

## Section 32 Evaluation Report: Natural Hazards

### 1. Strategic Context

Section 32(1)(a) of the Resource Management Act 1991 requires that a Section 32 evaluation report must examine the extent to which the proposed objectives are the most appropriate way to achieve the purpose of the Act.

The purpose of the Act demands an integrated planning approach and direction:

#### *5 Purpose*

*(1) The purpose of this Act is to promote the sustainable management of natural and physical resources.*

*(2) In this Act, sustainable management means managing the use, development, and protection of natural and physical resources in a way, or at a rate, which enables people and communities to provide for their social, economic, and cultural well-being and for their health and safety while—*

*(a) sustaining the potential of natural and physical resources (excluding minerals) to meet the reasonably foreseeable needs of future generations; and*

*(b) safeguarding the life-supporting capacity of air, water, soil, and ecosystems; and*

*(c) avoiding, remedying, or mitigating any adverse effects of activities on the environment.*

Addressing natural hazards within the District Plan is required to enable people and communities to provide for their well-being and health and safety, and also to ensure effects arising from natural hazards are addressed in terms of section 5(2)(c).

### 2. Regional Planning Documents

The Regional Policy Statement is currently under Review, and may be further advanced in that process by the time the District Plan Review is notified. Amendments to this evaluation may be required to accommodate that change. The District Plan must *give effect* to the Operative Regional Policy Statement and must *have regard to* the Proposed Regional Policy Statement.

The Operative Regional Policy Statement 1998, contains a number of references to natural hazards in its Objectives and Policies:

#### **Objectives**

**11.4.1** *To recognise and understand the significant natural hazards that threaten Otago's communities and features.*

**11.4.2** To avoid or mitigate the adverse effects of natural hazards within Otago to acceptable levels.

**11.4.3** To effectively and efficiently respond to natural hazards occurring in Otago.

**11.4.4** To avoid, remedy or mitigate the adverse effects of hazard mitigation measures on natural and physical resources.

## **Policies**

**11.5.1** To recognise and provide for Kai Tahu values in natural hazard planning and mitigation.

**11.5.2** To take action necessary to avoid or mitigate the unacceptable adverse effect of natural hazards and the responses to natural hazards on:

- (a) Human life; and
- (b) Infrastructure and property; and
- (c) Otago's natural environment; and
- (d) Otago's heritage sites.

**11.5.3** To restrict development on sites or areas recognised as being prone to significant hazards, unless adequate mitigation can be provided.

**11.5.4** To avoid or mitigate the adverse effects of natural hazards within Otago through:

- (a) Analysing Otago's natural hazards and identifying their location and potential risk; and
- (b) Promoting and encouraging means to avoid or mitigate natural hazards; and
- (c) Identifying and providing structures or services to avoid or mitigate the natural hazard; and
- (d) Promoting and encouraging the use of natural processes where practicable to avoid or mitigate the natural hazard.

**11.5.5** To provide a response, recovery and restoration capability to natural hazard events through:

- (a) Providing civil defence capabilities; and
- (b) Establishing procedures and responsibilities to ensure quick responses to any natural hazard event; and
- (c) Identifying agency responsibilities for assisting recovery during and after events; and
- (d) Developing recovery measures incorporated into civil defence plans.

**11.5.6** To establish the level of natural hazard risk that threatened communities are willing to accept, through a consultative process.

**11.5.7** To encourage and where practicable support community-based responses to natural hazard situations.

In November 2014 a draft Regional Policy Statement was circulated for comment. Some of the relevant provisions are as follows:

**Objective 2.1** *Risk that natural hazards pose to Otago's communities is reduced.*

**Policy 2.1.1 Identifying natural hazards**

*Identify natural hazards that may adversely affect Otago's communities.*

**Policy 2.1.4 Assessing and managing natural hazard risk**

*Assess and manage natural hazard risk, and the current and future community's tolerance of that risk, having considered the consequences and likelihood of natural hazard events.*

**Policy 2.1.5 Managing natural hazard risk in subdivision, use and development decisions**

*Assess the suitability of any zoning, rezoning or activity with regard to:*

- a) Risk identified; and,*
- b) Any proposed measures to avoid, remedy or mitigate those risks, including relocation and recovery methods; and,*
- c) The long term viability of those measures in b above; and,*
- d) Flow-on effects on the risk of other uses; and,*
- e) The availability of, or ability to provide, services including waste and water infrastructure, lifeline utilities and emergency services, during and after a natural hazard event.*

