NOT GOVERNMENT POLICY

To the Planning Team, Tararua District Council

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Thank you for the opportunity to submit on the Tararua Draft District Plan.

About the Natural Hazards Commission Toka Tū Ake (NHC)

The Natural Hazards Commission Toka Tū Ake (NHC) is a Crown Entity responsible for providing residential property owners with a current contract of fire insurance for their residential property with insurance against damage from natural hazards covered by the Natural Hazards Insurance Act 2023 (NHI Act). NHC provides limited cover for:

- building and land damage from earthquakes, landslides tsunami, volcanic and hydrothermal activity, and fire following these hazards, and
- land damage only from storm or flood, and fire following these hazards.

Why NHC is providing this submission

NHC's primary objective is to *'reduce the impact of natural hazards on people, property, and the community'*. To achieve this objective, NHC's functions, as set out in the Natural Hazards Insurance Act 2023 (the NHI Act), include: to facilitate research and education, and to contribute to the sharing of information, knowledge, and expertise (with the Crown, public and private entities, and the public generally), including in relation to:

- natural hazards and their impacts,
- community resilience to natural hazards, and
- planning for, and recovering from, natural hazards.

As NHC is the 'first loss' insurer for residential damage resulting from natural hazards listed in the NHI Act, NHC carries financial risk on behalf of the Crown. We also see the impacts of natural hazards in the insurance claims we receive. This means that NHC has leading insights and a strong interest in reducing risk from, and building resilience to, natural hazards across New Zealand.

Our investments in research and education about natural hazards enable us to use and translate this information to support evidence-based, policy and planning. Our focus is on ensuring long-term resilience by encouraging building in areas that will remain safe and sustainable for future generations. Developing in zones at high risk from natural hazards exposes future owners to complex and potentially hazardous situations, which could compromise the longevity and safety of these developments.

Climate change is also increasing the occurrence and severity of natural hazards covered by the NHC Scheme. Therefore, we support clear, risk-based policy frameworks that reduce natural hazard risks,

allow for resilient and sustainable land use planning to manage risk, and support community education and resilience towards natural hazards.

When we make submissions on council strategies and plans, our submissions relate to the suitability of the land proposed for development *without* mitigations. We do not submit on any individual planned or proposed developments. It is up to councils to decide whether the risks to land can be managed, and whether the appropriate mitigations and management strategies are in place for individual consent applications.

Our advice and recommendations are not intended to impede development, but to highlight the importance of careful and precautionary choices to ensure resilient and sustainable communities in the future. Our goal is to support councils ask the right questions and make risk informed decisions.

Therefore, our advice to councils is to consider the risks and impacts on communities the district plan may create for the future. We encourage councils to ensure that they are satisfied that:

- Natural hazard risk has been assessed on a multi-hazard basis, over multiple timeframes, to at least 50, or preferably 100, years into the future, and using multiple climate change scenarios.
- Risks are mitigated to tolerable levels for the community and council. For example, is 'nuisance flooding' tolerable if it is ongoing?
- New developments do not create any new or further risks for neighbouring suburbs – now, or in the future.
- There is a plan for managing any residual risks after mitigation.
- 'Status quo' of risk and risk tolerance are acceptable where long-term decisions are being made. I.e., an existing community being flood- or liquefaction-prone is not justification for a new development having the same risks.

We advise councils to engage with private insurers to assess their tolerance for providing insurance to locations, risks, and developments if there is any doubt. Insurability should be a key consideration when thinking about the risks and impacts on communities that are being creating for the future.

The Tararua District has a history of large earthquakes and has many known active faults[1], which can generate strong earthquake shaking, ground-surface fault rupture or deformation[2]. In addition, parts of Tararua District are also at risk from liquefaction, landslides (earthquake and rainfall induced) and floods. These hazards impose significant risks on buildings, infrastructure and the well-being of communities.

NHC encourages territorial authorities to use risk-based frameworks in district plans to reduce risk and increase resilience to natural hazards. The Tararua Draft District Plan contains provisions that we support in this regard, and we have provided suggestions in other areas that could be improved.

The lack of natural hazard maps and overlays provided with the Draft Plan Review makes the provisions that refer to natural hazard overlays confusing to understand and interpret. It is therefore difficult for

[1] https://experience.arcgis.com/experience/3f7b4ec2f6f14503af1146ce412de39e/page/Fault-Lines/
[2] https://gis.tararuadc.govt.nz/Tararua/FAAFAZ/CR202103_Active_Fault_Mapping_for_Tararua_District_FINAL.pdf

NHC to comment on their potential effectiveness. Many provisions require greater clarity to ensure a consistent and appropriate interpretation. Our feedback on provisions can be found in the attached Submission Table.

We welcome the opportunity to discuss the contents of our submission with council officers as required. If you have any questions, please don't contact us via the email provided above.

Yours sincerely,

Sarah-Jayne McCurrach

Head of Risk Reduction, NHC Toka Tū Ake

Submission Table

Provision	Description	Support/ Oppose/ Amend	Reasoning	Requested Action
3. Strategic Direction – Chapter Sustainability Resilience & Climate Change (SRC)				
SRC – Introduction	Sustainable subdivisions and buildings are characterised by: • significantly reduced energy consumption • improved resource efficiency • reduced environmental impacts • improved indoor environment • lower impact on local infrastructure and easier to manage.	Support/ Amend	As well as being sustainable, subdivisions should also be resilient to natural hazards. Resilience is the ability to anticipate and resist the effects of a disruptive event, minimise adverse impacts, respond effectively, maintain or recover functionality, and adapt in a way that allows for learning and thriving. Resilient and sustainable development are an effective way to reduce natural hazard risks and promote sustainability more holistically.	That the following amendment be made: • Resilient and sustainable subdivisions and buildings are characterised by: …
SRC-Objective 2	Risk and vulnerability of people and property from natural hazards is minimised.	Support	NHC supports risk reduction to be considered in development decisions. It aligns with NHC's primary mission: *to reduce the impact of natural hazards on people property and the community (NHI Act 2023)*	That this provision be retained
SRC-Objective 3	There is no significant increase in the risk from natural hazards, including the effects of climate change, to people, property, and infrastructure as a result of subdivision, use, and development.	Support in part	We support that subdivision use and development should not cause significant increase in natural hazard risks. However, it is important to clearly define what level of natural hazard risk is "significant" to avoid confusion and ensure consistent application of rules and policies.	That the following amendment be made: Include a definition and metric to determine what natural hazard risk is deemed "significant" by the council. A suggested example for reference is the Natural Hazard Risk Assessment

