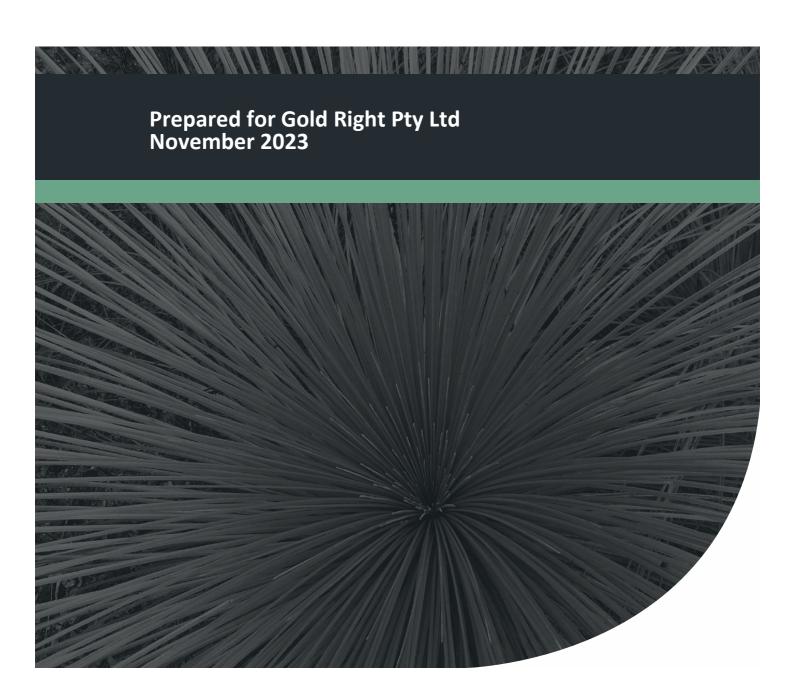


Bushfire Attack Level Assessment

Stage 5A Vista Estate, Karnup

Project No: EP13-035(30)





Document Control

Doc name:	Bushfire Attack Level Assessment Stage 5A Vista Estate, Karnup					
Doc no.:	EP13-035(30)080 PPS					
Version	Date	Author	Author Reviewer			
	N 2022	Daniel Calcula	DDC	Kirsten Knox	KK	
1	November 2023	Pascal Scholz	PPS	Anthony Rowe	AJR	
	Report issued to client.					

Disclaimer:

This document has been prepared in good faith and is derived from sources believed to be reliable and accurate at the time of publication. Nevertheless, this publication is distributed on the terms and understanding that the author is not responsible for the results of any actions taken based on information in this publication or for any error in or omission from this publication.

The content of this document has been prepared primarily to consider the layout of the development or the appropriate building construction standard, where relevant. The measures outlined are considered to be prudent minimum standards only based on the relevant experience of the author and the standards prescribed by the relevant authorities. The level of implementation of the fire precautions achieved will depend upon the actions of the landowner or occupiers of the land and is not the responsibility of the author. The relevant local government and fire authority (i.e. Department of Fire and Emergency Services or local bushfire brigade) should be approached for guidance on preparing for and responding to a bushfire.

Notwithstanding the precautions adopted in this report, it should always be remembered that bushfires burn under a wide range of conditions. An element of risk, no matter how small always remains. The objective of the Australian Standard AS 3959-2018 is to "prescribe particular construction details for buildings to reduce the risk of ignition from a bushfire while the front passes" (Standards Australia 2018). Building to the standards outlined in AS 3959 does not guarantee a building will survive a bushfire or that lives will not be lost.

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Appendix A

BAL Assessment Certificate

Project number: EP13-035(30) | November 2023



List of Abbreviations

Table A1: Abbreviations – General terms

General terms	General terms				
AHD	Australian Height Datum				
APZ	Asset Protection Zone				
AS 3959	Australian Standard 3959-2018 Construction of buildings in bushfire prone areas				
BAL	Bushfire Attack Level				
ВМР	Bushfire Management Plan				
BPAD	Bushfire Planning and Design				
FDI	Fire Danger Index				
FZ	Flame Zone				

Table A2: Abbreviations – Organisations

Organisations	
DFES	Department of Fire and Emergency Services
OBRM	Office of Bushfire Risk Management
WAPC	Western Australian Planning Commission



1 Introduction

1.1 Background

This Bushfire Attack Level (BAL) Assessment has been prepared on behalf of Gold Right Pty Ltd (the proponent) to support the construction of dwellings (Class 1 buildings) within Stage 5A of the Vista Estate, Karnup (herein referred to as 'the site'). The site includes the development of 34 residential lots as shown, on **Figure 1**.

The site is located approximately 56 km south of the Perth Central Business District within the City of Rockingham and is shown in **Figure 1**. The site is bounded by residential development to the west and south (previous Karnup Estate development stages), Lot 3 Mandurah Road comprising native vegetation to the north, cleared land for future development stages (under the control of the proponent) and the Perth to Mandurah Railway Line to the east.

