

## Engineering Referral Response

<b>Application Number:</b>	DA2022/2202
<b>Proposed Development:</b>	Alterations and additions to a dwelling house including a swimming pool and double carport
<b>Date:</b>	22/06/2023
<b>To:</b>	Nick England
<b>Land to be developed (Address):</b>	Lot 14 DP 216125 , 6 Jacqueline Close BAYVIEW NSW 2104

### Reasons for referral

This application seeks consent for the following:

- New Dwellings or
- Applications that require OSD where additional impervious area exceeds 50m<sup>2</sup> 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

#### 22/06/2023:

No objections to approval subject to conditions as recommended.

To address the requirements of Roads Team, to maintain the fencing and paving encroachment in the road reserve, A minor encroachment application condition has been imposed.

#### For Planner:

As per Roads Team Comments please consider imposing a condition prior to issuing the occupation certificate it is ensured the removal of the private gatehouse structure.

#### 14/06/2023:

Amended plans are provided. It is noted that a referral has been sent to Council's Roads Asset Team, Development Engineering Team will provide final comments after Roads Team provides their assessment.

#### 28/02/2023:

Development application is for alterations and additions to a four storey residential dwelling including new elevated carport, studio underneath carport, driveway and swimming pool.

#### Stormwater:

Site falls to the rear, an onsite stormwater detention system is proposed with level spreader. As the site falls to rear stormwater drainage for the site shall demonstrate compliance with Council's Water Management for Development Policy, particularly Stormwater Drainage from Low Level Properties Section 5.5, but due to site constraints an easement is not considered viable.

**Geotech:**

The proposed development is located within a Geotechnical Hazard H1 area. In accordance with Clause B3.1 Landslip Hazard of Pittwater 32 DCP, a risk assessment is to be undertaken (Geotechnical Risk Management Policy for Pittwater) for the site.

Geotechnical Assessment by ASCENTGEO Consulting Geotechnical Engineers, Ref AG 22156, Dated 15th May 2022 is provided.

**Access**

Elevated carport is proposed. Seems like the bottom of B85 vehicle at chainage 7.48 is scraping, engineer to re-work out driveway profile.

New driveway with retaining walls on both sides, gated pedestrian access stairs on public road reserve is proposed.

It is noted that a referral has been sent to Council's Roads Asset Team, Development Engineering Team will provide final comments after Roads Team provides their assessment.

**NOTE:** Public land is used for storage of private waste bins. A gate house has also been constructed on public land.

The proposal is therefore supported.

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

**Recommended Engineering Conditions:**

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

**Geotechnical Report Recommendations have been Incorporated into Designs and Structural Plans**

The recommendations of the risk assessment required to manage the hazards as identified in the Geotechnical Report prepared by ASCENTGEO Consulting Geotechnical Engineers, Ref AG 22156, Dated 15th May 2022 are to be incorporated into the construction plans. Prior to issue of the Construction Certificate, Form 2 of the Geotechnical Risk Management Policy for Pittwater (Appendix 5 of P21 DCP) is to be completed and submitted to the Accredited Certifier. Details demonstrating compliance are to be submitted to the Certifier prior to the issue of the Construction Certificate.

Reason: To ensure geotechnical risk is mitigated appropriately.

**On-site Stormwater Detention Details**

The Applicant is to provide a certification of drainage plans detailing the provision of on-site stormwater detention in accordance with Northern Beaches Council's WATER MANAGEMENT for DEVELOPMENT POLICY and generally in accordance with the concept drainage plans prepared by Taylor Consulting ,Drawing Number- STORM-1/B, Dated 06/June/2023. Detailed drainage plans are to be prepared by a suitably qualified Civil Engineer, who has membership to the Institution of Engineers Australia, National Professional Engineers Register (NPER) and registered in the General Area of Practice for civil engineering.

The drainage plans must address the following:

- i. Level spreader to be designed in accordance with Appendix 4 of Council's Water Management for Development Policy.
- ii. Level spreader to be at least 3m away from any site boundary.
- iii. Detailed drainage plans, including engineering certification, are to be submitted to the Principal Certifier for approval prior to the issue of the Construction Certificate.

Reason: To ensure appropriate provision for the disposal of stormwater and stormwater management arising from the development.

### **Encroachment Application**

The applicant is to submit an Minor Encroachments/ Constructions With Road Reserve Application for approval.

The applicant is to enter into any appropriate agreements with Council. All costs related to the above application are to be borne by the applicant.

A letter from Council indicating this conditions has been satisfied to be submitted to the Certifying Authority prior to the issue of the Construction Certificate.

Reason: Identify the responsibility of the structures on Council road reserve

### **Submission Roads Act Application for Civil Works in the Public Road**

The Applicant is to submit an application for approval for infrastructure works on Council's roadway. Engineering plans for the new development works within the road reserve and this development consent are to be submitted to Council for approval under the provisions of Sections 138 and 139 of the Roads Act 1993.

The application is to include copy of Civil Engineering plans for the design of elevated vehicular crossing in Jacqueline Close which are to be generally in accordance with the Council's specification for engineering works - AUS-SPEC #1. The plan shall be prepared by a qualified civil engineer. The design must include the following information:

- 1) Engineering details for the vehicle crossing and retaining structures to be prepared by a qualified practicing Structural Engineer with corporate membership of the Institute of Engineers Australia (M.I.E) and has appropriate experience and competence in the related field.
- 2) Vehicle crossing to be 3.0 metres wide at the kerb and the driveway profile to be in accordance with Northern Beaches Council's standard normal low vehicle crossing profile.
- 3) Structural Engineers design certificate for design of elevated driveway and any supporting retaining structure.
- 4) There should be no kerb on the traffickable section of the verge and the grass verge shall be battered off between concrete driveway finished surface level and existing verge level in compliance with Council's standards.
- 5) Details of proposed fencing as well as existing fencing.
- 6) At a minimum, the drawings must show the works in plan view, longitudinal section, details at a

relevant scale including all existing levels, any existing services/ infrastructure to be retained in the area of works.

