a house that is within 15m of a river over 3m wide. Specific conditions for temporary crossings, single culverts, battery culverts, drift deck, for, single-span bridges. Controlled (except for fords) if doesn't comply with permitted conditions. Restricted discretionary if don't meet controlled rule, and for fords, provided rest disc conditions are met Discretionary	River crossings Culverts, fords, (small) bridges permitted subject to conditions: River no wider than 5m. Fords don't raise bed by more than 300m Bridge at least 600mm above the river bank level. Don't impede fish passage. Bank and riverbed erosion, scouring. No reduction in flood flow capacity. Maintenance, leave site tidy, no refuelling in river bed No bird nests disturbed. Conditions re wetlands. No piers in riverbeds. Discretionary if permitted conditions not met. Dxs of organic matter or soil from construction need consent?	<ul style="list-style-type: none"> • NES looks possibly more stringent. Lots of conditions on NES rules could mean potentially more consents needed. • L&WP conditions appear to limit the size of crossings. • NES condition and explanation identifies significant wetlands as those larger than 2,500sqm, however this is not one of the criteria that West Coast significant wetlands were defined by. Assume the Plan rules for crossings in significant wetlands prevail as a matter that councils can apply more stringent rules to. • Not clear if bridge piers are permitted in the riverbed or not under the NES condition.
Pruning and thinning to waste (production thinning classed as harvesting) Permitted in all zones subject to conditions: No depositing slash into water bodies, or where it could	Pruning and thinning to waste Permitted under s9 RMA. No rules or conditions for pruning or silviculture.	<ul style="list-style-type: none"> • NES appears to be similar to the L&WP in that a consent is required for depositing slash into water bodies. • NES is more lenient with its default status of

<p>enter water bodies and block, dam, divert, have downstream and aquatic effects.</p> <p>Controlled if permitted conditions not met.</p>	<p>Discretionary: Discharge of contaminants, e.g. slash, into water bodies.</p>	<p>consent rules than the L&WP.</p> <ul style="list-style-type: none"> • Slash management condition for pruning/thinning is a harder test than slash management condition for harvesting. Pruning requires no deposition, this is not a condition for harvesting.
<p>Harvesting</p> <p>Permitted in low, medium, high erosion-prone areas subject to conditions.</p> <p>Give notice to CI.</p> <p>Prepare a Harvest Plan in accordance with a prescribed template.</p> <p>If harvesting in high erosion-prone area, must prepare an ESCP.</p> <p>Manage erosion, minimise sediment dx to water.</p> <p>Controlled in very high erosion-prone areas except for Class 8e, and where permitted conditions aren't met.</p> <p>Rest disc in very high erosion-prone Class 8e areas.</p>	<p>The definition of vegetation disturbance includes cutting, felling, harvesting but not tree pruning or silviculture.</p> <p>Vegetation disturbance permitted on flat land except in Sched 1 and 2 wetlands.</p> <p>Permitted in riparian margins as part of earthworks.</p> <p>Permitted on slopes up to max of 20m². Subject to conditions to minimise erosion and sediment dx.</p> <p>Discretionary if don't meet permitted rules.</p>	<ul style="list-style-type: none"> • NES possibly more stringent on flat land with requirements for a Harvesting Plan, and management of erosion and sediment. • L&WP potentially more stringent on slopes, requiring consent for more than 20m² of vegetation disturbance/harvesting, although NES conditions for Harvesting Plan, ESCP, and management of riparian disturbance, slash, and debris would likely equate to what would be required under resource consent. • Class of NES rules appears more lenient.
<p>Replanting</p> <p>Permitted in all zones subject to conditions:</p> <p>Setbacks from rivers (greater than 3m wide=10m), streams, wetlands, lakes, CMA.</p> <p>Controlled if permitted conditions not met.</p>	<p>Replanting</p> <p>Same Plan rules apply as for afforestation.</p> <p>Permitted if exotics planted more than 5m from any river greater than 3m wide (no rule, this is a presumption from Rule 14). No other conditions.</p> <p>Rule 14 Rest Disc for exotic trees planted within 5m of a river greater than 3m wide, or a lake, provided it is outside a Sched 1 or 2 wetland.</p>	<ul style="list-style-type: none"> • NES setback from rivers wider than 3m is larger, 10m, compared to 5m in L&WP. • Consent needed under NES if plant less than 10m from a river/stream 3+m wide. • L&WP more stringent with default rule status i.e. restricted discretionary compared to NES controlled rule.
<p>Dust</p> <p>Permitted provided nuisance dust is contained within property boundaries or under same ownership. This would include dust from forestry traffic on roads.</p>	<p>Dust</p> <p>Air Quality Plan: Dust from forestry traffic on roads not covered by Air Plan rules. Not practical to regulate in the Air Plan.</p> <p>Dust from road construction and maintenance, earthworks and quarrying permitted subject to no offensive or objectionable dust beyond property boundary.</p>	<ul style="list-style-type: none"> • NES more stringent for dust, including from trucks on roads. • Otherwise rules are generally the same.