**Policy 2.1.7 Avoiding new intolerable natural hazard risk**

*Manage activities so that natural hazard risk does not increase beyond tolerable levels, including by:*

- a) Avoiding zoning, activities or changes in land use which increase risk beyond tolerable levels; and*
- b) Encouraging designs that enable relocation or recovery from natural hazard events.*

Council has had regard to these provisions however Council recognises the draft RPS is still at a 'pre-notification' stage, and is incomplete with some sections (predominantly methods) acknowledged as being under development. It is therefore the view of Council that the draft RPS carries little weight at this stage. The proposed Plan Change gives effect to these and other parts of the operative RPS, by synthesising the objectives and policies through the provisions.

### **3. Resource Management Issues**

The resource management issues set out in this section have been identified from the following sources:

- Monitoring and review of Operative District Plan
- Consultation with the Otago Regional Council
- Legislative changes

The Issues are:

- Existing settlements within the District are subject to natural hazards. There is a need to recognise the existence of these hazards when undertaking development within existing settlements.
- In some instances the natural hazard risk is significant and development should be discouraged.
- Council's knowledge of natural hazards in the District is continually growing as further study is undertaken, including that in conjunction with the Otago Regional Council. Therefore it is important that the approach to addressing natural hazards in the District Plan can easily accommodate new information as it comes to light.
- Mapping natural hazards is an integral part of how Council manages, communicates and minimises the risk of natural hazards. The only natural hazard that is mapped in the operative and proposed Plans is flooding. All other hazards are mapped within Council's hazard database.
- Council is responsible for addressing natural hazards under a number of different pieces of legislation such as the Resource Management Act, the Local Government Act, the Building Act and the Civil Defence and Emergency Management Act.
- Private property rights are a relevant consideration in the wider approach to natural hazards. Providing provisions that are overly restrictive is counter-productive to sustainable management and the continued growth of the District.
- The operative Plan does not address natural hazards in a comprehensive manner. Some zones have natural hazards as an assessment matter, and others do not, despite being potentially subject to natural hazards. Additionally there are assessment criteria that are often worded differently across zones meaning there is a potential for an inconsistent approach to the assessment of natural hazards through the resource consent process.

#### **4. Purpose and Options**

The purpose of this chapter is to promote the sustainable management of the District with respect to natural hazards. Council has a responsibility under Section 31(1)(b) of the Act to address natural hazards:

##### ***“31 Functions of territorial authorities under this Act***

*(1) Every territorial authority shall have the following functions for the purpose of giving effect to this Act in its district:*

*b) the control of any actual or potential effects of the use, development, or protection of land, including for the purpose of—  
(i) the avoidance or mitigation of natural hazards”*

Furthermore, this reflects the intent of the proposed Strategic Directions Chapter as follows:

*Goal 2: The strategic and integrated management of urban growth*

*Objective 2 To manage development in areas affected by natural hazards, including fire.*

Determining the most appropriate methods to resolve the natural hazard issues identified will enable the Plan to give effect to relevant parts of the Strategic Directions Chapter through the management of development in areas affected by natural hazards, and ultimately meet the purpose of the Act.

## 5. Broad options considered to address issues

Four broad options were considered to address the issues:

**Option1: Status quo / no change:** Retain the current chapter and varying assessment criteria throughout the Plan.

**Option 2: Retain and improve:** Retain the existing approach to managing natural hazards – that is no rules (excluding flooding) using natural hazards as a trigger for needing resource consent. Instead focus on ensuring there is a consistent approach to how hazards are dealt with in the Plan and a consistent framework for the assessment of resource consents that includes natural hazard risk consideration as a matter for control / discretion.

**Option 3: Hazards database referred to in Plan but remains external to Plan:** This is the approach that is being used elsewhere including in the Proposed Auckland Unitary Plan. The approach requires a 'catch all' rule that requires consent if a site is shown as being subject to natural hazards in Council's natural hazards database. The database remains external to the Plan.

**Option 4: Retain and improve plus map all hazards in Plan.** This approach builds on Option 2 but also requires all hazards to be mapped in the Plan and use the presence of the mapped hazards as a trigger for consent.