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			NHC Toka Tū Ake developed a Risk Tolerance Methodology[1] that is designed to integrate a risk tolerance assessment into existing risk management approaches. This methodology could be used by the Council to develop a metric to determine what 'significant' risk is.	User guide [3] developed by Bay of Plenty.
SRC-Objective 7	Land use, subdivision, and development design supports climate change adaptation.	Support/ Amend	We support that land use, subdivision and development design should adapt to climate change, but adaptation measures should also account for natural hazard risks. Climate change can increase the frequency and severity of some natural hazards like flooding.	That the following amendment be made: Land use, subdivision, and development design supports climate change adaptation and natural hazard risk reduction.
SSB- Policy 4	To ensure development is responsive to the effects of climate change.	Support/ Amend	We support development that is responsive to the effects of climate change. However, developments that are also responsive to natural hazard events enables faster recovery of communities, increasing their resilience in the aftermath of an event.	That the following amendment be made: To ensure development is responsive to the effects of climate change and natural hazard risks.
SSB- Policy 5	To avoid or mitigate the effects of natural hazards and the location of development in areas prone to natural hazard risk.	Amend	As currently worded, development in any area prone to natural hazard risk, regardless of its susceptibility, should be avoided or mitigated. This could result in an overly restrictive policy where the risk is low. We	That the following amendment be made: To avoid ~~or mitigate the effects of natural hazards and the location of~~

[3] https://www.boprc.govt.nz/media/579449/natural-hazard-risk-assessment-user-guide-web_final.pdf

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			recommend that a threshold is included, such as "moderate" and/or "high", so that areas of low hazards are not required to be avoided.	development in areas prone to high natural hazard risk; and To mitigate the effects of natural hazards in areas prone to moderate or low natural hazard risk.
3. Strategic Direction – Chapter Urban Form and Development (UFD)				
UFD-Objective 9	Encourage urban development that supports reductions in greenhouse gas emissions, minimises waste production, transport and energy demand, and is resilient to the current and future effects of climate change.	Support/ Amend	We support urban development that is environmentally conscious and resilient to the effects of climate change. In addition, urban development should also be resilient to natural hazards.	That the following amendment be made: Encourage urban development that supports reductions in greenhouse gas emissions, minimises waste production, transport and energy demand, and is resilient to the current and future effects of climate change and natural hazards.
6.Specific District Wide Matters – Chapter Hazardous Substances (HS)				
HS -Objective 2	Hazardous substance use, storage, and disposal activities are located, designed, constructed, and operated, so that: ... 3. The risk associated with moderate and high hazard areas is avoided.	Support in part	It is unclear what hazard areas this provision is referring to. Assuming this refers to natural hazard risks, we support activities that use, store, and dispose of hazardous substances are not located in areas at moderate to high risk from natural hazards. As written, it is unclear if the risk and hazard referred to is the risk from natural hazards, or if the risk and hazard is from	That the following amendment be made: Further clarification on what the risk and hazard areas are that are referred to in the Objective.

Provision	Description	Support/ Oppose/ Amend	Reasoning	Requested Action
			the hazardous substances to people and the surrounding environment. We do support locating activities that use, store, and dispose of hazardous substances outside of high or moderate natural hazard risk areas.	
HS -Policy 1	Minimise risk to people, property, and the environment from any new significant hazardous facility, or any addition to a significant hazardous facility by: ... 5. Locating outside any moderate or high hazard area; and 6. Locating outside any low hazard area unless risk associated with the hazard can be mitigated to protect human, and environmental, health and safety.	Support in part	Assuming the hazards referenced in this provision are referring to natural hazards (see previous submission point), we support not locating (i.e. avoiding) significant hazardous facilities within moderate or high natural hazard risk areas.	Subject to clarification of the above submission point, we support this provision being retained.
HS-Rule 2	General Industrial and General Rural Zones Activity: **Discretionary** Where the following conditions are met: i. The activity is not located within a Area	Support/ Amend	For provision (i), it is unclear which 'area' the provision is referring to. For provision (ii), we support the discretionary status of the activity assuming the industrial and rural zones are not located in moderate or high natural hazard areas.	Clarify which Area is referred to in provision (i)

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	ii. The activity is not located within any moderate or high hazard area;			
6.Specific District Wide Matters – Chapter Natural Hazards (NH)				
NH-Risk-based approach	Fault hazard areas are also not categorised due to the variable level of spatial definition of the active fault lines.	Support in part	NHC supports the sensitive activities classification and hazard category as a risk-informed planning approach. However, we think there are opportunities to strengthen application of the proposed approach. GNS Science has provided active fault mapping at a scale suitable for district planning as specified by the Ministry of Environment (MfE) guidance document *Planning for Development of Land on or Close to Active Faults*, in their 2021 Active Fault Mapping Report[4]. The GNS Science Report identifies Fault Avoidance Zones (FAZ) and Fault Awareness Areas (FAA) for eight priority town areas, including Dannevirke, Woodville, Pahiatua and Eketāhuna, which are towns that have been identified for future development (refer to Appendix 1). Additionally, T+T have provided maps identifying possible areas at risk from liquefaction areas for Tararua District, in their 2021 Tararua Liquefaction Vulnerability Study (refer to Appendix 2). Liquefaction Guidance from MBIE/MFE[5] can assist on how these maps should be applied within the District Plan.	Include active fault hazard maps from GNS Science and liquefaction hazard maps from T+T as overlays in the district plan maps, as per MfE and MBIE guidance; and include risk-based provisions to control development in areas identified as being at risk from active faults and liquefaction.

[4] https://gis.tararuadc.govt.nz/Tararua/FAAFAZ/CR2021-03_Active_Fault_Mapping_for_Tararua_District_FINAL.pdf
[5] https://www.building.govt.nz/assets/Uploads/building-code-compliance/b-stability/b1-structure/planning-engineering-liquefaction.pdf

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			Maps and planning recommendations from these reports should be incorporated as overlay maps within the Proposed District Plan. The overall understanding of the potential impacts from liquefaction and active faults will enable better informed assessments of best location for activities, stronger argument to enforce appropriate mitigation measures by developers, and clearer communication amongst decision makers.	
NH- Risk-based approach	Table NH-1: Hazard risk categories	Support in part	We support the categorisation of flood hazards, but the terms in Table NH-1 flood hazard types (i.e. river corridors, overland flow path and ponding), are not the same as the legend classifications of the available flood overlay maps. It is not clear whether the flood hazard maps available on the Tararua District Council website are the same maps as those referred to in the draft plan. We recommend standardising flood classifications for consistency purposes, or if they are different maps, updating the plan to include the correct flood hazard maps. Additionally, we note that Flood Awareness Areas and Fault Hazard Areas are mentioned in the Draft District Plan but are not included in this table. Active faults have been mapped at variable scales, but the report provided by GNS Science does map Fault Avoidance	EITHER: Standardise terms describing the flood hazard types across flood overlay maps and Table NH-1. OR If the flood hazard maps available are not the same as those referred to as overlays in the Draft District Plan, make available the correct maps. Include all hazards and hazard layers, including active faults, liquefaction, and flood alert area, and an appropriate risk category for each, in Table NH-1.

