

# **Proposed District Plan Change 6**

**HUTT RIVER FLOOD HAZARD AREAS**

**Submissions Close: 22 April 2005 at 4.00pm**

## **PROPOSED PLAN CHANGE 6 - HUTT RIVER FLOOD HAZARD AREAS**

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The main features of this proposed Plan Change which include amendments to Issues, Objectives, Policies, Explanation and Reasons, Rules and Anticipated Environmental Results to chapters of the District Plan are as follows:

- (a) Buildings and structures on the riverside of the building setback line are not to be permitted activities.
- (b) Buildings and structures within the 1 in 100-year flood extent are to have floor levels raised above the 100-year flood level although minor additions and new accessory buildings (20m<sup>2</sup> or less) will be permitted activities subject to conditions.
- (c) Buildings and structures in the Primary or Secondary River Corridor that are 20m<sup>2</sup> or less and have a minimum setback of 20m or more from any flood protection structure will be permitted activities.

The following Activity Areas will be updated to reflect the Hutt River flood hazard: General Residential, Suburban Commercial, General Business, Avalon Business, General Recreation, River Recreation and General Rural as well as the Utilities, Natural Hazard and Earthworks chapters of the District Plan.

### **Changes to Chapter 1 - Introduction and scope of the Plan**

Chapter 1, "Relationship of this plan to documents prepared by central and regional government". Make amendments to the following:

1. **Add heading and explanation** to "1.3(b) Regional Documents" the following:

**"(vi) Hutt River Floodplain Management Plan**

The Wellington Regional Council has produced the Hutt River Floodplain Management Plan. The Plan recognises the importance and influence of the river in terms of flood risk and the river's amenity values. Strategic solutions are proposed to manage the flood risk to the Hutt Valley. These solutions are of a structural (physical works) and non-structural (managing land use and development, and emergency management planning) nature together with an environmental strategy. The Plan is a framework for ongoing programmes."

## Changes to Chapter 3 – Definitions

Chapter 3, “Definitions”. Make amendments to the following:

2. **Add** to Chapter 3 the following definitions:

“Flood Protection Structure - physical assets (including land) managed and maintained by The Wellington Regional Council for the purpose of flood protection, such as stopbanks, flood gates, debris traps, river berms, bank-edge works and plantings.”

“Flood Hazard - the potential for damage to property or people due to flooding and associated erosion.”

“Flood Hazard Effects - the negative impacts of flooding caused by fast flowing or deep-ponded flood waters. Fast-flowing or ponded flood waters are dangerous for people, becoming more severe where floods affect urban areas. These effects also include damage to the flood protection system, and other structures and buildings by water and debris, or by erosion.”

“River Corridor - includes land immediately adjacent to the river. It is the minimum area able to contain a major flood and enable the water to pass safely to the sea. Due to its location, the river corridor represents a significant flooding and erosion hazard to people, buildings and structures, including the flood defences, sited in the corridor. The river corridor comprises both primary and secondary areas.”

“Primary River Corridor - contains fast flowing water and includes areas that are prone to erosion.”

“Secondary River Corridor - contains fast flowing water, but the erosion risk is not as significant as the Primary River Corridor.”

“Building Setback Line - land on the landward side of the building setback line is protected by flood protection structures up to a 100-year flood event. Land on the riverside of the line is at risk of erosion from the Hutt River.”

“100-Year Flood – a 100-year flood in the Hutt River is equal to a 1 in 100 year event and currently has a magnitude of approximately 1900 cubic metres of water per second measured at Taita. It has about a 1% chance of being equalled or exceeded in any one year.”

“Building Floor Level – (in relation to flooding) means the underside of floor joist for timber structures or, for concrete slabs, shall be 150mm below the finished top of the slab.”

## Changes to Chapter 4 - Residential

Chapter 4A, “General Residential Activity Area”. Make amendments to the following:

3. **Add** new 4A 1.2.2 “Heading”, “Issue”, “Objective”, “Policies” and “Explanation and Reasons” as follows:

### 4A 1.2.2 Effects of the Hutt River Flood Hazard

#### Issue

Areas not protected by flood protection structures are at a risk of flooding by the Hutt River. The size, scale and location of buildings and structures need to be managed to avoid or mitigate adverse flood hazard effects.

#### Objective

To avoid or mitigate adverse flood hazard effects on existing and new development within areas susceptible to a 100-year flood event from the Hutt River.

#### Policies

**(a)** To ensure that all buildings and structures on sites immediately adjacent to the Hutt River (see planning map E3) are appropriately located to avoid damage from erosion hazards of the Hutt River.

**(b)** To ensure that all buildings and structures (including additions that are more than minor to existing buildings and structures) on sites identified within the 100-year flood extent have floor levels constructed above the 1 in 100-year flood event.

