



**Report** 06.379  
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**Committee** Rural Services and Wairarapa  
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## July 2006 Flood Events

### 1. Purpose

To update the Committee on the impact of the rainfall storm events on 4-7 July, 13 July, 15/16 July, and 20/21 July 2006.

### 2. Significance of the decision

The matters for decision in this report do not trigger the significance policy of the Council or otherwise trigger section 76(3)(b) of the Local Government Act 2002.

### 3. Background

June had above average rainfall throughout the Wairarapa so the water tables were high prior to the rainfall storm event of 4-7 July.

The heaviest totals in the Ruamahunga valley fell in the vicinity and to the south of Martinborough and there was a band to the east of Masterton (for fuller details see Report 06.381, *The 4-7 July 2006 storms in the Wellington region*, attached to the order paper). Rainfall totals typically ranged from 150-300 millimetres throughout the Ruamahunga valley.

### 4. What Happened

The Huangarua River at Hautotara rose rapidly on 4 July lifting the Ruamahunga River level quickly at Waihenga. This, plus the length of the rainfall event, resulted in the floodways being operational for 64 hours, the longest time since its construction (the previous highest being 55 hours in 2000).

The total flow volume (above 900 cubic metres/second) was 113 million cubic metres, the highest on record, compared to 77 million cubic metres in 2004, the second largest event. This was a big event.

As a consequence Lake Wairarapa rose to 12.2 metres, the highest level since the construction of the Lower Wairarapa Valley Development Scheme.

## **5. How this Affected the River Schemes**

Flood damage estimates are expected to be the order of \$1m. Most of the damage has occurred in the Lower Wairarapa Valley Development Scheme and there has been some damage in the Waipoua River and the Gladstone section of the Ruamahanga River. A detailed assessment has not been completed. This will occur once all the water levels have receded.

In the Lower Wairarapa Valley Development Scheme there has been damage to stopbanks (primarily slumping in the front of the bank) and within the floodways. The Hikinui Sill and the Ducksbill at Oporua have both suffered erosion. Temporary repairs were made to the Hikinui Sill prior to the rainfall event of 20/21 July. In total 86 tonnes of sandbags were filled and placed in holes scoured into the sill. These were washed out by the event of 20/21 July but did prevent any further scouring. Achieving a 'practical patch up' of these scour holes to get GW through to the summer period when any 'permanent works' can be constructed is proving to be an interesting challenge. The damage at the Ducksbill was increased by subsequent events.

Considerable debris was deposited in the upper sections of the floodway. Staff will work with Taskforce Green workers to remove it.

The level in Lake Wairarapa has been above 11.0 metres for over 25 days (typical levels for this time of the year are 10.2 metres). This, plus strong north-westerly winds, has damaged some privately owned stopbanks on the eastern lakeshore. These are not the responsibility of the Lower Wairarapa Valley Development Scheme. Staff have liaised frequently with these landowners, providing sandbags, advice and solace. Councillors Buchanan and Long, along with Geoff Dick, have visited the area. Repairs will not be possible or practical until the lake levels drop significantly. Once this happens staff will assess the situation and provide advice as appropriate.

The impact on lakeshore farmers with stopbanks has raised some issues regarding the Lower Wairarapa Valley Development Scheme rating review. These will need to be worked through. For example, how can these stopbanks be protected from wavelap erosion? Would GW via an isolated works budget and/or the Lower Wairarapa Valley Development Scheme provide funding assistance for permanent repairs which may include the planting of appropriate species to provide wavelap protection?

Persistent large southerly ground swells in Palliser Bay over the latter part of July have contributed to the ongoing high water levels in Lake Wairarapa. The opening to the sea of the Ruamahunga River (Lake Onoke) at Lake Ferry deteriorated. The large southerly swells diverted the opening to the east significantly reducing the openings hydraulic efficiency. The level at Lake Onoke on 28 July was 10.9 metres, with a total range of less than 100 millimetres compared to a Lake Wairarapa level of 11.0 metres, that is to say there was no fall.

Lake Onoke was artificially blocked on 29 July and a new opening was made using two bulldozers and a digger on 30 July. Once the opening has developed

and there is a head difference between Lake Wairarapa and Lake Onoke the Barrage Gates will be opened. Until this occurs Lake Wairarapa levels will remain close to 11.0 metres.

The wet conditions have tested pump drainage schemes. At Te Hopai, for example, farm land was under water for over two weeks. Pumped water ended up going around in circles. Staff liaised with the landowners and the Department of Conservation staff over the use of a wetland reserve as a storage pond area. The high lake levels have significantly slowed drainage on the shores of Lake Wairarapa.

## 6. Conclusion

In the Kopuaranga River there has been strong support for the recently completed isolated works programme (see Attachment 1).

Staff have made a conscious effort to get out and about to see what is occurring and to take appropriate action. The majority of landowners are philosophical about the 'July monsoon' with many showing considerable ingenuity to assist them improve their situation. The scale of the flood damage is likely to delay the proposed LWVDS capital works programme until next financial year.

## 7. Communication

There has been considerable media interest in the July events. Flood damage schedules will be prepared and discussed with the respective advisory committees. Thus there is no need for further communication.

## 8. Recommendations

*That the Committee:*

1. ***Receives the report.***
2. ***Notes the content of the report, and that a detailed flood damage report is proposed for consideration by the Committee at its meeting on 19 September 2006.***

Report prepared by:

Report approved by:

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Attachment 1: