

Before Hawkes Bay Regional Council and Hastings District Council

In the matter of the Resource Management Act 1991

And

In the matter of Application by Hastings District Council and Napier City Council to
Hawke's Bay Regional Council for resource consents authorising
the operation of Area B at Ōmarunui Landfill (**consent application**)

And

In the matter of A notice of requirement by Hastings District Council to Hastings
District Council for alteration of designation for the Ōmarunui
Regional Landfill (**NoR**)

Reply evidence by John Robert Hansford in response to evidence of Danny Bearsley

Dated 19 October 2021

INTRODUCTION

1. My name is John Robert Hansford. I gave a statement of evidence on this matter in relation to flooding impacts of the Omarunui Landfill dated 2 September 2021. My qualifications and experience are set out in that statement. I confirm my earlier statement as to the Code of Conduct for Expert Witnesses and note that this statement has also been prepared in compliance with it.
2. This reply evidence has been prepared to respond to the evidence of Mr Danny Bearsley, received by the Applicants on 17 September 2021.

RESPONSE TO MR BEARSLEY'S EVIDENCE: STORMWATER AND FLOODING

3. The rainfall event just prior to the application being notified is understood to have occurred between 8 and 9 November 2020. As stated by Mr Bearsley, this was a significant rainfall event causing extensive flooding in Napier and on his farm.
4. As presented in my evidence in chief, during the November 2020 rainfall event 126 mm of rainfall was recorded in 6 hours. The probability of this amount of rainfall

occurring in 6 hours is on average once in forty years (based on the HIRDS storm rainfall data for the rainfall station location).

5. Mr Bearsley referenced flooding that occurred during October 2019, which is a much lesser recurrence interval event than the November 2020 event referenced in my evidence in chief. According to the record from the rainfall station at the landfill 86.5 mm of rainfall was recorded in 48 hours during October 2019. The probability of this amount of rainfall occurring in 48 hours is on average once in 1.3 years (based on the HIRDS storm rainfall data for the rainfall station location).
6. Plots showing simulated flood extents for the October 2019 and November 2020 events, assuming no landfill operations (blue areas) with the additional areas flooded due to maximum landfill operations (orange areas) are attached. The plots show extensive flooding during both events and also that the difference in inundation areas without landfill operations and with landfill operations is negligible.
7. The simulated increase in flood depth in Mr Bearsley's paddocks during the November 2020 infrequent event was between 5 and 10 mm and during the October 2019, more frequent event, this reduced to 2 mm.

