

## ADDENDUM ASSESSMENT MEMORANDUM – ACID SULFATE SOILS

### NORTHERN REGIONAL PLANNING PANEL

<b>PANEL REFERENCE &amp; DA NUMBER</b>	PPSNTH-168 – (DA2022/00086)
<b>PROPOSAL</b>	Affordable housing project comprising 23 x 1 bedroom units in four separate but linked 2 storey buildings with one level of basement carparking comprising 24 parking spaces
<b>ADDRESS</b>	Lot 1 DP 863743 15 Watson Street, Bellingen
<b>APPLICANT</b>	Geolink Consulting Pty Ltd
<b>OWNER</b>	Royal Freemasons Benevolent Institution of NSW
<b>DA LODGEMENT DATE</b>	21 June 2022
<b>APPLICATION TYPE (DA, Concept DA, CROWN DA, INTEGRATED, DESIGNATED)</b>	Development Application
<b>REGIONALLY SIGNIFICANT CRITERIA</b>	Clause 2.19, Schedule 6 of <i>State Environmental Planning Policy (Planning Systems) 2021</i> : Clause 2.19 provides that development specified in Schedule 6 is declared to be regionally significant development for the purposes of the Act. Schedule 6 includes development for the purpose of affordable housing that has a capital investment value of more than \$5m. The Act defines affordable housing as meaning housing for very low income households, low income households or moderate income households. Clause 4.5 of the Act designates the Northern Regional Planning Panel as the consent authority for regionally significant development.
<b>CIV</b>	\$5,996,515 (excluding GST)
<b>CLAUSE 4.6 REQUESTS</b>	Clause 4.3 Height of buildings – the highest point of the proposed building is 11.01m above natural ground level, which exceeds the 10m maximum building height.
<b>KEY SEPP/LEP</b>	State Environmental Planning Policy (Housing) 2021; State Environmental Planning Policy (Planning Systems) 2021; State Environmental Planning Policy (Resilience and Hazards) 2021; State Environmental Planning Policy (Building Sustainability Index: BASIX) 2004; Bellingen Local Environmental Plan 2010.
<b>TOTAL &amp; UNIQUE SUBMISSIONS ISSUES SUBMISSIONS</b>	Nil
<b>DOCUMENTS SUBMITTED FOR CONSIDERATION</b>	Statement of Environmental Effects including Appendices A – N; Contamination Assessment; Geotechnical Assessment

<b>SPECIAL INFRASTRUCTURE CONTRIBUTIONS (S7.24)</b>	Nil
<b>RECOMMENDATION</b>	Conditional Approval
<b>DRAFT CONDITIONS TO APPLICANT</b>	Yes
<b>SCHEDULED MEETING DATE</b>	31 August 2022
<b>PLAN VERSION</b>	8 August 2022 Revision 2
<b>PREPARED BY</b>	Benson McCormack Architecture
<b>DATE OF MEMORANDUM</b>	30 August 2022

## EXECUTIVE SUMMARY

Acid sulfate soils (ASS) have been adequately assessed in the application as per Clause 7.1(4) of the Bellinghen Local Environmental Plan 2010 being that a preliminary assessment of the proposed works prepared in accordance with the *Acid Sulfate Soils Manual* indicates that an acid sulfate soils management plan is not required for the works. Apologies are expressed for the confusion in the report which referenced the Statement of Environmental Effects as well as the later report by Regional Geotechnical Solutions. The observations by the Panel Member are agreed.