The site is partially identified as a 'bushfire prone area' under the state-wide *Map of Bush Fire Prone Areas* as prepared by the Office of Bushfire Risk Management (OBRM 2022), as shown in **Plate 1** below. Where a Class 1, Class 2, Class 3 or Class 10a building is proposed to be located in an area identified as 'bushfire prone area', a Bushfire Attack Level (BAL) assessment in accordance with *Australian Standard AS 3959 – 2018 Construction of buildings in bushfire prone areas* (Standards Australia 2018) (AS 3959) is required to support the relevant building permit application to determine any related construction requirements.

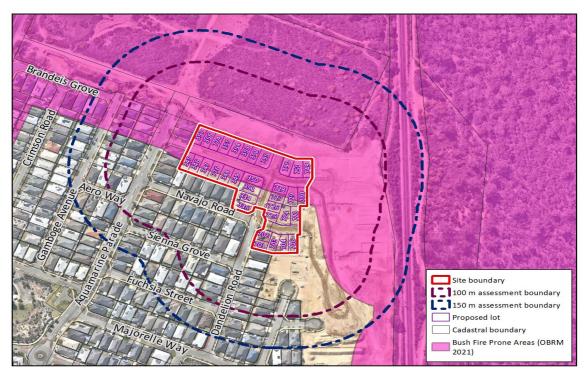


Plate 1: Areas within and surrounding the site identified as a 'bushfire prone area' (as indicated in purple) under the state-wide Map of Bush Fire Prone Areas (OBRM 2021).



1.2 Aim of this report

This BAL assessment aims to assess classified vegetation and effective slope in accordance with Method 1 of AS 3959 in order to determine the applicable BAL ratings for future habitable buildings within the site. It is based on identifying the lot as the 'building', given the specific building location within the lot is unknown. Distances are detailed within the BAL assessment where a different BAL rating could be achieved depending upon the final building location.

The outcomes of this assessment can be used to support the building permit application process.

1.3 Statutory policy and framework

The following key legislation, policies and guidelines are relevant to the preparation of a BAL assessment:

- Planning and Development Act 2005 and Planning and Development (Local Planning Scheme Amendment) Regulations 2015
- State Planning Policy 3.7 Planning in Bushfire Prone Areas (SPP 3.7) (WAPC 2015)
- Guidelines for Planning in Bushfire Prone Areas version 1.4 (the Guidelines) (WAPC and DFES 2021)
- Australian Standard AS 3959 2018 Construction of buildings in bushfire prone areas (AS 3959) (Standards Australia 2018).



2 BAL Assessment

A Method 1 BAL assessment has been completed for the site in accordance with AS 3959. This assessment considers the vegetation classification and effective slope for the site and surrounding 150 m to determine the applicable BAL ratings.

AS 3959 specifies requirements for the construction of buildings in bushfire-prone areas in order to improve their resistance to bushfire attack from embers, burning debris, radiant heat, flame contact, and combinations of these attack forms. It provides six BAL ratings: BAL-LOW, BAL-12.5, BAL-19, BAL-29, BAL-40 and BAL-FZ, based on the radiant heat flux thresholds from vegetation within 100 m of a building. Each BAL rating is associated with specific national construction requirements, which have been summarised in **Table 1** below.

It is relevant to note that while buildings constructed to increased standards under AS 3959 are more likely to survive a bushfire than buildings that do not conform to these construction standards, building survival is not guaranteed.

Table 1: Summary of BAL ratings, heat flux thresholds and associated construction standards, as outlined within AS 3959

Bushfire Attack Level (BAL)	Classified vegetation within 100 m of the subject building and heat flux exposure thresholds	Description of the predicted bushfire attack and levels of exposure	Construction section (within AS 3959)
BAL-LOW	See Section 2.2.3.2 of AS 3959	There is insufficient risk to warrant specific construction requirements	4
BAL-12.5	≤ 12.5 kW/m ²	Ember attack	3 & 5
BAL-19	> 12.5 kW/m² to ≤ 19 kW/m²	Increasing levels of ember attack and burning debris ignited by windborne embers blown together with increasing heat flux	3 & 6
BAL-29	> 19 kW/m² to ≤ 29 kW/m²	Increasing levels of ember attack and burning debris ignited by windborne embers blown together with increasing heat flux	3 & 7
BAL-40	> 29 kW/m² to ≤ 40 kW/m²	Increasing levels of ember attack and burning debris ignited by windborne embers blown together with the increased likelihood of exposure to flame	3 & 8
BAL-FZ	> 40 kW/m ²	Direct exposure to flames from fire front in addition to heat flux and ember attack	3 & 9

Not all vegetation is a classified bushfire risk. Vegetation and ground surfaces that are exempt from classification as a potential hazard are identified as a low threat under Section 2.2.3.2 of AS 3959.



2.1 Assessment inputs

The classification of vegetation within the site and the surrounding 100 m has been undertaken in accordance with AS 3959. The assignment of vegetation classifications is based on Section 2.2.3 and Table 2.3 of AS 3959 and generally considers the various fuel layers of different vegetation types. For example, fuel layers in a typical forest environment can be broken down into five segments as illustrated in **Plate 2** below.

