

Natural Environment Referral Response - Coastal

Application Number:	DA2019/0910
Responsible Officer	Rhiannon McLardy
Land to be developed (Address):	Lot 1 DP 344054 , 4 Cabarita Road AVALON BEACH NSW 2107

Reasons for referral

This application seeks consent for land located within the Coastal Zone.

And as such, Council's Natural Environment Unit officers are required to consider the likely impacts on drainage regimes.

Officer comments

The application has been assessed in consideration of the Coastal Management Act 2016, State Environmental Planning Policy (Coastal Management) 2018 and has also been assessed against requirements of the Pittwater LEP 2014 and Pittwater 21 DCP.

Estuarine Risk Management

The property at 4 Cabarita Road, AVALON BEACH has been identified as affected by estuarine wave action and tidal inundation on Council's Estuarine Hazard Mapping. As such, the Estuarine Risk Management Policy for Development in Pittwater (Appendix 7, Pittwater 21 DCP) and the relevant B3.7 Estuarine Hazard Controls will apply to any proposed development of the site.

In accordance with the Pittwater Estuary Mapping of Sea Level Rise Impacts Study (2015), a base estuarine planning level (EPL) of RL 2.66m AHD would apply at the subject site. A reduction factor (RF) based upon the distance from the foreshore of proposed development may also apply at a rate of 0.07m reduction to the EPL for every 5.00m distance from the foreshore edge up to a maximum distance of 40.00m. However, based on design life of proposed upgraded seawall as 60 years and of boat shed 25 years, Horton Coastal Engineering through its Estuarine Risk Management Report dated 14 August 2019, justified Estuarine Planning Level for seawall as 2.54m AHD and for boat shed 2.2m AHD. Council accepts these levels for detailed structural design. The report has further assessed risks to the proposed seawall and boatshed and recommended mitigation measures. Council conditions all these recommendations in approving this DA.

Coastal Management Act 2016

The applicant has proposed raising of the seawall at the same alignment as existing. Hence the proposed development has been assessed also against the requirements of the Section 27 of the Coastal Management Act 2016. Given a number of risks identified under Section 7 of the Estuarine Risk Management Report dated 14 August 2019 prepared by Horton Coastal Engineering, Council applies maintenance condition as per Section 27(b)(ii) in approving this DA

State Environmental Planning Policy (Coastal Management) 2018

The subject land has been located on both the 'Coastal Environment Area' and 'Coastal Use Area' maps but not been included on the Coastal Vulnerability Area Map under the State Environmental Planning Policy (Coastal Management) 2018 (CM SEPP). Hence Clauses 13, 14 and 15 of the CM SEPP apply. Council considered and accepts compliance against requirements of these clauses, as described in the Statement of Environmental Effects (SEE) report submitted with this DA .

Comment:

As such, it is considered that the application does comply with the requirements of the State Environmental Planning Policy (Coastal Management) 2018.

Referral Body Recommendation

Recommended for approval, subject to conditions

Refusal comments

Recommended Natural Environment Conditions:

CONDITIONS TO BE SATISFIED PRIOR TO THE ISSUE OF THE CONSTRUCTION CERTIFICATE

Erosion and Sediment Control Plan

An Erosion and Sediment Control Plan (ESCP) shall be prepared by an appropriately qualified person and implemented onsite prior to commencement. The ESCP must meet the requirements outlined in the Landcom publication Managing Urban Stormwater: Soils and Construction - Volume 1, 4th Edition (2004). The ESCP must include the following as a minimum:

- Site Boundaries and contours
- Approximate location of trees and other vegetation, showing items for removal or retention (consistent with any other plans attached to the application)
- Location of site access, proposed roads and other impervious areas (e.g. parking areas and site facilities);
- Existing and proposed drainage patterns with stormwater discharge points
- Locations and methods of all erosion and sediment controls;
- North point and scale.

Details demonstrating compliance are to be submitted to the Certifying Authority for approval prior to the issue of the Construction Certificate.

Reason: To protect the environment from the effects of sedimentation and erosion from development sites.

Compliance with Estuarine Risk Management Report

The development is to comply with all recommendations of the approved Estuarine Risk Management

Report prepared by Horton Coastal Engineering Pty. Ltd. dated 14 August 2019 and these recommendations are to be incorporated into construction plans.

Reason: To minimise potential hazards associated with development in an estuarine habitat.

Structural Engineering for Estuarine Risk

Structural engineering design for the development shall be prepared, with input as necessary from a chartered professional engineer with coastal engineering as a core competency, to ensure that for its design life (taken to be 100 years unless otherwise justified and accepted by Council) the development is able to withstand the wave impact forces and loadings identified in the approved Estuarine Risk Management Report prepared by Horton Coastal Engineering Pty. Ltd. dated 14 August 2019.

Note: The potential for component fatigue (wear and tear) should be recognised for the less severe, but more frequent, wave impact loadings.

Reason: To ensure structural engineering is prepared by an appropriately qualified professional

Engineers Certification of Plans

The structural design shall be prepared by and each plan/sheet signed by, a registered professional civil or structural engineer with chartered professional status (CP Eng) who has an appropriate level of professional indemnity insurance and shall be submitted to the Principal Certifying Authority prior to the release of the Construction Certificate.

Reason: To ensure structural engineering is prepared by an appropriately qualified professional

Upgrading of existing seawall

The upgrading of the existing seawalls must be designed and constructed, as recommended in the Estuarine Risk Management Report prepared by Horton Coastal Engineering Pty Ltd dated 14 August 2019, such that it will not, over the design life of the works, pose or likely to pose a threat to public safety.

Reason: To ensure compliance with section 27 of the Coastal Management Act 2016

CONDITIONS THAT MUST BE ADDRESSED PRIOR TO ANY COMMENCEMENT

Installation and Maintenance of Sediment and Erosion Control

Sediment and erosion controls must be installed in accordance with Landcom's 'Managing Urban Stormwater: Soils and Construction' (2004). Techniques used for erosion and sediment control on site are to be adequately maintained and monitored at all times, particularly after periods of rain, and shall remain in proper operation until all development activities have been completed and the site is sufficiently stabilised with vegetation.

Reason: To protect the surrounding environment from the effects of sedimentation and erosion from the site

ON-GOING CONDITIONS THAT MUST BE COMPLIED WITH AT ALL TIMES

Ongoing maintenance of the approved coastal protection works

The owner(s) of 4 Cabarita Road Avalon Beach NSW 2107 (Lot 1 DP 344054) are responsible for the ongoing maintenance of the approved seawall in accordance with the approved plans and specifications following any damage caused by coastal hazard or storm. This includes undertaking works required to remove any threat to public safety arising from damage to the seawall such as the

removal of rocks or debris, that have become dislodged from the works.

Reason: To ensure compliance with section 27 of the Coastal Management Act 2016

Compliance with Estuarine Risk Management Report

The development is to comply with all recommendations of the approved Estuarine Risk Management Report prepared by Horton Coastal Engineering Pty. Ltd., dated 14 August 2019 and these recommendations are to be maintained over the life of the development.

Reason: To ensure preservation of the development and the estuarine environment and to ensure compliance with section 27 of Coastal Management Act 2016