

Environmental Health Referral Response - acid sulfate soils

Application Number:	DA2020/1639
Date:	30/04/2021
Responsible Officer	Kent Bull
Land to be developed (Address):	Lot A DP 27567 , 158 Crescent Road NEWPORT NSW 2106 Lot LIC 316068 , 158 Crescent Road NEWPORT NSW 2106

Reasons for referral

This application seeks consent for one or more of the following:

- All development in class 1 land
- Any works below ground surface or will lower water table in area class 2 land
- Any works beyond 1 metre or lower water table by 1 metre in class 3 land
- Any works beyond 2 metres or lower water table by 2 metres in class 4 land
- Works on land below 10 metres AHD and within 500m of class 1, 2, 3 or 4 land which are likely to lower water table below 1 metre

And as such, Council's Environmental Investigations officers are required to consider the likely impacts.

Officer comments

The applicant seeks consent to construct a seawall required for bank stabilisation, which includes reclamation, proposed berthing area and the authorisation of a pontoon and one mooring pile.

Environmental Health has considered the Statement of Environmental Effects (SoEE) by SDG dated 13 May 2019 and the Marine Habitat Survey by H2O Consulting Group 27 January 2018.

Pittwater is classified as class 1 for acid sulfate soils. Clause 7.1 of Pittwater LEP (taken from the standard instrument), provides exemptions to the requirement for an acid sulfate soil management plan (as stated in the SoEE), however, this clause was not formulated with significant consideration to aquatic developments. As such, if acid sulfate-related pollution issues are considered in the context of the LEP alone, the person/company in charge of an aquatic development may place themselves at risk of breaching the Protection of the Environment Operations Act 1997 and/or the Fisheries Management Act 1994 during construction.

Pittwater is known to contain an accumulation of harmful and persistent contaminants within its sediment profile. Many of these contaminants, historically deposited as a result of marine-related industrial activities, became encapsulated by sediment deposited thereafter. ASS, known to be present in Pittwater, are also contained within waterlogged sediment layers.

Dredging, driving and removal of jetty piles, barge movements etc., can cause re-suspension of previously encapsulated sediments and contaminants. ASS released into surface waters can react with dissolved oxygen in a two-stop process to produce acid and facilitate the release of certain metals and metalloids (e.g. arsenic).

It should be noted that monosulfides have been identified within Pittwater sediments and that certain

areas of Pittwater are not well-flushed.

Environmental Health are concerned that the cumulative effect of aquatic developments will significantly lower both the recreational value of Pittwater and cause ecological harm. As such, each development must be carefully considered and monitored.

Environmental Health recommends approval subject to conditions.

The proposal is therefore supported.

Note: Should you have any concerns with the referral comments above, please discuss these with the Responsible Officer.

Recommended Environmental Investigations Conditions:

CONDITIONS THAT MUST BE ADDRESSED PRIOR TO ANY COMMENCEMENT

Environmental Health inspection before, during and after works

Notification must be given in writing to Council's Environmental Health team, no later than seven (7) business days prior to the date of commencement of works. No works relating to the removal or installation of piles, construction or removal of any other structure within the area classified as Class 1 for acid sulfate soils, are to commence until Council's Environmental Health Officer is on site to conduct an inspection and has taken water and soil samples. Council's Environmental Health Officer must be permitted entry to the site for the purposes of inspection and to collect before, during and after construction water and soil samples.

Reason: To facilitate environmental monitoring for the purposes of environmental protection.

CONDITIONS TO BE COMPLIED WITH DURING DEMOLITION AND BUILDING WORK

Barge Movements Not to Disturb Sediment or Seagrasses

Barge movements to and from the approved construction footprint must be timed so as to not disturb sediment, or cause damage to any seagrasses.

Reason: To facilitate environmental monitoring for the purposes of environmental protection.

Requirement to Notify About New Acid Sulfate Soils Evidence

Any new information revealed during works that has the potential to alter previous conclusions about Acid Sulfate Soils, shall be immediately notified to the Council and the Principal Certifying Authority prior to further commencement.

Reason: Protection of the environment