The costs and benefits of these options are evaluated in the table below:

|              | <b>Option 1:<br/>Status quo/ No<br/>change</b>   | <b>Option 2:<br/>Retain and Improve</b>  | <b>Option 3:<br/>Hazards Database External<br/>to Plan but referred to in<br/>Plan.</b>  | <b>Option 4:<br/>Retain and Improve Plus map<br/>all hazards in Plan</b>   |
|--------------|--|--|--|--|
| <b>Costs</b> | Does not address all the identified issues nor address the lack of consistency in terms of assessment criteria across various zones. | Requires additional hazard information gathering.<br><br>Requires focus on zoning to ensure activities potentially susceptible to natural hazards e.g. subdivisions or new dwellings are subject to resource consent to enable consideration of natural hazards. | Requires additional hazard information gathering.<br><br>Potentially ultra vires as Plan relies upon external information to trigger need for resource consent which has not been subject to first schedule process. | Requires additional hazard information gathering.<br><br>Council does not currently have all natural hazards mapped for the entire District and to the same level of detail. Significant cost would be required to get natural hazards mapped.<br><br>Potential increased Plan publication costs with a separate series of hazard maps likely to be required.<br><br>As new hazard information comes to hand plan changes would be required. |

|                 |   |   |  |   |
|-----------------|---|---|--|---|
| <b>Benefits</b> | Retains the established approach which parties are familiar with. | Retains established approach but improves where necessary for clarity and assist implementation.<br><br>Keeping natural hazard information outside of the Plan ensures that the best available information is used when assessing and managing the risk from natural hazards. | Ensures the most up to date information is used to trigger the need for resource consent.<br><br>Keeping natural hazard information outside of the Plan ensures that the best available information is used when assessing and managing the risk from natural hazards. | This approach would allow a suite of rules to be linked to hazard maps, providing a high degree of certainty. |
| <b>Ranking</b>  | <b>3</b>  | <b>1</b>  | <b>2</b>   | <b>2</b>  |

## 5. Scale and Significance Evaluation

The level of detailed analysis undertaken for the evaluation of the proposed objectives and provisions has been determined by an assessment of the scale and significance of the implementation of the proposed provisions in the Natural Hazards Chapter. In making this assessment, regard has been had to the following, namely whether the objectives and provisions:

- Result in a significant variance from the existing baseline.
- Have effects on matters of national importance.
- Adversely affect those with specific interests, e.g, Tangata Whenua.
- Involve effects that have been considered implicitly or explicitly by higher order documents.
- Impose increased costs or restrictions on individuals, communities or businesses.

In this case both the scale and significance are high given the extent of natural hazard risk within the District, and the potential effects associated with this.



## 6. Evaluation of proposed Objectives S32 (1) (a)

The purpose of the Act is to promote the sustainable management of natural and physical resources. Council is required to undertake an evaluation of the proposed objectives of the proposal.

| <i>Objective</i>   | <i>Appropriateness</i>   |
|--|--|
| Objective 11.5.1 – The effects of natural hazards on the community and the built environment are minimised to tolerable levels.  | <p>Existing built areas of the District are subject to natural hazards. As such it is appropriate to ensure the effects of these natural hazards on these communities are minimised to tolerable levels. This approach recognises that avoidance is not always possible and in the context of the Queenstown Lakes District minimising effects to tolerable levels is a more appropriate approach.</p> <p>Tolerability is determined by the approach proposed in the draft RPS.</p>  |
| Objective 11.5.2 –Development on land subject to natural hazards only occurs where the risks to the community and the built environment are avoided or appropriately managed or mitigated. | <p>Whilst recognising existing built areas of the District are subject to natural hazards, that does not mean that further development in those areas is ‘a given’. In considering development proposals on land subject to natural hazards it is appropriate to allow development where the risks can be avoided or appropriately mitigated. This recognises that in some locations in the District ‘avoidance’ is not an option, and that mitigation can be an appropriate approach to address the natural hazard risk. It also recognises the importance of existing settlements to the District and the need to consolidate development in these areas rather than allow ongoing expansion.</p> <p>This objective also sets the framework for a risk-based approach, whereby the level of risk informs the extent to which the hazard needs to be addressed and the resultant planning response.</p> |
| Objective 11.5.3 –The community’s awareness and understanding of the natural hazard risk in the District is continually enhanced.  | <p>This objective recognises the fact that in some locations in the District existing developed areas are subject to natural hazard risks. In some instances the risk is mitigated to a degree, however ensuring the community is aware of these risks is an appropriate way to further mitigate the risk and to enable the community to be ‘in readiness’ for a natural hazard event. This also links with Council’s obligations under other Acts such as the Civil Defence and Emergency Management Act.</p>   |

The above objectives are considered to be the most appropriate methods of achieving the purpose of the Act, as they identify and give direction as to how natural hazard issues are to be addressed.