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			Zones and Fault Awareness Areas, which should be included.	
NH-Objective 1	The risk and consequences from natural hazards on people, property, infrastructure, and the environment are not increased.	Amend	We suggest amending this provision to specify that risks and consequences from natural hazards should not be increased to an unacceptable or intolerable level. The objective could result in overly restrictive provisions for development, as any development on any site will inherently increase risk from natural hazards to some extent. However, a metric to measure acceptable, tolerable levels and intolerable levels of risk should be provided. NHC Toka Tū Ake developed a Risk Tolerance Methodology[1] that is designed to integrate a risk tolerance assessment into existing risk management approaches. This methodology could be used by the Council to develop a metric to determine what level of risk is tolerable.	That the following amendment be made: The risk and consequences from natural hazards on people, property, infrastructure, and the environment are not increased to intolerable levels.
NH-Objective 2	Natural features are used to reduce the susceptibility of people, communities, property, and infrastructure to damage from natural hazards.	Support	We support the use of natural features to reduce the risks from natural hazards. Natural features and nature-based solutions can safeguard the health of our environment, increase resilience to natural hazards like flooding, and support the well-being of our communities.	That this provision be retained.

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NH-Policy 1	Identify and map areas affected by natural hazards and take a risk-based approach to the management of subdivision, use, and development based on: 1. the sensitivity of the activities to the impacts of natural hazards; and 2. the hazard posed to people's lives and wellbeing, and property, by considering the likelihood and consequences of differing natural hazard events.	Support in part	We support mapping areas affected by natural hazards and the application of a risk-based planning approach when managing subdivision, land use and development. We note that many of the natural hazards mentioned in the introduction and referred to as overlays in the Draft Plan are not included with the Draft plan as maps. Some hazards i.e. active faults and liquefaction are not included as overlays, even though hazard maps for the region have been made available (see submission on NH-Risk-based approach, and appendices 1 and 2).	All relevant and available natural hazard maps must be included as overlays in the District Plan.
NH-Policy 2	Avoid locating hazard sensitive activities and potentially hazard sensitive activities within high hazard areas unless the activity has an operational need or functional need to locate within the high hazard area.	Support	We support avoiding hazard sensitive activities in high hazard areas and only allowing for operational or functional activities in high hazard areas if needed. Locating such activities in locations highly susceptible to natural hazards can exacerbate impacts, losses and costs to the community.	That this provision be retained.
NH-Policy 3	Only allow hazard sensitive activities and potentially hazard sensitive activities within moderate hazard areas where: 1. benefits the activity incorporates mitigation measures that demonstrate that risk to people's lives	Support in part	NHC accepts that development can be appropriate in natural hazard risk areas, if mitigation measures are incorporated based on comprehensive risks assessments. This approach could result in minimal building damages.	Clarify the meaning and context of "benefits the activity", and how this relates to natural hazard mitigation measures. Remove reference to building damage. That the following amendments are made

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	and wellbeing, and building damage is low, and any damage to buildings is minimised;		However, this provision is unclear as to what "benefits the activity" means and how it relates to the context of minimising natural hazard risk. It is important to note that Tararua's District Council function as described in section 31 of the RMA is to achieve integrated management of the use, development, or protection of land and associated natural and physical resources of the district. Anything related to building performance (i.e. seismic and wind loadings) must comply with the Building Act 2004 which may not necessarily be a relevant matter for the District Plan to address. In this policy Building damage is controlled by the Building Act via the Building Code and standards, and reference to building damage should be removed. If this policy is specific to raising floor levels to reduce flood impacts, then this should be made explicit.	1. benefits the activity incorporates mitigation measures that demonstrate that risk to people's lives and wellbeing ~~and building damage is low, and any damage to buildings~~ is minimised.
NH-Policy 4	Provide for hazard sensitive activities and potentially hazard sensitive activities within low hazard areas where: 1. the activity incorporates mitigation measures that demonstrate that risk to people's lives and wellbeing, and building damage is low, and any	Amend	NHC accepts that it is sometimes necessary to permit hazard sensitive activities and potentially hazard sensitive activities in low hazard areas. We support the activities having integrated mitigation measures and that natural hazard should not be increased in adjacent properties, activities and people. It is important to note that Tararua's District Council function as described in section 31 of the RMA is to achieve integrated management of the use,	Provide clarification on which, if any, hazard overlays exist other than Flood Hazard – ensure ponding and possible liquefaction are classified as low hazard areas. That the following amendment be made: Provide for hazard sensitive activities and potentially hazard sensitive

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	damage to buildings is minimised, and 2. the risk to adjacent properties, activities, and people is not increased as a result of the activity proceeding.		development, or protection of land and associated natural and physical resources of the district. Anything related to building performance (i.e. seismic or wind loadings) must comply with the Building Act 2004 which may not necessarily be a relevant matter for the District Plan to address. If this policy is specific to raising floor levels to reduce flood impacts, then this should be made explicit. Additionally, as not all hazards are included in the introductory table detailing hazard ranking, it is unclear which overlays are classified as 'low' hazard areas.	activities within low hazard areas where: 1. The activity incorporates mitigation measures that demonstrate that risk to people's lives and well-being, ~~and building damage is low, and any damages to buildings~~ is minimised, and 2. the risk to adjacent properties, activities, and people is not increased as a result of the activity proceeding.
NH-Policy 6	Discourage new buildings in flood hazard - overland flow path and ponding areas unless: 1. there is no increase in flood flow or level on adjoining sites; 2. risk to people's safety will be low; 3. the activity incorporates mitigation measures so that the risk of damage to buildings and structures is not significantly increased; and 4. people can safely evacuate the property during a natural hazard event.	Support in part	We support the discouragement of new buildings in flood hazard areas but recommend replacing the word '*discourage'* with *'avoid'* for new buildings in the overland flow path area. Development within overland flow paths can lessen the ability of flood water to drain away and lead to increased flood volume overall. We are not able to find overland flow paths and ponding areas within the flood overlay hazard maps to cross-check against the provision (see submission NH-Risk-based approach). Either the flood hazard need to be updated to reflect the terminology in the Draft District Plan, or the maps that are being referred to (if different) must be provided.	Provide flood overlay maps in the District Plan showing the location of overland flood paths and ponding. That the following amendments be made: ~~Discourage~~ Avoid new buildings in flood hazard - overland flow path and ponding areas unless: ....

