## **Steve Mueck Biodiversity Pty Ltd**



Expert Evidence Statement prepared by
Stephen Mueck for Greater Bendigo Planning
Scheme Amendment C248gben and
Planning Permit Application DS/207/2019:
1 Buckland Street, 20 Montis Lane, 18-46 Saade
Street, adjoining reserves and road reserves,
Epsom – Biodiversity

Prepared at the request of Lawserve, Beardall and Smith (the proponent)

Date of study area inspection: 30 September 2024

Date of statement: 14 October 2024

Cover photo: Looking south across the study area from Montis Lane towards Buckland Street.

Disclaimer:

Steve Mueck Biodiversity Pty Ltd has completed this assessment in accordance with the relevant federal, state and local legislation and current industry best practice. The company accepts no liability for any damages or loss incurred as a result of reliance placed upon the report content or for any purpose other than that for which it was intended.

# Contents

Name and address	1
Qualifications and experience	2
Qualifications and training	2
Professional affiliations and memberships	2
Professional experience	2
Area of expertise to make this report	3
General expertise	3
Site-specific expertise	3
Limitations	3
Other contributors to this report and their expertise	4
Scope of this evidence	5
Documents and materials considered	6
Legislation and subordinate instruments	6
Government publications	
Databases	6
Other reports and information	6
Summary	8
Study area	10
Landscape context	10
Land use	10
Available biodiversity information covering the study area	
Current condition	
Other ecological values	
Assessed impacts of the proposed development	
Expert assessment	15
Response to submissions	16
Conclusion	17
Limitations and qualifications	18
Provisional opinions	18
Questions	18
Inaccuracies	18
Declaration	
Appendices	20
Appendix 1 Curriculum vitae for Stephen Mueck	21

Appendix 2	Photos	25	
Appendix 3	Letter of Instruction3	32	
Appendix 4	EVC Benchmark for Creek-line Grassy Woodland4	18	
Appendix 5	Threatened species recorded in the local area5	<b>i</b> 1	
Appendix 6	Plant species recorded6	<b>i</b> 3	
Appendix 7	Native vegetation removal report and credit register extract6	6	
List of Figures  Figure 1: Location of 1 Buckland Street, 20 Montis Lane, 18-46 Saade Street, adjoining reserves and road reserves, Epsom			
Photos			
	ditional small, scattered trees growing on the boundary of Lot 3, 36-46 Saade Street 2		
Photo 3 Or	ditional small, scattered trees growing on the boundary of Lot 4, 36-46 Saade Street 2 ne of the additional small trees recorded from Lot 2 of TP747978 (the northern parcel of treet)		
	additional small tree recorded from Lot 1TP743178 (part of 1 Buckland Street)		
	ditional small, scattered trees recorded from Lot 20A of TP739862 (the southern parcel of treet)2		
	additional small, scattered tree recorded from the southern extent of the unmade portio		
Photo 7 Tr	ees 4, 5, 6 and 7 as mapped and measured by Practical Ecology (2024c)2	8:	
	ee 3 as mapped and measured by Practical Ecology (2024c)2		
Photo 10 Lo	ee 1 as mapped and measured by Practical Ecology (2024c)		
Photo 11 H	abitat Zone 4b as mapped by Practical Ecology (2024c)3	0	
	ne ground cover vegetation of the subject land is dominated by weeds and has been heavi its historical land-use	-	
	ne interface between the subject land and Bendigo Creek includes an often elevated share		

# Name and address

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# Qualifications and experience

## **Qualifications and training**

- Bachelor of Science (Hons), Monash University
- Masters of Environmental Science, Monash University

## **Professional affiliations and memberships**

- Australian Network for Plant Conservation (current member)
- Pimelea spinescens Recovery Team (current member)

## **Professional experience**

I have over 35 years of experience in vegetation assessment, management and research and an extensive knowledge of the vegetation of southeastern Australia. I became a senior botanist with Biosis (then known as Biosis Research) in 1995. While with Biosis I was senior scientist and project manager on a number of major investigations including assessments for Melbourne's new Wholesale Market, the Environmental Effects Statement (EES) for BHP's Eastern Gas Pipeline, preparation of management options for Mount Stirling, and vegetation mapping for the Central Highlands and Western Regional Forest Assessment Areas. I have prepared numerous flora surveys, undertaken conservation value assessments, worked on nature reserve design and management, prepared ecological design guidelines for developments, and supervised and participated in both large and small scale mapping exercises. I also have experience in preparing and implementing pest plant and animal management plans, I am DEECA certified for vegetation quality assessments and have produced numerous plans and assessments for clients to achieve compliance with state and federal biodiversity legislation and policy.

I have helped develop novel techniques for assessing and mitigating impacts to threatened flora and fauna. I also possess strong project management skills.

Further details about my qualifications and experience can be found in Appendix 1.

I am currently Principal Botanist with Steve Mueck Biodiversity Pty Ltd, established in April 2023.

# Area of expertise to make this report

## **General expertise**

I have worked extensively with remnant native vegetation, including woodlands, grasslands, wetlands and floodplain environments, within south-eastern Australia for more than 35 years, conducting flora and fauna surveys and providing specialist advice on ecological management within these environments.

I have provided advice on the ecological management and rehabilitation of a broad range of environments including grasslands, woodlands, forests and wetlands. This work has included projects involving the provision of advice on mitigating the environmental impacts of proposed developments and the rehabilitation of these environments after impacts associated with construction works, such as residential developments, road works and establishment of other infrastructure.

I have provided assessment and impact advice in similar circumstances (i.e. impacts of proposed infrastructure, residential and industrial subdivisions) in numerous other instances. At a larger scale, similar projects include the assessment and management of biodiversity matters for Peninsula Link for VicRoads, early planning for the development of Williams Landing for Cedar Woods, planning for subdivisional stages of Cairnlea for Development Victoria and the Ravenhall Prison for the Department of Justice.

While a Principal Botanist at Biosis, I also supervised the management and monitoring of grassland, woodland and wetland reserves in response to conservation offset programs and have provided management advice to improve the condition of native vegetation across Victoria.

## Site-specific expertise

I inspected the study area, encompassing 1 Buckland Street, 20 Montis Lane, 18-46 Saade Street, adjoining reserves and road reserves, Epsom, on 30 September 2024 to assess the biodiversity values present. A selection of photos from my site inspection are presented in Appendix 2.

I have been assessed by the Department of Energy, Environment and Climate Action (DEECA) as competent in the conduct of vegetation quality assessments (habitat hectares) and have been listed by DEECA as an accredited assessor (https://www.environment.vic.gov.au/\_data/assets/pdf\_file/0035/546974/deeca-vegetation-quality-accredited-assessor-list-29Dec2023.pdf).

#### Limitations

I inspected the study area on one occasion and assessed the biodiversity values by myself. While it is unlikely that my survey was able to detect all of the vascular plants likely to be present, it is considered that all relevant matters relating to the native vegetation present have been documented to allow for a comprehensive assessment of the potential impacts of the proposed development to native vegetation and other habitat values present.

As such, no significant limitations are identified for this expert evidence report.

# Other contributors to this report and their expertise

I, Stephen Mueck, have researched and written this expert evidence report. I have inspected land at 1 Buckland Street, 20 Montis Lane, 18-46 Saade Street, adjoining reserves and road reserves, Epsom (the subject land) and assessed the ecological values of these properties.

I have also received flora and fauna assessments of the subject land produced by Practical Ecology dated March 2019, March 2023, August 2020, June 2024 and July 2024. These reports guided my observations and impact assessments within the subject land.

There are no other contributors to this report.

# Scope of this evidence

- 1. I have been requested by Russell Kennedy, acting on behalf of the proponent to provide ecological expert evidence in this matter. I have considered this to require:
  - Review the existing reports on biodiversity values of the study area, including reports by Practical Ecology (2019, 2020, 2023, January 2024, June 2024 and July 2024) and existing biodiversity databases.
  - Provide my opinions relating to potential impacts to native vegetation and other biodiversity associated with the proposed development of the subject land.
  - Address any biodiversity related matters raised by regulatory authorities or objectors.
  - Prepare a statement detailing the matters addressed above in the form of an expert witness report.

A copy of the letter issuing me with instructions is provided in Appendix 3.

This report has been prepared considering the VCAT Practice Note PNVCAT2 Expert Evidence.

# Documents and materials considered

2. The following is a list of the documents and materials that I have used or considered to prepare this statement, including documents received electronically from Sonia Narduzzo of Russell Kennedy.

## Legislation and subordinate instruments

- Planning and Environment Act 1987 (PE Act) (Vic.)
- Flora and Fauna Guarantee Act 1988 (FFG Act)
- Greater Bendigo Planning Scheme.
- Environment Protection and Biodiversity Conservation Act 1999 (EPBC Act) (Cth).

## **Government publications**

- DELWP 2017. Guidelines for the removal, destruction or lopping of native vegetation. Victorian Government Department of Environment, Land, Water and Planning, Melbourne (the **Guidelines**).
- DELWP 2018. Assessor's handbook: Applications to remove, destroy or lop native vegetation. Victorian Government Department of Environment, Land, Water and Planning, Melbourne (the **Handbook**).
- DSE 2004. Vegetation Quality Assessment Manual Guidelines for applying the habitat hectare scoring method version 1.3. Department of Sustainability and Environment, East Melbourne.
- Department of Transport and Planning 2024. Expert evidence Practice Note 1. Department of Transport and Planning, Melbourne (https://www.planningpanels.vic.gov.au/\_data/assets/ pdf\_file/0026/593333/ppv-pn01-expert-evidence.pdf).

#### **Databases**

- DEECA 2024a. NatureKit biodiversity decision support tool (https://maps2.biodiversity.vic.gov.au/Html5viewer/index.html?viewer=NatureKit).
- DEECA 2024b. Native vegetation information management (NVIM) system (https://mapshare.vic.gov.au/nvr/map/removal).

## Other reports and information

- Practical Ecology 2019. Flora and Fauna Assessment and Native Vegetation Impact Assessment, Saade Street, Epsom – Rezoning and Subdivision Version 1.0, prepared by Practical Ecology, Preston (19 March 2019).
- Practical Ecology 2020. Flora and Fauna Assessment and Native Vegetation Impact Assessment, Saade Street, Epsom – Rezoning and Subdivision Version 2.0, prepared by Practical Ecology, Preston (27 August 2020).
- Practical Ecology 2023. Flora and Fauna Assessment and Native Vegetation Impact Assessment, Saade Street, Epsom – Rezoning and Subdivision Version 2.0, prepared by Practical Ecology, Preston (21 March 2023).
- Practical Ecology 2024a. Flora and Fauna Assessment and Native Vegetation Impact Assessment, Saade Street, Epsom – Rezoning and Subdivision, Version 2.0, prepared by Practical Ecology, Preston (22 January 2024).

- Practical Ecology 2024b. Native Vegetation Impact Assessment Amendment for the proposed rezoning of land at Saade Street, Epsom, prepared by Practical Ecology, Preston (7 June 2024).
- Practical Ecology 2024c. Native Vegetation Impact Assessment Amendment for the proposed rezoning of land at Saade Street, Epsom, prepared by Practical Ecology, Preston (15 July 2024).
- Native vegetation removal report: PRE\_2019\_020 issued 5 March 2019.
- External Referral Comments, prepared by DELWP (now DEECA) by Amanda Johnson to Ross Douglas, dated 28 April 2020 and the associated DELWP mapping request.
- Letter from DEECA to Council, dated 28 April 2020.
- Letter from DEECA to Council, dated 14 March 2023.
- Letter from DEECA to Council, dated 29 March 2023.
- Letter from DEECA to Council, dated 11 April 2024.
- Letter from DEECA to Council, dated 5 July 2024.
- Letter from DEECA to Council, dated 18 July 2024.
- City of Greater Bendigo Council Meeting Agenda dated July 24, 2023.
- City of Greater Bendigo Council Meeting Minutes dated July 24, 2023.
- City of Greater Bendigo Council Meeting Agenda dated August 26, 2024.
- City of Greater Bendigo Council Meeting Minutes dated August 26, 2024.
- Greater Bendigo C248gben Draft Planning Permit Conditions Exhibition Gazetted (Draft Permit Requirements).
- City of Greater Bendigo correspondence to Spiire Australia dated 15 April 2019.
- Spiire Australia correspondence to DEECA Planning Services (North), Planning and Environment Assessment dated 15 July, 2024.

# **Summary**

- 1. The subject land encompasses 1 Buckland Street, 20 Montis Lane, 18-46 Saade Street, adjoining reserves and road reserves, Epsom.
- 2. A total of 19 native and 59 introduced flora species were recorded during the site assessment.
- 3. Based on the Native Vegetation Removal Report (PRE\_2024\_043) provided by Practical Ecology (2024c), development of the subject land would impact 12 patches of native vegetation and 14 scattered trees including 7 large trees. I agree that these impacts would occur but would also add impacts to an additional 24 scattered small trees and change the status of an additional patch tree from a small to a large tree.
- 4. All native vegetation within the study area is classified as the ecological vegetation class (EVC) Creek-line Grassy Woodland (EVC 68). A large tree within this EVC is described as having a diameter at breast height (DBH) of at least 80 centimetres.
- 5. As the proposed development described in association with Planning Permit Application DS/207/2019 impacts native vegetation, a permit to clear native vegetation is required under Clause 52.17 of the Greater Bendigo Planning Scheme (the Scheme).
- 6. The Subject Land does not include any DEECA mapped wetlands and is classified as Location 2 by the Guidelines.
- 7. Based on my assessment of Practical Ecology (2024c), the proposed development would result in impacts to 1.263 ha of native vegetation including 12 patches supporting 5 large trees and 39 scattered trees including 3 large trees. The DEECA generated Native Vegetation Removal Report for this impact identifies an offset requirement of 0.2950 general habitat units with a minimum strategic biodiversity value score of 0.3712 and the protection of 8 large trees.
- 8. Areas of native vegetation are retained within the areas proposed to be zoned as Public Park and Recreation Zone (PPRZ). In this context, the proposed development has acknowledged the biodiversity values present in the broader area and designed the proposed development to avoid impacts to some of the biodiversity values within the study area as best it can, given the requirement to fill areas subject to residential development and excavate areas to cater for stormwater retention.
- 9. Previous design iterations noted by Practical Ecology (2024c) noted a proposed swale drain to intercept potential runoff from the development impacting Bendigo Creek. However, this feature has been restricted and the majority of earthworks are now contained within the subject land. The proponent therefore claimed the design review process had avoided and minimised impacts to native vegetation.
- 10. The highest biodiversity values associated with this area is the Bendigo Creek and its immediate environs. Efforts to minimise impacts to this environment also contribute to the avoid and minimise requirements of the Guidelines.
- 11. The Subject Land is also covered by an Environmental Significance Overlay (ESO1) under Clause 42.01 of the Scheme. This relates to the protection of the watercourse with environmental objectives relating to water quality and other instream values. The protection of these values is a significant consideration in the design of the proposed subdivision.

- 12. DEECA's correspondence to the City of Greater Bendigo (dated 5 July 2024) supported the rezoning but objected to the planning permit application. This objection was based on the potential impacts to specific trees and patches of native vegetation requiring clarification and requiring further justification for the proposed clearing in relation to specific trees. The subsequent report provided by Practical Ecology (2024c) satisfied DEECA's concerns and DEECA provided correspondence to Council dated 18 July ,2024, indicating DEECA did not object to a planning permit being granted and considered the avoid and minimise requirements of the Guidelines had been met. DEECA also provided a series of conditions it recommended for inclusion in a permit, if a permit was to be granted for this project.
- 13. In summary, it is my view that the proposed development has considered all relevant biodiversity and landscape components of the Scheme and seeks to retain those values. The extent of clearing has been supported by DEECA (correspondence to Council dated 18 July 2024) as implementing the three-step approach required by the Guidelines, and as such the proposed development is considered to be an acceptable response to the relevant provisions of the Scheme.

# Study area

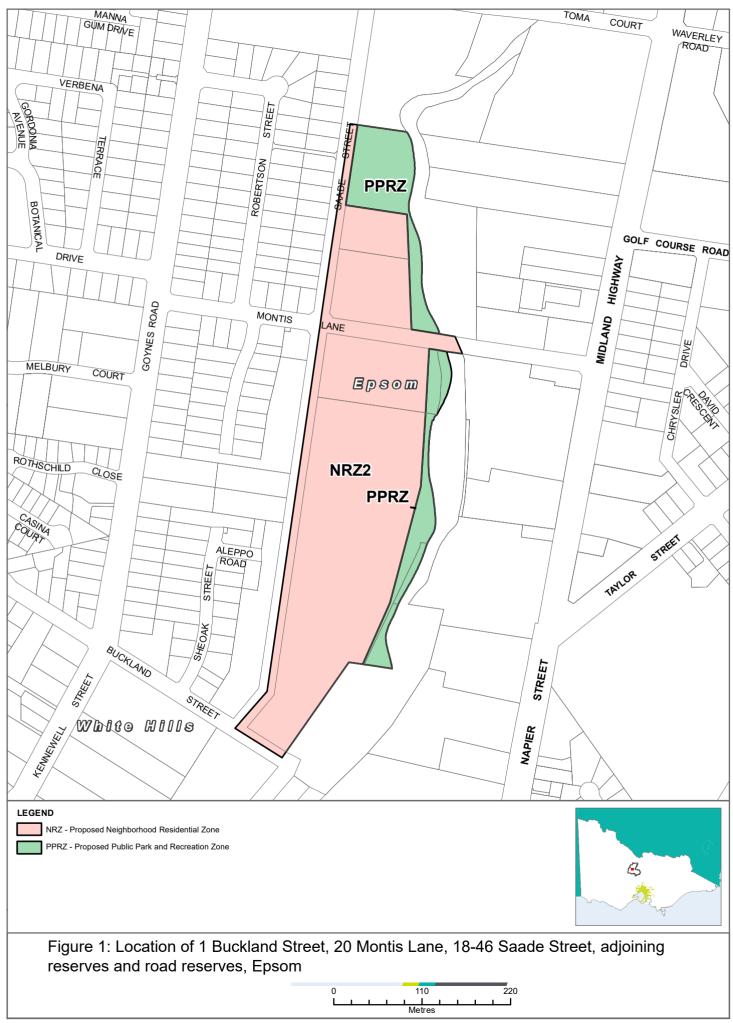
14. The Subject Land encompasses 1 Buckland Street, 20 Montis Lane, 18-46 Saade Street, adjoining reserves and road reserves, Epsom (Figure 1).

## Landscape context

- 15. The Subject Land is approximately 132 kilometres north of the Melbourne central business district, within the Bendigo suburb of Epsom.
- 16. DEECA map the Subject Land on the boundary of the Goldfields and Victorian Riverina bioregions. Based on the DEECA mapping it is considered reasonable to use the channel of Bendigo Creek as the boundary between these bioregions with the western side of the creek, which includes the Subject Land, identified as within the Goldfields Bioregion and land on the eastern side of the creek identified as within the Victorian Riverina Bioregion.
- 17. The Subject Land supports remnant native vegetation that is part of a diffuse, discontinuous corridor of remnant native vegetation (predominantly consisting of River Red-gums *Eucalyptus camaldulensis*) along Bendigo Creek. This vegetation is otherwise within an urban area that occurs between larger areas of native vegetation associated with the Bendigo Regional Park to the east and the Greater Bendigo National Park to the west.
- 18. Approximately three kilometres further north of the Subject Land, Bendigo Creek is part of the Huntly Streamside Reserve which supports more contiguous areas of remnant native vegetation.
- 19. As such the vegetation within the subject land makes a limited contribution to a habitat stepping stone between two broader core areas of native vegetation. While it is not a contiguous habitat link, it does, to a limited extent, facilitate the movement of more mobile fauna between these remnants.
- 20. The study area is flat to gently sloped. Topographically the proposed development is part of a valley floor within the catchment of Bendigo Creek. The study area does not include any DEECA mapped wetlands or other areas that could be considered of management interest at a landscape scale (e.g. saline discharge areas).

#### Land use

- 21. The vegetation and fauna habitat throughout the subject land has been modified by past land uses which have included disturbance from clearing associated with the historical development for agriculture and residential development and associated weed invasion. However, the study area still supports small populations of native flora, including scattered indigenous trees and small patches of native vegetation, as defined under the Guidelines, which are remnants of the original EVC or have otherwise regenerated since being disturbed (S. Mueck personal observations) (see Photos 1 12).
- 22. Current land use within the subject land is zoned as Farming Zone Schedule 1 (FZ1) and is proposed to be rezoned as Neighbourhood Residential (NRZ) with areas along Bendigo Creek to be zoned as Public Park and Recreation Zone (PPRZ). It is also covered by a biodiversity related planning overlay:
- Environmental Significance Overlay Schedule 1 (ESO1).
- 23. The subject land is also almost entirely affected by the Land Subject to Inundation Overlay Schedule 1 (LSIO1).



## Available biodiversity information covering the study area

- 24. The native vegetation mapped for the study area is classified by DEECA (NatureKit) as remnants of the ecological vegetation classes (EVCs) Creek-line Grassy Woodland (EVC 68) and Grassy Woodland (EVC 175).
- 25. It is important to note that the NatureKit EVC classifications are modelled at a relatively coarse scale (1:25,000 at best). The modelled EVC extents and boundaries may therefore not be an accurate representation of what is present on site. At a property scale it is my assessment that the vegetation within the Subject Land is more consistent with Creek-line Grassy Woodland rather than Grassy Woodland. All remnants of native vegetation within the Subject Land are therefore classified as remnants of EVC 68.
- 26. The EVC Benchmark for Creek-line Grassy Woodland (EVC 68) identifies a large tree as one with a diameter at breast height of 80 centimetres (Appendix 4).
- 27. As any one off survey is unlikely to detect all of the plant and animal species likely to utilise or occupy the available habitat present in an area being assessed, it is normal practice to identify what threatened species have been recorded in the local area (normally within 5 kilometres of a study area) and assess the habitat within a study area as to its suitability for those threatened species.
- 28. The Subject Land does not include any known records of rare or threatened species and none were observed during the site inspection. None of the threatened flora recorded within the local area (within five kilometres of the subject land) are considered likely to occur within the subject land due to the disturbed nature of the site (Appendix 5).
- 29. Similarly, most of the threatened fauna recorded from the local area (Appendix 5) are unlikely to occur within the subject land as it does not support suitable habitat for those species. However, more mobile species such as the White-bellied Sea-Eagle Haliaeetus leucogaster (endangered in Victoria) and White-throated Needletail *Hirundapus caudacutus*, may forage in or fly over the subject land on rare occasions.
- 30. The terrestrial habitat provided by the subject land provides a very small fraction (less than 1%) of any habitat which would be utilised by these species in the local area. As much of the subject land has been cleared and does not support any signs of supporting roosting or breeding habitat, it is unlikely that it provides any significant contribution to the more broadly available habitat for these species.
- 31. Bendigo Creek may also provide potential habitat for some significant fauna species, such as Eastern Great Egret *Ardea alba modesta* and Growling Grass Frog *Litoria raniformis*, this habitat would not be directly impacted by the proposed development and additions to existing areas of PPRZ will provide additional buffer areas for the creek.
- 32. No communities listed under the *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act), or the *Flora and Fauna Guarantee Act 1988* (FFG Act) occur within the study area and there are no DEECA mapped Current Wetlands present.
- 33. The subject land is classified under the Guidelines as Locations 1 and 2 by DEECA (NVIM). Proposals to clear less than 0.5 hectares of native vegetation, impacting on one or more large trees are assessed under the Intermediate Assessment Pathway outlined by the Guidelines. For impacts to native vegetation exceeding 0.5 hectares, proposals are assessed under the detailed pathway.
- 34. ESO1 is identified as *Waterway Protection* and covers land on the eastern margin of the subject land, providing a buffer of approximately 50 metres on either side of Bendigo Creek.
- 35. The objective of this ESO is *to protect and enhance Greater Bendigo's waterways and the land adjacent to them*. This ESO has no additional specified application requirements. It also indicates that a permit is not required under this overlay to construct a building if it is connected to reticulated sewage and drainage.

#### **Current condition**

- 36. The subject land is dominated by introduced ground cover species, including perennial and annual introduced grasses, herbs and shrubs. However, the majority of trees are remnant or regenerating River Red-gums which is a locally indigenous species.
- 37. A total of 19 native and 59 introduced flora species were recorded during the site assessment (Appendix 6). The great majority of the indigenous species recorded were only present as small, scattered populations and many species were only recorded from a very restricted area.
- 38. A total of 12 patches of native vegetation have been identified. This includes patches defined by the presence of groups of indigenous trees and the local aggregation of a small number of disturbance tolerant, indigenous understorey species. These patches were noted during my site inspection and have been otherwise mapped by Practical Ecology (2024c).
- 39. I generally agree with the mapping of the extent and condition of native vegetation provided by Practical Ecology (2024c). However, I have recorded 24 additional small, scattered trees not identified by Practical Ecology (2024c). This includes 16 small trees growing on the eastern boundary of Lots 3 and 4 of LP210213 (the southern 2 parcels of 36-46 Saade Street) (Photos 1 and 2), 3 small trees in the eastern half of Lot 2 of TP747978 (the northern parcel of 1 Buckland Street) (Photo 3), 1 small tree on the eastern margin of Lot 1TP743178 (part of 1 Buckland Street) (Photo 4), 3 small trees within Lot 20A of TP739862 (the southern parcel of 1 Buckland Street) (Photo 5) and one additional small scattered tree on the southern boundary of the intersection of Buckland Street and Saade Street (the unmade portion of this street) (Photo 6).
- 40. The DBH of trees within the subject land are provided by Practical Ecology (2024c). While I would generally agree with the measurements provided by Table 2 in Practical Ecology (2024c), I did identify some differences. While this would influence the extent of the tree protection zone for these trees, none of the differences I noted in the reported tree DBHs would result in a difference in the way in which this vegetation has been assessed except for Tree 7. Tree 7 was reported by Practical Ecology to have a DBH of 72 centimetres. However, I measured it to be 92 centimetres. This change would classify Tree 7 as a large tree rather than a small tree and add one large tree to the prescribed offset requirement should a permit be issued for the proposed development.
- 41. No other significant discrepancies are noted in relation to the extent and condition of native vegetation provided by Practical Ecology (2024c).
- 42. An example of an insignificant discrepancy I observed was that Trees 4 and 5, as recorded by Practical Ecology (2024c), appear to have been transposed on Table 2 as what was mapped as Tree 4 was measured as having Tree 5's DBH and *vica versa* (Photo 7).
- 43. In total therefore, I have assessed that 8 large trees would be lost by the approval of Planning Permit DS/207/2019 rather than the 7 reported by Practical Ecology (2024c).

## Other ecological values

- 44. Large hollow bearing trees in the subject land provide habitat for hollow-dependant fauna within the local area. While a total of 7 large trees were measured as assessable under the guidelines by Practical Ecology (2024c), none of these trees had readily observable hollows. However, tree hollows are notoriously difficult to observe from the ground and the large trees within the subject land will invariably support at least some small hollows.
- 45. The potential habitat corridor values of the native vegetation have been discussed above. However, the subject land is assessed as having relatively low values in relation to its function as a habitat corridor.

## Assessed impacts of the proposed development

- 46. The potential impact to the native vegetation associated with the approval of Planning Permit DS/207/2019 is outlined by Practical Ecology (2024c) and the Native Vegetation Removal Report (NVRR) included in that report (PRE\_2024\_027).
- 47. As noted above, while I agree that the native vegetation identified by Practical Ecology (2024c) would be impacted by the approval of Planning Permit DS/207/2019, I have identified an additional 24 small trees to be included in the NVRR and updated the status of one patch tree from small to large.
- 48. Therefore, the total impact required to be assessed under the Guidelines for the development footprint identified by Practical Ecology (2024c) includes impacts to 12 patches of native vegetation, including 5 large trees and 36 scattered trees, including three large trees.
- 49. The Native Vegetation Removal Report generated using DEECA's Native Vegetation Removal tool (NVR Map: https://mapshare.vic.gov.au/nvr/) (Appendix 7) outlines the offset requirements for the loss of this native vegetation, should a permit be issued for its clearing.
- 50. The proposed loss off 12 patches of native vegetation, including 5 large trees and 36 scattered trees, including 3 large trees occurs within an area classified as both Location 1 and Location 2. The total extent of proposed vegetation removal is assessed as 1.263 hectares with a strategic biodiversity value score (SBVS) of 0.464.
- 51. Given the approval of Planning Permit DS/207/2019, this impact is prescribed an offset of 0.2950 General Habitat Units (GHU) with a minimum SBVS of 0.3712 and the protection of 8 large trees (Appendix 7).
- 52. Offsets prescribed for this development are required to be sourced from within the North Central CMA district or within the Greater Bendigo City Local government Area.
- 53. An extract from the DEECA credit register is appended to the NVRR provided in Appendix 7. This indicates that the prescribed offset is currently available.
- 54. The proposed removal of native vegetation is not expected to have any measurable adverse impact on the role of land covered by ESO1 to function as a buffer to the environmental significance of Bendigo Creek.

# Expert assessment

- 55. Based on the project footprint outlined by Practical Ecology (2024c), the approval of Planning Permit DS/207/2019 would result in the loss of 1.263 hectares of native vegetation including 12 patches of native vegetation supporting 5 large trees, and 39 scattered trees including 3 large trees.
- 56. While the assessments documented by Practical Ecology prior to Practical Ecology (2024b) included a number of errors and oversights in relation to the protocols required by the Habitat Hectare assessment methodology and the Guidelines, these have largely been resolved by Practical Ecology (2024c) with the exception of the addition of the extra 24 small trees to be impacted and a change in the large tree status of Tree 7 as noted above.
- 57. Some of these shortcomings were noted by DEECA in their correspondence to Council (i.e. correspondence from DEECA to Council dated 14 March 2023 and 5 July 2024).
- 58. DEECA, in their correspondence to Greater Bendigo City Council in relation to Planning Permit DS/207/2019 dated 11 April 2024 and again on 5 July 2024 supports the proposed rezoning of the subject land but objects to the granting of the planning permit.
- 59. DEECA objected to the granting of the planning permit on the basis that the information provided did not meet the requirements of the Guidelines as required under Clause 52.17 of the Greater Bendigo Planning Scheme.
- 60. The assessment report provided to DEECA was Practical Ecology (2024a). This report indicates the subject land was assessed on 8 November 2018. DEECA correctly note that an application under the detailed assessment pathway requires a current assessment by an accredited assessor. As the assessment was received in 2024 and the Guidelines (Section 6.5 on page 23) requires an assessment is current as detailed under the Handbook. The Handbook indicates an assessment is current if it is less than three years old in grassy woodlands and therefore the assessment conducted in 2018 is not current and needs to be updated.
- 61. This update is provided by Practical Ecology (2024b) with the concerns raised by DEECA in their correspondence of 5 July 2024 addressed by Practical Ecology (2024c).
- 62. Based on my review of Practical Ecology (2024c), this report has addressed all of DEECA's procedural concerns raised in their 2024 correspondence. DEECA have not indicated that they oppose the extent of the proposed removal of native vegetation and have previously indicated 'The department is satisfied with the overall steps taken by the applicant to avoid, minimize and offset the impacts of native vegetation loss'. (DEECA correspondence in relation to Joint PSA and PPA (Section 96C) C248 DS/207/2019 to the City of Greater Bendigo dated 20/04/2020).
- 63. The avoid and minimise statement provided by Practical Ecology (2019) was clearly acceptable to DEECA in 2020 (see above), again in March 2023 (DEECA correspondence to Council dated 29 March 2023) and again ion 18 July 2024. The avoid and minimise statement provided by Practical Ecology (2024c) remains consistent with those provided in previous Practical Ecology assessments (i.e. 2024a and b).
- 64. Council's Meeting Agenda for August 26, 2024, notes on page 115 of 477 that following the proponents of Planning Permit DS/207/2019 providing additional information to DEECA, DEECA had provided written advice that they no longer opposed the permit application (DEECA correspondence to Greater Bendigo City Council dated 18 July, 2024). This is presumably based on DEECA being provided with Practical Ecology (2024c).
- 65. In my view there is no reason to expect that DEECA would reject Planning Permit DS/207/2019 based on my revisions of the NVRR provided in Appendix 7.

- 66. Council's internal review for Planning Permit DS/207/2019 from Parks and Open Space (email from Suzanne Johnstone dated 2019) advised that no native vegetation removal should be permitted on land that will become the responsibility of the City of Greater Bendigo. However, Council's meeting agenda of July 24, 2023, included a recommended motion implying that Planning Permit DS/207/2019 would be approved.
- 67. This statement, including the Native Vegetation Removal Report provided (Appendix 7), includes all of the relevant data on the native vegetation present within the Subject Land as outlined above. Therefore, Planning Permit application DS/207/2019 can be prepared in a manner which satisfies all the relevant requirements of the Guidelines, Clause 52.17 and ESO1of the planning scheme.
- 68. The results of the updated Native Vegetation Removal Report (Appendix 7) would be used to update the draft permit requirements, specifically the Native Vegetation Offsets outlined on Page 9 of the Draft Permit Requirements. The offset requirements which would be included in the permit requirements include the provision of 0.295 GHUs with a minimum SBVS of 0.3712 and the protection of 8 large trees. These offsets must be sourced from within the North Central CMA district or the Greater Bendigo City Local government Area. Based on the extract from DEECA's credit register (Appendix 7), these offsets are available.
- 69. Other biodiversity related permit conditions recommended by DEECA in the Draft Permit Requirements (pages 8, 9 and 10 of the Draft Permit Requirements) are considered normal, standard permit requirements.
- 70. Given the permit conditions are updated in accordance with the new NVRR the proposed development outlined in Planning Permit application DS/207/2019 will have satisfied all of the biodiversity related procedural requirements for approval under the *Planning and Environment Act 1987*.