**(c)** To establish a maximum limit on area for additions to the gross floor area of existing buildings or structures as at 1 March 2005 on sites identified within the 100-year flood extent.

**(d)** That minor additions (not more than 20m<sup>2</sup>) to existing buildings and structures on sites identified within the 100-year flood extent are permitted.

- (e)** That all buildings and structures do not create adverse flood hazard effects for other land, buildings and structures off-site.
- (f)** That new accessory buildings on sites identified within the 100-year flood extent are permitted, subject to a maximum gross floor area.
- (g)** To discourage the siting of buildings and structures in the Primary and Secondary River Corridors.
- (h)** To ensure that buildings and structures in the Primary or Secondary River Corridor of the Hutt River have no more than minor adverse effects on flood protection structures.
- (i)** To mitigate the effects of flood hazards on building and structures in the Primary and Secondary River Corridors by managing their location, size and scale.
- (j)** That any remaining risk that arises will be dealt with by emergency management procedures and other voluntary actions.

#### Explanation and Reasons

In established areas of the Hutt River corridor and floodplain it is accepted that appropriate development must be able to continue, although landowners and developers will be expected to reduce flood hazard effects to an acceptable level. These effects are described in the Hutt River Floodplain Management Plan. Buildings and structures need to be located so they are not in a position likely to subside as a result of erosion or flooding, damaging other buildings and structures such as flood protection structures in the River Corridor.

Buildings and structures in the Primary or Secondary River Corridor of the Hutt River could adversely affect flood protection structures. Buildings and structures in the river corridor will also be subject to effects of fast flowing water, deep flooding and erosion. The outcomes identified in the Hutt River Floodplain Management Plan are relevant and should be taken into account in any assessment of effects. It is important that buildings and structures are discouraged in the Primary and Secondary River Corridors. It is therefore appropriate to control the location of buildings and structures.

In order to ensure that flood hazard effects are managed, minimum conditions are specified.

Emergency management procedures and other voluntary actions will be initiated in the event of severe flooding in an effort to minimise the damage to properties and prevent injury and loss of life to people.

**(a) Building Setback Line**

A building setback line (see planning map E3) has been established to ensure that all buildings and structures on properties immediately adjacent to the Hutt River are not located in a position where they are at risk from erosion by the Hutt River. Land on the riverside of the line could be subject to erosion over time due to the flow, velocity and meander patterns of the Hutt River. Buildings and structures on the riverside of the line require a resource consent. Buildings and structures on the landward side of the line that comply with the Permitted Activity Conditions for the General Residential Activity Area do not require a resource consent. At Belmont, erosion protection works have been undertaken on the riverside of the building setback line. These works have substantially increased the protection to Belmont from erosion. The remaining level of risk from erosion is now low when compared to an unprotected bank, though Council must manage this risk through appropriate rules in the District Plan and emergency management procedures.

**(b) Floor levels**

A limited number of properties in Belmont and at the entrance to Stokes Valley have been identified as being within the 100-year flood extent (see planning maps D3, E3, G1). These properties are not protected by stopbanks. All buildings and structures, including additions that are more than minor, are required to have floor levels constructed above the 1 in 100-year flood event. This floor level is to minimise the flood hazard effects to buildings and structures up to a 100-year flood event. Council must manage the flood risk through appropriate rules in the District Plan and emergency management procedures.

Minor additions to existing buildings and structures not in excess of 20m<sup>2</sup> gross floor area are permitted at existing floor levels for properties within the 100-year flood extent. New accessory buildings not in excess of 20m<sup>2</sup> gross floor area are also permitted. The 20m<sup>2</sup> threshold relates to a desire to permit some building as of right without the need to require a raised floor level. In setting the 20m<sup>2</sup> limit Council needed to determine at what point the potential adverse effects of the buildings, on the flood hazard should be considered. It is considered that allowing development of 20m<sup>2</sup> would not significantly increase the flood hazard risk."

4. **Add to Rule 4A 2.1.1 “Permitted Activities – Conditions” the following:**

**“(w) Sites in Belmont that contain the building setback line (see planning map E3):**

No part of any building or structure shall be constructed on the riverside of the building setback line.

**(x) Buildings and Structures within the 1 in 100-year flood extent (see planning maps D3, E3 and G1):**

In addition to the other Permitted Activity Conditions, the following shall apply in this area:

- (i) All buildings and structures shall have a floor level above the 1 in 100-year flood level; except:
- (ii) Minor additions to existing buildings and structures are a Permitted Activity provided:
  - the floor level of additions is not below the floor level of the existing building or structure; and
  - the gross floor area of all additions does not exceed 20m<sup>2</sup> to the gross floor area of the building or structure existing as at 1 March 2005.
- (iii) New accessory buildings shall not exceed a total gross floor area of 20m<sup>2</sup>.