7) Longitudinal section of driveway from street gutter invert to parking space within site with existing and proposed levels and grades

8) All driveways gradients and safe sight distances etc. shall be designed comply with AS 2890.1:2004 (Off-street Parking Standards).

9) Existing services plan to be provided and any adjustment to existing services are to be approved by the relevant service authority with all costs associated borne by the applicant

10) Details of provisions of Physical controls as per Australian/New Zealand Standard AS/NZS 2890.1:2004 parking facilities - Off-street car parking, in particular Section 2.4.5

11) Driveway gradients within the private property are not to exceed a gradient of 1 in 4 (25%) with a transition gradient of 1 in 10 (10%) for 1.5 metres prior to a level parking facility

The fee associated with the assessment and approval of the application is to be in accordance with Council's Fee and Charges.

An approval is to be submitted to the Certifying Authority prior to the issue of the Construction Certificate.

Reason: To ensure engineering works are constructed in accordance with relevant standards and Council's specification.

## **CONDITIONS THAT MUST BE ADDRESSED PRIOR TO ANY COMMENCEMENT**

### **Public Liability Insurance - Works on Public Land**

Any person or contractor undertaking works on public land must take out Public Risk Insurance with a minimum cover of \$20 million in relation to the occupation of, and approved works within Council's road reserve or public land, as approved in this consent. The Policy is to note, and provide protection for Northern Beaches Council, as an interested party and a copy of the Policy must be submitted to Council prior to commencement of the works. The Policy must be valid for the entire period that the works are being undertaken on public land.

Reason: To ensure the community is protected from the cost of any claim for damages arising from works on public land.

## **CONDITIONS TO BE COMPLIED WITH DURING DEMOLITION AND BUILDING WORK**

### **Road Reserve**

The applicant shall ensure the public footways and roadways adjacent to the site are maintained in a safe condition at all times during the course of the work.

Reason: Public safety.

### **Civil Works Supervision**

The Applicant shall ensure all civil works approved in the Section 138 approval are supervised by an appropriately qualified and practising Civil Engineer.

Details demonstrating compliance are to be submitted to the Principal Certifier and/or Roads Authority.

Reason: To ensure compliance of civil works with Council's specification for engineering works.

**Notification of Inspections (infrastructure works to be handed over to Council)**

Council's Development Engineer is to be given 48 hours notice when the works reach the following stages:

- (a) Installation of Silt and Sediment control devices
- (b) Prior to pouring for vehicle crossing

NOTE: Any inspections carried out by Council do not imply Council approval or acceptance of the work, and do not relieve the developer/applicant from the requirement to provide an engineer's certification.

Reason: To ensure new Council infrastructure is constructed in accordance with Auspec 1 Council's design and specification standards.

**CONDITIONS WHICH MUST BE COMPLIED WITH PRIOR TO THE ISSUE OF THE  
OCCUPATION CERTIFICATE****Positive Covenant and Restriction as to User for On-site Stormwater Disposal Structures**

The Applicant shall lodge the Legal Documents Authorisation Application with the original completed request forms (NSW Land Registry standard forms 13PC and/or 13RPA) to Council and a copy of the Works-as-Executed plan (details overdrawn on a copy of the approved drainage plan), hydraulic engineers' certification.

The Applicant shall create on the Title a restriction on the use of land and a positive covenant in respect to the ongoing maintenance and restriction of the on-site stormwater disposal structures within this development consent. The terms of the positive covenant and restriction are to be prepared to Council's standard requirements at the applicant's expense and endorsed by Northern Beaches Council's delegate prior to lodgement with the NSW Land Registry Services. Northern Beaches Council shall be nominated as the party to release, vary or modify such covenant. A copy of the certificate of title demonstrating the creation of the positive covenant and restriction for on-site storm water detention as to user is to be submitted.

Details demonstrating compliance are to be submitted to the Principal Certifier prior to the issue of an Occupation Certificate.

Reason: To ensure the on-site stormwater disposal system is maintained to an appropriate operational standard.

**Certification Elevated Parking Facility Work**

The Applicant shall submit a Structural Engineers' certificate certifying that the elevated parking facility was constructed in accordance within this development consent and the provisions of Australian/New Zealand Standard AS/NZS 2890.1:2004 parking facilities - Off-street car parking, in particular Section 2.4.5 Physical controls. Details demonstrating compliance are to be submitted to the Principal Certifier prior to the issue of the Occupation Certificate.

Reason: Compliance with this consent.

**Retaining wall**

The retaining wall works shall be certified as compliant with all relevant Australian Standards and Codes by a Structural Engineer. Details demonstrating compliance are to be submitted to the Principal Certifier prior to the issue of an Occupation Certificate.

Reason: Public and Private Safety

**Geotechnical Certification Prior to Occupation Certificate**

The Applicant is to submit the completed Form 3 of the Geotechnical Risk Management Policy (Appendix 5 of P21 DCP) to the Principal Certifier prior to issue of the Occupation Certificate.

Reason: To ensure geotechnical risk is mitigated appropriately.

### **Encroachment**

The applicant is to submit the agreement with Council to the Certifying Authority prior to the issue of the Occupation Certificate

Reason: Identify the responsibility of the structures on Council road reserve