### 1. ACID SULFATE SOILS QUERY

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The following queries have been raised by a Panel member through the Chair:

*I've just had a very quick scan of this and wanted to ask about the suggestion in the assessment report that the absence of an Acid Sulfate Soils Management Plan be dealt with as a 4.6 variation?*

*On the first page of the report in the section relating to Clause 4.6 requests is states:*

*"[LEP] Clause 7.1 Acid sulfate soils (ASS) – the north west half of the site is mapped as containing Class 4 ASS. Clause 7.1(3) provides that development consent must not be granted under this clause for the carrying out of works more than 2m below the natural ground surface unless an acid sulfate soils management plan (ASSMP) has been prepared for the proposed works in accordance with the Acid Sulfate Soils Manual and has been provided to the consent authority. The applicant requests that the preparation of the ASSMP be set as a condition of consent."*

*First of all I can't find the relevant 4.6 request on the portal, only the one for the requested height variation. Secondly don't think that the LEP requirement to prepare a ASSMP is a development standard amendable to the 4.6 process anyway. Then at p.14 of the Assessment Report it states:*

*“a geotechnical assessment prepared by Regional Geotechnics concludes (page 5) that based on the results of assessment the site soils are not considered to be either actual or potential ASS and an ASS management plan is therefore not required.”*

*That report is on the portal and dated 6 July 2022. It doesn't appear to contain a 4.6 variation request.*

*However, it may be that LEP cl. 7.1(4) applies here, as follows:*

*(4) Despite subclause (2), development consent is not required under this clause for the carrying out of works if –*

- (a) a preliminary assessment of the proposed works prepared in accordance with the Acid Sulfate Soils Manual indicates that an acid sulfate soils management plan is not required for the works, and*
- (b) the preliminary assessment has been provided to the consent authority and the consent authority has confirmed the assessment by notice in writing to the person proposing to carry out the works.*

*Please could we get some further advice on this matter from the report author before proceeding too much further? The report at p.2 suggests it has been prepared by Benson McCormack Architecture but they are of course the project architects.*

## **2. ACID SULFATE SOILS RESPONSE**

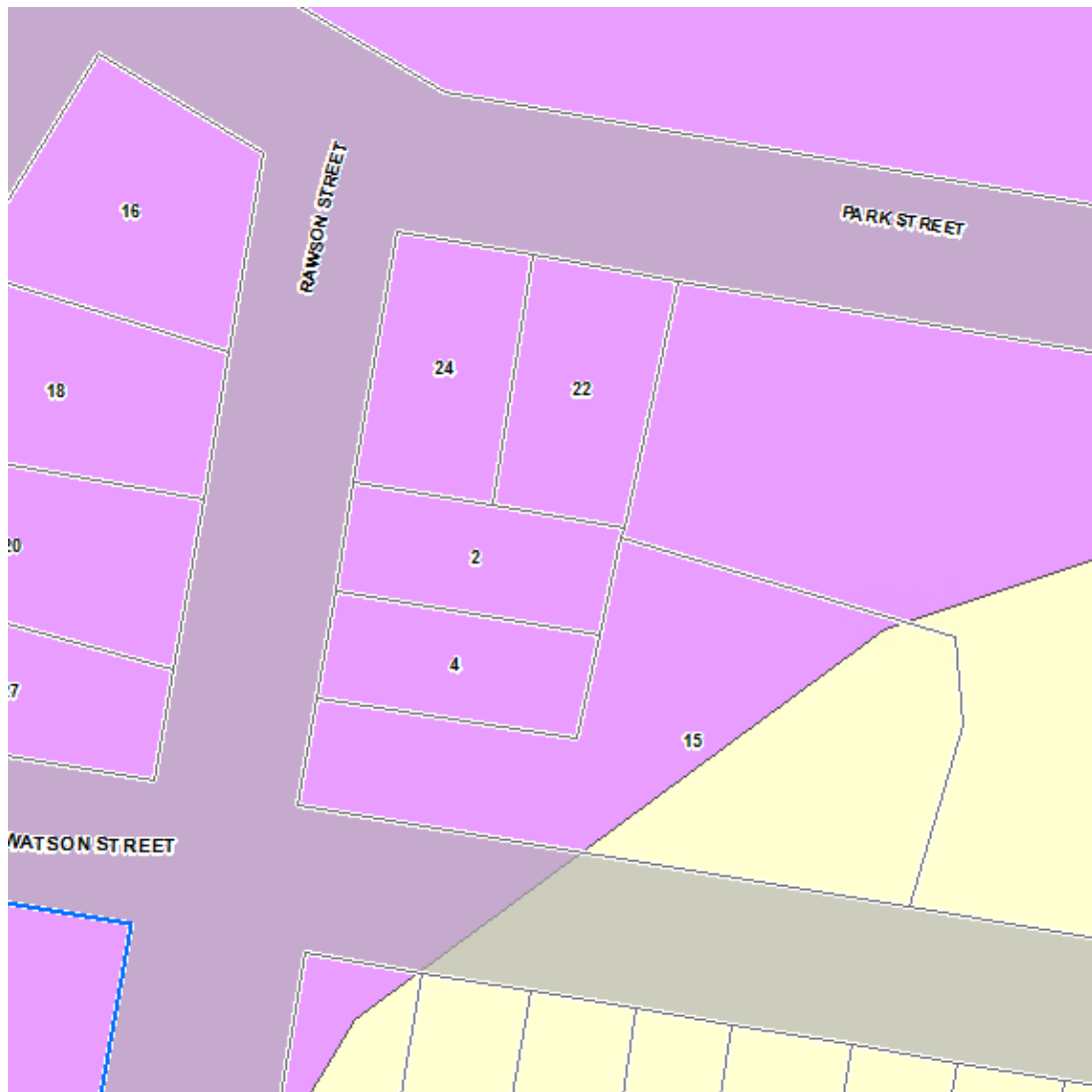
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A map showing an extract from Council's Acid Sulfate Soils (ASS) mapping for 15 Watson Street is shown below. The pink shading indicates potential Class 4 ASS whilst the yellow shadowing indicates potential Class 5 ASS. The mapping indicates that approximately the north western half of the site is potential Class 4 ASS whilst approximately the south eastern half is potential Class 5 ASS.