## Response to submissions

- 71. Submissions provided include a number of objections to the removal of native vegetation, particularly trees, and these also generally indicate the value of these trees as fauna habitat. These submissions generally call for tree loss to be avoided and some note that the avoid and minimise statement provided is inadequate. This includes the submissions 1, 3, 4, 7, 9, 10 and 11.
- 72. These submissions do not identify any procedural shortfalls associated with the permit application.
- 73. DEECA provide advice to Council in relation to biodiversity related matters, particularly in relation to the clearing of native vegetation. This rigorous process considers the extent and condition of native vegetation and requires the application of the Guidelines to all permit applications requiring the clearing of native vegetation.
- 74. While the loss of native vegetation is not desirable, the procedures in place to regulate this process is rigorous and thorough. This is evidenced by Council's request for further information in a letter to Spiire Australia dated 15 April 2019 and the request for further information issued by DEECA dated 11 April 2024.
- 75. Issues raised by DEECA in a submission to Council dated 7 June and 5 July 2024 resulting in DEECA objecting to the issuing of Planning Permit have been resolved (as indicated in the Council Meeting Agenda dated August 26, 2024: page 115 of 477).
- 76. In response to public concern about the loss of native vegetation, the Landscape Masterplan required by draft permit conditions 5, 6 and 31 should focus on indigenous species for street tree plantings and new areas to be zoned PPRZ. This landscape plan would enhance the biodiversity values of these areas by establishing landscape plantings consistent with the species listed as typical for Creek-line Grassy Woodland (EVC 68) within the Goldfields Bioregion (Appendix 4).

#### Conclusion

- 77. Planning Permit Application DS/207/2019 has considered the principles of avoid and minimise required under the Guidelines and the proponent's implementation of this process has been endorsed by DEECA and the City of Greater Bendigo. The prescribed offset requirement identified by this statement is available on the DEECA credit register (Appendix 7).
- 78. All the relevant information required to update this application for a permit to clear native vegetation is provided by this statement.
- 79. The proposed development will result in impacts to some environmental values within an area of land covered by ESO1. However, the majority of the biodiversity values associated with areas covered by ESO1 within the Subject Land occur between the Subject Land and Bendigo Creek and would not be impacted by the approval of Planning Permit DS/207/2019.
- 80. Over and above supplying the formal offset required under Clause 52.17, an additional impact mitigation measure would be provided by the required landscape master plan utilising locally indigenous species consistent with species characteristic of Creek-line Grassy Woodland (EVC 68).
- 81. Overall, I consider the development proposal addresses the biodiversity related requirements of the planning scheme, including Clauses 12.01, 12.03, 42.01 and 52.17, in a manner consistent with the objectives of these provisions.

# Limitations and qualifications

## **Provisional opinions**

In relation to the potential impact of the proposed rezoning of 1 Buckland Street, 20 Montis Lane, 18-46 Saade Street, adjoining reserves and road reserves, Epsom and the proposed development of this land defined by Planning Permit DS/207/2019, I have not provided any provisional opinions that have not been fully researched.

## **Questions**

In relation to the impacts of the proposed rezoning of 1 Buckland Street, 20 Montis Lane, 18-46 Saade Street, adjoining reserves and road reserves, Epsom and the proposed development of this land defined by Planning Permit DS/207/2019, I have no questions that fall outside my area of expertise.

#### **Inaccuracies**

To the best of my knowledge, this report is complete and accurate.

# **Declaration**

I acknowledge that I have read the expert witness Code of Conduct and agree to be bound by it.

I have made all the inquiries that I believe are desirable and appropriate and that no matters of significance which I regard as relevant have to my knowledge been withheld from the Panel.

**Stephen Mueck** 

14 October 2024

# **Appendices**

# Appendix 1 Curriculum vitae for Stephen Mueck

## Stephen Mueck

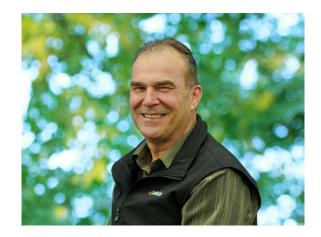
#### **Position**

**Principal Botanist** 

#### Qualifications

BSc (Hons), MEnvSc

Vegetation Quality Assessments (Habitat Hectares): https://www.environment.vic.gov.au/\_data/assets/pdf\_file/0035/546974/DELWP-VQA-AccreditedAssessorList\_26July2023.pdf



#### **Professional experience**

Stephen has over 35 years experience in vegetation assessment, management and research and an extensive knowledge of the vegetation of south eastern Australia. Beginning as a senior botanist with Biosis Research in 1995, Stephen has been senior scientist and project manager on a number of major investigations. He has prepared numerous flora surveys, undertaken conservation value assessments, worked on nature reserve design and management, prepared ecological design guidelines for developments, and has supervised and participated in both large and small scale mapping exercises.

Stephen also has experience in preparing and implementing pest plant and animal management plans, is DEECA certified for vegetation quality assessments and has produced numerous plans and assessments for clients to achieve compliance with state and federal biodiversity legislation and policy.

He has helped develop novel techniques for assessing and mitigating impacts to threatened flora and fauna. He possesses strong project management skills. He has assisted in calculating and identifying the offset requirements for a number of larger Victorian projects including Melbourne's Wholesale Market, Esso's Longford pipeline, the upgrade of the Western Highway (Ararat to Stawell) for VicRoads and MAB's Alliance Business Park at Epping.

In 2023 Stephen established Steve Mueck Biodiversity Pty Ltd and now operates as an independent ecologist.

#### Key project experience

Project Manager / Botanist	Offset Strategy for the Longford Pipeline. Report for Esso Australia, prepared in consultation with Advisian (four offset sites assessed and registered).
Project Manager / Botanist	Assessment of the ecological values and offset requirements for the Deer Park Bypass including assessment of impacts to private landowners, interactions with Victoria's Valuer General, defining prescribed offsets and sourcing the offsets to ensure project compliance for VicRoads.

#### **Steve Mueck Biodiversity Pty Ltd**

6/1 River Avenue Phone: 0429 808 732

Ascot Vale VIC 3033 Email:steve@stevemueckbiodiversity.au ACN 666 396 345

Expert witness	Statement prepared and evidence provided in the Supreme Court of Victoria regarding the influence of biodiversity legislation and policy on the purchasing decision making of an informed developer in relation to compensation for the compulsory acquisition of land for the Melbourne Wholesale Market (S CI 2006 08035).
Project Manager / Botanist	Post-construction (2006/2007) audit of strategic firebreaks for Melbourne's water catchments: Flora and terrestrial fauna values. Report for Department of Sustainability and Environment.
Ecologist	EPA (Victoria) forest management audit team assessing the operations of the Department of Sustainability and Environment in state forest according to the Code of Forest Practices with GHD.

#### Other qualifications and training

Construction Induction (OH&S) Red/White Card
Rail Industry Safety Induction Card
First Aid (CPR) training

#### **Professional affiliations and memberships**

Australian Network for Plant Conservation (Current member)

Native Fish Australia (Member 1990 –1995)

Pimelea spinescens Recovery Team (Current member)

#### **Publications**

Stephen has written over 1000 consultant's reports and published 17 other published reports and journal papers:

DCCEEW 2024, National Recovery Plan for the Spiny Rice-flower Pimelea spinescens subspecies spinescens, Department of Climate Change, Energy, the Environment and Water, Canberra, October. (**S. Mueck** contributed to sections of this recovery plan)

Chapter in Recovering Australian Threatened Species (Garnett et al. 2018) "Spiny Rice-flower: small, unassuming but with many friends" Chapter 6, authors – V Craigie, D Reynolds, N Walsh, **S Mueck**, L James & P Rudolph.

Monks, L., Jusaitis, M., Dillon, R., Freestone, M., Taylor, D., Commander, L. and **Mueck, S**. 2018. Implementing the translocation and ongoing maintenance. Chapter 7 in Commander, LE., Coates, DJ., Broadhurst, L., Offord, CA., Makinson, RO., and Matthes, M. (eds.) Guidelines for the Translocation of threatened plants in Australia, Third Edition. Australian Network for Plant Conservation, Canberra.

Mueck S. 2012. Forest Ecology – A Victorian Perspective: Abstract from a paper presented to the FNCV Biodiversity Symposium 2011. Vic. Nat. 129(5): 180.

John Turner, Marcia Lambert, David Flinn, **Steve Mueck**, Glen Kile 2005. An analysis of Australian research on indicators of sustainable forest management. Research Paper presented by John Turner at the International Union of Forestry Research Organisations (IUFRO) World Congress, 2005. Session 154: 'Research demonstration: Evaluation of sustainable forest management'.

Mueck S G 2000. Translocation of Plains Rice-flower Pimelea spinescens, Laverton, Victoria. Ecological Management & Restoration 1(2): 122-127.

Peel W 1999. Rainforest and Cool Temperate Mixed Forests of Victoria. DNRE, Melbourne. (Stephen has made significant contributions to this document i.e. he is the author of all the two-way tables).

**Mueck S**, Ough K & Banks J C G 1996. How old are Wet Forest understories? Australian Journal of Ecology 21(3): 345-348.

Loyn R, **Mueck S** & Ough K 1994. Vertebrate Pest Animals and Pest Plants. In: Joint ANZECC-MCFFA National Forest Policy Statement Implementation Sub-committee, The development of consistent nationwide baseline environmental standards for native forests, Draft Report.

**Mueck S**, Loyn R H, Ough K & Murphy A 1994. Research and development of ecologically sustainable systems of silviculture in Victoria's Mountain Ash forests. International Forest Biodiversity Conference, Canberra.

Turner L A & **Mueck S** 1992. The vegetation of the Sardine, Rich and Ellery Forest Blocks, Orbost Region, Victoria. DCE, VSP Technical Report No.9.

**Mueck S** & Peacock R J 1992. Impacts of intensive timber harvesting on the forests of East Gippsland, Victoria. DCE, VSP Technical Report No.15.

Mueck S 1990a. The Floristic Composition of Mountain Ash and Alpine Ash Forests in Victoria. Silvicultural Systems Project, Technical Report No. 4, Department of Conservation and Environment, Kew.

Mueck S 1990b. The Floristic Composition of Dry, Damp and Lowland Sclerophyll Forests in East Gippsland. Timber Industry Stratagy, Department of Conservation, Forests and Lands, Kew.

Gillespie G R, Henry S R, **Mueck S**, Scotts D & Westaway J 1990. Flora and Fauna of the Pheasant Creek and Upper Buenba Forest Blocks, Alpine Area, Victoria. Department of Conservation, Forests and Lands, Ecological Survey Report No. 29.

Westaway J, Henry S R, Gillespie G R, Lobert B O, Scotts D & **Mueck S** 1990. Flora and Fauna of the West Errinundra and Delegate Forest Blocks, East Gippsland, Victoria. Department of Conservation, Forests and Lands, Ecological Survey Report No. 31.

Westaway J, Cherry K, Duncan P E, Gillespie G R, Henry S R, & **Mueck S G** 1990. Flora and Fauna of the Lower Wilkinson and Fainting Range Forest Blocks, Gippsland, Victoria. Department of Conservation, Forests and Lands, Ecological Survey Report No. 27.

Gell P A & **Mueck S G** 1987. Applications of Isolate Biogeographic Theory to the Delineation and Management of Mallee Nature Reserves. Proceedings of 21st Congress, Institute of Australian Geographers, University of Western Australia. May 1986

# Appendix 2 Photos



**Photo 1** Additional small, scattered trees growing on the boundary of Lot 3, 36-46 Saade Street.



**Photo 2** Additional small, scattered trees growing on the boundary of Lot 4, 36-46 Saade Street.



**Photo 3** One of the additional small trees recorded from Lot 2 of TP747978 (the northern parcel of 1 Buckland Street).



**Photo 4** An additional small tree recorded from Lot 1TP743178 (part of 1 Buckland Street).



**Photo 5** Additional small, scattered trees recorded from Lot 20A of TP739862 (the southern parcel of 1 Buckland Street).



**Photo 6** An additional small, scattered tree recorded from the southern extent of the unmade portion of Saade Street.



**Photo 7** Trees 4, 5, 6 and 7 as mapped and measured by Practical Ecology (2024c).



Photo 8 Tree 3 as mapped and measured by Practical Ecology (2024c).



Photo 9 Tree 1 as mapped and measured by Practical Ecology (2024c).



**Photo 10** Looking east along Montis Lane. No assessable native vegetation was recorded along this road reserve.



**Photo 11** Habitat Zone 4b as mapped by Practical Ecology (2024c).



**Photo 12** The ground cover vegetation of the subject land is dominated by weeds and has been heavily impacted by its historical land-use.



**Photo 13** The interface between the subject land and Bendigo Creek includes an often elevated shared path.

# Appendix 3 Letter of Instruction

# **Russell Kennedy**

**RK reference** DZV 362064-00001

David Vorchheimer T +61 3 8640 2308 E dvorchheimer@rk.com.au

Stefan Fiedler T +61 3 9609 1672 E sfiedler@rk.com.au

Sonia Narduzzo T +61 3 8640 2300 E snarduzzo@rk.com.au

18 September 2024

## BY EMAIL steve@stevemueckbiodiversity.au

Steve Mueck Principal Botanist Steve Mueck Biodiversity

Dear Steve

Letter of Instruction
Greater Bendigo Planning Scheme Amendment C248gben
Planning Permit Application No. DS/207/2019
1 Buckland Street, 20 Montis Lane, 18-46 Saade Street, adjoining reserves and road reserves,
Epsom

- 1 We act on behalf of Lawserve, Beardall and Smith (**Proponent / Client**) in the above matter.
- This matter concerns a combined Planning Scheme Amendment (Amendment C248gben) and Planning Permit Application No. DS/207/2019 (Planning Application) which aims to facilitate residential development at 1 Buckland Street; 20 Montis Lane; 18-26, 28-34, 36-46 Saade Street, adjoining reserves and road reserves, Epsom (Subject Land). The combined request was made on behalf of our Client under section 96A of the *Planning and Environment Act 1987* (Vic) (PE Act).
- Greater Bendigo City Council (**Council**) is the Planning Authority for Amendment C248gben.
- This correspondence outlines your instructions to provide expert evidence in relation to ecological issues in this matter.

#### The Proposal

#### Amendment C248gben

- Amendment C248gben concerns the entirety of the Subject Land being the land at Buckland Street, 20 Montis Lane, 18-26, 28-34 and 36-46 Saade Street and Montis Lane, Epsom as well as the adjoining reserves and road reserves. It proposes to:
  - (a) rezone the land at 1 Buckland Street, 20 Montis Lane, 28-34, 36-46 Saade Street, Epsom, and parts of the adjoining road reserves of Buckland Street, Montis Lane and Saade Street from the Farming Zone (**FZ**) to the Neighbourhood Residential Zone 2 (**NRZ2**) as shown on Planning Scheme Map No. 15;

Russell Kennedy Pty Ltd ACN 126 792 470 ABN 14 940 129 185 Level 18, 500 Bourke Street, Melbourne VIC 3000 Australia PO Box 5146, Melbourne VIC 3001 Australia T +61 3 9609 1555 F +61 3 9609 1600 E info@rk.com.au russellkennedy.com.au

**Ally**Law

An international member of

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- (b) rezone the land immediately abutting the western side of the Bendigo Creek which includes part of the land at 18-26 Saade Street, Crown Allotment 19, No Section, Township of Epsom, Crown Allotment 20, No Section, Township of Epsom and Crown Allotment 2024, No Section, Township of Epsom, Parish of Sandhurst from the Farming Zone (FZ) to the Public Park and Recreation Zone (PPRZ) as shown on Planning Scheme Map No. 15 and
- (c) rezone the reserves and road reserves adjoining the land to reflect the zone of the adjoining private property.
- The existing planning overlays are not proposed to be changed by Amendment C248gben.

#### Planning Application

- The Planning Application concerns the land at 1 Buckland Street, 20 Montis Lane, 18-26, 28-34 and 36-46 Saade Street and Montis Lane, Epsom. It seeks approval to:
  - (a) subdivide the land into 78 residential lots and an open space reserve in six stages;
  - (b) remove 0.812 hectares of native vegetation, including dead vegetation;
  - (c) carry out works including earthworks, roadworks, fences, and other works ancillary to the subdivision; and
  - (d) create a drainage reserve.