**(y) Primary and Secondary River Corridors**

All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area of 20m<sup>2</sup> or less and with a setback of 20m or more from a flood protection structure.”

5. **Add to Rule 4A 2.3 “Restricted Discretionary Activities” the following:**

**“(f)** All buildings and structures that are sited wholly or in part on the riverside of the building setback line in Belmont.

**(g)** All buildings and structures within the 1 in 100-year flood extent that do not comply with the Permitted Activity Conditions for floor levels or total gross floor area.

**(h)** All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area greater than 20m<sup>2</sup> or with a setback less than 20m from a flood protection structure.”

6. **Add** to “Matters in which Council has Restricted its Discretion and Standards and Terms” the following:

**“(f) All buildings and structures that are sited wholly or in part on the riverside of the building setback line in Belmont.**

(i) In assessing proposals, Council will be guided by the degree to which buildings and structures further increase:

- The risk to people of exposure to the erosion hazard; and
- Any mitigation measures that are proposed.

**(g) All buildings and structures within the 1 in 100-year flood extent that do not comply with the Permitted Activity Conditions for floor levels or total gross floor area.**

(i) In assessing proposals, Council will be guided by the degree to which buildings and structures further increase:

- The risk to people of exposure to the flood hazard; and
- The flood hazard effects for land, buildings and structures off-site.

**(h) All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area greater than 20m<sup>2</sup> or with a setback less than 20m from a flood protection structure.**

- Proximity of buildings and structures to flood protection structures;
- Adverse effects of the flood hazard on buildings and structures and on flood protection structures; and
- The risk to people of exposure to the flooding and erosion hazard.”

7. **Add** to 4A 3 “Anticipated Environmental Results” the following:

**“(g) To protect buildings and structures from potential erosion and flooding of land by the Hutt River.**

**(h) The scale, size and location of buildings and structures will have adverse effects which are no more than minor on flood protection structures.**

**(i) The adverse effects on buildings and structures in the Primary and Secondary River Corridors will be avoided or mitigated”**



## Changes to Chapter 5 – Commercial

Chapter 5C, “Suburban Commercial Activity Area”. Make amendments to the following:

8. **Add** new 5C 1.2.3 “Heading”, “Issue”, “Objective”, “Policies” and “Explanation and Reasons” as follows:

“5C 1.2.3 Effects of the Hutt River Flood Hazard

Issue

Areas not protected by flood protection structures are at a risk of flooding by the Hutt River. The size, scale and location of buildings and structures need to be managed to avoid or mitigate adverse flood hazard effects.

Objective

To avoid or mitigate adverse flood hazard effects on existing and new development within areas susceptible to a 100-year flood event from the Hutt River.

Policies

**(a)** To ensure that all buildings and structures (including additions that are more than minor to existing buildings and structures) on sites identified within the 100-year flood extent have floor levels constructed above the 1 in 100-year flood event.

**(b)** To establish a maximum limit on area for additions to the gross floor area of existing buildings or structures as at 1 March 2005 on sites identified within the 100-year flood extent.

**(c)** That minor additions (not more than 20m<sup>2</sup>) to existing buildings and structures on sites identified within the 100-year flood extent are permitted.

**(d)** That all buildings and structures do not create adverse flood hazard effects for other land, buildings and structures off-site.

**(e)** That new accessory buildings on sites identified within the 100-year flood extent are permitted, subject to a maximum gross floor area.

**(f)** That any remaining risk that arises will be dealt with by emergency management procedures and other voluntary actions.

## Explanation and Reasons

In established areas of the Hutt River corridor and floodplain it is accepted that appropriate development must be able to continue, although landowners and developers will be expected to reduce flood hazard effects to an acceptable level. These effects are described in the Hutt River Floodplain Management Plan. Buildings and structures need to be located so they are not in a position likely to subside as a result of erosion or flooding, damaging other buildings and structures such as flood protection structures in the river corridor.

In order to ensure that flood hazard effects are managed, minimum conditions are specified.

Emergency management procedures and other voluntary actions will be initiated in the event of severe flooding in an effort to minimise the damage to properties and prevent injury and loss of life to people.

### (a) Floor levels

A limited area at the entrance to Stokes Valley has been identified as being within the 100-year flood extent (see planning map G1). This area is not protected by a stopbank. All buildings and structures, including additions that are more than minor, are required to have floor levels constructed above the 1 in 100-year flood event. This floor level is to minimise the flood hazard effects to buildings and structures up to a 100-year flood event. Council must manage the flood risk through appropriate rules in the District Plan and emergency management procedures.