Clause 7.1 (3) of the Bellingen Local Environmental Plan 2010 provides that development consent must not be granted for the carrying out of works unless an acid sulfate soils management plan has been prepared for the proposed works in accordance with the *Acid Sulfate Soils Manual* and has been provided to the consent authority.

Clause 7.1 (4) provides that development consent is not required for the carrying out of works if –

- (a) a preliminary assessment of the proposed works prepared in accordance with the *Acid Sulfate Soils Manual* indicates that an acid sulfate soils management plan is not required for the works, and
- (b) the preliminary assessment has been provided to the consent authority and the consent authority has confirmed the assessment by notice in writing to the person proposing to carry out the works.



The applicant via the Statement of Environmental Effects (SEE) noted in section 5.3.1 (page 30) as follows:

### 5.3.1 Acid Sulfate Soils

*The land is mapped as containing class 4 and 5 acid sulfate soils (ASS). The proposal includes bulk earthworks to accommodate the basement carparking area. As identified in the Preliminary Geotechnical Assessment, the alluvial soils in the west of the site are mapped as having a low probability of occurrence of Acid Sulfate Soils (ASS) at depths of greater than 3m. Samples of alluvial soil have been collected and submitted for laboratory testing to determine whether the materials are either actual or potential ASS and whether an ASS Management Plan is required for the alluvial soils. The alluvial soils are expected to be limited to the western portion of the site (ie not within Stage 1). An Acid Sulfate Soils Management Plan (ASSMP) prepared in accordance with the Acid Sulfate Soils Manual may be required pending the results of the soil samples undertaken."*

And on page 12 when noting the requirements of the Bellingen Local Environmental Plan 2010 the SEE indicates in the compliance table that:

*"The proposal includes excavation of more than 2m below the natural ground surface to accommodate the basement carparking area."*

*An Acid Sulfate Soils Management Plan (ASSMP) is required. It is requested that the preparation of a Final ASSMP be set as a condition of development consent. (underlining added for emphasis).*

A report dated 6 July by Regional Geotechnical Solutions and titled “Geotechnical Assessment Proposed Multistorey Residential Development 15-23 Watson Street, Bellingen” is referred to by the Panel Member. The purpose of the assessment included to provide comments and recommendations in relation to the presence of acid sulfate soils and the need for an acid sulfate soil management plan. The report indicates that the methodology for the field work included:

