

PRECISION | COMMUNICATION | ACCOUNTABILITY

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18 June 2018

HB&B Property Attention: Kurt Beckhaus PO Box 409 MASCOT NSW 4001

Dear Sir

Re: SSD-7173 First Estate, Mamre Road, Orchard Hills Civil Engineering Modification – Lot 5 Expansion & Drainage Channel

We provide this letter relating to a proposed modification to the First Estate project approved under SSD_7173. Specifically this letter covers the civil engineering aspects of the amendment.

The modification is for an amendment to the approved civil engineering items defined in SSD_7173. The main components of the current amendment is for an adjustment to the estate drainage channel and extent of filling within Lot 5.

A set of civil engineering drawings were completed by Costin Roe Consulting during 2017. The following drawings have now been revised to show the new estate drainage channel location and Lot 5 filling, enclosed as listed following.

- Co12042.00-C100 [B] Drawing List and General Notes
- Co12042.00-C200 [C] Erosion and Sediment Control Plan and Details-Sheet 1
- Co12042.00-C201 [A] Erosion and Sediment Control Plan and Details-Sheet 2
- Co12042.00-C400 [E] Channel Re-Alignment Plan
- Co12042.00-C401 [A] Lot 5 Filling Plan
- Co12042.00-C410 [C] Channel Longitudinal Section
- Co12042.00-C440 [B] Channel Cross Sections Sheet 1
- Co12042.00-C441 [B] Channel Cross Sections Sheet 2
- Co12042.00-C450 [B] Channel Details

We have also provided a summary of the engineering components of the development which will change from, or remain consistent with, the approved SSD_7173 development.

It is also noted that the design drawings, channel adjustment and regrading works included per enclosed, are also consistent with the modelling including in the *Stage 2 (Revised) Overland Flow Report* (Ref: *Co12042.05-04d.rpt*, Revision D, dated 8 June 2018).

A summary of design elements are as follows.



1. Estate Drainage Channel Adjustment:

The proposal is for the Estate Drainage Channel to be relocated from the previously approved location to run parallel to the northern boundary of Lot 2172 in DP 1153854. The drainage easement for the channel is to be set a width of 35m wide as shown on drawing **Co12042.00-C400**. The proposed realignment has been made to improve the utilisation of the farming land which was bisected by the previously approved drainage channel and forms part of a condition of sale between the land owner and applicant.

The proposed channel position will align with the approved and constructed channel at chainage 56.50m, and continue north, before making a left turn and heading towards South Creek adjacent to the existing lot boundary. The drainage channel as constructed as part of the current approval is to be filled to the pre-existing levels and decomissioned. When filled, the existing channel is to have a slight depression acting as an overland flow path. The Stormwater Management Strategy for the site will remain generally consistent with the approved configuration produced by Costin Roe in 2016.

Some local regrading of the land adjacent to the proposed stormwater channel is proposed to improve the utilisation of the farming land and to improve local stormwater runoff to South Creek.

All stormwater runoff will remain being directed to the Estate Drainage Channel and discharge into South Creek as per the approved SSD_7173, with the overall Stormwater Management Strategy maintained.

2. Lot 5 Filling:

The filling of the as constructed Lot 5 of the First Estate is proposed to be extended out to the north-west boundary of the site fronting Rick Pasturo Land and The Estate water management basin.

The works will involve the importation of approximately 34,000m³ of engineered fill. The proposed level of the expanded area is to match the existing earthworks levels on site. Configuration of the proposed works are shown on drawing **Co12042.00-C401**. All stormwater runoff will remain being directed to the Estate Stormwater Management Basin as per the approved SSD_7173, with the overall Stormwater Management Strategy maintained noting the overall catchment allowances for the estate were completed based on inclusion of this expansion area in the overall management allowance.

We trust the above information meets your current needs. Please do not hesitate in contacting the undersigned if any further clarification is required.

Yours faithfully, COSTIN ROE CONSULTING PTY LTD

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MARK WILSON MIEAust CPEng NER Director