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No. Pages: 3

Project No.: 2021-089

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7 Hill Street,
Queenscliff N.S.W. 2096.

Preliminary Landslip Assessment for 7 Hill Street, Queenscliff

This letter report details the results of a preliminary landslip assessment required by Northern Beaches Council to accompany all new Development or Building Certificate Applications. It is a review of the design plans followed by a walk over visual assessment of the stability of the existing property, no insitu testing was undertaken.

The assessment follows the guidelines as set out in Section E10-Landslip Risk of Warringah Councils 2011 LEP Planning Rules.

1. Landslip Risk Class:

The site is located within Landslip Risk Class "B" which is classified as Flanking Slopes of between 5° and 25° (Warringah LEP Landslip Risk Map Sheet LSR_010).

2. Site Location:

The site is located on the high south side of Hill Street within gently north dipping topography. The site is a rectangular shaped block with a front north boundary of 9.945m, a rear south boundary of 11.155m and western and eastern boundaries of 42.67m, as referenced from the supplied survey drawing.

3. Proposed Development:

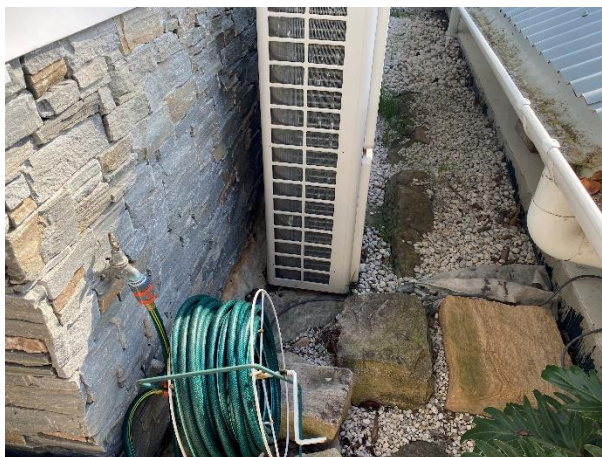
It is understood that the proposed works consists of the construction of a new gym/storage room below the existing site-dwelling and a new bin storage area directly to the west of an existing front carport.

The new gym/storage room and bin storage area will have a similar level to the existing front carport, as such an excavation of approximately 1.0m depth (adjacent to the carport) increasing south to 1.90m depth (under the existing dwelling) will be required. The excavation will extend to approximately 6.0m south from the site-dwelling's frontage wall, 4.0m from the north boundary and 1.50m to 3.0m off the western and eastern boundaries, respectively. The works will also include the removal and additions of new structural members.

4. Existing Site Description:

Hill Street is formed with a gently east dipping bitumen pavement where it passes the site, with low concrete gutter and kerbs, adjacent to a grass lawn and a concrete cross over driveway which allows access to the front carport of the site. There were no signs of significant deformation, cracking or underlying geotechnical issues within the road reserve.

The front carport appears to be excavated into the slope and contains a masonry retaining wall (≤ 1.50 m high) along the southern side. Rock outcrop is located directly to the rear of the carport masonry retaining wall (Photograph-1), which appears to be sandstone bedrock.



*Photograph-1: Potential sandstone bedrock is located directly to the rear of the carport.
View looking down west.*

The site-dwelling comprises a one and two storey, timber, semi-detached dwelling. The site-dwelling shares a common wall with the neighbouring dwelling (No.5) along the western side and the main entrance is accessed via paved stairs adjacent to the western boundary. The site-dwelling's Ground Floor (GF) is approximately 2.8m higher than the front carport floor level and the inspection identified that the front of the dwelling and internal floors are supported by brick bearing walls.

Access to the rear of the site is achieved along the eastern boundary via a sandstone paved and timber decking ($\leq 1.50\text{m}$ wide) pathway and a narrow ($\leq 0.90\text{m}$ wide) gravel pathway. The pathway and dwelling's external walls appeared in good condition, signs of instability or underlying geotechnical issues were not observed within the surrounding structures.

The rear of the block contains a timber deck that extends $\leq 5.0\text{m}$ south from the dwelling and a grass lawn which is bounded by gardens along the southern and eastern sides with trees located at the south-west corner of the block. Signs of instability or underlying geotechnical issues were not observed within the rear of the property.

5. Neighbouring Property Conditions:

The neighbouring property to the west (No.5 Hill Street) contains the semi-detached dwelling, comprising a one and two storey brick and timber house. The front of the site contains a carport within the western side and a grass lawn with stairs (allowing access to the property dwelling) within the eastern side. An inground swimming pool appears located to the rear of the dwelling, bounded by a grass lawn and gardens adjacent to the boundaries. Signs of instability, cracking or underlying geotechnical issues were not observed within the neighbouring property and appeared in good condition.

The neighbouring property to the east (No.9 Hill Street) contains a new two storey clad dwelling which broadly occupies the centre of the block. The front of the property contains a grass lawn and a cross over concrete driveway within the western and eastern sides, respectively. The rear of the block contains an inground pool and pool decking with a grass lawn and with gardens. The neighbouring dwelling extends west to approximately 1.0m from the common boundary and contains a similar Ground Surface Level (GSL) to the site along the common boundary. The property appeared in new (< 10 years old) and good condition. Signs of instability, cracking or underlying geotechnical issues were not observed within the neighbouring property.

The neighbouring property to the south (127 Crown Road) contains a two storey, masonry unit building with a basement carpark. The front of the block contains a lawn and concrete ramp within the western and eastern sides, respectively. The building is surrounded by narrow lawns and gardens along the rear and sides. The

dwelling appeared in good and stable condition. Signs of instability or underlying geotechnical issues were not observed within the neighbouring property.

The neighbouring properties were only inspected from within the site or from the road reserve however the visible aspects did not show any significant signs of large-scale slope instability or other major geotechnical concerns which would impact the site or the proposed development.

6. Assessment:

Based on the above items and on Councils flow chart check list (Page: 2 of 2 in Section E10), i.e., does the present site or proposed development contain:

- | | |
|--------------------------------|-----|
| • History of Landslip | No |
| • Proposed Excavation/Fill >2m | No |
| • Site developed | Yes |
| • Existing Fill >1m | No |
| • Site Steeper than 1V:4H | No |
| • Existing Excavation >2m | No |
| • Natural Cliffs >3m | No |

It is considered that a detailed Landslip Risk Assessment is not required for this Development Application. However, it is recommended that an excavation methodology report be prepared that includes geotechnical inspection by an experienced geotechnical consultant during excavation and provides recommendations where required.

7. Date of Assessment: 22nd April 2021.

8. Assessment by:



Marvin Lujan
Geotechnical Engineer

9. References:

Architectural Drawings – by H & C Design Pty Ltd, Date: Jan. 2021, Drawn: Henk, Job No.: 201213-3, Drawings: Floor Plan of Gym/ Store Room, Site Plan, Eastern Elevation, Existing Ground Floor Plan, Existing First Floor Plan, Northern Elevation, Section 1 and Section 2.

Survey Plan – by Stutchbury Jaques Pty Ltd, Date: 24/11/2020, Sheet 1 of 1 and Reference: 6827/08.