#### **Subject Land**

- The Subject Land comprises thirteen parcels with a total area of approximately 8.91 hectares within the suburb of Epsom, located immediately west of the Bendigo Creek, described as follows:
  - (a) 1 Buckland Street, Epsom which is comprised in Certificate of Title Volume 8274 Folio 871 and formally described as Crown Allotment 20A, Township of Epsom, Parish of Sandhurst:
  - (b) 20 Montis Lane, Epsom which is comprised in Certificate of Title Volume 11335 Folio 620 and formally described as Lot 1 on Title Plan No. TP949533H;
  - (c) 18-26 Saade Street, Epsom which is comprised in Certificate of Title Volume 9792 Folio 960 and formally described as Reserve 1 on Plan of Subdivision No. LP210004M;
  - (d) 28-34 Saade Street, Epsom which is comprised in Certificate of Title Volume 9792 Folio 962 and formally described as Lot 2 on Plan of Subdivision No. PS210213C;
  - (e) 36-46 Saade Street, Epsom which is comprised in Certificate of Title Volume 9792 Folio 963 and formally described as Lot 3 on Plan of Subdivision No. PS210213C, and Certificate of Title Volume 9792 Folio 964 and formally described as Lot 4 on Plan of Subdivision No. PS210213C;
  - (f) the land comprised in Certificate of Title Volume 5061 Folio 015 and formally described as Lots 1 and 2 on Title Plan No. TP747978S;



- (g) the land comprised in Certificate of Title Volume 8782 Folio 139 and formally described as Lots 1 and 2 on Title Plan No. TP743178Y;
- (h) the land comprised in Certificate of Title Volume 11796 Folio 179 and formally described as Crown Allotment 2024, Township of Epsom, Parish of Sandhurst;
- (i) the land formally described as Crown Allotment 19, No Sec, Township of Epsom (General Law Land); and
- (j) the land formally described as Crown Allotment 20, No Sec, Township of Epsom (General Law Land).
- 9 The Subject Land is shown in the red outline below:



Figure 1: NearMap satellite image showing the Subject Land in red as at 30 July 2024.

- The Subject Land is located within the Farming Zone (**FZ**). In terms of overlays:
  - the site is almost entirely affected by the Land Subject to Inundation Overlay Schedule 1 (**LSIO1**) for flooding from waterways with depths up to and including 350 millimetres], or the Land Subject to Inundation Overlay Schedule 2 (**LSIO2**) for flooding from waterways with depths greater than 350 millimetres. The area within the site proposed for residential development / zoning is only affected by the LSIO1; and
  - (b) the site is also partially affected be the Environmental Significance Overlay Schedule 1 (**ESO1**).



- The Subject Land has previously been used for farming purposes and is largely cleared of vegetation, with no existing dwellings or structures present. Scattered trees exist throughout the site, with vegetation present along the eastern boundary adjacent to Bendigo Creek and within the northern portion of the site. The Montis Lane road reserve extends through a portion of the site (at the northern end). This road reserve is currently used as a shared path which provides a link to the Bendigo Creek Trail, which runs along the Bendigo Creek from the Epsom Shopping Centre to Lake Weeroona.
- The surrounding area includes a mixture of residential and commercial land uses, with public open space along Bendigo Creek. The land immediately west of the site is within the General Residential Zone (GRZ) with developed and developing residential lots as part of the 'Elmwood Estate'. The Bendigo Creek adjoins the site to the east and separates it from land within the Commercial 2 Zone (C2Z) further east. The land to the south of the site is within the Low Density Residential Zone (LDRZ) and comprises larger residential lots. The land to the north of the site is also within the FZ and includes an existing drainage basin, owned and managed by the Council, which is proposed to be utilised as part of this proposal.

#### **Background and Chronology**

Lodgement of combined Planning Application and Amendment C248gben application

- In August 2018, Spiire reached out to Council seeking a pre-application meeting in relation to a combined permit application and rezoning of the Subject Land. On 11 September 2018, Council provided its response indicating its support. (See Tab 2)
- On 22 March 2019, the combined application was lodged on behalf of our Client seeking to use and develop the Subject Land for the Proposal. (See Tab 3)
- On 26 March 2019, Council issued an acknowledgement letter. (See Tab 4)

#### Request for Further Information

- On 15 April 2019, Council issued a Request for Further Information (RFI). (See Tab 5)
- On 11 October 2019, a response to Council's RFI was submitted which included an updated Town Planning Report, a Preliminary Environmental Site Assessment, a Soil Management Plan, Explanatory Report, Amendment Instruction Sheet and Amendment Map. (See Tab 6)

#### Referrals / Key Issues

- The application was referred internally to Council's Drainage Engineer, Traffic Engineer, Sustainable Design Officer. (See Tab 7)
- The application was referred externally to the North Central Catchment Management Authority (NCCMA), the Country Fire Authority (CFA), the Department of Environment, Energy and Climate Action (DEECA), the Environment Protection Authority (EPA), the Department of Transport and Planning (DTP), Coliban Water, Dja Dja Wurrung, Downer Utilities and Goulburn Murray Water. (See Tab 8)
- On 17 December 2019, a response to the EPA referral was submitted. There was a range of correspondence between the EPA and Edwards Environmental to determine if a Soil Management Plan (**SMP**) was in fact required for the site, given the background arsenic levels and placement of clean fill on the site. The EPA ultimately advised that they don't



review SMP's and that Council should undertake a peer review of the submitted Preliminary Environmental Site Assessment (**PESA**) and SMP. Council arranged for a peer review of the revised SMP which confirmed that the originally proposed Post Construction Management Measures were not required. Council was satisfied with the updated information provided by our Client in response to the EPA's advice. (**See Tab 9**) In July 2024, Edwards Environmental prepared an updated PESA. (**See Tab 24**)

- Although, DEECA initially consented to the Proposal subject to conditions, following receipt of the various referral responses the treatment of the open space area along the Bendigo Creek was reviewed. Specifically, the engineering design was revised to avoid the removal of vegetation, with the initial swale drain proposed along the site's eastern boundary replaced with a piped drainage system discharging to the drainage reserve. The non-swale design has avoided the clearance of various trees and as such, an updated Ecological Report was provided to Council on 28 August 2020. (See Tab 10)
- On 14 March 2023, DEECA provided its review and comments on the updated report. On 22 March 2023, Practical Ecology provided its response. On 29 March 2023, DEECA provided its final referral response which reinstated its consent to the Proposal subject to conditions. (See Tab 11)
- On 28 August 2020, a response to the NCCMA referral response (which comprised of an updated Stormwater Management Strategy prepared by Afflux and dated August 2020) was submitted. On 20 October 2020, NCCMA provided a further response requesting further information. In response, Afflux updated their report (dated March 2022) and Terraco prepared a subsequent SMP which provides proof of concept for stormwater detention and treatment solution, in particular for the existing drainage basin. On 1 March 2023, the NCCMA issued a final referral response. (See Tab 12)
- Correspondence regarding the use of Council's Drainage Reserve is provided at Tab 13.
- The site has a Heritage Inventory listing HI as the Epsom Hotel, H7724-0637. On 17 May 2021, Heritage Victoria wrote to the Applicant's project team acknowledging that the site may formerly have been the location of the Epsom Hotel known to have operated during the gold rush years of the mid-late 1850s. It is possible that significant archaeological remains of the hotel complex survive buried at depth across the site.
- On 9 July 2024, Heritage Victoria wrote to Council confirming that it does not object to the issuing of the planning permit application, but it is important that any interested parties are aware of the requirement to obtain a Heritage Act Consent that applies to this site. (See Tab 14)

#### Council's resolution to prepare

On 24 July 2023, Council resolved at its Ordinary Meeting to request the Minister for Planning to authorise Council to prepare a combined planning scheme amendment and planning permit application under section 96A of the PE Act. (See Tab 15)

#### Minister's authorisation to proceed

- On 28 November 2023, DTP, on behalf of the Minister for Planning, authorised Council to prepare the combined application subject to a range of conditions. (See Tab 16)
- The explanatory report addresses DTP's authorisation conditions in tracked changes, a copy of which is provided at **Tab 17**. There have subsequently been some minor changes



to the report prior to exhibition. Other authorisation conditions were addressed through changes to the subdivision layout plan and the draft permit conditions.

#### Exhibition of combined Planning Application and Amendment C248gben application

- On 22 February 2024, Amendment C248gben and the Planning Application were exhibited. The exhibition process comprised of letters to affected landowners / occupiers, a notice in the Bendigo Advertiser, an A3 notice on the subject site and a notice in the Government Gazette. A copy of the notice in the Government Gazette and a list of the landowners/occupiers that were notified in the post is provided at **Tab 18**.
- A copy of the exhibited documents is provided at **Tab 19**.
- During exhibition, fifteen submissions were received in total. Thirteen submissions opposed the combined application or sought clarification / changes, and two were in support. (See Tab 20)
- Following exhibition, the Applicant was required to obtain written consent from the landowners of 28-34 Saade Street, Epsom. (See Tab 21)
- A response to the submitters and DEECA is provided at **Tab 22** and a response to the EPA is provided at **Tab 23**.

#### Council's Resolution to Refer to Panel

On 26 August 2024, Council resolved at its Ordinary Meeting to refer all submissions to an independent planning panel. (See Tab 25)

#### Panel Hearing

On 6 September 2024, Planning Panels Victoria (**PPV**) confirmed the referral and set out draft directions for the Hearing in this matter. On 9 September 2024, PPV confirmed that the Panel for this matter has now been appointed. Kathy Mitchell AM will be the Panel Chair, with Rodger Eade as the member. (**See Tab 26**)

#### **Key Dates**

- This matter is listed for a Directions Hearing at 10:00am on 23 September 2024. The purpose of the Directions Hearing is to consider procedural requirements and conduct for the Hearing, in addition to confirming key dates ahead of the Hearing.
- 38 At present, the Panel has proposed the following dates:

Time	Date	Action	
12:00pm	19 September 2024	Parties to file Request to be Heard form	
10:00am	23 September 2024	Directions Hearing	
12:00pm	23 September 2024	Parties to provide expert witness details	
12:00pm	9 October 2024	Proponent to file expert witness report(s)	



Time	Date	Action	
12:00pm	9 October 2024	Council to file Part A (background and context) submission	
12:00pm	14 October 2024	Council must provide a submitter location map to the Panel only	
12:00pm	14 October 2024	Other parties to file expert witness report(s)	
12:00pm	18 October 2024	Any parties not appearing at the Hearing to file supplementary submission	
12:00pm	18 October 2024	Council to file 'Day 1' version of the Amendment documentation	
12:00pm	18 October 2024	Parties to file documents or material to be presented at the hearing	
ТВС	TBC	Accompanied site inspection	
All day	21 October 2024, 22 October 2024, 23 October 2024 (AM only), 28 October 2024 (if required), 29 October 2024 (if required)	Hearing	

We will provide an update to you once procedural dates have been confirmed.

#### **Brief of Materials**

- 40 Please find enclosed to this letter an index of documents which includes material for you to consider to the extent that you deem relevant.
- The material can be accessed at the below link:

https://russellkennedylawyers.sharefile.com/d-sbab69bc69cc74f3bb169ef798e080f85.

Please note that this link will expire on 26 March 2025.

#### Instructions

- 42 You are instructed to:
  - (a) review background materials as necessary and relevant to your expertise;
  - (b) undertake a peer review, any necessary field work, and prepare an expert evidence report for circulation by 9 October 2024. If this date is not feasible, but a similar date is feasible, please note this; and



- (c) appear as an expert witness at the hearing of this matter on 21, 22, 23, 28 and 29 October 2024. If you are only partly available, please let us which dates are suitable for timetabling purposes.
- At this stage, we are required to circulate your expert witness by **9 October 2024**. We request that you provide your draft expert report to us at least 2 business days ahead of circulation.
- The content, format, and layout of your expert report, the manner of expression, and the way in which you seek to address yourself to the tasks you have been engaged to undertake are all matters for you. However, your report must be prepared in compliance with <a href="Planning Panels Victoria">Planning Panels Victoria Practice Note 1 Expert Evidence</a> (PPV PN1) and the duties outlined therein.
- It will be apparent to you that not all the materials which have been provided to you will be necessarily relevant to the task which you have been asked to undertake. You are instructed to examine the material and to determine for yourself what is relevant to the formulation of your conclusions, including any other matters you consider relevant. If you require any further information to complete the tasks you have been instructed to undertake, or if you require any assistance in understanding the nature of the tasks you have been asked to undertake, please contact us.

#### **Billing**

In the first instance, please provide us with your fee estimate addressed to our firm as follows:

Lawserve, Beardall and Smith C/- David Vorchheimer Russell Kennedy Level 18, 500 Bourke Street Melbourne VIC 3000

47 Please contact us if you have any queries.

Yours faithfully

**RUSSELL KENNEDY** 

David Vorchheimer Partner

Stefan Fiedler Partner



# INDEX TO BRIEF OF MATERIALS

Tab	Document		
Subject Land			
1.	Planning Property Reports.		
Combined F	Planning Application and Amendment C248gben Application		
2.	Council's Response to Proponent's Pre-Application Request, dated 11 September 2018.		
3.	Lodgement of Combined Application, dated 22 March 2019, including:		
	Cover Letter, prepared by Spiire, dated 22 March 2019;		
	<ul> <li>Application for a Planning Permit Form, prepared by Spiire, dated 22 March 2019;</li> </ul>		
	Current Certificates of Title for the Subject Land;		
	Town Planning Report, Revision No. B, prepared by Spiire, dated March 2019;		
	Overall Layout Plan, Version 2, prepared by Terraco Pty Ltd, dated 19 March 2019 (refer to Appendix B of Town Planning Report);		
	Clause 56 Assessment, prepared by Spiire (refer to Appendix C of Town Planning Report);		
	Traffic Impact Assessment, Version 2, prepared by Trafficworks Pty Ltd, dated 18 September 2018;		
	<ul> <li>Flora and Fauna Assessment and Native Vegetation Impact Assessment, Version 1.0, prepared by Practical Ecology, dated 19 March 2019;</li> </ul>		
	Bushfire Risk Assessment, Version 1.0, prepared by Practical Ecology, 28 dated February 2018;		
	Stormwater Management Plan, Version V02a, prepared by Afflux Consulting Pty Ltd, dated 14 September 2018; and		
	Cultural Heritage Management Plan Approval Letter, prepared by Dja Dja Wurrung Clans Aboriginal Corporation, dated 6 March 2019.		
4.	Council's Acknowledgement Letter, dated 26 March 2019.		
Request for	Further Information		
5.	Council's Request for Further Information, dated 15 April 2019.		



Tab	Document				
6.	Proponent's Response to Request for Further Information, dated 11 October 201 including:				
	Cover Letter, prepared by Spiire, dated 11 October 2019;				
	<ul> <li>Town Planning Report, Revision No. C, prepared by Spiire, dated 10 Octobe 2019;</li> </ul>				
	<ul> <li>Preliminary Environmental Site Assessment, Version 2.0, prepared between Edwards Environmental, dated September 2019;</li> </ul>				
	<ul> <li>Soil Management Plan, Version 1.0, prepared by Edwards Environmental dated September 2019;</li> </ul>				
	<ul> <li>Native Vegetation Removal Report, Report ID: PRE_2019_020, issued 5 March 2019;</li> </ul>				
	<u>Draft</u> Combined Application Explanatory Report, prepared by Spiire, undated (PDF and Word versions);				
	<u>Draft</u> Amendment C248gben Instruction Sheet, prepared by Spiire, undated ( <i>PDF and Word versions</i> ); and				
	Amendment C248gben Map No. 15, Version 1, dated 10 October 2019.				
Referrals / K	Cey Issues				
7.	Internal Referrals, including:				
	<ul> <li>Internal Referral Comments, prepared by ESD Department, dated 17 December 2019;</li> </ul>				
	Internal Referral Comments, prepared by Traffic Engineering Department, dated 20 December 2019;				
	<ul> <li>Internal Referral Comments, prepared by Parks and Open Space Department, dated 20 December 2019;</li> </ul>				
	Internal Referral Comments, prepared by Drainage Engineering Department, dated 7 February 2020.				
8.	External Referrals, including:				
	External Referral Comments, prepared by Downer, dated 9 November 2019;				
	External Referral Comments, prepared by Coliban Water, dated 4 December 2019;				
	External Referral Comments, prepared by CFA, dated 5 December 2019;				



