

IN THE MATTER of the Resource Management Act
1991 (the Act)

AND

IN THE MATTER A hearing of application by Tararua District Council to Horizons Regional Council for APP-1993001253.02 for resource consent in relation to the discharge of treated wastewater from the Pahiatua Township into the Mangatainoka River, a discharge to air (principally odour) and a discharge to land via seepage, Julia Street, Pahiatua.

**REPORT TO THE COMMISSIONERS
DR BRENT COWIE (CHAIR), MR REGINALD PROFFIT AND MR PETER
CALLANDER**

**SUPPLEMENTARY EVIDENCE OF TABITHA MANDERSON, SENIOR RESOURCE
MANAGEMENT PLANNER**

23rd May 2017

Introduction

1. My name is Tabitha Manderson. I am a Senior Resource Management Planner with the consulting firm Opus International Consultant.
2. Following my primary evidence, in this brief supplementary evidence I provide
 - a. A small number of corrections to my evidence as circulated
 - b. Comments on some of the submitter evidence received (Mr Phillip Percy and Mr Adam Canning)
 - c. A comment on further opportunities for interested parties to be involved in detailed design of the proposed wetland

Corrections

3. I have a small number of minor corrections to my pre-circulated evidence.
4. Para 5.25 – 3rd sentence the first word should read Once (not One)
5. Para 8.5 – first sentence should read I do agree (take out the not)
6. Para 8.12 – last sentence should read alternative condition (not additional)

Comments on submitter expert evidence

7. Mr Percy is incorrect that the maintenance requirements of the wetland are not incorporated in to my recommended conditions (para 66 of his evidence). The Panel will note that Condition 3 requires the preparation of a management plan to include “*A description of the entire treatment system facility*” – The Wetland is part of the proposed treatment facility. And “*A description of routine inspection and maintenance procedures to be undertaken with respect to the treatment plant and discharge components*” – again, the wetland forms part of the treatment plant, therefore any maintenance requirements will need to be detailed in this plan in order to meet this condition. In my experience it is preferable to include all components of the treatment facility in one plan, making no distinction between those part that are ‘mechanical’ and ‘biological’ so as to ensure operators at the plant are

viewing the system as a whole. However, if the panel considered it necessary I think that Condition 3 could be amended to make this more evident, this could be done by listing main groupings of treatment components.

8. In addition to the general WWTP management plan condition discussed above, I also recommended a conditions in line with Mr MacGibbons advice that a wetland construction and establishment plan be prepared. Condition 8 in the seepage consents condition. Part of this condition is to include updates to the general WWTP management plan.
9. It is clear to me, that a wetland is a form of land based treatment. Mr MacGibbon has provided a functional description, and details how the design of these types of treatment wetlands is undertaken. I note as well that in reports such as "Tiaki Para A Study of Ngai Tahu Values and Issues Regarding Waste" there are a number of references to "land-based treatment and/or disposal method, such as constructed wetlands" (first para, page 17 of that report, under Section 7 on page 20). I make this statement in relation to whether a wetland meets Policy 5-11, I do not say that this will address all the issues raised by the various iwi submitters. I am merely reiterating my position that a treatment wetland, designed taking into account flows and treatment standards, does meet Policy 5-11.
10. In his evidence Mr Canning puts forward the opinion that the nutrient concentrations required to meet the One Plan MCI target of 120 will need to be more restrictive than the nutrient concentration targets in the One Plan. I cannot comment on the technical aspects of this, however from a planning perspective I note that the One Plan is the relevant planning document and that the Policy direction is clear with regards to ensuring that the proposed discharge should be assessed against the relevant policy requirements contained within that.

Opportunities for further involvement by interested parties

11. There are, in my opinion, further opportunities for active engagement with iwi – namely in the detailed design of the wetland and outlet structure (above what is already to be provided for by virtue of the wastewater forum). This could easily be incorporated as a requirement of consent condition, but I would only recommend this be incorporated if this was of interest to submitters, the iwi submitters in particular. The panel may wish to gauge whether this would be of interest and value to submitter. Once the wetland is designed and ready to be planted, there is opportunity for the community to be involved – I understand from Mr MacGibbon that this has occurred on other wetland projects he has been involved with.

Tabitha Manderson



23rd May 2017

Specific Questions

Can she provide more detail as to the timeline when the discharge will be to the wetland and so removed from Town Creek.

This would logically be once the wetland had been built and plants are sufficiently established. Timing of the wetland construction will also depend on ensuring that Council have a suitable source of plant material. From discussions with Mr MacGibbon I understand that plants would need to be ordered shortly (within the next few weeks/months) if planting next autumn were to be contemplated. I would suggest as a start that part of the detailed design condition include a timeline that logically ties together the construction of the wetland (bulk earthworks) and then planting. Achieving the established planting would be the trigger for moving the discharge from Town Creek.

We seek some further information in relation to Fiona's para 94 in relation to Greg's memo about the earthworks

The conditions included in Ms Morton's 42A report included that a finalised ESCP be prepared and submitted for certification. Given the recent change to the wetland concept an updated ESCP will need to be produced. My reading of the memo from Mr Bevin of the 19th of May is that he considered the risk of discharge to be low risk as a result of the earthworks proposed. I can provide the most recently updated ESCP, but as I note above a further update will still be required to be submitted to Council as per the recommendation condition by Ms Morton.

Paragraph 2.4 – reference to legal advice and Phil's paragraph 27 – can she provide some more detail please. Is it a discharge to land or to water or do both these options need to be covered.

The discharge over land through the constructed wetland is a discharge to land where it may enter water (seepage), from there the nature of the discharge will depend I believe on whether or not the discharge 'structure' is lined. One option discussed by the team is for a 'confined aquifer' to be built, essentially a lined channel (Mr Crawford has discussed). If a lined channel is used then I am comfortable it is a discharge to water at that point (stressing that it has already passed over land).

If for reasons to better mitigate mauri it is determined that an unlined structure of some description is preferable then this would likely be a discharge to land where it would enter water. This may take the form of an extension to the treatment wetland, so long as it can be designed in such a way so as to not interfere with the functioning of the treatment wetland.

The last sentences in 5.30 – does she now have a view about the duration of groundwater monitoring.

I note that Mr Baker does not suggest a timeframe. Again my experience with other consents 3 years is often used as a suitable period as there is a good chance get a range of seasons (as has been discussed with surface water monitoring, not that I am saying they are the same thing).

8.5 – can she elaborate further on this paragraph please.

My first sentence of para 8.5 should read that I do agree with para 119. I was also agreeing that exactly what form the ongoing engagement may take was not detailed at this stage, but went on to note in para 8.6 that one mechanism is through the Forum.

8.12 – does she support the additional monitoring recommended by Mr Baker.

In para 9 or 13 of the supplementary evidence?

If para 9, Mr Baker has suggested installing a monitoring bore on land not owned by TDC.

If Para 13, I am not sure additional monitoring is required as this would be captured, in my opinion, by the condition recommended whereby a water balance is undertaken to better quantify if there is seepage from the ponds. Unless this monitoring would replace the condition I have put forward.

8.20 – is she therefore saying that what they are doing is a discharge to land.

No, my statement here relates to the first sentence where I talk about overland flow. It is a discharge to land where may enter water (for the wetland) but the ultimate discharge is to water.

8.21 – can she give us an update on the discussions with Rangitane. Have any similar discussions taken place with Kahungunu

I was unfortunately not able to attend this meeting, it was referred to by Mr King in his evidence and he talked to this and gave an update on Tuesday.