- *“observation of site features and surrounding features relevant to the geotechnical conditions of the site;*
- *Five boreholes to depths of up to 5m with a 4WD mounted drill rig. Hand (pocket) penetrometer testing was undertaken on recovered samples;*
- *Dynamic Cone Penetrometer (DCP) testing adjacent to each of the boreholes; and*
- *Collection of samples for subsequent laboratory testing. The following was undertaken:*
  - *Two shrink-swell tests;*
  - *One 4 day soaked CBR test; and*
  - *Six acid sulfate soil field screening tests.*

Section 5 (page 4) of the report by Regional Geotechnical Solutions addresses the potential for ASS on the site and for the purposes of the Bellingen Local Environmental Plan 2010 notes as follows:

*“An assessment regarding the presence of ASS at the site and the need for an ASS Management Plan has been undertaken based on the procedures outlined within the “National Acid Sulfate Soils Guidance: National acid sulfate soils sampling and identification methods manual” (June 2018).*

## *5.2 Stage 1: Desktop Assessment*

*The NSW Government “eSPADE” online mapping indicates that the western edge of the site has a low probability of occurrence of ASS which, if present, would occur at depths of greater than 3m below the ground surface. The remainder of the site is located within an area of “No Known Occurrence” of ASS.*

## *5.3 Stage 2: Site Observation*

*A site assessment was undertaken by RGS in May 2022 and a summary of the results of the assessment is presented below:*

- *The site grades down to the west at grades of less than about 8 degrees towards an area in the west of the site which has been mapped as being an alluvial levee with an elevation greater than 4m AHD;*
- *Surface waters were not present during the site investigation. Groundwater was encountered within alluvial clay in borehole BH5 at a depth of 1.2m;*

- *A visual assessment of the prevalent plant communities within the site does not trigger the need for further assessment based on the indicators presented within Table 5.1 of the manual referred to in Section 5.1 of this report;*
- *The subsurface profile comprises alluvial clay soils and residual soils. The surface and subsurface soils do not contain any visual indicators of being either potential or actual ASS as presented within Table 5.1 of the manual referred to in Section 4.1 of this report;*
- *Six soil samples obtained from BH4 and BH5 (ie the two boreholes drilled within the alluvial soils) were screened for the presence of actual or potential ASS using methods 23Af and 22Bf of the ASSMAC Acid Sulfate Soils Manual. The test results are presented in Appendix B. The results indicated:*
  - *The samples revealed  $pH_f$  values of 5.1 to 5.7 in distilled water. In this test,  $pH < 4$  is an indicator of Actual ASS; and*
  - *The samples revealed  $PH_{FOX}$  values of 4 and 4.6 in hydrogen peroxide. Values of less than 3 can be an indicator of Potential ASS.*

#### 5.4 ASS Assessment

*An assessment has been undertaken to determine the presence of ASS at the site and the need for an ASS Management Plan. Based on the results of the assessment, detailed soil sampling and field testing is not required and the site soils are not considered to be either Actual or Potential ASS.*

*An ASS Management Plan is therefore not required.*

### 3. CONCLUSION

The Regional Technical Solutions Report demonstrates a detailed investigation of the occurrence or otherwise of ASS with a finding that the site soils are not considered to be either Actual or Potential ASS and hence a conclusion that an ASS Management Plan is not required.

Therefore, it is agreed that provisions for the exemption under clause 7.1(4) are met being that:

- (4) *...development consent is not required under this clause for the carrying out of works if –*
  - (a) *a preliminary assessment of the proposed works prepared in accordance with the Acid Sulfate Soils Manual indicates that an acid sulfate soils management plan is not required for the works, and*
  - (b) *the preliminary assessment has been provided to the consent authority and the consent authority has confirmed the assessment by notice in writing to the person proposing to carry out the works.*

Clause 4.6 is not relevant to the matter and the reference to it in the table is incorrect.