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NH-Policy 7	For new buildings and structures that contain habitable rooms and are located within fault hazard areas: 1. Allow buildings and structures to locate within Fault Hazard Area where it can be demonstrated that the fault hazard risk can be avoided or mitigated to prevent loss of life. 2. Avoid buildings and structures locating within the Fault Hazard Area where the risk to life cannot be avoided or mitigated via distance from the fault, building engineering solutions, or other means.	Amend	The GNS Science Report provide active faults maps in the Tararua District including Fault Avoidance Zones (FAZ) and Fault Awareness Areas (FAA), which we recommend incorporating in the District Plan. While the locations of many active faults are known, the precise magnitude and extent of a fault rupture and damage cannot be predicted before an earthquake. Additionally, surface rupture along a fault can result in displacement of the ground surface by up to several metres, both in a horizontal and vertical sense, severely damaging any building that lies across it. Best practice is setting policies that seek to avoid establishing buildings over these faults to protect people and property (refer to Appendix 3). As such, we recommend replacing "Fault Hazard Areas" with the categorisation of active fault hazards as Fault Avoidance Zones and Fault Awareness Areas that are provided in the 2021 GNS Science report. We also recommend avoiding development of new buildings within Fault Avoidance Zones and Fault Awareness Areas.	Clarify whether the Fault Hazard Area is the same as the Fault Avoidance Zone in the GNS Science report. Replace the category of "Fault Hazard Areas" with the categorisation of active fault hazards as Fault Avoidance Zones and Fault Awareness Areas that are provided in the 2021 GNS Science report. Incorporate as a District Plan overlay the maps of fault traces, Fault Avoidance Zones, and Fault Awareness Areas for the Tararua District by GNS Science. That the following amendments be made: For new buildings and structures that contain habitable rooms and are located within fault hazard areas: 1. Avoid buildings and structures located within Fault Avoidance Zones and Fault Awareness Areas unless it is demonstrated that the building is at least 20m away from the fault.

Provision	Description	Support/ Oppose/ Amend	Reasoning	Requested Action
				~~1. Allow buildings and structures to locate within Fault Hazard Area where it can be demonstrated that the fault hazard risk can be avoided or mitigated to prevent loss of life.~~ ~~2. Avoid buildings and structures locating within the Fault Hazard Area where the risk to life cannot be avoided or mitigated via distance from the fault, building engineering solutions, or other means.~~
NH-Policy 8	Allow for the upgrade of existing infrastructure, and only allow new infrastructure to be established in hazard areas where: 1. it has an operational need or functional need for the location; 2. it will be designed to maintain its integrity and function during and after a natural hazard event, or it will be able to be immediately re-instated after a natural hazard event, and	Support	We support interrelating infrastructure investment decisions with natural hazard risks. This aligns with the 2022 New Zealand Infrastructure Strategy[6] by the New Zealand Infrastructure Commission, which aims for better infrastructure building and maintenance investment decisions to be more responsive to current and future challenges. Infrastructure development has direct influence on residential intensification decisions and contributes to enhancing the resilience and protection of housing against natural hazard events. Therefore the location and physical properties of infrastructure development is an important consideration.	That this provision be retained.

[6] https://media.umbraco.io/te-waihanga-30-year-strategy/mmahiykn/rautaki-hanganga-o-aotearoa-new-zealand-infrastructure-strategy.pdf

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	3. the risk to properties, activities, and people is not increased.			
NH-Policy 12	Only allow hazard sensitive activities and potentially hazard sensitive activities within flood alert areas where: 1. the activity incorporates mitigation measures that demonstrate that risk to people's lives and wellbeing, and building damage is low, and any damage to buildings is minimised; 2. people can safely evacuate the property during a natural hazard event; and 3. the risk to adjacent properties, activities, and people is not increased as a result of the activity proceeding.	Amend	We support the development of hazard sensitive activities and potentially hazard sensitive activities in flood alert areas with appropriate mitigation measures, safe evacuation routes, and without increasing the risk to neighbouring properties. However, further clarification is required in terms of referencing overlay maps showing location of flood alert areas. In the absence of flood alert maps we are not able to cross-check this provision and provide an informed comment. We request that the hazard maps referred to in the Draft District Plan are provided, and that the terminology is made consistent between overlays and within the Draft District Plan. It is important to note that Tararua's District Council function as described in section 31 of the RMA is to achieve integrated management of the use, development, or protection of land and associated natural and physical resources of the district. Anything related to building performance (i.e. seismic or wind loadings) must comply with the Building Act 2004 which may not necessarily be a relevant matter for the District Plan to address. If this policy is specific to raising floor levels to reduce flood impacts (i.e. not any	EITHER: Standardise terms describing the flood hazard types across flood overlay maps and Table NH-1. OR If the flood hazard maps available are not the same as those referred to as overlays in the Draft District Plan, make available the correct maps. That the following amendment be made: 1. the activity incorporates mitigation measures that demonstrate that risk to people's lives and wellbeing~~, and building damage is low, and any damage to buildings~~ is minimised; ...

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			natural hazard as per (2)), then this should be made explicit.	
NH-Policy 13	Discourage new buildings in flood alert areas unless: 1. there is no increase in flood flow or level on adjoining sites; 2. risk to people's safety will be low; 3. the activity incorporates mitigation measures so that the risk of damage to buildings and structures is not significantly increased; and 4. people can safely evacuate the property during a natural hazard event.	Support in part	Clarification needs to be provided on what flood alert maps are. As we were unable to access theses maps, we are not able to cross-check this provision and provide an informed comment. Further clarification is required in terms of referencing overlay maps showing location of flood alert areas. We request that the hazard maps referred to in the Draft District Plan are provided, and that the terminology is made consistent between overlays and within the Draft District Plan.	Include flood alert areas as an overlay. EITHER: Standardise terms describing the flood hazard types across flood overlay maps and Table NH-1. OR If the flood hazard maps available are not the same as those referred to as overlays in the Draft District Plan, make the correct maps available.
NH-Rule 4	Additions to buildings within all hazard areas Activity Status: **Permitted** Where the following conditions are met: i. The building addition is located within the possible liquefaction prone area; or ii. The additions do not increase the gross floor area of a hazard sensitive	Amend	We consider permitted status for additions to buildings, including habitable areas, in areas at risk from all natural hazards to be inappropriate. As written, this provision implies that additions to buildings within areas at any level of risk from natural hazards are permitted as long as they are also within the possible liquefaction prone area overlay. We recommend this provision is removed. Liquefaction in the event of an earthquake can be extremely damaging to properties. It can result in people living in unsafe, unsanitary dwellings after an	That the following amendments are made: Additions to buildings within all natural hazards areas Activity Status: Permitted Where the following conditions are met: ~~i. The building addition is located within the possible liquefaction prone area; or~~

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	activity or potentially hazard sensitive activity by more than 20m^2; and iii. Any building additions located in the identified overland flow path or ponding area of the flood hazard overlay have a finished floor level above the 1% AEP level.		earthquake and incur high clean up and remediation costs. We therefore recommend that permitted status for additions to hazard sensitive and potentially hazard sensitive activities within the possible liquefaction prone area is restricted to additions under 20m^2 and non-habitable rooms.	~~ii.~~ i. The additions do not increase the gross floor area of a hazard sensitive activity or potentially hazard sensitive activity by more than 20m^2; ~~and~~ ~~iii.~~ ii. Any building additions located in the identified overland flow path or ponding area of the flood hazard overlay have a finished floor level above the 1% AEP level~~.~~; and iii. That additions do not contain habitable room(s).
NH-Rule 6	New buildings and structures in Fault Hazard Area All zones Activity Status: **Restricted Discretionary** Where the following conditions are met: i. Building or structure contains habitable room(s); and ii. The subject site is located fully or partially within the Fault Hazard Area. Matters over which discretion is restricted:	Amend	We support the incorporation of engineering solutions to reduce anticipated impacts from seismic events. We support ensuring that new developments are at least 20m away from a fault trace, as specified in MfE's guidance document *Planning for development of land on or close to active faults*. This will ensure that natural hazard risks do not increase to an unacceptable level and impacts to people and property are reduced. We recommend replacing "Fault Hazard Areas" with the categorisation of active fault hazards as Fault Avoidance Zones and Fault Awareness Areas that are provided in the 2021 GNS Science report on active faults in the Tararua District. As currently written, it is unclear whether the Fault Hazard Area corresponds to	Clarify whether the Fault Hazard Area is the same as the Fault Avoidance Zone in the GNS Science report. Replace the category of "Fault Hazard Areas" with the categorisation of active fault hazards as Fault Avoidance Zones and Fault Awareness Areas that are provided in the 2021 GNS science report. Incorporate as a District Plan overlay the maps of fault traces, Fault Avoidance Zones, and Fault Awareness

Provision	Description	Support/ Oppose/ Amend	Reasoning	Requested Action
	a. The proximity to any identified fault as demonstrated supporting geotechnical evidence; b. Engineering measures incorporated into the building or structure to prevent loss of life from anticipated effects of a seismic event; and c. The matters set out in NH-P1, NH-P8, and NH-P11.		the Fault Avoidence Zones in the GNS Science report, the Fault Awareness Areas, or both. It is important to note that Tararua's District Council function as described in section 31 of the RMA is to achieve integrated management of the use, development, or protection of land and associated natural and physical resources of the district. Anything related to seismic building performance must comply with the Building Act 2004 which may not necessarily be a relevant matter for the District Plan to address.	Areas for the Tararua District by GNS Science. That the following amendment is made: Matters over which discretion is restricted: a. The proximity to any identified fault as demonstrated supporting geotechnical evidence; ~~b. Engineering measures incorporated into the building or structure to prevent loss of life from anticipated effects of a seismic event;~~ and ~~c.~~b. The matters set out in NH-P1, NH-P8, and NH-P11.
NH-Rule 7	Any new potentially hazard sensitive activity or hazard sensitive activity and associated buildings within flood alert areas All zones Activity Status: **Restricted Discretionary** Where the following conditions are met:	Support in part	We support restricted discretionary status for new potentially hazard sensitive activities or hazard sensitive activities and associated buildings within flood alert areas. However, inclusion of flood alert overlay maps is essential to avoid confusion and maintain consistency amongst end-users. We request that the hazard maps referred to in the Draft District Plan are provided, and that the terminology is made consistent between overlays and within the Draft District Plan.	That the following amendment be made: (1) EITHER: Standardise terms describing the flood hazard types across flood overlay maps and Table NH-1. OR If the flood hazard maps available are not the same as those referred to as

Provision	Description	Support/ Oppose/ Amend	Reasoning	Requested Action
	i. A supporting flood hazard assessment has been undertaken to determine the nature and scale of the flood hazard on the property; ii. The risk of flooding to people and property is not increased; and iii. The activity or building will not worsen the flood hazard. Matters over which discretion is restricted: a. For buildings, measures to avoid, remedy, or mitigate flooding effects on the building. b. For buildings and activities in flood alert areas, the matters in Policy NH-P12 and NH-P13.		We support including appropriate application of flood mitigation measures on buildings as a matter of discretion. This will ensure that adverse effects from floods are appropriately mitigated, in turn reducing the impacts to people and property in future flood events.	overlays in the Draft District Plan, make the correct maps available.
NH-Rule 9	Any hazard sensitive activity and associated buildings within moderate hazard areas and low hazard areas Activity Status: **Discretionary**	Support	We support discretionary status for hazard sensitive activity and associated buildings within moderate hazard areas and low hazard areas. NHC considers that development outside of areas at risk from natural hazards to be best practice to increase community resilience.	That this provision be retained.

Provision	Description	Support/ Oppose/ Amend	Reasoning	Requested Action
NH-Rule 10	Any hazard sensitive activity or potentially hazard sensitive activity and associated buildings within high hazard areas Activity Status: **Non-Complying**	Support	We support non-complying status for hazard sensitive or potentially hazard sensitive activity and associated buildings within high hazard areas. NHC considers that development outside of areas at risk from natural hazards to be best practice to support resilient and sustainable communities.	That this provision be retained.
7.Subdivision (SUB)				
SUB-Objective 2	Subdivision and developments create allotments and patterns of land use and development that: 5.respond to the risks of natural hazards and is resilient to climate change.	Amend	We support that subdivisions and developments should create allotments that are able to respond effectively to the risks of natural hazard and are resilient to climate change. In addition, we recommend that subdivision and development should be able to respond to the risks of natural hazards and climate change, and be both resilient and sustainable for decades to come.	That the following amendment be made: Subdivisions and developments create allotments and patterns of land use and development that: 5.respond to the risks of natural hazards and climate change; and ~~and is resilient to climate change.~~ 6. are sustainable and resilient to natural hazards and climate change impacts.
SUB-Objective 6	Avoidance of subdivision in localities where there is a significant risk of material damage from natural hazards on land or structures, including in relation to any likely subsequent use of the land, unless these cannot be remedied or mitigated.	Support in part	We support that subdivision use and development should not cause significant increase in natural hazard risks. However as worded, the aim of the objective is to avoid subdivision where there is significant risk, unless 'these cannot be remedied or mitigated'. It is unclear what 'these' refers to – the risk, the subdivision, the use, or all three? The triple negative of	That the following amendments be made: Reword the objective to clarify what the intent is with regards to remedy or mitigate.