Tab	Document		
	<ul> <li>External Referral Comments, prepared by Regional Transport Planning Loddon Mallee c/- Department of Transport, dated 5 December 2019;</li> </ul>		
	<ul> <li>External Referral Comments, prepared by Head, Transport for Victoria c/- Department of Transport, dated 5 December 2019;</li> </ul>		
	<ul> <li>External Referral Comments, prepared by Dja Dja Wurrung Clans Aboriginal Corporation, dated 5 December 2019;</li> </ul>		
	External Referral Comments, prepared by EPA, dated 6 December 2019;		
	<ul> <li>External Referral Comments, prepared by North Central CMA, dated 6 December 2019;</li> </ul>		
	<ul> <li>External Referral Comments, prepared by Goulburn Murray Water, dated 14 January 2020;</li> </ul>		
	<ul> <li>External Referral Comments, prepared by DELWP / DEECA, dated 28 April 2020;</li> </ul>		
	DELWP / DEECA Mapping Request.		
9.	Proponent's Response to EPA External Referral Comments, including:		
	<ul> <li>Emails between Council and EPA, dated between 2 February 2023 – 22 March 2023;</li> </ul>		
	<ul> <li>Peer Review of Proposed Soil Management Plan, prepared by Tetra Tech Coffey, dated 6 June 2021;</li> </ul>		
	<ul> <li>Letter to Spiire, prepared by Edwards Environmental, dated 17 December 2019;</li> </ul>		
	Soil Management Plan, Version 2.0, prepared by Edwards Environmental, dated February 2020;		
	Email attaching Updated Soil Management Plan from Edwards Environmental to EPA, dated 12 March 2020;		
	<ul> <li>Emails between Edwards Environmental and EPA, dated between 12 March 2020 – 7 April 2020;</li> </ul>		
	<ul> <li>Emails between Spiire, Edwards Environmental and EPA, dated between 12 March 2020 – 19 May 2020.</li> </ul>		
10.	Proponent's Response to DELWP / DEECA External Referral Comments, including:		
	Flora and Fauna Assessment and Native Vegetation Impact Assessment, Version 2.0, prepared by Practical Ecology, dated 27 August 2020.		
11.	Correspondence between Practical Ecology and DELWP / DEECA, including:		



Tab	Document		
	<ul> <li>Flora and Fauna Assessment and Native Vegetation Impact Assessment, Version 2.0, prepared by Practical Ecology, dated 21 March 2023;</li> </ul>		
	Letter from DELWP / DEECA to Council, dated 14 March 2023;		
	Letter from DELWP / DEECA to Council, dated 29 March 2023.		
12.	Proponent's Response to North Central CMA External Referral Comments, including:		
	Letter from North Central CMA to Council, dated 6 December 2019;		
	Stormwater Management Plan & Future Strategy, prepared by Afflux Consulting, Version V01c, dated 24 August 2020;		
	Letter from North Central CMA to Council, dated 20 October 2020;		
	<ul> <li>Revised Stormwater Management Plan, Version 7, prepared by Afflux Consulting, dated 6 March 2022;</li> </ul>		
	Stormwater Management Plan, Version 1, prepared by Terraco Pty Ltd, dated October 2022;		
	Letter from North Central CMA to Council, dated 1 March 2023.		
13.	Correspondence regarding Council Drainage Reserve, including:		
	Proponent's Written Agreement, dated between 3 January 2023 – 12 January 2023;		
	Council Meeting Minutes, dated 22 May 2023 (refer to PDF page 44);		
	Council Meeting Agenda, dated 22 May 2023 (refer to PDF page 144);		
	Letter from Council to Spiire, dated 30 June 2021;		
	Letter from Spiire to Council, dated 22 April 2021.		
14.	Heritage Inventory Listing, including:		
	<ul> <li>Letter from Heritage Victoria c/- DELWP / DEECA to Terraco Pty Ltd, dated 17 May 2021;</li> </ul>		
	Letter of Advice, prepared by Heritage Insight, dated 15 July 2021;		
	Site History Report Advice, prepared by Dr Susan Walter, dated November 2021;		
	Letter from Heritage Victoria to Council, dated 9 July 2024;		
	Historical Archaeological Site Card Form, undated;		



Tab	Document		
	Obtaining a Heritage Act Consent Brochure, prepared by Heritage Victoria c/- DELWP / DEECA, undated.		
Council's R	esolution to Prepare		
15.	Council Meeting, dated 24 July 2023, including:		
	Council Meeting Minutes, dated 24 July 2023 (refer to PDF page 33);		
	Council Meeting Agenda, dated 24 July 2023 (refer to PDF page 90).		
Minister's A	uthorisation to Proceed		
16.	Authorisation to Prepare Amendment and Conditions, dated 28 November 2023, including:		
	Letter under Delegation from the Minister for Planning c/- Department of Transport and Planning, dated 28 November 2023.		
17.	Response to Preparation of Amendment Conditions, including:		
	Draft Updated Combined Application Explanatory Report, prepared by Spiire, dated 7 December 2023.		
Exhibition o	Exhibition of Combined Planning Application and Amendment C248gben Application		
18.	Notice Documents, including:		
	<ul> <li>Map of Notified Landowners and Occupiers, prepared by Strategic Planning, dated 9 February 2024;</li> </ul>		
	Notice in Government Gazette, No. G 8, dated 22 February 2024 (refer to PDF page 279).		
19.	Amendment C248gben Exhibition Documents, including:		
	Explanatory Report;		
	Instruction Sheet;		
	• Map No. 15;		
	Schedule 2 to Clause 32.09 – Neighbourhood Residential Zone;		
	Draft Conditions for Planning Permit No. DS/207/2019;		
	Overall Layout Plan, Version 12, prepared by Terraco Pty Ltd, dated 14 December 2023;		
	Stormwater Management Plan, Version 2, prepared by Terraco Pty Ltd, dated December 2023;		



Tab	Document				
	Town Planning Report, Rev No. J, prepared by Spiire, dated 10 January 2024;				
	<ul> <li>Bushfire Risk Assessment, Version 2.0, prepared by Practical Ecology, dated 22 January 2024;</li> </ul>				
	<ul> <li>Flora and Fauna Assessment and Native Vegetation Impact Assessment, Version 2.0, prepared by Practical Ecology, dated 22 January 2024;</li> </ul>				
	Preliminary Environmental Site Assessment, Version 3.1, prepared by Edwards Environmental, dated January 2024.				
20.	Submissions, including:				
	Collated Submissions, dated between February 2024 – March 2024;				
	Letter from DELWP / DEECA to Council, dated 11 April 2024;				
	Letter from EPA to Council, dated 30 April 2024.				
21.	Written Consent of Maria and Giuseppe Dimasi, dated 19 April 2024.				
22.	Proponent's Response to Submissions, including:				
	Native Vegetation Impact Assessment Amendment, prepared by Practical Ecology, dated 7 June 2024;				
	Letter from Spiire to Council, dated 21 June 2024.				
23.	Proponent's Response to EPA Submission, dated 26 June 2024, including:				
	Email from Edwards Environmental to EPA, dated 26 June 2024;				
	Table regarding Derivation of Investigation Levels HIL A Calculations, undated;				
	Determination of As Bioaccessibility in Impacted Soil, prepared by University of South Australia, dated 24 June 2024.				
24.	Updated Preliminary Environmental Site Assessment, including:				
	Preliminary Environmental Site Assessment, Version 4.0, prepared by Edwards Environmental, dated July 2024;				
	Sample Exceedance Map, Rev. D, prepared by Edwards Environmental, dated 16 August 2024.				
Council's Ro	esolution to Refer to Panel				
25.	Council Meeting, dated 26 August 2024, including:				
	Council Meeting Minutes, dated 26 August 2024 (refer to PDF page 86);				



Tab	Document		
	Council Meeting Agenda, dated 26 August 2024 (refer to PDF page 114).		
Panel Hearing			
26.	Panel's Directions, including:		
	<ul> <li>Directions Hearing Notification, prepared by Planning Panels Victoria, dated</li> <li>6 September 2024.</li> </ul>		

# Appendix 4 EVC Benchmark for Creek-line Grassy Woodland



# EVC 68: Creekline Grassy Woodland

#### **Description:**

Eucalypt-dominated woodland to 15 m tall with occasional scattered shrub layer over a mostly grassy/sedgy to herbaceous ground-layer. Occurs on low-gradient ephemeral to intermittent drainage lines, typically on fertile colluvial/alluvial soils, on a wide range of suitably fertile geological substrates. These minor drainage lines can include a range of graminoid and herbaceous species tolerant of waterlogged soils, and are presumed to have sometimes resembled a linear wetland or system of interconnected small ponds.

#### Large trees:

 Species
 DBH(cm)
 #/ha

 Eucalyptus spp.
 80 cm
 15 / ha

#### **Tree Canopy Cover:**

%coverCharacter SpeciesCommon Name15%Eucalyptus camaldulensisRiver Red-gumEucalyptus microcarpaGrey BoxEucalyptus melliodoraYellow Box

#### **Understorey:**

Life form	#Spp	%Cover	LF code
Immature Canopy Tree		5%	IT
Medium Shrub	4	10%	MS
Small Shrub	3	5%	SS
Large Herb	2	5%	LH
Medium Herb	9	15%	MH
Small Herb	3	5%	SH
Large Tufted Graminoid	2	5%	LTG
Medium to Small Tufted Graminoid	16	40%	MTG
Medium to Tiny Non-tufted Graminoid	3	5%	MNG
Bryophytes/Lichens	na	10%	BL

LF Code MS MS	Species typical of at least part of EVC range  Acacia pycnantha  Daviesia ulicifolia	<b>Common Name</b> Golden Wattle Gorse Bitter-pea
MS	Cassinia arcuata	Drooping Cassinia
SS	Pimelea humilis	Common Rice-flower
SS	Pultenaea largiflorens	Twiggy Bush-pea
PS	Astroloma humifusum	Cranberry Heath
LH	Senecio tenuiflorus	Slender Fireweed
MH	Xerochrysum viscosum	Shiny Everlasting
MH	Gonocarpus tetragynus	Common Raspwort
MH	Hypericum gramineum	Small St John's Wort
SH	Hydrocotyle laxiflora	Stinking Pennywort
LTG	Austrostipa rudis	Veined Spear-grass
LTG	Carex tereticaulis	Rush Sedge
MTG	Poa labillardierei	Common Tussock-grass
MTG	Elymus scaber var. scaber	Common Wheat-grass
MTG	Austrodanthonia setacea	Bristly Wallaby-grass
MTG	Juncus remotiflorus	Diffuse Rush
MTG	Carex appressa	Tall Sedge
MNG	<i>Microlaena stipoides</i> var. <i>stipoides</i>	Weeping Grass
SC	Thysanotus patersonii	Twining Fringe-lily



# EVC 68: Creekline Grassy Woodland - Goldfields bioregion

#### **Recruitment:**

Continuous

#### **Organic Litter:**

40 % cover

#### Logs:

30 m/0.1 ha.

#### Weediness:

weeainess:				
LF Code	Typical Weed Species	Common Name	Invasive	<b>Impact</b>
LH	Cirsium vulgare	Spear Thistle	high	high
LH	Sonchus oleraceus	Common Sow-thistle	high	low
MH	Hypochoeris radicata	Cat's Ear	high	low
MH	Anagallis arvensis	Pimpernel	high	low
MH	Hypochoeris glabra	Smooth Cat's-ear	high	low
MH	Galium murale	Small Goosegrass	high	low
MH	Oxalis pes-caprae	Soursob	high	high
LTG	Juncus acutus	Spiny Rush	high	high
LTG	Phalaris aquatica	Toowoomba Canary-grass	high	high
MTG	Briza maxima	Large Quaking-grass	high	low
MTG	Briza minor	Lesser Quaking-grass	high	low
MTG	Romulea rosea	Onion Grass	high	low
MTG	Vulpia bromoides	Squirrel-tail Fescue	high	low
MTG	Bromus hordeaceus ssp. hordeaceus	Soft Brome	high	low
MNG	Aira elegantissima	Delicate Hair-grass	high	low
MNG	Vulpia muralis	Wall Fescue	high	low
MNG	Bromus madritensis	Madrid Brome	high	low

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# Appendix 5 Threatened species recorded in the local area

Notes to tables: Nomenclature follows the current Victorian Biodiversity Atlas (VBA) maintained by DEECA.

Code	Meaning	Reference
National lis	tings (EPBC Act)	
EX	Extinct	
CR	Critically endangered	Commonwealth Environment Protection and
EN	Endangered	Biodiversity Conservation Act 1999 (EPBC Act)
VU	Vulnerable	Blockwershy conservation rice 1999 (El Bernet)
PMST	Protected Matters Search Tool	
State listing	s (FFG Act and Advisory List)	
L	Listed as threatened	
cr	Critically endangered	Victorian Flora and Fauna Guarantee Act 1988
е	Endangered	(FFG Act)
V	Vulnerable	

**Table A5.1:** Threatened flora recorded in the local area (within 5 km of the study Area)

Scientific name	Common name	Consei status	rvation	Most recent database	Other records	Habitat description	Likely occurrence	Rationale for likelihood ranking
		ЕРВС	FFG	record			in study area	
National significa	ince							
Amphibromus fluitans	River Swamp Wallaby-grass	VU			PMST	Swampy areas, mainly along the Murray River between Wodonga and Echuca with scattered records from southern Victoria.	Negligible	No suitable habitat present
Caladenia audasii	McIvor Spider- orchid	EN	cr		PMST	Endemic to Victoria where known only from the west and central goldfields in woodland on shallow stony soils.	Negligible	No suitable habitat present
Caladenia concolor	Crimson Spider-orchid	VU	en		PMST	Dry open forests on well drained gravelly and clay loam soils.	Negligible	No suitable habitat present
Caladenia tensa	Rigid Spider- orchid	EN			PMST	Grows in in Eucalypt/Callitris woodland on well-drained sandy soil.	Negligible	No suitable habitat present
Dodonaea procumbens	Trailing Hop- bush				PMST	Grows in low-lying, often winter-wet areas in woodland, low open-forest and grasslands on sands and clays.	Negligible	No suitable habitat present
Eucalyptus crenulata	Buxton Gum			2018		Alluvial soils in seasonally inundated depressions along river flats; records away from Buxton and Yering in the northeast are likely to be introductions.	Negligible	Outside of the natural range and local records are the result of horticultural plantings
Glycine latrobeana	Clover Glycine	VU	V	1980	PMST	Grasslands and grassy woodlands, particularly those dominated by Kangaroo Grass.	Negligible	No suitable habitat present
Lepidium monoplocoides	Winged Pepper-cress	VU			PMST	A variety of grassland, wetland and floodplain communities on finely textured soils; sometimes in exposed, sparsely vegetated sites, on dry and eroded clay scolds.	Negligible	No suitable habitat present
Myriophyllum porcatum	Ridged Water- milfoil	VU			PMST	Shallow, ephemeral wetlands.	Negligible	No suitable habitat present

Scientific name	Common name	Consei status	rvation	Most recent database	Other records	Habitat description	Likely occurrence	Rationale for likelihood ranking
		ЕРВС	FFG	record			in study area	
Pimelea spinescens subsp. spinescens	Spiny Rice- flower	CE	ce		PMST	Primarily grasslands featuring a moderate diversity of other native species and intertussock spaces, although also recorded in grassland dominated by introduced perennial grasses.	Negligible	No suitable habitat present
Prasophyllum validum	Sturdy Leek- orchid	VU			PMST	Grows in drier woodland and grassland habitats.	Negligible	No suitable habitat present
Senecio behrianus	Stiff Groundsel	EN			PMST	Confined to heavy, winter-wet, clayey soils.	Negligible	No suitable habitat present
Senecio macrocarpus	Large-fruit Fireweed	VU	cr		PMST	Grasslands and grassy woodlands	Negligible	No suitable habitat present
Swainsona murrayana	Slender Darling-pea	VU			PMST	Grows on heavy soils, especially in seasonally wet areas.	Negligible	No suitable habitat present
Westringia crassifolia	Whipstick Westringia	EN			PMST	Confined to the Bendigo Whipstick and Little Desert mallee communities on sand or sandy soils derived from shales and sandstone.	Negligible	No suitable habitat present
State significance								
Acacia ausfeldii	Ausfeld's Wattle		en	2006		Scattered through north-central Victoria where it grows in dry forest and mallee communities.	Negligible	No suitable habitat present
Acacia flexifolia	Bent-leaf Wattle		en	1918		Mostly on shallow and rocky soils in open- forest or mallee scrub.	Negligible	No suitable habitat present
Acacia williamsonii	Whirrakee Wattle		vu	2022		Restricted to north-central Victoria where occurring from Inglewood to Rushworth, and particularly common in the Whipstick Forest near Bendigo where growing on stony gravel or clay-loam in open eucalypt forest and mallee open-scrub.	Negligible	No suitable habitat present

Scientific name	Common name	Conse status	rvation	Most recent database	Other records	Habitat description	Likely occurrence	Rationale for likelihood ranking
		ЕРВС	FFG	record			in study area	
Allocasuarina luehmannii	Buloke		cr	2004		Non-calcareous soils in drier areas on slopes and plains; often in woodlands associated with Grey Box.	Negligible	No suitable habitat present
Cassinia diminuta	Dwarf Cassinia		en	2009		A subshrub of the understorey of Eucalyptus behriana mallee and E. tricarpa woodland on sandy-clay soils mostly in the Whipstick and Kamarooka Forests. Also from near Rushworth.	Negligible	No suitable habitat present
Cassinia ozothamnoides	Cottony Cassinia		en	2006		An uncommon pioneer species of disturbed sites in dry open-forests on poor shaly or stony soils of the north-east.	Negligible	No suitable habitat present
Corymbia maculata	Spotted Gum		V	2020		Only known naturally in Victoria from the Mottle Range, south of Buchan.	Negligible	Study area is outside the natural range of this species.
Crowea exalata subsp. revoluta	Whipstick Crowea		cr	1998		Restricted to an area between Bendigo and Kamarooka and near St Arnaud, mainly in the Whipstick Scrub and Rushworth Forest where found in mallee communities on ironstone ridges with clay and gravelly soils.	Negligible	No suitable habitat present
Grevillea dryophylla	Goldfields Grevillea		en	2010		Grows in dry eucalypt forest (box-ironbark- stringybark associations) in poor stony or gravelly soil.	Negligible	No suitable habitat present
Olearia tubuliflora	Rayless Daisy- bush		en	1990		Usually in box-ironbark forest on poor gravelly soils, with outlying occurrences in southern parts of the Brisbane Ranges and near Anglesea.	Negligible	No suitable habitat present
Prostanthera saxicola var. bracteolata	Slender Mint- bush		en	2000		Scattered in heathland, dry sclerophyll forests and woodlands from the Grampians to Ensay area, often on rocky soils.	Negligible	No suitable habitat present