Minor additions to existing buildings and structures not in excess of 20m<sup>2</sup> gross floor area are permitted at existing floor levels for properties within the 100-year flood extent. New accessory buildings not in excess of 20m<sup>2</sup> gross floor area are also permitted. The 20m<sup>2</sup> threshold relates to a desire to permit some building as of right without the need to require a raised floor level. In setting the 20m<sup>2</sup> limit Council needed to determine at what point the potential adverse effects of the buildings, on the flood hazard should be considered. It is considered that allowing development of 20m<sup>2</sup> would not significantly increase the flood hazard risk."

9. **Add to Rule 5C 2.1.1 "Permitted Activity - Conditions" the following:**

#### **"(n) Buildings and Structures within the 1 in 100-year flood extent (see planning map G1):**

In addition to the other Permitted Activity Conditions, the following shall apply in this area:

- (i) All buildings and structures shall have a floor level above the 1 in 100-year flood level; except:
- (ii) Minor additions to existing buildings and structures are a Permitted Activity provided:
  - the floor level of additions is not below the floor level of the existing building or structure; and
  - the gross floor area of all additions does not exceed 20m<sup>2</sup> to the gross floor area of the building or structure existing as at 1 March 2005.
- (iv) New accessory buildings shall not exceed a total gross floor area of 20m<sup>2</sup>.

And renumber Rule 5C 2.1.1 (n) General Rules to (o) General Rules.”

10. **Add to Rule 5C 2.2 “Restricted Discretionary Activities” the following:**

**“(d) All buildings and structures within the 1 in 100-year flood extent that do not comply with the Permitted Activity Conditions for floor levels or total gross floor area.”**

11. **Add to “Matters in which Council has Restricted its Discretion and Standards and Terms” the following:**

**“(d) All buildings and structures within the 1 in 100-year flood extent that do not comply with the Permitted Activity Conditions for floor levels or total gross floor area.**

(i) In assessing proposals, Council will be guided by the degree to which buildings and structures further increase:

- The risk to people of exposure to the flood hazard; and
- The flood hazard effects for land, buildings and structures off-site.”

12. **Add to 5C 3 “Anticipated Environmental Results” the following:**

**“(d) To protect buildings and structures from potential flooding of land by the Hutt River.**

**(e) The scale, size and location of buildings and structures will have adverse effects which are no more than minor on flood protection structures.”**

## Changes to Chapter 6 – Business

Chapter 6A, “General Business Activity Area”. Make amendments to the following:

13. **Add** new 6A 1.2.3 “Heading”, “Issue”, “Objective”, “Policies” and “Explanation and Reasons” as follows:

“6A 1.2.3 Effects of the Hutt River Flood Hazard

Issue

Buildings and structures within the Primary or Secondary River Corridor of the Hutt River are subject to flood hazard effects and can also have adverse effects on flood protection structures. The size, scale and location of buildings and structures need to be managed to avoid or mitigate these adverse effects.

Objectives

To avoid or mitigate adverse flood hazard effects on buildings and structures.

To avoid or mitigate adverse flood hazard effects on flood protection structures.

Policies

**(a)** To discourage the siting of buildings and structures in the Primary and Secondary River Corridors.

**(b)** To ensure that buildings and structures in the Primary or Secondary River Corridor of the Hutt River have no more than minor adverse effects on flood protection structures.

**(c)** To mitigate the effects of flood hazards on buildings and structures in the Primary and Secondary River Corridors by managing their location, size and scale.

Explanation and Reasons

Buildings and structures which are inappropriately located can have adverse effects on adjoining activities. Buildings and structures in the Primary or Secondary River Corridor of the Hutt River could adversely affect flood protection structures. Buildings and structures in the river corridor will also be subject to effects of fast flowing water, deep

flooding and erosion. The outcomes identified in the Hutt River Floodplain Management Plan are relevant and should be taken into account in any assessment of effects. It is important that buildings and structures are discouraged in the Primary and Secondary River Corridors. It is therefore appropriate to control the location of buildings and structures.

In order to ensure that flood hazard effects are managed, minimum conditions are specified."

14. **Add** to Rule 6A 2.1.1 "(b) Setback Requirements" the following:

"All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area of 20m<sup>2</sup> or less and with a setback of 20m or more from a flood protection structure."

15. **Add** to **Rule** 6A 2.3 "Restricted Discretionary Activities" the following:

"(h) All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area greater than 20m<sup>2</sup> or with a setback less than 20m from a flood protection structure."