Provision	Description	Support/ Oppose/ Amend	Reasoning	Requested Action
			'avoid' 'unless' and 'cannot' is confusing as to whether subdivision can proceed if risks can be remedied or mitigated, or not. Should the wording be 'unless these can~~not~~ be ...?' It is important to clearly define what level of natural hazard risk is "significant" to avoid confusion and ensure consistent application of rules and policies. A suggested example for reference is the Natural Hazard Risk Assessment User guide [7] developed by Bay of Plenty. NHC Toka Tū Ake developed a Risk Tolerance Methodology[1] that is designed to integrate a risk tolerance assessment into existing risk management approaches. This methodology could be used by the Council to develop a metric to determine what 'significant' risk is.	Include a definition and metric to determine what natural hazard risk is deemed "significant" by the council.
SUB-Policy 5	Natural hazards Subdivision avoids, or is designed to mitigate, risks from natural hazards by: 1.ensuring land being subdivided, including any potential structure on that land, is not subject to significant risk of material damage by the effects of natural hazards, including flooding,	Support in part	We support that subdivisions should avoid, or include designs, to mitigate natural hazard risks; and that applied mitigation measures avoid adverse effects on the environment. However, it is important to have a clear methodology to evaluate 'significant' and 'proportionate' of risk mitigation measures applied for a specified 'level' of risks. These terms are open for interpretation and having them well-defined avoids confusion. A suggested example for reference is the Natural Hazard	Include a definition and/or metric to determine what natural hazard risk is deemed "significant" by the council. Include liquefaction vulnerability and active fault overlay maps within the District Plan.

[7] https://www.boprc.govt.nz/media/579449/natural-hazard-risk-assessment-user-guide-web_final.pdf

Provision	Description	Support/ Oppose/ Amend	Reasoning	Requested Action
	inundation, erosion, subsidence or slippage and earthquake faults; 2.demonstrating appropriate mitigation measures proportionate to the risks associated with the hazards; 3.providing for subdivision on land where liquefaction risk has been identified and can be appropriately managed; 4.maintaining the function of overland flow paths to safely convey flood waters while taking into account the likely long-term effects of climate change, and 5.ensuring that any measures used to manage the risks of natural hazards avoid any further adverse environmental effects		Risk Assessment User guide developed by Bay of Plenty Regional Council. We suggest considering Risk Tolerance Methodology[1] developed by NHC Toka Tū Ake. It is designed to integrate a risk tolerance assessment into existing risk management approaches. As the overlay maps for liquefaction vulnerability and fault rupture are not provided in the draft district plan, were unable to cross-check the provision against the maps.	
SUB-Rule 1	Subdivision to create allotments in all zones (5 total allotment or less) Activity status: **Controlled** Matters over which discretion is restricted: ... h. Effects on the stability of land and buildings, and potential to create new	Support in part	We support controlled status for subdivisions to create 5 or fewer allotments. We support matters of control including the potential to create new or exacerbate existing natural hazards. However, as currently worded this matter of discretion focuses on land and building stability and we are unsure why land stability hazard has been singled out. This could lead to other hazards being overlooked and	That the following amendments are made: Matters over which discretion is restricted: ... f- Effects on ~~the stability of land and buildings, and potential to create new or exacerbate existing~~ natural hazard~~s~~ risk and the matters set out in SUB-P5.

Provision	Description	Support/ Oppose/ Amend	Reasoning	Requested Action
	or exacerbate existing natural hazards and the matters set out in SUB-P5.		inconsistent application of these rules in practice. Simplifying the matter of discretion to the "effects on natural hazard risk" would encompass all natural hazards equally, including land stability.	
SUB-Rule 5	Subdivision of land to create 6 or more lots Activity Status: **Restricted Discretionary** Matters over which discretion is restricted: ... o- Effects on the stability of land and buildings, and potential to create new or exacerbate existing natural hazards and the matters set out in SUB-P5.	Support in part	We support restricted discretionary status for subdivisions to create six or more allotments. We support matters of discretion including the potential to create new or exacerbate existing natural hazards However, as currently worded this matter of discretion focuses on land and building stability and we are unsure why land stability hazard has been singled out. This could lead to other hazards being overlooked and inconsistent application of these rules in practice. Simplifying the matter of discretion to the "effects on natural hazard risk" would encompass all natural hazards equally, including land stability.	That the following amendments are made: Matters over which discretion is restricted: ... o- Effects on ~~the stability of land and buildings, and potential to create new or exacerbate existing~~ natural hazard~~s~~ risk and the matters set out in SUB-P5.
8.General District Wide Matters – Chapter Coastal Environment (CE)				
CE-Policy 5	To manage proposed activities within the coastal environment area to ensure that the activity is located appropriately, having regard to its effects and: x. ensuring that the location, design and scale of structures, buildings, and	Support in part	We support that building characteristics and properties should include coastal hazards risk reduction consideration and mitigation measures. Also, that the proposed activity should ensure that vulnerability from natural hazard risks and climate change impacts are not exacerbated.	Include the Foreshore Protection Overlay within the Draft District Plan.

Provision	Description	Support/ Oppose/ Amend	Reasoning	Requested Action
	activities avoid or mitigate risks to people and property from coastal hazards and that the risk to other people, properties, and activities is not increased; and v. the presence of any natural hazards and whether the activity will exacerbate the hazard and/or be vulnerable to it; vi. the impacts of climate change		However, it is important to include available coastal hazards overlay maps, including the Foreshore Protection Overlay as part of the Proposed District Plan, to ensure the correct application of the policy.	
CE-Policy 8	Adopt a precautionary approach to new subdivision, use, and development where knowledge is lacking about coastal processes and where the risks from coastal hazards are likely to be high, by identifying the Foreshore Protection Area and: a. only providing for activities that have an operational need or functional need within the Foreshore Protection Area; b. avoid new residential activities and other hazard sensitive activities within the Foreshore Protection Area; and c. for activities within the Foreshore Protection Area that satisfy the above,	Support in part	We support taking a precautionary approach to subdivision, use and development where there is insufficient knowledge about coastal processes and risk. With the effects of climate change and sea level rise coastal areas are likely to be subject to higher levels of hazard in the future. As such we support avoiding residential activities where the risks from coastal hazards may be high. However, it is important to include available coastal hazards overlay maps, including the Foreshore Protection Overlay as part of the Proposed District Plan, to ensure the correct application of the policy.	Include the Foreshore Protection Overlay within the Draft District Plan.