Scientific name Common name		Conservation status		ation Most recent database record	Other records	Habitat description	Likely occurrence in study	Rationale for likelihood ranking
		EPBC	FFG	record			area	
Pterostylis maxima	Large Rustyhood		cr	2003		Scattered across northern and north- western Victoria in woodland, sparse open-forest and mallee scrub on well- drained soils.	Negligible	No suitable habitat present
Pterostylis smaragdyna	Emerald-lip Greenhood		en	1960		Grows in drier forests and woodlands on well-drained shallow clay loam.	Negligible	No suitable habitat present
Swainsona phacoides	Dwarf Swainson-pea		en	1884		Mostly on low dunes or sandy rises associated with lakes or the Murray River, occasionally on plains with heavier soils, rarely in deep sand mallee.	Negligible	No suitable habitat present

**Table A5.2:** Threatened fauna recorded in the local area (within 5 km of the study Area)

Scientific name	Comm on name	Conser sta		Most recent	Other records	MST A range of dry woodlands and forests dominated by nectar-producing tree species.  A wide range of open woodlands and shrublands where there is an understorey of grasses or shrubs, or both.  Rocky grasslands and woodlands in southeastern Australia.	Likely occurrence	Rationale for likelihood ranking
		EPBC	FFG	database record			in study area	
National significar	nce							
Anthochaera phrygia	Regent Honeyeater	CR	cr	2000	PMST		Negligible	Species considered extinct in southern Victoria.
Aphelocephala leucopsis	Southern Whiteface	VU				shrublands where there is an understorey of	Negligible	No suitable habitat present
Aprasia parapulchella	Pink-tailed Worm-lizard	VU	е			, ,	Negligible	No suitable habitat present
Botaurus poiciloptilus	Australasian Bittern	EN	cr	2003	PMST	Shallow freshwater and brackish wetlands with abundant emergent aquatic vegetation.	Negligible	No suitable habitat present
Calidris acuminata	Sharp-tailed Sandpiper	VU				The species occurs both along coasts and within inland wetlands - from fresh to hypersaline.	Negligible	No suitable habitat present
Calidris ferruginea	Curlew Sandpiper	CE	cr			Intertidal mudflats in sheltered coastal areas, such as estuaries, bays, inlets and lagoons, and also around non-tidal swamps, lakes and lagoons near the coast, and ponds in saltworks and sewage farms.	Negligible	No suitable habitat present
Callocephalon fimbriatum	Gang-gang Cockatoo	EN	е	2017	PMST	S Vic to E NSW. Forests and woodlands from coast to alpine areas. Autumn-winter dispersal from highlands to lower elevations. Forages in eucalypts, acacias and some exotic garden trees and shrubs.	Low	Very limited foraging resources and no breeding resources.
Climacteris picumnus	Brown Treecreeper	VU			PMST	Often observed feeding on insects as it spirals up trees or when hopping along the ground or on fallen litter.	Negligible	No suitable habitat present.
Crinia sloanei	Sloane's Froglet				PMST	Typically associated with periodically inundated areas in grassland, woodland and disturbed habitats.	Low	Potential habitat associated with existing

Scientific name	Comm on name	Conser stat		Most recent	Other records	AST Lightly timbered plains and Acacia scrub.  Slow-flowing or still freshwater wetlands such as swamps, drains and backwaters of streams.  Inhabits open, freshwater wetlands with low, dense vegetation (e.g. swamps, flooded grasslands or heathlands, around bogs and other water bodies).  Dry open woodlands and forests. Typically forages for fruit and nectar in mistletoes and in tree canopies.  An almost exclusively aerial species within Australia, occurring over most types of habitat, particularly wooded areas.  A range of forests and woodlands, especially those supporting nectar-producing tree species. Also well-treed urban areas.  Non-breeding migrant to Australia. Shallow tidal, brackish or freshwater wetlands and margins. Generally concentrated in coastal habitats but may occur widely across	Rationale for likelihood ranking	
		EPBC	FFG	database record			in study area	
								artificial drains and Bendigo Creek.
Falco hypoleucos	Grey Falcon	VU	V		PMST	Lightly timbered plains and Acacia scrub.	Negligible	No suitable habitat present
Galaxias rostratus	Flathead Galaxias				PMST	as swamps, drains and backwaters of	Negligible	No suitable habitat present
Gallinago hardwickii	Latham's Snipe	VU				dense vegetation (e.g. swamps, flooded grasslands or heathlands, around bogs and	Negligible	No suitable habitat present
Grantiella picta	Painted Honeyeater	VU	V		PMST	forages for fruit and nectar in mistletoes and	Negligible	No suitable habitat present
Hirundapus caudacutus	White-throated Needletail	VU	V	2019	PMST	Australia, occurring over most types of	High	Species may forage in the airspace above the study area.
Lathamus discolor	Swift Parrot	CR	cr	2019	PMST	those supporting nectar-producing tree	Negligible	No suitable habitat present
Limosa limosa	Black-tailed Godwit	1982	cr	EN		tidal, brackish or freshwater wetlands and margins. Generally concentrated in coastal	Negligible	No suitable habitat present
Litoria raniformis	Growling Grass Frog	VU	V	1961	PMST	Still or slow-flowing waterbodies and surrounding terrestrial vegetation.	Negligible	No suitable habitat present.
Maccullochella macquariensis	Trout Cod				PMST	Streams characterised by a high abundance of large woody debris.	Negligible	No suitable habitat present.

Scientific name	Comm on name	Conser stat		Most recent	Other records	Habitat description	Likely occurrence	Rationale for likelihood ranking
		EPBC	FFG	database record			in study area	
Maccullochella peelii	Murray Cod				PMST	Found within the Murray River catchment usually in sluggish turbid rivers, in deep holes or amongst fallen timber and other debris.	Negligible	No suitable habitat present.
Melanodryas cucullata cucullata	South-eastern Hooded Robin	EN	V		PMST	Woodlands of eucalypt, Mallee, semi-cleared farmland.	Negligible	No suitable habitat present.
Nannoperca australis (Murray-Darling lineage)	Southern Pygmy Perch (Murray- Darling lineage)	2024	vu	VU		Prefers habitats in low-gradient waterways and floodplains with slow-flowing or still water, and aquatic macrophyte cover or wood at shallow depths, with little or no flow in summer.	Negligible	No suitable habitat present.
Neophema chrysostoma	Blue-winged Parrot	VU			PMST	A range of coastal, sub-coastal and semi-arid regions throughout south-eastern Australia. Favor heathy woodland for breeding, particularly sites recently disturbed by fire or logging.	Negligible	No suitable habitat present.
Paralucia pyrodiscus lucida	Eltham Copper Butterfly				PMST	Dry forest and woodlands supporting an understorey of Sweet Bursaria	Negligible	No suitable habitat present.
Pedionomus torquatus	Plains-wanderer	CE	cr			Ground-dwelling bird that lives in open grasslands	Negligible	No suitable habitat present.
Polytelis swainsonii	Superb Parrot				PMST	Occurs mainly on open, tall riparian River Red Gum <i>Eucalyptus camaldulensis</i> forest or woodland primarily along the Murray and Murrumbigee Rivers.	Low	Outside the normal distribution of this species.
Pteropus poliocephalus	Grey-headed Flying-fox	VU	V		PMST	Rainforest, wet and dry sclerophyll forest, woodland and urban areas.	Low	Species may forage in flowering eucalypts.
Rostratula australis	Australian Painted-snipe	EN	cr	2007	PMST	Shallows of well-vegetated freshwater wetlands.	Negligible	No suitable habitat present.
Stagonopleura guttata	Diamond Firetail	VU	V		PMST	Open forests and woodlands with a grassy ground layer.	Negligible	No suitable habitat present.
Synemon plana	Golden Sun Moth	VU	V		PMST	Natural temperate grassland, grassy woodland and pasture supporting spear	Negligible	No suitable habitat present.

Scientific name	Comm on name	Consers stat EPBC		Most recent database record	Other records	Habitat description	Likely occurrence in study area	Rationale for likelihood ranking
						grasses and wallaby grasses and exotic grassland dominated by Chilean needle grass.		
Tringa nebularia	Common Greenshank	EN	е		PMST	Roosts and loafs round wetlands, in shallow pools and puddles, or slightly elevated on rocks, sandbanks or small muddy islets	Negligible	No suitable habitat present.
State significance								
Accipiter novaehollandiae	Grey Goshawk		е	2022		Rainforest, gallery forest, tall wet forest and woodland. Also partially cleared agricultural land.	Low	May forage in the study area on rare occasions.
Actitis hypoleucos	Common Sandpiper		vu	2014		Migrates to Australia from Eurasia in August where it inhabits a wide variety of coastal and inland wetlands with muddy margins before departing north in March.	Negligible	No suitable habitat present.
Ambassis agassizii	Agassiz's Glassfish		ex	2023		Occurs in a variety of freshwater habitats in the Murray-Darling basin, although the species is considered extinct in South Australia and Victoria.	Negligible	No suitable habitat present.
Anseranas semipalmata	Magpie Goose		V	1994		Open floodplains and wet grasslands.	Negligible	No suitable habitat present.
Antigone rubicunda	Brolga		en	1993		Prefers shallow marshland areas, usually less than 50 cm deep with emergent vegetation.	Low	Marginal habitat present
Ardea alba modesta	Eastern Great Egret		V	2019		Flooded crops, pasture, swamps, lagoons, saltmarsh, sewage ponds, estuaries, dams, roadside ditches. Breeds in trees standing in water.	Negligible	No suitable habitat present.
Ardea intermedia plumifera	Plumed Egret		cr	2013		Densely vegetated freshwater wetlands including lakes, swamps and billabongs. Breeds in trees standing in water.	Negligible	No suitable habitat present.
Biziura lobata	Musk Duck		V	2001		Deep, permanent freshwater wetlands with areas of open water and patches of dense aquatic vegetation.	Negligible	No suitable habitat present.

Scientific name	Comm on name	Conser stat		Most recent	Other records	Habitat description	Likely occurrence	Rationale for likelihood ranking
		EPBC	FFG	database record			in study area	
Calamanthus pyrrhopygius	Chestnut-rumped Heathwren		vu	2001		Small bird of dense heath and shrubland in southeastern Australia.	Negligible	No suitable habitat present.
Chelodina expansa	Broad-shelled Turtle		е	2012		Water bodies that are deeper than three metres and show a preference for aquatic habitats with submerged structures such as logs, tree roots and dead trees.	Low	Poor quality habitat present
Egretta garzetta	Little Egret		en	2018		Swamps, billabongs, floodplain pools, mudflats, mangroves and channels.	Low	Marginal habitat present
Falco subniger	Black Falcon		cr	1983		Woodlands, open country and around terrestrial wetlands, including rivers and creeks.	Negligible	No suitable habitat present.
Geopelia cuneata	Diamond Dove		vu	1984		Predominantly inhabits woodland in areas near water but in environments which are arid or semi-arid in nature.	Low	Marginal habitat present
Haliaeetus leucogaster	White-bellied Sea-Eagle		е	2017		Coastal areas such as beaches and estuaries, inland wetlands and major inland streams.	Low	Species may fly overhead on rare occasions.
Hieraaetus morphnoides	Little Eagle		V	2003		Woodland and open areas. Rabbits are a key component of their diet. Nesting occurs in mature trees in open woodland or riparian vegetation.	Low	Potential foraging habitat present.
Lewinia pectoralis	Lewin's Rail		vu	2001		Swamps, dense riparian vegetation and saltmarsh.	Low	Marginal habitat present
Lichenostomus cratitius	Purple-gaped Honeyeater		vu	1989		Endemic to semi-arid southern Australia, where it inhabits mallee, tall heath and associated low eucalypt woodland.	Negligible	No suitable habitat present.
Lophoictinia isura	Square-tailed Kite		vu	2019		Eucalypt woodlands, open forest and partially cleared farmland.	Medium	Species may utilise e airspace above the study area for foraging
Melanotaenia fluviatilis	Murray-Darling Rainbowfish		en	2021		Rivers and streams of the Murray-Darling basin.	Negligible	No suitable habitat present.

Scientific name	Comm on name	Conserva statu EPBC		Most recent database record	Other records	Habitat description	Likely occurrence in study area	Rationale for likelihood ranking
Mogurnda adspersa	Southern Purple- spotted Gudgeon		cr	2024		Southern Purple spotted Gudgeons inhabit freshwater rivers, creeks and billabongs. They prefer still or slow-flowing deeper waters, and usually shelter among aquatic vegetation, rocks, snags and other woody debris.	Negligible	No suitable habitat present.
Neophema pulchella	Turquoise Parrot		vu	1953		Occupies woodlands and open forests in the foothills of the Great Dividing Range, in areas supporting a ground cover of grasses and understorey of low shrubs.	Low	Potential habitat present but no recent local records.
Ninox connivens	Barking Owl		cr	1986		Open woodland forest habitats often where forests adjoin open land. Barking Owl is now considered rare in many areas of Victoria.	Low	Potential habitat present but no recent local records.
Ninox strenua	Powerful Owl		V	2022		Eucalypt forests and woodlands, well-treed urban areas.	Low	Suitable foraging habitat present but local habitat not extensive enough to support this species.
Oreoica gutturalis	Crested Bellbird		en	2006		Drier parts of Australia where its typical habitats are acacia scrublands, eucalypt woodlands, spinifex and saltbush plains, and dunes.	Negligible	No suitable habitat present.
Oxyura australis	Blue-billed Duck		V	2022		Open or densely vegetated wetlands.	Negligible	No suitable habitat present.
Peltohyas australis	Inland Dotterel		vu	1983		Sparsely vegetated gibber plain and claypans	Negligible	No suitable habitat present.
Phascogale tapoatafa	Brush-tailed Phascogale		vu	1987		Drier sclerophyll forests and woodlands.	Low	Marginal habitat present
Pogona barbata	Bearded Dragon		vu	1990		Woodlands, forests and heathlands with abundant coarse, woody debris cover.	Low	Marginal habitat present
Pomatostomus temporalis	Grey-crowned Babbler		vu	1988		Open forests and woodlands.	Low	Species considered extinct in southern

Scientific name Comm	Comm on name	Conserv stat		Most recent	Other records	Habitat description	Likely occurrence	Rationale for likelihood ranking
		EPBC	FFG	database record			in study area	
								Victoria and almost so elsewhere.
Pseudophryne bibronii	Brown Toadlet		en	2007		A wide variety of woodland, forest and grassland habitats, where it shelters under leaf litter and other debris in moist soaks and depressions. Breeds in swamps and inundated habitats, and along creek lines.	Low	Marginal habitat present
Sminthopsis crassicaudata	Fat-tailed Dunnart		vu	1992		A variety of grassland and woodland habitats in drier regions of Australia	Low	Highly degraded marginal habitat.
Spatula rhynchotis	Australasian Shoveler		V	2018		All kinds of wetlands, preferring large undisturbed heavily vegetated freshwater swamps.	Negligible	No suitable habitat present.
Stictonetta naevosa	Freckled Duck		en	2020		Large freshwater wetlands, generally with dense vegetation.	Negligible	No suitable habitat present.
Tringa glareola	Wood Sandpiper		en	1988		Well-vegetated shallow freshwater wetlands with emergent aquatic plants and dense fringing vegetation.	Negligible	No suitable habitat present.
Tringa stagnatilis	Marsh Sandpiper		en	1990		Permanent or ephemeral wetlands, mudflats and saltmarshes in coastal and inland environments.	Negligible	No suitable habitat present.

# Appendix 6 Plant species recorded

Nomenclature follows the current Victorian Biodiversity Atlas (VBA) maintained by DEECA.

Notes to tables:

The following abbreviations and symbols are relevant to this Appendix:

Code	Meaning	Reference	
National listings (EPBC Act)			
CR	Critically endangered	Commonwealth Environment Protection and	
EN	Endangered	Biodiversity Conservation Act 1999 (EPBC Act)	
VU	Vulnerable		
PMST	Protected Matters Search Tool		
State listin	gs (FFG Act and Advisory List)		
T	Listed as threatened	Victorian Flora and Fauna Guarantee Act	
P	Protected species (public land only)	1988 (FFG Act)	
Noxious w	eed status (CaLP Act)		
SP	State prohibited species	Victorian Catchment and Land Protection	
RP	Regionally prohibited species	Act 1994 (CaLP Act)	
RC	Regionally controlled species		
R	Restricted species		
Other			
#	Native species outside its natural range	Victorian Biodiversity Atlas (VBA)	

Table 5.1 Flora species (19 native and 59 weeds) recorded within the study area.