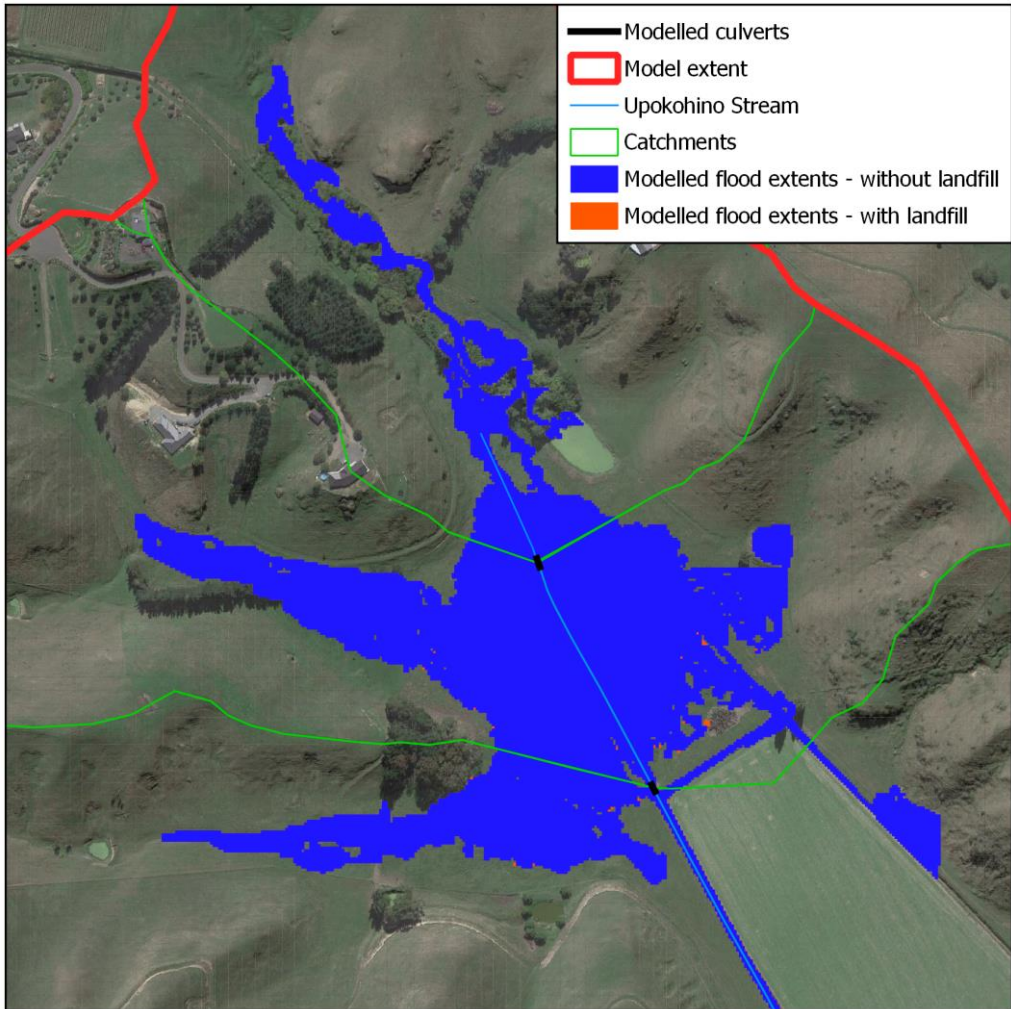
SUPPLEMENTARY EVIDENCE OF MR BRYCE IN RELATION TO STORMWATER

8. I have read the supplementary evidence of Mr Bryce in relation to the stormwater and sediment controls proposed for the stockpiles. There is nothing described in his evidence that will increase or have any additional effect on Mr Bearsley's property beyond what I have considered in my evidence in chief.

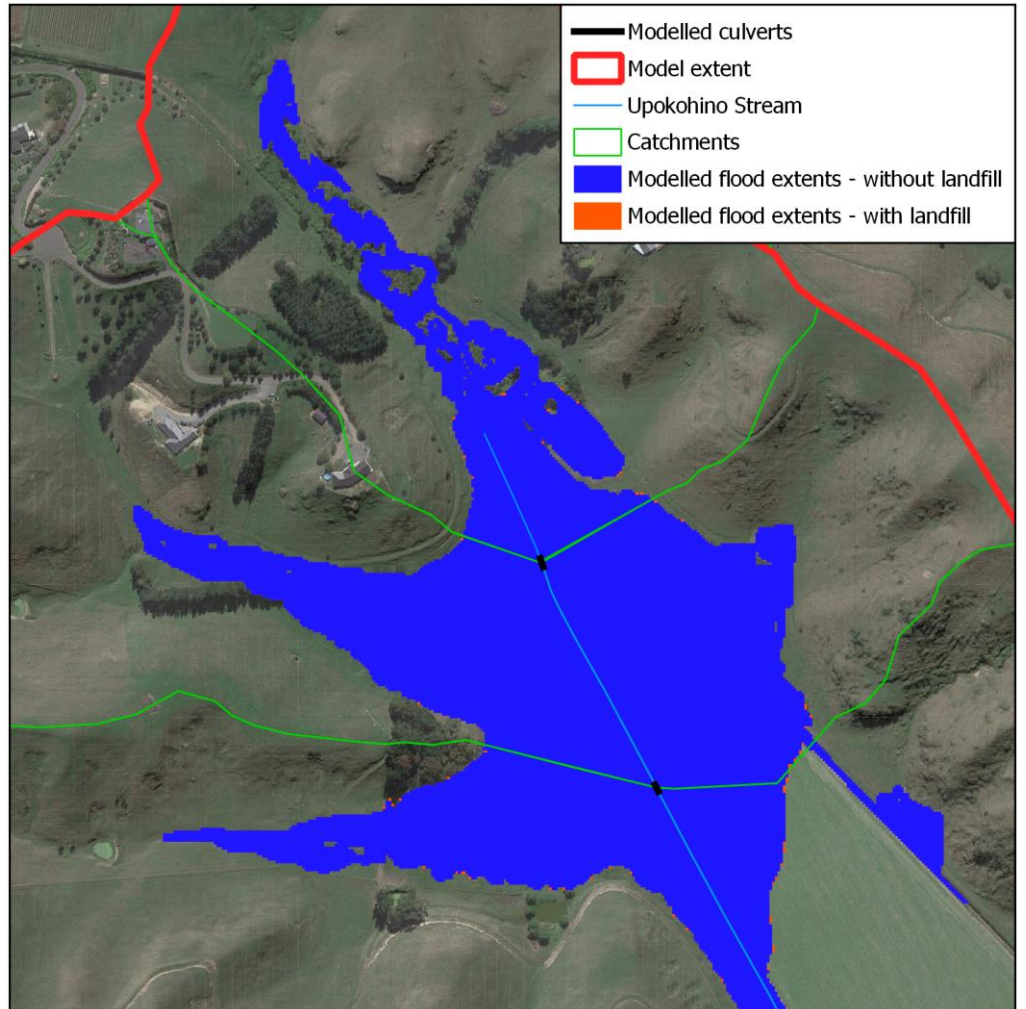
CONCLUSION

9. The modelling shows that, even during the relatively infrequent November 2020 event, increased flood depths and extents on Mr Bearsley's farm due to landfill operations will be negligible.

John Hansford
19 October 2021



October 2019 event



November 2020 event