16. **Add** to "Matters in which Council has Restricted its Discretion and Standards and Terms" the following:

"(h) **All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area greater than 20m<sup>2</sup> or with a setback less than 20m from a flood protection structure.**

- Proximity of buildings and structures to flood protection structures; and
- Adverse effects of the flood hazard on buildings and structures and on flood protection structures."

17. **Add** to 6A 3 "Anticipated Environmental Results" the following:

"(f) The scale, size and location of buildings and structures will have adverse effects which are no more than minor on flood protection structures.

(g) The adverse effects on buildings and structures in the Primary and Secondary Rivers Corridors will be avoided or mitigated."

Chapter 6C, "Avalon Business Activity Area". Make amendments to the following:

18. **Add** new 6C 1.2.2 "Heading", "Issue", "Objective", "Policies" and "Explanation and Reasons" as follows:

"6C 1.2.2 Effects of the Hutt River Flood Hazard

Issue

Buildings and structures within the Secondary River Corridor of the Hutt River can have adverse effects on flood protection structures. The size, scale and location of buildings and structures need to be managed to avoid or mitigate these adverse effects.

Objective

To avoid or mitigate adverse flood hazard effects on flood protection structures.

Policies

**(a)** To discourage the siting of buildings and structures in the Secondary River Corridor.

**(b)** To ensure that buildings and structures in the Secondary River Corridor of the Hutt River have no more than minor adverse effects on flood protection structures.

Explanation and Reasons

Buildings and structures which are inappropriately located can have adverse effects on adjoining activities. Buildings and structures in the Secondary River Corridor of the Hutt River could adversely affect flood protection structures. The outcomes identified in the Hutt River Floodplain Management Plan are relevant and should be taken into account in any assessment of effects. It is important that buildings and structures are discouraged in the Secondary River Corridor. It is therefore appropriate to control the location of buildings and structures.

In order to ensure that flood hazard effects are managed, minimum conditions are specified."

19. **Add to Rule 6C 2.1.1 “Permitted Activities – Conditions” the following:**
- “(n) Secondary River Corridor**
- All new buildings and structures or additions in the Secondary River Corridor with a gross floor area of 20m<sup>2</sup> or less and with a setback of 20m or more from a flood protection structure.
- And renumber Rule 6C 2.1.1 (n) General Rules to (o) General Rules.”
20. **Add to Rule 6C 2.2 “Restricted Discretionary Activities” the following:**
- “(c) All new buildings and structures or additions in the Secondary River Corridor with a gross floor area greater than 20m<sup>2</sup> or with a setback less than 20m from a flood protection structure.”**
21. **Add to “Matters in which Council has Restricted its Discretion and Standards and Terms” the following:**
- “(c) All new buildings and structures or additions in the Secondary River Corridor with a gross floor area greater than 20m<sup>2</sup> or with a setback less than 20m from a flood protection structure.**
- Proximity of buildings and structures to flood protection structures; and
  - Adverse effects on flood protection structures.”
22. **Add to 6C 3 “Anticipated Environmental Results” the following:**
- “(d) The scale, size and location of buildings and structures will have adverse effects which are no more than minor on flood protection structures.”**

## **Changes to Chapter 7 - Recreation and Open Space**

Chapter 7A, “General Recreation Activity Area”. Make amendments to the following:

23. **Add to 7A 1.2.1 “Issue” as the second to last sentence the following:**
- “Buildings and structures within the Primary or Secondary River Corridor of the Hutt River are subject to flood hazard effects and can also have adverse effects on flood protection structures.”**

24. **Add** to 7A 1.2.1 “Policies” the following:
- “(f) To mitigate the effects of flood hazards on buildings and structures in the Primary and Secondary River Corridors by managing their location, size and scale.
- (g) To discourage the siting of buildings and structures in the Primary and Secondary River Corridors.
- (h) To ensure that buildings and structures in the Primary or Secondary River Corridor of the Hutt River have no more than minor adverse effects on flood protection structures.”
25. **Amend** second paragraph of “Explanation and Reasons” as follows:
- “Buildings and structures which are inappropriately located can have adverse effects on adjoining activities. Buildings and structures in the Primary or Secondary River Corridor of the Hutt River could adversely affect flood protection structures. Buildings and structures in the river corridor will also be subject to effects of fast flowing water, deep flooding and erosion. The outcomes identified in the Hutt River Floodplain Management Plan are relevant and should be taken into account in any assessment of effects. It is important that buildings and structures are discouraged in the Primary and Secondary River Corridors. It is therefore appropriate to control the location of buildings and structures.”
26. **Add** new 7A 1.2.2 “Heading”, “Issue”, “Objective”, “Policies” and “Explanation and Reasons” as follows:
- “7A 1.2.2 Effects of the Hutt River Flood Hazard
- Issue
- Areas not protected by flood protection structures are at a risk of flooding by the Hutt River. The size, scale and location of buildings and structures need to be managed to avoid or mitigate adverse flood hazard effects.
- Objective
- To avoid or mitigate adverse flood hazard effects on new development within areas susceptible to a 100-year flood event from the Hutt River.



## Policies

**(a)** To ensure that all buildings and structures on sites identified within the 100-year flood extent have floor levels constructed above the 1 in 100-year flood event.

**(b)** That all buildings and structures do not create adverse flood hazard effects for other land, buildings and structures off-site.

**(c)** That any remaining risk that arises will be dealt with by emergency management procedures and other voluntary actions.

## Explanation and Reasons

Buildings and structures need to be located so they are not in a position likely to subside as a result of erosion or flooding, damaging other buildings and structures such as flood protection structures in the river corridor. In order to ensure that flood hazard effects are managed, minimum conditions are specified.

Emergency management procedures and other voluntary actions will be initiated in the event of severe flooding in an effort to minimise the damage to properties and prevent injury and loss of life to people.

### **(a)** Floor levels

A limited area at the entrance to Stokes Valley has been identified as being within the 100-year flood extent (see planning map G1). This area is not protected by a stopbank. All buildings and structures are required to have floor levels constructed above the 1 in 100-year flood event. This floor level is to minimise the flood hazard effects to buildings and structures up to a 100-year flood event. Council must manage the flood risk through appropriate rules in the District Plan and emergency management procedures.

27. **Add to Rule 7A 2.1.1 “(d) Building Coverage and Size of Structures”** the following:

“(iv) All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area of 20m<sup>2</sup> or less and with a setback of 20m or more from a flood protection structure.”

28. Add new **Rule 7A 2.1.1** as follows:

**“(k) Buildings and Structures within the 1 in 100-year flood extent (see planning map G1):**

In addition to the other Permitted Activity Conditions, the following shall apply in this area:

(i) All buildings and structures shall have a floor level above the 1 in 100-year flood level.

And renumber (k) General Rules to (l) General Rules.”

29. Add to **Rule 7A 2.2 “Restricted Discretionary Activities”** the following:

**“(e) All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area greater than 20m<sup>2</sup> or with a setback less than 20m from a flood protection structure.**

**(f) All buildings and structures within the 1 in 100-year flood extent that do not comply with the Permitted Activity Conditions for floor levels.”**

30. Add to “Matters in which Council has Restricted its Discretion and Standards and Terms” the following:

**“(e) All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area greater than 20m<sup>2</sup> or with a setback less than 20m from a flood protection structure.**

- Proximity of buildings and structures to flood protection structures; and
- Adverse effects of the flood hazard on buildings and structures and on flood protection structures.

**(f) All buildings and structures within the 1 in 100-year flood extent that do not comply with the Permitted Activity Conditions for floor levels.**

(i) In assessing proposals, Council will be guided by the degree to which buildings and structures further increase:

- The risk to people of exposure to the flood hazard; and
- The flood hazard effects for land, buildings and structures off-site.”

31. **Amend** and **add** to 7A 3 “Anticipated Environmental Results” the following:

“(c) The scale, size, location and external appearance of buildings and structures will have adverse effects which are no more than minor on amenity values and flood protection structures.

(d) Adverse effects of recreation activities on adjoining flood protection structures will be avoided, remedied or mitigated.

(e) The adverse effects on buildings and structures in the Primary and Secondary Rivers Corridors will be avoided or mitigated.

(f) To protect buildings and structures from potential flooding of land by the Hutt River.”

Chapter 7C – River Recreation Activity Area. Make amendments to the following:

32. **Add** to 7C 1.1.3 “Issue” as the first two sentences as follows:

“The River Recreation Activity Area that is contained within the Primary and Secondary River Corridors is exposed to a significant flood hazard. Activities need to avoid or mitigate potential adverse flood hazard effects associated with these higher-risk areas.”

33. **Amend** policy (a) 7C 1.1.3 “Policies” as follows:

“To ensure that recreation activities on the surface of rivers and margins have *no more than minor* adverse effects on flood protection structures.”

34. **Add** to 7C 1.1.3 “Policies” the following:

“(e) To ensure that any other activities in the Primary or Secondary River Corridor of the Hutt River have no more than minor adverse effects on flood protection structures.”

35. **Add** to 7C 1.1.3 “Explanation and Reasons” as the second paragraph the following:

“Activities in the Primary or Secondary River Corridor of the Hutt River could adversely affect flood protection structures. Additionally, there is the possibility of people being put at risk by activities that allow them to live, work or congregate in the activity area. It is important that any activity in the Primary or Secondary River Corridor

shall mitigate adverse effects. The outcomes identified in the Hutt River Floodplain Management Plan are relevant and should be taken into account in any assessment of effects.”

