

## **PRELIMINARY GEOTECHNICAL ASSESSMENT:**

### **42 Bix Road, Dee Why**

<b>1.0</b>	<b>LANDSLIP RISK CLASS</b> ( <i>Highlight indicates Landslip Risk Class of property</i> )
<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** Construct a new carport on the uphill side of the house
- 2.2** Extend the downhill side of the house.
- 2.3** Construct a new pool and cabana on the downhill side of the property by excavating to a maximum depth of ~1.8m.
- 2.4** Various other minor internal and external alterations.
- 2.5** No significant fills are shown on the plans.
- 2.6** Details of the proposed development are shown on 10 drawings prepared by Peter Zavaglia Design Studio, Job number 2011, drawings numbered DA00 to DA09, Revision A, dated 4/3/22.

## **3.0 Site Location**

- 3.1** The site was inspected on the 10<sup>th</sup> May, 2022.

**3.2** This residential property is on the low side of the road and has a NW aspect. It is located on the gentle to moderately graded lower reaches of a hillslope. No rock outcrops on the property. The Sydney 1:100 000 Geological sheet indicates the site is underlain by Hawkesbury Sandstone that is described as a medium to coarse grained quartz sandstone with very minor shale and laminite lenses. Sandstone bedrock is expected to underlie the surface at relatively shallow depths. The current development of the block has altered the natural surface little with the development to date. The proposed development will require an excavation to a maximum depth of ~1.8m for the proposed pool.

**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**

At the road frontage, a concrete driveway runs to a carport attached to the uphill side of the house. Between the road frontage and the house is a gently sloping lawn. The single-storey brick house is supported on brick walls. The supporting brick walls show no significant signs of movement. A moderately sloping lawn falls from the downhill side of the house before easing back to gentle angles across the remainder of the property. The moderate portion of the slope is terraced with two rough stack rock walls that will be demolished as part of the proposed works. The land surface surrounding the driveway and house is mostly lawn-covered with some paved areas. No signs of movement related to slope instability were observed on the grounds. No cliffs or large rock faces were observed on the property or in the near vicinity. No geotechnical hazards that could impact on the subject property were observed on the surrounding neighbouring properties as viewed from the subject property and the street.

## 5.0 Recommendations

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

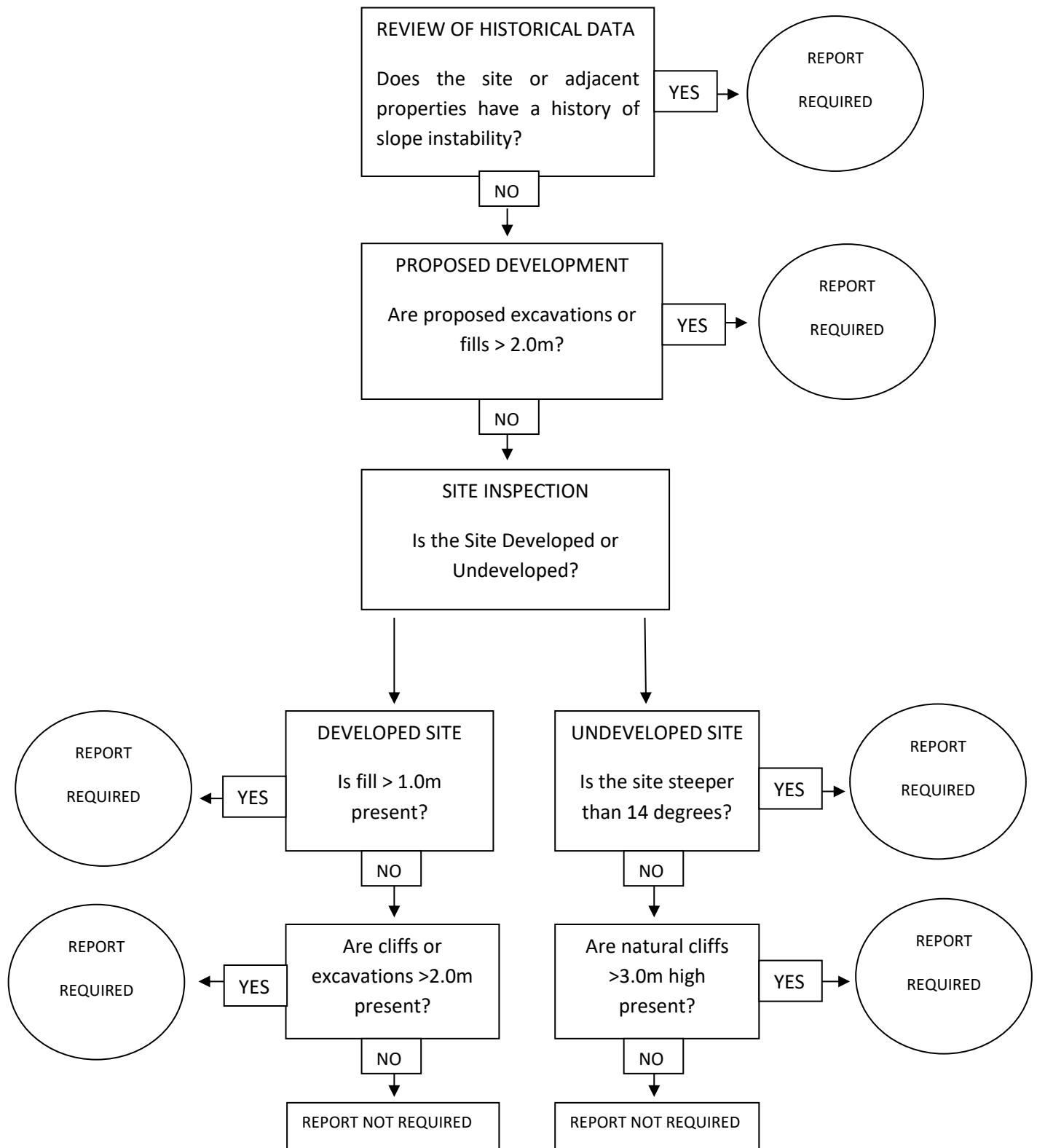
Provided good engineering and building practice are followed no further Geotechnical assessment is recommended.

White Geotechnical Group Pty Ltd.



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## Preliminary Assessment Flow Chart – Northern 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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