Provision	Description	Support/ Oppose/ Amend	Reasoning	Requested Action
	manage effects to ensure any significant adverse effects on people and property will be avoided and all other effects will be avoided, and where this is not practicable, will be mitigated.			

Appendix 1 – Active Faults and Earthquakes

Active Fault Maps provided by GNS Science: https://storymaps.arcgis.com/stories/411a3d4c631c4254ad1d9d0712f61307

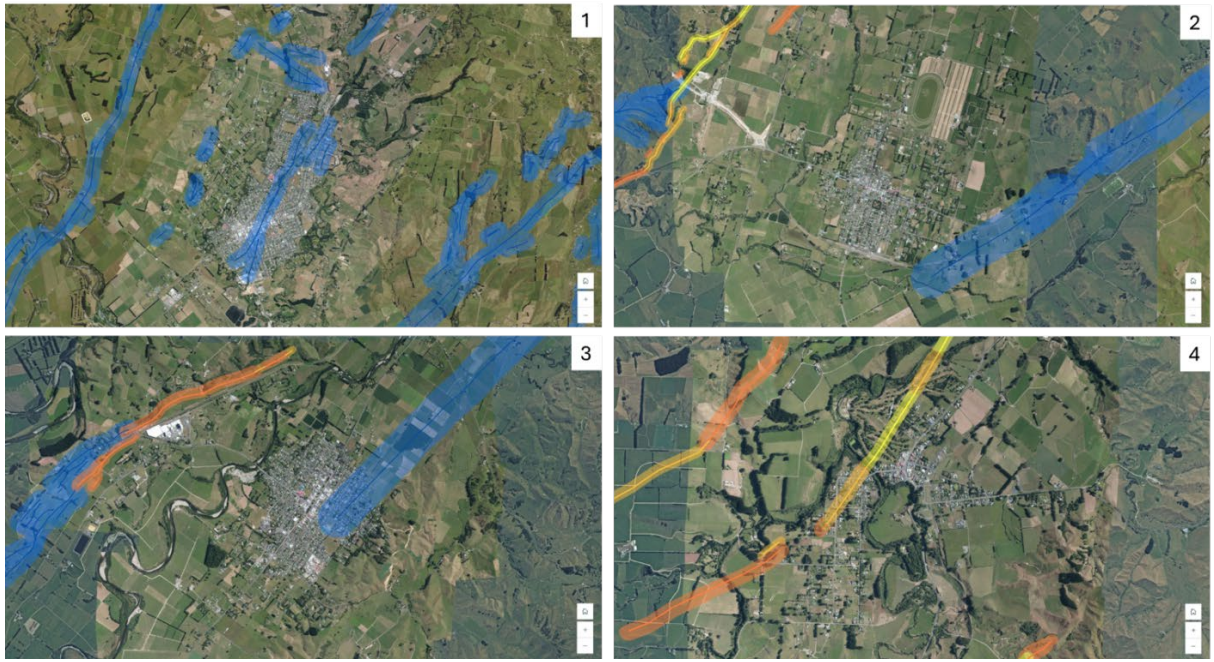


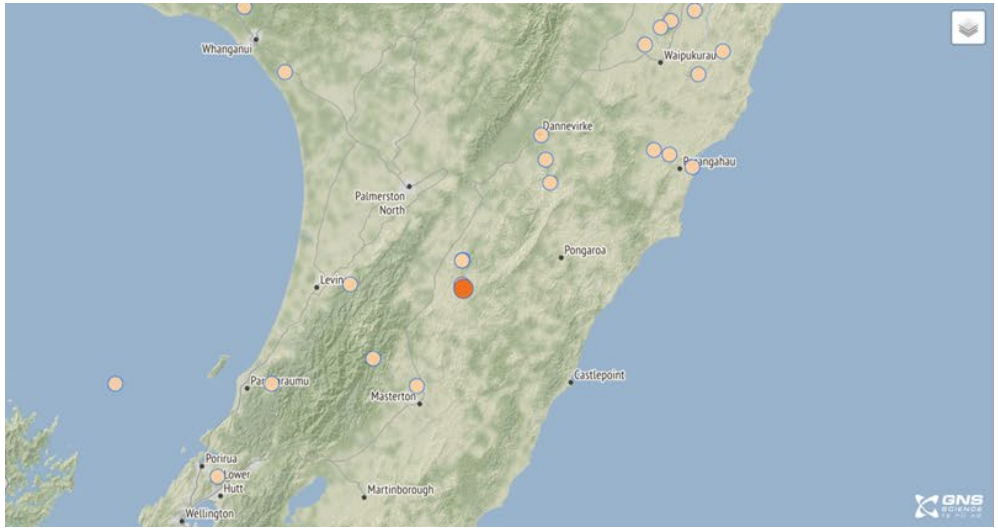
Figure 1 Active Fault lines in Dannevirke. Faulting associated with the Woodville-Dannevirke Fault Zone (WDFNZ) runs to the west of Dannevirke and steps across the landscape and possibly through the town. The WDFNZ is assigned a preliminary RI Class IV status. The FAAs have been developed for all the traces in the Dannevirke priority area. We recommend that the features traversing through Dannevirke are investigated further.

Figure 2 Active Fault lines in Woodville. The active (WDFNZ) projects south towards Woodville. However, near the town the WDFNZ is concealed and considered 'possibly active'. Thus, FAAs are developed near the town. FAZs have been developed for parts of the RI Class I Mohaka Fault to the west of Woodville.

Figure 3 Active Fault lines in Pahiatua. The Pahiatua fault is poorly expressed along most of its length and has been designated as 'possibly active' near and withing the town where FAAs have been developed for its northern end near Pahiatua.

Figure 4 Active Fault lines in Eketāhuna. The Eketāhuna fault (new) runs through the town and FAZs are developed along it. The Cliff Road Fault and the Waiwaka fault occur outside the town, and FAZs have been developed for these.