Status	Scientific Name	Common Name		
Indigenou	Indigenous species			
Р	Acacia mearnsii	Black Wattle		
	Carex inversa	Knob Sedge		
#	Cassinia sifton	Drooping Cassinia		
	Crassula decumbens	Spreading Crassula		
	Enchylaena tomentosa var. tomentosa	Ruby Saltbush		
	Epilobium billardiereanum	Variable Willow-herb		
	Eucalyptus camaldulensis	River Red-gum		
	Eucalyptus melliodora	Yellow Box		
	Geranium sp. 5	Naked Crane's Bill		
	Juncus spp.	Rush		
	Juncus subsecundus	Finger Rush		

Status	Scientific Name	Common Name
-Status*	Laphangium luteoalbum	Jersey Cudweed
	Lythrum hyssopifolia	Small Loosestrife
	Oxalis perennans	Grassland Wood-sorrel
	Rytidosperma caespitosum	Common Wallaby-grass
	Rytidosperma fulvum	
		Copper-awned Wallaby-grass
	Rytidosperma racemosum	Stiped Wallaby-grass
D	Salsola tragus	Saltwort
P	Vittadinia gracilis	Woolly New Holland Daisy
Introduce	ed species	Share Samul
	Acetosella vulgaris	Sheep Sorrel
	Allium triquetrum	Three-corner Garlic
	Allium vineale	Crow Garlic
	Arctotheca calendula	Cape Weed
	Avena barbata	Wild Oat
	Briomus diandrus	Great Brome
	Bromus catharticus	Prairie Grass
	Bromus hordeaceus	Soft Brome
	Carex divisa	Divided Sedge
	Convolvulus arvensis	Common Bindweed
RC	Cynara cardunculus subsp. flavescens	Artichoke Thistle
	Cynodon dactylon var. dactylon	Couch
	Cyperus eragrostis	Drain Flat-sedge
	Dactylis glomerata	Cocksfoot
	Ehrharta longifolia	Annual Veldt-grass
	Erodium botrys	Big Heron's-bill
	Erodium brachycarpum	Hairy-pit Heron's-bill
	Foeniculum vulgare	Fennel
	Galium aparine	Cleavers
	Gazania linearis	Gazania
RC	Genista linifolia	Flax-leaf Broom
RC	Genista monspessulana	Montpellier Broom
	Holcus lanatus	Yorkshire Fog
	Hordeum leporinum	Wall Barley-grass
	Hypochaeris radicata	Flatweed
RC	Juncus acutus	Spiny Rush
	Lactuca serriola	Prickly Lettuce
	Lepidium africanum	Common Pepper-cress
	Lolium perenne	Perennial Rye-grass
	Lolium rigidum	Wimmera Rye-grass
	Malva spp.	Mallow
RC	Marrubium vulgare	Horehound
	Medicago polymorpha	Burr Medic
	Medicago polymorpha	Burr Medic
	Medicago sativa	Lucerne
	Modiola caroliniana	Red-flower Mallow
	Modiola cal difficila	Neu-IIOWEI IVIAIIOW

Status	Scientific Name	Common Name
	Moraea setifolia	Thread Iris
R	Nassella neesiana	Chilean Needle-grass
	Olea europaea	Olive
R	Opuntia spp.	Prickly Pear
	Oxalis pes-caprae	Soursob
	Paspalum dilatatum	English Couch
	Pinus radiata	Radiata Pine
	Plantago coronopus	Buck's-horn Plantain
	Plantago lanceolata	Ribwort
	Poa bulbosa	Bulbous Meadow-grass
	Prunus cerasifera	Cherry Plum
	Romulea rosea	Onion Grass
RC	Rosa rubiginosa	Sweet Briar
	Rumex crispus	Curled Dock
	Schinus molle	Pepper Tree
	Sonchus oleraceus	Common Sow-thistle
	Tribolium acutiflorum	Desmazeria
	Trifolium angustifolium	Narrow-leaf Clover
	Trifolium arvense	Hares-foot Clover
	Trifolium subterraneum	Subterranean Clover
RC	Ulex europaeus	Gorse
	Vicia sativa	Common Vetch
	Vulpia bromoides	Squirrel-tail Fescue

# Appendix 7 Native vegetation removal report and credit register extract

# **Native Vegetation Removal Report**



NVRR ID: 325\_20241011\_ZB6

This report provides information to support an application to remove, destroy or lop native vegetation in accordance with the *Guidelines for the removal, destruction or lopping of native vegetation* (the Guidelines). This report is **not an assessment by DEECA** of the proposed native vegetation removal. Native vegetation information and offset requirements have been determined using spatial data provided by the applicant or their consultant.

### Report details

**Date created:** 11/10/2024

Local Government Area: GREATER BENDIGO CITY

**Shapefile name:** 

 ${\tt Epsom\_NVRMap\_Removal\_Trees.shp}$ 

Patches.shp

**Site assessor name:** Steve Mueck

Registered Aboriginal Party: Dja Dja Wurrung

Coordinates: 144.31068, -36.71460

Address:

28-34 SAADE STREET EPSOM 3551 BUCKLAND STREET EPSOM 3551 20 MONTIS LANE EPSOM 3551 36-46 SAADE STREET EPSOM 3551 1 BUCKLAND STREET EPSOM 3551 6 ALEPPO ROAD EPSOM 3551 18-26 SAADE STREET EPSOM 3551

#### **Regulator Notes**

Removal polygons are located:

• On Crown Land



### Summary of native vegetation to be removed

Assessment pathway	Detailed Ass	essment Pathway	
Location category	Location 2  The native vegetation extent map indicates that this area is typically characterised as supporting native vegetation. Additionally, it is modelled as encompassing an endangered Ecological Vegetation Class, sensitive wetland or sensitive coastal area. The removal of less than 0.5 hectares of native vegetation in this area will not require a Species Offset.		
Total extent including past and proposed removal (ha)  Includes endangered EVCs (ha): 1.232	1.263	Extent of past removal (ha)  Extent of proposed removal - Patches (ha)  Extent of proposed removal - Scattered Trees (ha)	0 0.403 0.860
No. Large Trees proposed to be removed	8	No. Large Patch Trees  No. Large Scattered Trees	5 3
No. Small Scattered Trees	36		

### Offset requirements if approval is granted

Any approval granted will include a condition to obtain an offset, before the removal of native vegetation, that meets the following requirements:

General Offset amount <sup>1</sup>	0.2950 General Habitat Units	
Vicinity	North Central CMA or GREATER BENDIGO CITY LGA	
Minimum strategic biodiversity value score <sup>2</sup>	0.3712	
Large Trees*	8	
*The total number of Large Trees that the offset must protect	<b>8</b> Large Trees to be protected in either the General, Species or combination across all habitat units protected	

 $\ensuremath{\mathsf{NB}}\xspace$  values within tables in this document may not add to the totals shown above due to rounding

Appendix 1 includes information about the native vegetation to be removed

Appendix 2 includes information about the rare or threatened species with mapped habitat at the site

Appendix 3 includes the following figures

- Location map
- Strategic Biodiversity Value map
- Condition map
- Endangered EVCs map
- Aerial photograph showing mapped native vegetation
- Property in context
- Habitat Importance maps

<sup>1.</sup> The General Offset amount required is the sum of all General Habitat Units in Appendix 1.

<sup>2.</sup> Minimum strategic biodiversity value score is 80 per cent of the weighted average score across habitat zones where a General Offset is required.

<sup>3.</sup> The Species Offset amount(s) required is the sum of all Species Habitat Units in Appendix 1.

#### **Next steps**

Any proposal to remove native vegetation must meet the application requirements of the Detailed Assessment Pathway and it will be assessed under the Detailed Assessment Pathway.

If you wish to remove the mapped native vegetation you are required to apply for approval from the responsible authority. The responsible authority will refer your application to DEECA for assessment, as required. **This report is not a referral assessment by DEECA.** 

This *Native vegetation removal report* must be submitted with your application for approval to remove, destroy or lop native vegetation.

Refer to the Guidelines for a full list of application requirements This report provides information that meets the following application requirements:

- The assessment pathway and reason for the assessment pathway.
- A description of the native vegetation to be removed (partly met).
- Maps showing the native vegetation and property (partly met).
- Information about the impacts on rare or threatened species.
- The offset requirements determined in accordance with Section 5 of the Guidelines that apply if approval is granted to remove native vegetation.

Additional application requirements must be met including:

- Topographical and land information
- · Recent dated photographs.
- Details of past native vegetation removal.
- An avoid and minimise statement.
- A copy of any Property Vegetation Plan as applicable.
- A defendable space statement as applicable.
- A statement about the Native Vegetation Precinct Plan (NVPP) as applicable.
- A site assessment report including a habitat hectare assessment of any patches of native vegetation and details of trees.
- An offset statement that explains that an offset has been identified and how it will be secured.

## Appendix 1: Description of native vegetation to be removed

The Species-General Offset Test was applied to your proposal. This test determines if the proposed removal of native vegetation has a proportional impact on any rare or threatened species habitats above the Species Offset threshold. The threshold is set at 0.005 per cent of the mapped habitat value for a species. When the proportional impact meets or exceeds the Species Offset threshold, a Species Offset is required. This test is completed for all species with mapped habitat at the site. Multiple Species Offsets will be required if the Species Offset threshold is exceeded for multiple species.

Where a zone requires Species Offset(s), the Species Habitat Units for each species in that zone are calculated by the following equation in accordance with the Guidelines: <u>Species Habitat Units = extent without overlap x condition score x species landscape factor x 2, where the species landscape factor = 0.5 + (habitat importance score/2)</u>

The Species Offset amount(s) required is the sum of all Species Habitat Units per zone.

Where a zone does not require a Species Offset, the General Habitat Units in that zone are calculated by the following equation in accordance with the Guidelines: General Habitat Units = extent without overlap x condition score x general landscape factor x 1.5, where the general landscape factor = 0.5 + (strategic biodiversity value score/2)

The General Offset amount required is the sum of all General Habitat Units per zone.

### Native vegetation to be removed

	Informa	tion pr	ovided by o	or on behalf of	the applica	int	Information calculated by NVR Map							
Zone	Туре	DBH (cm)	EVC code	Bioregional conservation status	Partial Removal	Condition score	Large Tree(s) Polygon extent (ha) Extent without overlap (ha) SBV Score Units						Offset Type	
0-P	Patch	-	Gold0068	Endangered	no	0.370	4	0.096	0.096	0.163	-	0.031	General	
1-P	Patch	-	Gold0068	Endangered	no	0.130	-	0.142	0.142	0.518	-	0.021	General	
10-P	Patch	-	Gold0068	Endangered	no	0.130	-	0.001	0.001	0.600	-	0.000	General	
11-P	Patch	-	Gold0068	Endangered	no	0.130	-	0.004	0.004	0.600	-	0.001	General	

	Informat	tion pr	ovided by o	or on behalf of	the applica	int	Information calculated by NVR Map							
Zone	Туре	DBH (cm)	EVC code	Bioregional conservation status	Partial Removal	Condition score	Large Tree(s)	Polygon extent (ha)	Extent without overlap (ha)	SBV score	HI Score	Habitat Units	Offset Type	
2-P	Patch	-	Gold0068	Endangered	no	0.370	1	0.052	0.052	0.169	-	0.017	General	
3-P	Patch	-	Gold0068	Endangered	no	0.130	-	0.007	0.007	0.393	-	0.001	General	
4-P	Patch	-	Gold0068	Endangered	no	0.130	-	0.004	0.004	0.100	-	0.000	General	
5-P	Patch	-	Gold0068	Endangered	no	0.130	-	0.008	0.008	0.600	-	0.001	General	
6-P	Patch	-	Gold0068	Endangered	no	0.300	-	0.012	0.012	0.740	-	0.005	General	
7-P	Patch	-	Gold0068	Endangered	no	0.300	-	0.028	0.028	0.600	-	0.010	General	
8-P	Patch	-	Gold0068	Endangered	no	0.250	-	0.047	0.047	0.740	-	0.015	General	
9-P	Patch	-	Gold0068	Endangered	no	0.250	-	0.002	0.002	0.740	ı	0.001	General	
0-a	Scattered Tree	10	VRiv0068	Endangered	no	0.200	-	0.031	0.031	0.170	-	0.005	General	
1-a	Scattered Tree	91	Gold0068	Endangered	no	0.200	1	0.070	0.051	0.740	-	0.013	General	
10-a	Scattered Tree	10	Gold0068	Endangered	no	0.200	-	0.031	0.031	0.740	-	0.008	General	
11-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.005	0.600	-	0.001	General	
12-a	Scattered Tree	20	Gold0068	Endangered	no	0.200	-	0.031	0.020	0.600	-	0.005	General	

	Informat	tion pr	ovided by o	or on behalf of	the applica	nt	Information calculated by NVR Map							
Zone	Туре	DBH (cm)	EVC code	Bioregional conservation status	Partial Removal	Condition score	Large Tree(s)	Polygon extent (ha)	Extent without overlap (ha)	SBV score	HI Score	Habitat Units	Offset Type	
13-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.019	0.170	-	0.003	General	
14-a	Scattered Tree	10	Gold0068	Endangered	no	0.200	-	0.031	0.031	0.740	-	0.008	General	
15-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.003	0.600	-	0.001	General	
16-a	Scattered Tree	10	Gold0068	Endangered	no	0.200	-	0.031	0.027	0.740	-	0.007	General	
17-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.003	0.170	-	0.000	General	
18-a	Scattered Tree	10	Gold0068	Endangered	no	0.200	-	0.031	0.031	0.740	-	0.008	General	
19-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.006	0.170	-	0.001	General	
2-a	Scattered Tree	57	VRiv0068	Endangered	no	0.200	-	0.031	0.012	0.170	-	0.002	General	
20-a	Scattered Tree	15	Gold0068	Endangered	no	0.200	-	0.031	0.020	0.600	-	0.005	General	
21-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.005	0.600	-	0.001	General	

	Informat	tion pr	ovided by o	or on behalf of	the applica	nt	Information calculated by NVR Map							
Zone	Туре	DBH (cm)	EVC code	Bioregional conservation status	Partial Removal	Condition score	Large Tree(s)	Polygon extent (ha)	Extent without overlap (ha)	SBV score	HI Score	Habitat Units	Offset Type	
22-a	Scattered Tree	10	Gold0068	Endangered	no	0.200	-	0.031	0.025	0.740	-	0.006	General	
23-a	Scattered Tree	8	VRiv0068	Endangered	no	0.200	-	0.031	0.005	0.170	-	0.001	General	
24-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.006	0.600	-	0.002	General	
25-a	Scattered Tree	10	Gold0068	Endangered	no	0.200	-	0.031	0.031	0.600	-	0.008	General	
26-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.007	0.170	-	0.001	General	
27-a	Scattered Tree	8	VRiv0068	Endangered	no	0.200	-	0.031	0.031	0.600	-	0.008	General	
28-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.019	0.600	-	0.004	General	
29-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.015	0.170	-	0.003	General	
3-a	Scattered Tree	97	Gold0068	Endangered	no	0.200	1	0.070	0.051	0.740	-	0.013	General	
30-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.005	0.170	-	0.001	General	

	Informat	tion pr	ovided by o	or on behalf of	the applica	nnt	Information calculated by NVR Map							
Zone	Туре	DBH (cm)	EVC code	Bioregional conservation status	Partial Removal	Condition score	Large Tree(s)	Polygon extent (ha)	Extent without overlap (ha)	SBV score	HI Score	Habitat Units	Offset Type	
31-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.006	0.600	-	0.001	General	
32-a	Scattered Tree	8	VRiv0068	Endangered	no	0.200	-	0.031	0.031	0.190	-	0.006	General	
33-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.031	0.190	-	0.006	General	
34-a	Scattered Tree	30	VRiv0175	Endangered	no	0.200	-	0.031	0.005	0.138	-	0.001	General	
35-a	Scattered Tree	40	VRiv0175	Endangered	no	0.200	-	0.031	0.023	0.114	-	0.004	General	
36-a	Scattered Tree	60	VRiv0175	Endangered	no	0.200	-	0.031	0.023	0.114	-	0.004	General	
37-a	Scattered Tree	44	Gold0175	Vulnerable	no	0.200	-	0.031	0.031	0.100	-	0.005	General	
38-a	Scattered Tree	65	Gold0068	Endangered	no	0.200	-	0.031	0.031	0.740	-	0.008	General	
4-a	Scattered Tree	100	VRiv0175	Endangered	no	0.200	1	0.070	0.070	0.118	-	0.012	General	
5-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.021	0.486	-	0.005	General	

	Informat	tion pr	ovided by o	or on behalf of	int	Information calculated by NVR Map							
Zone	Туре	DBH (cm)	EVC code	Bioregional conservation status	Partial Removal	Condition score	Large Tree(s)	Polygon extent (ha)	Extent without overlap (ha)	SBV score	HI Score	Habitat Units	Offset Type
6-a	Scattered Tree	10	Gold0068	Endangered	no	0.200	-	0.031	0.031	0.740	-	0.008	General
7-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.004	0.170	-	0.001	General
8-a	Scattered Tree	10	Gold0068	Endangered	no	0.200	-	0.031	0.029	0.740	-	0.008	General
9-a	Scattered Tree	5	VRiv0068	Endangered	no	0.200	-	0.031	0.031	0.600	-	0.008	General

# Appendix 2: Information about impacts to rare or threatened species' habitats on site

This table identifies all rare or threatened species with mapped habitat at the site and the proportional impact associated with the proposed native vegetation removal.

