

Engineering Referral Response

Application Number:	DA2018/1514
To:	Lashta Haidari
Land to be developed (Address):	Lot 100 DP 1015283 , 145 Old Pittwater Road BROOKVALE NSW 2100

Reasons for referral

This application seeks consent for the following:

- New Dwellings or
- Applications that require OSD where additional impervious area exceeds 50m² or
- Alterations to existing or new driveways or
- Where proposals affect or are adjacent to Council drainage infrastructure incl. watercourses and drainage channels or
- Torrens, Stratum and Community Title Subdivisions or
- All new Commercial and Industrial and RFB Development with the exception of signage or
- Works/uses in flood affected areas

And as such, Council's development engineers are required to consider the likely impacts on drainage regimes.

Officer comments

Updated comments 15/4/19

1) The applicant has stated that the twin 1350mm stormwater lines located partly within the new building works will be maintained by the owner which is agreed, however the Cardno response dated 7/1/19 fails to provide detail on the access manholes and their location in regard to the building works. They need to be able to be accessed readily by maintenance crews within a short time and be free of obstructions in a common area within the mall.

Council also requires a CCTV review of the 1350mm twin lines and condition report by a suitably qualified engineer to determine the current state /life expectancy of the line.

2) In addition its noted that the applicant has provided WAX drawing for the stage two augmentation culvert works however it can not be determined the difference in the design levels compared to as constructed levels. Also certification is required from Cardno stating that the stage 2 Augmentation works have been constructed in accordance with Condition 60 and the approved Construction Certificate design (DA 2018/1742) and is to include certification that the mixing chambers have been constructed in accordance with the MHL physical model and approved plans.

Referring to the Flood Impact report, Stormwater management report by Cadno and stormwater concept designs, the proposed Stage 2 development cannot be supported for the following reasons:

1) The proposed building works are over an existing stormwater drainage infrastructure (twin 1350 mm pipes) . The stormwater management report has failed to address the impacts of the development on

this line in terms of access for maintenance and renewal of the infrastructure. Councils Technical specification -"Building over or adjacent to Constructed Council Drainage systems and easements' generally does not support building over stormwater drainage infrastructure of this type.

The concept plans does not demonstrate the location of the stormwater drainage lines in relation to the proposed structure.

Additionally the impacts of overland flow and in particular depth vrs velocity and the stability of pedestrians and vehicles has not been assessed in this location.

2) Referring to the Flood Impact report dated 10 August 2018 I support the Natural Environment Flood referral response and in particular non compliance with Warringah DCP Part G4 ,(requirement 61) ensuring that all new development on the site does not adversely affect flooding conditions in existing development located both internal and external to the site.

(requirement 64) Structural measures are to be implemented on the site that ensure all overland flows are conveyed through the site in a low hazard nature for floods up to the 1 in 100 year ARI.

3) Additionally work as executed drawings of the constructed stage 2 augmentation works are to be supplied to council to demonstrate that the completed works including the stormwater culverts and mixing chambers have been installed as designed in regard to the MHL physical model and approved plans.

Referral Body Recommendation

Recommended for refusal

Refusal comments

Recommended Engineering Conditions:

Nil.