

## **PRELIMINARY GEOTECHNICAL ASSESSMENT:**

### **44 Monash Parade, Dee Why**

<b>1.0</b>	<b>LANDSLIP RISK CLASS</b> (Highlight indicates Landslip Risk Class of property)
<input checked="" type="checkbox"/>	A - Geotechnical Report not normally required
<input checked="" type="checkbox"/>	B - Geotechnical Engineer (Under Council Guidelines) to decide if Geotechnical Report is required
<input type="checkbox"/>	C - Geotechnical Report is required
<input type="checkbox"/>	D - Geotechnical Engineer (Under Council Guidelines) to decide if Geotechnical Report is required
<input type="checkbox"/>	E - Geotechnical Report required

## **2.0 Proposed Development**

- 2.1** Widen the existing driveway by excavating to a maximum depth of ~2.0m.
- 2.2** Various other internal and external alterations.
- 2.3** No fills are shown on the plans.
- 2.4** Details of the proposed development are shown on 7 drawings prepared by Marston Architects, drawings numbered DA02 to DA06 with two drawings numbered DA01, all drawings dated 2020.

## **3.0 Site Location**

- 3.1** The site was inspected on the 8<sup>th</sup> October, 2020.
- 3.2** This residential property is on the high side of the road and has a N aspect. The block runs longways to the E so the slope is a cross-fall. It is located on the gently graded upper reaches of a hillslope. Medium Strength Hawkesbury Sandstone bedrock outcrops and steps down the property. Where sandstone is not exposed, it is expected to underlie the surface at relatively shallow depths. The natural surface of the block

has been altered with an excavation for the driveway and for a pool on the E side of the property. The proposed development will require an excavation to a maximum depth of ~2.0m to widen the driveway.

**3.3** The site shows no indications of historical movement in the natural surface that could have occurred since the property was developed. We are aware of no history of instability on the property.

## **4.0 Site Description**

The natural slope falls across the site at an average angle of ~6°. At the road frontage, a concrete driveway runs to a garage under the house. The cut for the uphill side of the driveway has been taken almost entirely through competent Medium Strength Sandstone and appears stable. The cut face on the downhill side of the driveway is supported by a stable ~1.2m high concrete block retaining wall. Medium Strength Sandstone outcrops between the road frontage and the house. The part three-storey concrete block house is supported on concrete block walls. No significant signs of movement were observed in the supporting walls of the house. A pool has been cut into the slope on the E side of the house. The water level of the pool indicates no ground movement has occurred in the shell of the pool since its construction. A timber deck also extends off the E side of the house beside the pool. Medium Strength Sandstone outcrops and steps down to the E boundary below the pool and deck. A steep slope extends beyond the boundary and eases to the top of the sea cliff. Some dislodged joint blocks were observed to be sitting in stable positions on this slope. The area surrounding the house is mostly lawn-covered with some paved areas. No signs of movement associated with slope instability were observed on the grounds. The adjoining neighbouring properties were observed to be in good order as seen from the road and the subject property.

## **5.0 Recommendations**

The proposed development and site conditions were considered and applied to the Council Flow Chart.

