## **APPENDIX 6**

# Addendum to Technical Specialist Report – Wastewater – Section 42A Reporting

# PLAN CHANGE 13 – TE RAPA RACECOURSE PRIVATE PLAN CHANGE

to

### **HAMILTON CITY DISTRICT PLAN**

**Hamilton City Council** 

#### 1 Introduction

#### **Purpose of Report**

- 1.1 This addendum provides further assessment and comment on Plan Change 13 following review of the applicant and submitter evidence. It updates the Technical Specialist Report Te Rapa Racecourse Private Change Stormwater and Wastewater (Beca, July 2023) Section 42A Reporting, prepared by Greg Cumming and Iain Smith of Beca for Hamilton City Council (HCC).
- 1.2 This is a statement of evidence from Greg Cumming and addresses wastewater aspects only.

#### **Information Considered**

- 1.3 In preparing this addendum the following documents have been reviewed:
- Evidence of Hayden John Vink
- There were no submissions relating to wastewater.

#### **Code of Conduct**

1.4 While I understand that the present hearing is not a matter to which the Code of Conduct for Expert Witnesses contained in the Environment Court Practice Note (2023) applies, I confirm that I have approached the preparation of this evidence in the same manner as I would for Environment Court proceedings and have complied with the requirements of the Code. I confirm that the issues addressed in this evidence are within my area of expertise and the opinions I have expressed are my own except where I have stated that I have relied on the evidence of other people. I have not omitted material facts known to me that might alter or detract from my evidence.

#### 2 Review of Evidence

- 2.1 I have been involved in reviewing the wastewater design elements of the proposed plan change from the beginning of the application process. I also prepared the Section 42A report with stormwater specific inputs from Iain Smith.
- 2.2 I consider there are no outstanding technical wastewater issues that need to be addressed for the purposes of the Plan Change.
- 2.3 I note that Section 5.5 of the Updated TE RAPA RACECOURSE SUB-CATCHMENT INTEGRATED CATCHMENT MANAGEMENT PLAN REV 3 / September 2022 prepared by Wainui Environmental highlights the following: "The proposed development layout shows building areas located over the existing wastewater reticulation running through the Racecourse Redevelopment site. Consideration should be given to diverting the wastewater pipes around the proposed buildings to avoid build-overs where possible. Alternatively, the development layout could be altered at detailed design time so that the proposed roads or open space areas are located over the existing wastewater reticulation". This is also mentioned in Hayden John Vink's evidence and noted here because:
  - i. The existing wastewater pipes are large (675mm diameter) and relatively deep (3m).
  - ii. HCC does not normally allow construction of buildings over wastewater pipelines. For further details refer to The Regional Infrastructure Technical Specification (RITS) 5.2.9 Building Over or Adjacent to Pipelines.

#### 3 Conclusion and Recommendation

- 3.1 There are no technical wastewater issues that remain unaddressed by the applicant. The design approach for the new wastewater network as noted in 2.3 can be determined at Resource Consent stage.
- 3.2 Therefore, I reconfirm the statements in the S42A report that the applicant has appropriately addressed wastewater issues.

APPENDIX 7



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22 August 2023

Hamilton City Council Private Bag 3010 Hamilton, 3204 New Zealand

**Attention: Laura Gault** 

Dear Laura

#### Te Rapa Racecourse Private Plan Change (PC13) - Specialist Geotechnical Review

This letter sets out our review of the latest geotechnical documents submitted in support of the Te Rapa Racecourse Private Plan Change (Plan Change 13), specifically:

- Appendix H of the Plan Change Application: "Te Rapa Racecourse Redevelopment: Ken Browne Drive,
  Hamilton Geotechnical Investigation Report" prepared by CMW Geosciences (CMW) for Waikato Racing
  Club, rev 1, dated 20 July 2022
- Statement of Evidence of Aine Colson, dated 26 July 2023

In 2017 we reviewed the initial version of the Appendix H geotechnical report referenced above (rev 0, dated 21<sup>st</sup> July 2017) and generally agreed with the Applicant that the site was suitable for the proposed residential development subject to appropriate further work. We have not been involved in the interim; however, our review of the above two listed documents has not identified any material changes that would impact the general suitability of the site, although we do note the following key revisions from the 2017 report:

- CMW (2022) identifies soakage as a viable solution for the disposal of stormwater; however, the latest ICMP (Wainui Environmental, 2022) included as Appendix E of the PC13 application, concludes that soakage is not viable due the low soakage rates and high groundwater levels encountered on site. We suggest that the ICMP should take precedent. We agree that, as set out in the ICMP, soakage may not be feasible or, would require significant further investigation and analysis before it could be relied upon.
- The revised liquefaction assessment presented in CMW (2022) has resulted in an increase in ULS settlement, which has implications for foundation design. CMW (2022) notes that this will need to be further refined as a result of the National Seismic Hazard Model (revised 2022). We concur that this is required and is best undertaken at subsequent stages of design, following further site-specific geotechnical testing and in accordance with the national standards as they apply at that time.
- New or additional commentary in CMW (2022) with regards to management of expansive soils, sensitive soils, and likely foundation requirements are consistent with our wider experience of residential developments in Hamilton. We agree such matters can be managed via typical industry design and construction standards.
- A Safety in Design Register (SiD) has now been included in the appendices of the Geotechnical report.
   We note that this is high level only will need fleshing out as the design develops to reflect design matters.
- The evidence of Aine Colson identifies that 4-storey buildings may now be proposed. We note that these
  are not specifically addressed by the existing Geotechnical Report and will require specific geotechnical
  and structural design.

make everyday better. We concur with geotechnical recommendations outlined in the evidence of Ms Colson, and we agree that these are more appropriate for inclusion as conditions at the subdivision, resource or building consent stage.

Overall, we consider that the site is suitable for residential development, subject to appropriate site investigation, design, analysis and peer review being undertaken at subsequent design and consenting stages.

Yours sincerely

Sian France

Technical Director - Hydrogeology

on behalf of

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