## 7. Evaluation of the proposed provisions S32 (1) (b)

(See also Table of options in Section 5 above.)

Objective 11.5.1 –The effects of natural hazards on the community and the built environment are minimised to tolerable levels.

Objective 11.5.2 –Development on land subject to natural hazards only occurs where the risks to the community and the built environment are avoided or appropriately managed or mitigated.

Objective 11.5.3 –The community's awareness and understanding of the natural hazard risk in the District is continually enhanced.

| <b><i>Proposed Provisions</i></b>            | <b><i>Costs</i></b>   | <b><i>Benefits</i></b>   | <b><i>Effectiveness and Efficiency</i></b>   |
|--|---|--|--|
| <p>Policies:</p> <p>11.5.1.1 to 11.5.1.5</p> | <p><b>Environmental</b></p> <p>Physical works undertaken to mitigate or minimise natural hazard risk can in themselves have adverse environmental effects (e.g visual).</p> <p><b>Economic</b></p> <p>There may be costs associated with undertaking developments in a manner that minimises natural hazards that are additional to typical development costs such as importation of fill material to increase floor levels.</p> <p><b>Social and Cultural</b></p> <p>There is the potential for activities necessary for the protection of existing settlements from natural</p> | <p><b>Environmental</b></p> <p>Development will not occur in locations where the natural hazard risk is intolerable.</p> <p>Enables appropriate responses for existing settlements that are exposed to known hazards, balancing the need to address risk whilst acknowledging that there may be an acceptance of a level of risk in some cases. Over time, as existing settlements continue to be developed and/or redeveloped their resilience to the risks associated with hazards will increase.</p> <p><b>Economic</b></p> <p>Providing a policy framework that allows for natural hazard mitigation provides for greater certainty for Plan</p> | <p>Council has a role to play in ensuring the risks of natural hazards on the community and the built environment are of a nature that is 'tolerable'. This includes restricting the establishment of activities that have the potential to increase the effects natural hazards can have on the community and built environment of the Queenstown Lakes District. It would be neither effective nor efficient to not acknowledge the natural hazard risk that the District is subject to.</p> |

| <b><i>Proposed Provisions</i></b>           | <b><i>Costs</i></b>  | <b><i>Benefits</i></b>  | <b><i>Effectiveness and Efficiency</i></b>  |
|---|--|---|---|
|   | <p>hazards to have impacts on cultural values through land disturbance or the disturbance of items of cultural or historic value.</p>  | <p>users.</p> <p>Reducing the risk natural hazards pose to the existing built environment.</p> <p>Avoids unnecessary costs created by activities that increase the effects natural hazards may or can have on the community.</p> <p><b><i>Social and Cultural</i></b></p> <p>Avoidance or mitigation of the social costs of natural hazard events on communities.</p>   |   |
| <p>Policies</p> <p>11.5.2.1 to 11.5.2.5</p> | <p><b><i>Environmental</i></b></p> <p>New approaches to building (such as raising floor levels) to address natural hazard risks could have consequences in terms of changes of built form or heights of structures in existing developed areas.</p> <p><b><i>Economic</i></b></p> <p>Land that is discovered to be unsuitable for development due to natural hazard risk will have potentially a decreased market value.</p> <p>Undertaking development in a manner that mitigates natural hazard risk may reduce the total development 'yield' of a property.</p> | <p><b><i>Environmental</i></b></p> <p>Development can occur on existing zoned land, subject to appropriately addressing natural hazards issues, providing for compact urban form.</p> <p>Promoting the use of natural features in addressing natural hazard risk provides for a less modified landscape.</p> <p>Using sites in a manner that recognises their limitations in natural hazards terms (micro-siting) can ensure land is used in an appropriate manner.</p> <p><b><i>Economic</i></b></p> <p>Using natural features and buffers to address natural hazard risk requires</p> | <p>Given that parts of the District are subject to natural hazards but also subject to high growth there is the need to adequately balance the need for development against natural hazard risk. It is recognised that there are areas of the District that are subject to natural hazards to the extent that the sites are unsuitable for development. It is also recognised that on other sites subject to natural hazard risk there are mechanisms available to provide mitigation of that risk and Council seeks to encourage mitigation. It is considered this approach provides an appropriate balance between the efficient use of land and effective natural hazard avoidance and mitigation.</p> |