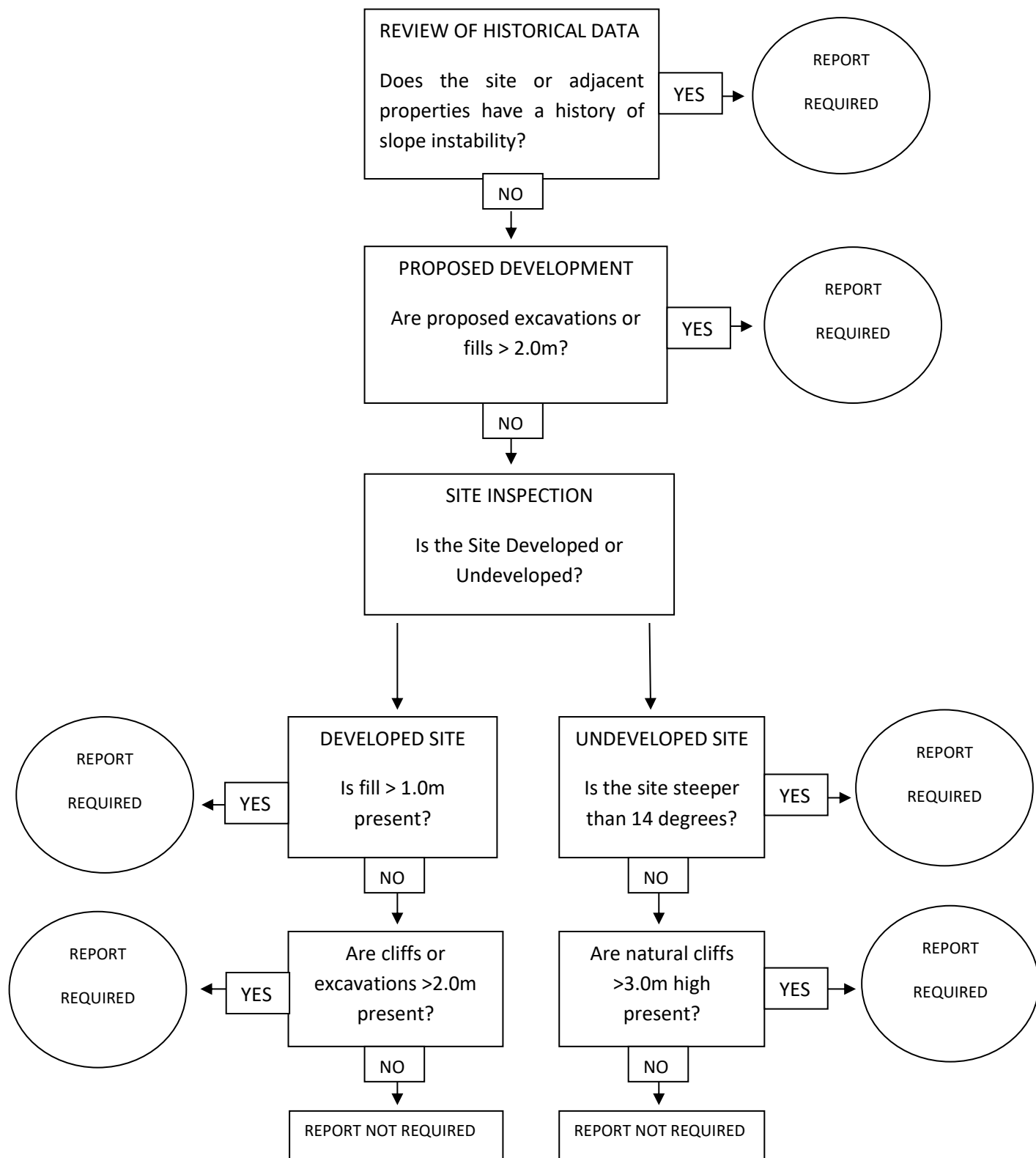
Provided good engineering and building practice are followed, no further Geotechnical assessment is recommended for the proposed development.

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## Preliminary Assessment Flow Chart – Norther Beaches Council (Warringah)



## Information about your Preliminary Assessment

This Preliminary Assessment relies on visual observations of the surface features observed during the site inspection. Where reference is made to subsurface features (e.g. the depth to rock) these are interpretations based on the surface features present and previous experience in the area. No ground testing was conducted as part of this assessment and it is possible subsurface conditions will vary from those interpreted in the assessment.

In some cases, we will recommend no further geotechnical assessment is necessary despite the presence of existing fill or a rock face on the property that exceed the heights that would normally trigger a full geotechnical report, according to the Preliminary Assessment Flow Chart. Where this is the case, if it is an existing fill, it is either supported by a retaining wall that we consider stable, or is battered at a stable angle and situated in a suitable position on the slope. If it is a rock face that exceeds the flow chart limit height, the face has been deemed to be competent rock that is considered stable. These judgements are backed by the inspection of over 5000 properties on Geotechnical related matters.

The proposed excavation heights referred to in section 2.0 of this assessment are estimated by review of the plans we have been given for the job. Although we make every reasonable effort to provide accurate information excavation heights should be checked by the owner or person lodging the DA. If the excavation heights referred to in in section 2.0 of this assessment are incorrect we are to be informed immediately and before this assessment is lodged with the DA.

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