Earthquakes from the last 365 days in Tararua District, as of 18th of February 2025: https://www.geonet.org.nz/earthquake/weak#



MMI	Intensity	Description
1	unnoticeable	Barely sensed only by a very few people.
2	unnoticeable	Felt only by a few people at rest in houses or on upper floors.
3	weak	Felt indoors as a light vibration. Hanging objects may swing slightly.
4	light	Generally noticed indoors, but not outside, as a moderate vibration or jolt. Light sleepers may be awakened. Walls may creak, and glassware, crockery, doors or windows rattle.
5	moderate	Generally felt outside and by almost everyone indoors. Most sleepers are awakened and a few people alarmed. Small objects are shifted or overturned, and pictures knock against the wall. Some glassware and crockery may break, and loosely secured doors may swing open and shut.
6	strong	Felt by all. People and animals are alarmed, and many run outside. Walking steadily is difficult. Furniture and appliances may move on smooth surfaces, and objects fall from walls and shelves. Glassware and crockery break. Slight non-structural damage to buildings may occur.
7	severe	General alarm. People experience difficulty standing. Furniture and appliances are shifted. Substantial damage to fragile or unsecured objects. A few weak buildings are damaged.
8	extreme	Alarm may approach panic. A few buildings are damaged and some weak buildings are destroyed.
9	extreme	Some buildings are damaged and many weak buildings are destroyed.
10	extreme	Many buildings are damaged and most weak buildings are destroyed.
11	extreme	Most buildings are damaged and many buildings are destroyed.

The table shows a simplified version of the New Zealand Modified Mercalli Intensity scale. We have added a generalised Intensity term.

Figure 5 Earthquakes from the last 365 days, as of 18th February 2025, that may have caused shaking intensity of Weak or greater in Tararua District.

Appendix 2 – Liquefaction Vulnerability

Liquefaction Vulnerability provide by T+T: https://www.tararuadc.govt.nz/data/assets/pdf_file/0023/13487/Tararua-Liquefaction-Final-Report.PDF

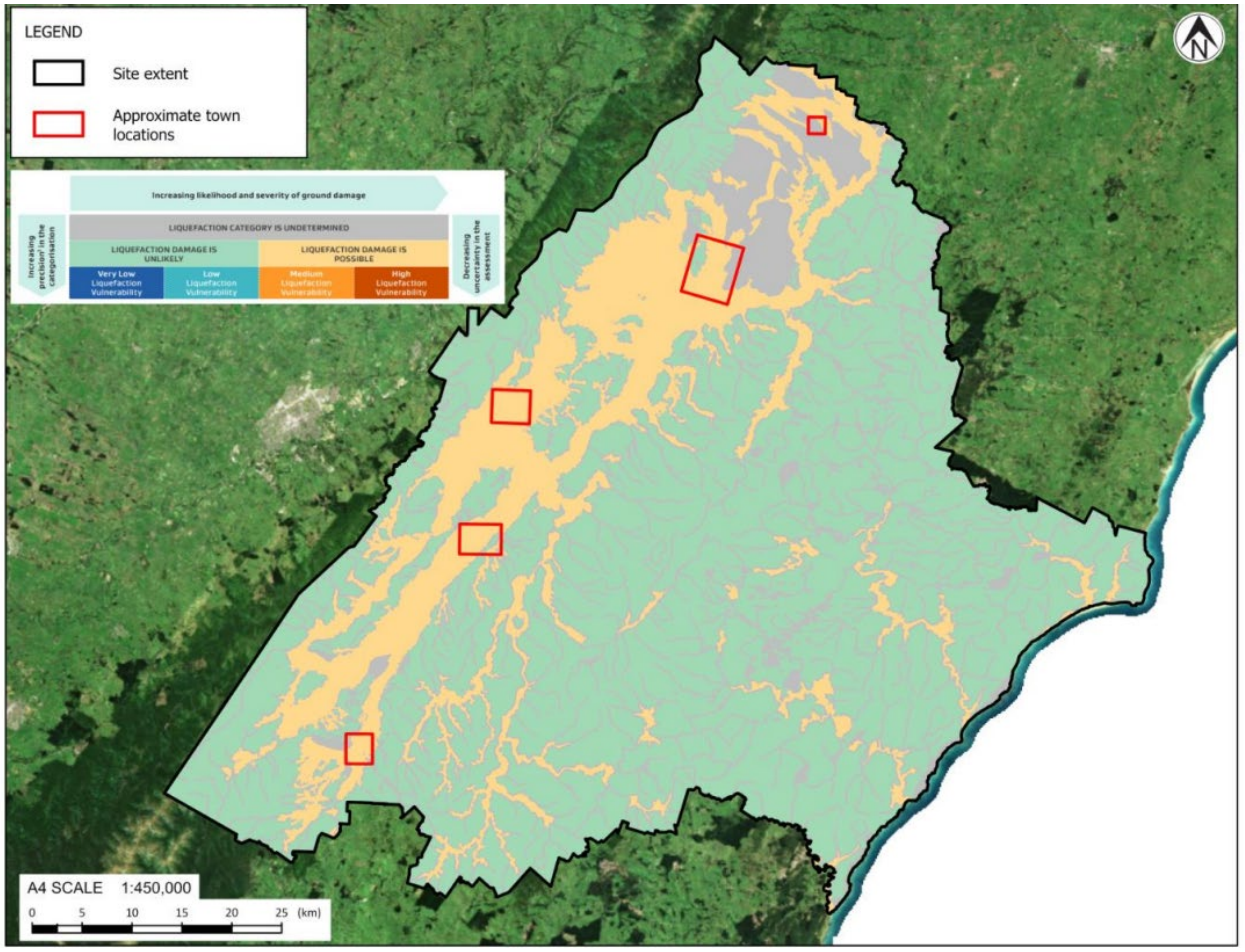


Figure 6. Liquefaction vulnerability classification assessed against performance criteria. Yellow indicates areas where liquefaction damage to buildings is possible, and green indicates areas where liquefaction damage to buildings is unlikely. Studies used to compile this map have relatively high uncertainty, so are unable to distinguish between low and very low risk, or between medium and high risk from liquefaction. In this case the recommendation is for more detailed site-specific investigations to be carried out for each prospective development.

Appendix 3 - Effect of fault ruptures on property

Kaikoura earthquake 2016: https://www.tasman.govt.nz/my-region/environment/environmental-management/natural-hazards/geological-hazards/earthquake-faults#:~:text=The%20Fault%20Rupture%20Risk%20Area%20rules%20require%20a%20geotechnical%20assessment,within%20the%20mapped%20Risk%20Area.

Figure 7 Consequence of a fault rupturing under a house, Kēkerengū Valley, Kaikōura earthquake 2016.