### **Changes to Chapter 8 – Rural**

Chapter 8B, “General Rural Activity Area”. Make amendments to the following:

36. **Amend** 8B 1.2.1 “Objective” as follows:

“To recognise those elements within the site that determine the character, amenity values and adverse effects of flood hazards of rural areas and manage them appropriately.”
37. **Add** to 8B 1.2.1 “Policies” the following:

“(e) To discourage the siting of buildings and structures in the Primary and Secondary River Corridors.

“(f) To ensure that buildings and structures in the Primary or Secondary River Corridor of the Hutt River have no more than minor adverse effects on flood protection structures.

“(g) To mitigate the effects of flood hazards on buildings and structures in the Primary and Secondary River Corridors by managing their location, size and scale.
38. **Amend** 1<sup>st</sup> sentence of “Explanation and Reasons” as follows:

“Minimum conditions which determine when and where buildings are located on a site contribute to the character, amenity values and adverse effects of flood hazards of rural areas.”
39. **Correct** typo in 3<sup>rd</sup> sentence of “Explanation and Reasons” from “an site” to “a site”.
40. **Add** as 2<sup>nd</sup> paragraph to “Explanations and Reasons” the following:

“Buildings and structures in the Primary or Secondary River Corridor of the Hutt River could adversely affect flood protection structures. Buildings and structures in the river corridor will also be subject to effects of fast flowing water, deep flooding and erosion. The outcomes identified in the Hutt River Floodplain Management Plan are relevant and should be taken into account in any assessment of effects. It is important that buildings and structures are discouraged in the Primary

and Secondary River Corridors. It is therefore appropriate to control the location of buildings and structures.”

41. **Add to Rule 8B 2.1.1 “Permitted Activities – Conditions” the following:**

**“(t) Primary and Secondary River Corridors**

All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area of 20m<sup>2</sup> or less and with a setback of 20m or more from a flood protection structure.”

42. **Add to Rule 8B 2.2 “Restricted Discretionary Activities” the following:**

**“(i) All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area greater than 20m<sup>2</sup> or with a setback less than 20m from a flood protection structure.”**

43. **Add to “Matters in which Council has Restricted its Discretion and Standards and Terms” the following:**

**“(i) All new buildings and structures or additions in the Primary or Secondary River Corridor with a gross floor area greater than 20m<sup>2</sup> or with a setback less than 20m from a flood protection structure.**

- Proximity of buildings and structures to flood protection structures; and
- Adverse effects of the flood hazard on buildings and structures and on flood protection structures.”

44. **Add to 8B 3 “Anticipated Environmental Results” as follows:**

**“(f) The scale, size and location of buildings and structures will have adverse effects which are no more than minor on amenity values and flood protection structures.**

**“(g) The adverse effects on buildings and structures in the Primary and Secondary Rivers Corridors will be avoided or mitigated.”**

### **Changes to Chapter 13 – Utilities**

Chapter 13 “Utilities”. Make amendments to the following:

45. **Add to 13.1.1 “Policies” the following:**

**“(k) Where practicable, economic and technically feasible, electricity transformers and water pumping stations should not be located within the Primary or Secondary River Corridor of the Hutt River.”**

46. **Add** to 9<sup>th</sup> paragraph of 13.1.1 “Explanation and Reasons” the following:

“It is generally inappropriate for electricity transformers and water pumping stations to be located within the Primary and Secondary River Corridors of the Hutt River, to minimise the possibility of disruption to service after a flood event.”

47. **Add** to Rule 13.2.3 “Discretionary Activities” the following:

“(h) In all activity areas, electricity transformers and water pumping stations in the Primary or Secondary River Corridor of the Hutt River.”

48. Add to “Assessment Matter for Discretionary Activities” the following:

“(q) The likely impact on electricity transformers and water pumping stations, and therefore the provision of those services to the City, in a flood event.

“(r) The likely impact of new roads on floodplain management.”

## **Changes to Chapter 14 - General Rules**

Chapter 14H, “Natural Hazards”. Make amendments to the following:

49. **Amend** 14H 1.1.1 Policies (b), (d), (e) by replacing “civil defence” with “emergency management”.

50. **Amend** last sentence of first paragraph “Explanation and Reasons (a) Risk and Vulnerability” as follows:

“Vulnerability can be reduced by various measures, including the provision of information, avoiding at-risk areas, maintaining a low intensity of development in at-risk areas or managing development in other ways to mitigate risks, providing insurance programmes, and by constructing physical protection measures.”