| <b><i>Proposed Provisions</i></b>           | <b><i>Costs</i></b>   | <b><i>Benefits</i></b>  | <b><i>Effectiveness and Efficiency</i></b>  |
|---|---|---|---|
|   | <p><b><i>Social and Cultural</i></b></p> <p>It may be that parts of existing settlements are unsuitable for further development, or in a worse case scenario need to be abandoned.</p>  | <p>less investment than hard structures.</p> <p>Acknowledges that there will be instances where infrastructure will need to be located on land subject to natural hazard risk.</p> <p><b><i>Social and Cultural</i></b></p> <p>Addressing natural hazards ensures the existing cultural and social fabric of the District is appropriately protected. This includes the protection of sites with heritage or cultural value, where achievable.</p>  |   |
| <p>Policies</p> <p>11.5.3.1 to 11.5.3.4</p> | <p><b><i>Environmental</i></b></p> <p>None</p> <p><b><i>Economic</i></b></p> <p>The collection of information regarding natural hazards has costs. Council will seek to share these with the Otago Regional Council.</p> <p>Those undertaking developments will have to undertake investigations into the natural hazard context of their site.</p> <p>Monitoring natural hazards requires ongoing investment by Council.</p> | <p><b><i>Environmental</i></b></p> <p>Compiling and maintaining a natural hazard database helps ensure Council has natural hazard information to make sound resource management decisions on.</p> <p><b><i>Economic</i></b></p> <p>Monitoring natural hazard trends enables Council to be proactive in managing natural hazard risk and potentially reducing the costs of an event through preparation.</p> <p>Making natural hazards information available to the public enables those contemplating development to be aware of the potential costs of</p> | <p>Council has a responsibility not only to address hazards in the District Plan, but also to gather the information necessary to effectively manage natural hazards and share this information with the public. This is required to ensure the residents of the District can effectively plan for natural hazard events through being aware of the potential risks posed by hazards. It also enables those contemplating development to be aware of the potential natural hazards that will need to be addressed through the development process, in both Resource Consent and Building Consent processes.</p> |

| <b><i>Proposed Provisions</i></b> | <b><i>Costs</i></b>   | <b><i>Benefits</i></b>  | <b><i>Effectiveness and Efficiency</i></b> |
|-----------------------------------|---|---|--|
|                                   | <p>There are costs associated with publishing and disseminating material on natural hazards and making natural hazard information available on Council's website.</p> <p>Funding may not be available for the collection of information.</p> <p><b><i>Social and Cultural</i></b></p> <p>People may have to adopt new or enhanced behaviours to ensure they are adequately prepared for a natural hazard event.</p> <p>Making people aware of natural hazard risks without appropriately communicating the level of risk could create an unnecessary climate of 'fear'.</p> | <p>development in terms of natural hazards mitigation which can be factored in to project budgeting.</p> <p><b><i>Social and Cultural</i></b></p> <p>Enhancing the community's awareness of natural hazards can help ensure the community is prepared for a natural hazard event.</p> <p>A natural hazards database can assist Council in planning for natural hazard events.</p> |  |

## **8. Efficiency and effectiveness of the provisions.**

The above provisions are drafted to specifically address the resource management issues identified with the current provisions, and to enhance those provisions that already function well. A number of areas of the existing chapter have been revised to aid the readability of the Plan by keeping the provisions at a minimum. Further to this natural hazards assessment criteria in various chapters will be removed, whilst inserting a consistent matter of discretion relating to natural hazards under.

Through the inclusion of additional objectives and policies the natural hazard provisions of the Plan are strengthened and enable a more consistent consideration of natural hazards within the Plan than the current Plan provisions allow. The policies also provide guidance to those preparing or considering resource consent applications.

## **9. The risk of not acting.**

It is considered that there is sufficient information available on which to base the above evaluation.

Council will continue to gather natural hazards information in conjunction with the Otago Regional Council and as such will continue to add to the depth and breadth of information in the hazards database. This information can be used in decision making processes and will also inform future Plan reviews.