Species common name	Species scientific name	Taxon ID	Conservation status	Group	Habitat impacted	Proportional impact (%)
Erect Peppercress	Lepidium pseudopapillosum	501909	Endangered	Dispersed	Habitat importance map	0.0001
Freshwater Catfish	Tandanus tandanus	528545	Endangered	Dispersed	Habitat importance map	0.0001
Southern Pygmy Perch (Murray-Darling lineage)	Nannoperca australis (Murray-Darling lineage)	903231	Vulnerable	Dispersed	Habitat importance map	0.0001
Lewin's Rail	Lewinia pectoralis pectoralis	10045	Vulnerable	Dispersed	Habitat importance map	0.0000
Bush Stone-curlew	Burhinus grallarius	10174	Endangered	Dispersed	Habitat importance map	0.0000
Brolga	Grus rubicunda	10177	Vulnerable	Dispersed	Habitat importance map	0.0000
Intermediate Egret	Ardea intermedia	10186	Endangered	Dispersed	Habitat importance map	0.0000
Eastern Great Egret	Ardea modesta	10187	Vulnerable	Dispersed	Habitat importance map	0.0000
Australian Little Bittern	lxobrychus dubius	10195	Endangered	Dispersed	Habitat importance map	0.0000
Australasian Shoveler	Anas rhynchotis	10212	Vulnerable	Dispersed	Habitat importance map	0.0000

Species common name	Species scientific name	Taxon ID	Conservation status	Group	Habitat impacted	Proportional impact (%)
Hardhead	Aythya australis	10215	Vulnerable	Dispersed	Habitat importance map	0.0000
Blue-billed Duck	Oxyura australis	10216	Endangered	Dispersed	Habitat importance map	0.0000
Musk Duck	Biziura lobata	10217	Vulnerable	Dispersed	Habitat importance map	0.0000
Grey Goshawk	Accipiter novaehollandiae novaehollandiae	10220	Vulnerable	Dispersed	Habitat importance map	0.0000
Black Falcon	Falco subniger	10238	Vulnerable	Dispersed	Habitat importance map	0.0000
Barking Owl	Ninox connivens connivens	10246	Endangered	Dispersed	Habitat importance map	0.0000
Swift Parrot	Lathamus discolor	10309	Endangered	Dispersed	Habitat importance map	0.0000
White-throated Needletail	Hirundapus caudacutus	10334	Vulnerable	Dispersed	Habitat importance map	0.0000
Grey-crowned Babbler	Pomatostomus temporalis temporalis	10443	Endangered	Dispersed	Habitat importance map	0.0000
Squirrel Glider	Petaurus norfolcensis	11137	Endangered	Dispersed	Habitat importance map	0.0000
Bearded Dragon	Pogona barbata	12177	Vulnerable	Dispersed	Habitat importance map	0.0000

Species common name	Species scientific name	Taxon ID	Conservation status	Group	Habitat impacted	Proportional impact (%)
Lace Monitor	Varanus varius	12283	Endangered	Dispersed	Habitat importance map	0.0000
Growling Grass Frog	Litoria raniformis	13207	Endangered	Dispersed	Habitat importance map	0.0000
Ausfeld's Wattle	Acacia ausfeldii	500013	Vulnerable	Dispersed	Habitat importance map	0.0000
Buloke Mistletoe	Amyema linophylla subsp. orientalis	500217	Vulnerable	Dispersed	Habitat importance map	0.0000
Buloke	Allocasuarina luehmannii	500678	Endangered	Dispersed	Habitat importance map	0.0000
Purple Diuris	Diuris punctata	501084	Vulnerable	Dispersed	Habitat importance map	0.0000
Hairy Tails	Ptilotus erubescens	502825	Vulnerable	Dispersed	Habitat importance map	0.0000
Rye Beetle-grass	Tripogon Ioliiformis	503455	Rare	Dispersed	Habitat importance map	0.0000
Yellow-tongue Daisy	Brachyscome chrysoglossa	503654	Vulnerable	Dispersed	Habitat importance map	0.0000
Southern Swainson-pea	Swainsona behriana	504944	Rare	Dispersed	Habitat importance map	0.0000
Late-flower Flax-lily	Dianella tarda	505085	Vulnerable	Dispersed	Habitat importance map	0.0000

Species common name	Species scientific name	Taxon ID	Conservation status	Group	Habitat impacted	Proportional impact (%)
Austral Crane's-bill	Geranium solanderi var. solanderi s.s.	505337	Vulnerable	Dispersed	Habitat importance map	0.0000
Arching Flax-lily	Dianella sp. aff. longifolia (Benambra)	505560	Vulnerable	Dispersed	Habitat importance map	0.0000

### **Habitat Group**

- Highly localised habitat means there is 2,000 hectares or less mapped habitat for the species.
- Dispersed habitat means there is more than 2,000 hectares of mapped habitat for the species.

### **Habitat Impacted**

The Species General Offset test, as described in Section 5.3.1 of the Guidelines, is used to determine if proposed native vegetation removal will result in a proportionally significant impact on the habitat value of rare or threatened species. The test is applied where the native vegetation proposed for removal:

- Intersects the Habitat Importance Map for a rare or threatened species; or
- Intersects the 'top ranking' modelled habitat for a rare or threatened species with dispersed habitat, as identified in its Top Ranking Habitat Importance Map.

Top Ranking Maps consist of the 2,000 hectares of habitat with the highest Habitat Importance Scores for each dispersed species.

The 'Habitat impacted' column identifies whether the Habitat Importance Map or its Top Ranking Map was used to determine the proportional impact for a species with dispersed habitat.

# **Appendix 3: Images of mapped native vegetation**

# 1. Property in context

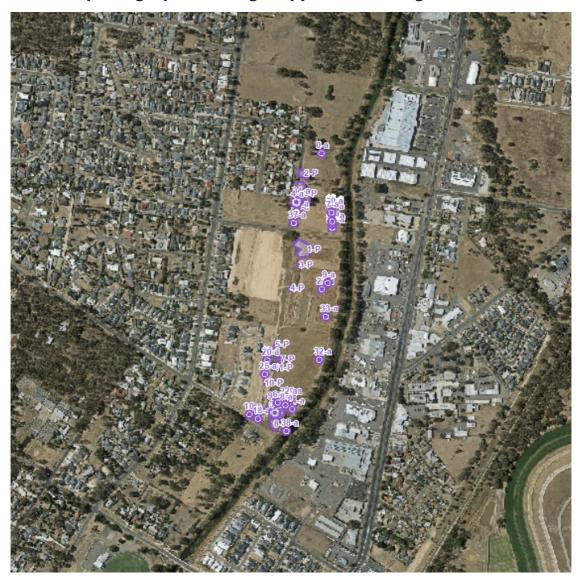


- Proposed Removal
- Past Removal
- Partial Removal
- Property Boundaries



300 m

## 2. Aerial photograph showing mapped native vegetation



- Proposed Removal
- Past Removal
- Partial Removal

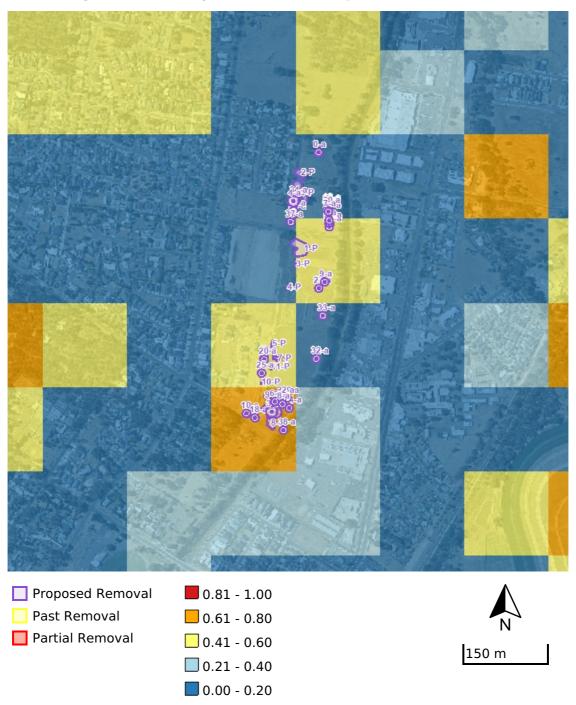


150 m

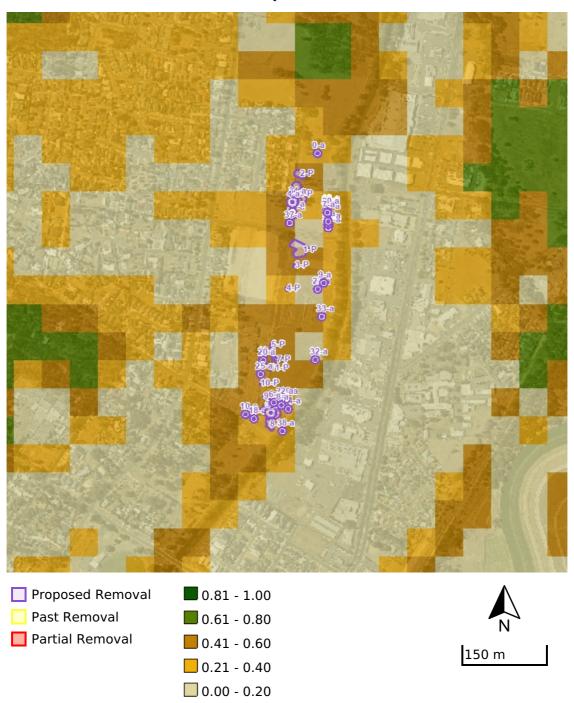
# 3. Location Risk Map



## 4. Strategic Biodiversity Value Score Map



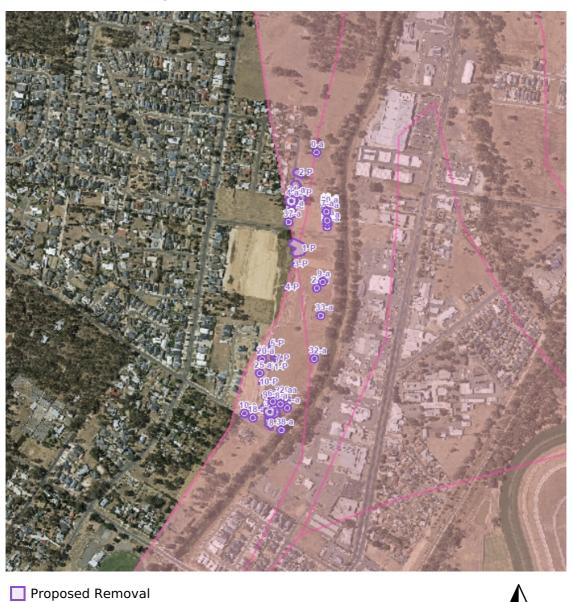
# 5. Modelled Condition Score Map



## **6. Modelled Endangered EVCs**

Past Removal
Partial Removal

■ Endangered 1750 Ecological Vegetation Classes



Page 19

150 m

### 7. Habitat Importance maps

Not Applicable

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This report lists native vegetation credits available to purchase through the Native Vegetation Credit Register.

This report is **not evidence** that an offset has been secured. An offset is only secured when the units have been purchased and allocated to a permit or other approval and an allocated credit extract is provided by the Native Vegetation Credit Register.

Date and time: 14/10/2024 12:19 Report ID: 26805

### What was searched for?

### General offset

General habitat units	Strategic biodiversity value	Large trees	Vicinity (	Catchment Management Authority or Municipal district)
0.295	0.3712	8	СМА	North Central
			or LGA	Greater Bendigo City

## Details of available native vegetation credits on 14 October 2024 12:19

### These sites meet your requirements for general offsets.

Credit Site ID	GHU	LT	СМА	LGA	Land owner	Trader	Fixed price	Broker(s)
BBA-3031	2.766	92	North Central	Pyrenees Shire	Yes	Yes	No	VegLink
BBA-3052_01	6.917	167	North Central	Northern Grampians Shire	Yes	Yes	No	VegLink
TFN-C1702	16.952	16	North Central	Gannawarra Shire	Yes	Yes	No	TFN
VC_CFL- 3056_01	7.677	108	North Central	Loddon Shire	Yes	Yes	No	VegLink
VC_CFL- 3071_01	2.164	105	North Central	Loddon Shire	Yes	Yes	No	VegLink
VC_CFL- 3076_01	8.071	46	North Central	Pyrenees Shire	Yes	Yes	No	Bio Offsets
VC_CFL- 3773_01	1.305	552	North Central	Macedon Ranges Shire	Yes	Yes	No	VegLink
VC_CLO- 2451_01	2.519	15	North Central	Greater Bendigo City	No	Yes	No	Ethos
VC_TFN- 09554_01	13.396	383	North Central	Macedon Ranges Shire	Yes	Yes	No	Bio Offsets

These sites meet your requirements using alternative arrangements for general offsets.

Credit Site ID	GHU	LT	СМА	LGA	Land	Trader	Fixed	Broker(s)
					owner		price	

There are no sites listed in the Native Vegetation Credit Register that meet your offset requirements when applying the alternative arrangements as listed in section 11.2 of the Guidelines for the removal, destruction or lopping of native vegetation.

# These potential sites are not yet available, land owners may finalise them once a buyer is confirmed.

Credit Site ID	GHU	LT	СМА	LGA	Land owner	Trader	Fixed price	Broker(s)
VC_CFL- 3701_01	10.574	18	Goulburn Broken, North Central	Greater Bendigo City	Yes	Yes	No	Bio Offsets
VC_CFL- 3742_01	12.301	410	North Central	Loddon Shire	Yes	Yes	No	VegLink

LT - Large Trees

CMA - Catchment Management Authority

LGA - Municipal District or Local Government Authority

### **Next steps**

### If applying for approval to remove native vegetation

Attach this report to an application to remove native vegetation as evidence that your offset requirement is currently available.

### If you have approval to remove native vegetation

Below are the contact details for all brokers. Contact the broker(s) listed for the credit site(s) that meet your offset requirements. These are shown in the above tables. If more than one broker or site is listed, you should get more than one quote before deciding which offset to secure.

### **Broker contact details**

Broker Abbreviation	Broker Name	Phone	Email	Website
Abezco	Abzeco Pty. Ltd.	(03) 9431 5444	offsets@abzeco.com.au	www.abzeco.com.au
Baw Baw SC	Baw Baw Shire Council	(03) 5624 2411	bawbaw@bawbawshire.vic.gov.au	www.bawbawshire.vic.gov.au
Bio Offsets	Biodiversity Offsets Victoria	0452 161 013	info@offsetsvictoria.com.au	www.offsetsvictoria.com.au
Contact NVOR	Native Vegetation Offset Register	136 186	nativevegetation.offsetregister@d eeca.vic.gov.au	www.environment.vic.gov.au/nativ e-vegetation
Ecocentric	Ecocentric Environmental Consulting	0410 564 139	ecocentric@me.com	Not avaliable
Ethos	Ethos NRM Pty Ltd	(03) 5153 0037	offsets@ethosnrm.com.au	www.ethosnrm.com.au
Nillumbik SC	Nillumbik Shire Council	(03) 9433 3316	offsets@nillumbik.vic.gov.au	www.nillumbik.vic.gov.au
TFN	Trust for Nature	8631 5888	offsets@tfn.org.au	www.trustfornature.org.au
VegLink	Vegetation Link Pty Ltd	(03) 8578 4250 or 1300 834 546	offsets@vegetationlink.com.au	www.vegetationlink.com.au
Yarra Ranges SC	Yarra Ranges Shire Council	1300 368 333	biodiversityoffsets@yarraranges.vi c.gov.au	www.yarraranges.vic.gov.au

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For more information contact the DEECA Customer Service Centre 136 186 or the Native Vegetation Credit Register at nativevegetation.offsetregister@delwp.vic.gov.au

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Obtaining this publication does not guarantee that the credits shown will be available in the Native Vegetation Credit Register either now or at a later time when a purchase of native vegetation credits is planned.

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