51. **Replace** “Explanation and Reasons (d) Flood Hazard – Hutt River” with the following:

“(i) The Hutt River:

Physical protection measures are used for the Hutt River. These include dredging at the river mouth, groynes, channel control and stopbanks. Physical protection works are planned to be upgraded during the next 40 years, under The Hutt River Floodplain Management Plan (HRFMP). This is in response to the current

standard of many stopbanks and bank edge protection works that would put a large part of the Hutt Valley floodplain at risk of flooding in a major flood event.

District Plan measures are used in the Primary and Secondary River Corridors and in parts of the Hutt Valley floodplain, that are not protected from major floods by the existing stopbanks or those proposed to be upgraded under the HRFMP. This land forms a narrow margin either side of the Hutt River, including parts of Belmont and Stokes Valley. The Seaview area is also affected by flooding however this area was not investigated in detail as part of the HRFMP, as it is also affected by flooding from the Waiwhetu Stream. The Wellington Regional Council and Hutt City Council are currently investigating the Waiwhetu Stream. Seaview flooding extents will be further investigated on completion of the Waiwhetu Stream investigation.

Any activities located within the Primary or Secondary River Corridors or other unprotected areas are susceptible to flooding which includes the effects of inundation and erosion. It is accepted that development must be able to continue in those areas that have already been developed, although landowners and developers will be expected to mitigate flood hazard effects to an acceptable level. For example, it is necessary for proposed buildings or structures greater than 20m<sup>2</sup> within the 100-year flood extent to raise floor levels to above the 100-year flood event. Proposed buildings and structures will also be required to be located to avoid damage from erosion hazards or be structurally strengthened to withstand the effects of severe erosion and high flood flow velocities.

The location of the following activities in the Primary or Secondary River Corridor or in areas not protected from major flooding by the existing stopbanks will not be appropriate:

- significant buildings where people work, live or congregate; such as schools, emergency services, hospitals, rest homes, holiday accommodation high-density residential developments and extensive commercial development.

These types of activities may expose people and assets to an unacceptable risk, or impose unacceptable costs on the community. Other activities such as earthworks, and accessory buildings and structures will also be required to avoid, remedy or mitigate the adverse flood hazard effects adequately. Adverse effects include, but are not limited to, erosion of the site or any part of a building, inundation and effects on other land and structures off-site. These effects may be cumulative or one-off in nature.

The Primary and Secondary River Corridors and those parts of the Hutt River Floodplain affected by flooding and erosion in a 100-year flood event are identified in the Map Volume of the District Plan. The height of floor levels for buildings and structures within the 100-year flood extent shall be above the 100-year flood level. This height is determined by the location of the proposed building in relation to a modelled flood level. The Wellington Regional Council has information on the Hutt River Floodplain, which will assist in determining an appropriate height for floor levels of buildings.

In addition to the District Plan measures, information on flood prone sites are given in Land Information Memoranda, and all Building Consents require a minimum floor level for all new development to be above the 50-year flood level.

While engineering works for flood defence can reduce the risk of flooding, they can never eliminate it completely. In the event of the stopbanks being over-topped or breached, the implementation of emergency management procedures may be necessary. Therefore, it is important that Hutt City residents are aware of the flood hazard, and prepare themselves for flooding should it occur.”

Chapter 14I “Earthworks”. Make amendments to the following:

52. Add new 14I 1.4 “Heading”, “Issue”, “Objective”, “Policy” and “Explanation and Reasons” as follows:

“14I 1.4 Primary and Secondary River Corridors

Issue

Earthworks can adversely affect flood protection structures in the Primary and Secondary River Corridors of the Hutt River. It is therefore necessary that these adverse effects are avoided or mitigated.

Objective

To ensure earthworks in the Primary or Secondary River Corridor of the Hutt River do not affect adversely flood protection structures.

Policy

To ensure that earthworks in the Primary or Secondary River Corridor have no more than minor adverse effects on flood protection structures.



## Explanation and Reasons

Earthworks in the Primary or Secondary River Corridor of the Hutt River can have adverse effects on flood protection structures by affecting the river's flow, velocity and meander patterns. The outcomes of the Hutt River Floodplain Management Plan are relevant and should be taken into account in any assessment of effects. It is important that earthworks do not occur near flood protection structures. It is therefore appropriate to control the location of earthworks."

53. **Add to Rule 14I 2.1.1** as follows:

**"(d)** In the Primary and Secondary River Corridors, earthworks must be a minimum distance of 20m from a flood protection structure."

54. **Add to Rule 14I 2.2.1 (a)** "Matters in which Council has Restricted its Discretion and Standards and Terms" (iv) Natural Hazards as follows:

"In the Primary and Secondary River Corridors of the Hutt River, consideration should be given to the effects on the flood protection structures."