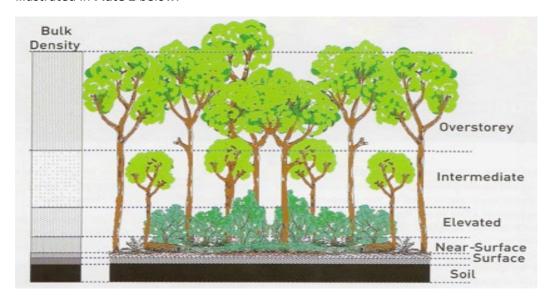


Plate 2: The fuel layers in a forest environment that could be associated with fire behaviour (Gould et al. 2007)

An assessment of existing vegetation within the site and surrounding 150 m was undertaken on 22 September 2023 in accordance with AS 3959. **Table 2** below outlines the determined vegetation classifications and associated effective slope and, where relevant, outlines the existing management practices that have informed the vegetation classification. The plots referenced in **Table 2** are also shown in **Figure 2**.

Vegetation has been cleared within the entirety of the site and the site's immediate vicinity to the north and east to enable future staged development. These areas currently comprising bare areas (mineral sand) and are under the control of the proponent. Native vegetation remains within 100 m of the site to the north within Lot 3 Mandurah Road.



2.1.1 **Vegetation Classification**

Each distinguishable vegetation plot with the potential to determine the BAL is identified in Table 2 and shown in Figure 2.

Table 2: AS3959 Vegetation Classification (refer to Figure 2)

Plot:

Photo ID: 1

Vegetation classification or exclusion clause and effective slope

Class C - Shrubland (Flat/Upslope)

Description / Justification for Classification

Shrubland (Class C) vegetation was identified to the north of the site within the western portion of Lot 3 Mandurah Road. This vegetation is dominated by coastal shrubs generally between 1 m and 2 m in height with a greater than 30% foliage cover and dense understorey comprising a closed continuous fuel profile. This vegetation is assumed to remain postdevelopment of the site.



Plot:

2

Photo ID:

2

Vegetation classification or exclusion clause and effective slope

Class D - Scrub (Downslope 5 - 10°)

Description / Justification for Classification

Scrub (Class D) vegetation was identified to the north of the site within the eastern portion of Lot 3 Mandurah Road, adjacent to the Perth to Mandurah railway. This vegetation is dominated by shrubs generally between 3 m and 4 m in height with a greater than 30% foliage cover and dense understorey comprising a closed continuous fuel profile. This vegetation is assumed to remain post-development of the site.



Bushfire Attack Level Assessment

Stage 5A Vista Estate, Karnup



Table 2: AS3959 Vegetation Classification (refer to Figure 2)(continued)

3

Plot:

4

Photo ID:

Vegetation classification or exclusion clause and effective slope

Exclusion clause 2.2.3.2(e) (Non-vegetated)

Description / Justification for Classification

Non-vegetated areas for future residential development across the site have been excluded in accordance with clause 2.2.3.2(e) of AS 3959. This area will be maintained by the proponent until the lots are sold and after that will be maintained by the lot owners.



Plot:

4

Photo ID:

4

Vegetation classification or exclusion clause and effective slope

Exclusion clause 2.2.3.2(e) (Non-vegetated)

Description / Justification for Classification

Non-vegetated areas for future residential development across the site and adjacent Stage 5C (east of the site) have been excluded in accordance with clause 2.2.3.2(e) of AS 3959. This area will be maintained by the proponent until the lots are sold and after that will be maintained by the lot owners.



Plot

4

Photo ID:

5

Vegetation classification or exclusion clause and effective slope

Exclusion clause 2.2.3.2(e) (Non-vegetated)

Description / Justification for Classification

Roads currently under construction within the site (extension of Dandelion Road) have been excluded in accordance with clause 2.2.3.2(e) of AS 3959 as nonvegetated. These areas will remain low threat in accordance with Section 2.2.3.2 of AS 3959 as development is finalised and housing construction commences within the site.



Bushfire Attack Level Assessment

Stage 5A Vista Estate, Karnup



Table 2: AS3959 Vegetation Classification (refer to Figure 2) (continued)

6

Plot:

Photo ID:

Vegetation classification or exclusion clause and effective slope

Exclusion clause 2.2.3.2(e) (Non-vegetated)

Description / Justification for Classification

Roads currently under construction within the site (extension of Citrine Way) have been excluded in accordance with clause 2.2.3.2(e) of AS 3959 as non-vegetated. These areas will remain low threat in accordance with Section 2.2.3.2 of AS 3959 as development is finalised and housing construction commences within the site.



Plot:

Photo ID:

Vegetation classification or exclusion clause and effective slope

Exclusion clause 2.2.3.2(e) (Non-vegetated)

Description / Justification for Classification

View across the site and Stage 5C and 5B (background) comprising non-vegetated areas for future residential development have been excluded in accordance with clause 2.2.3.2(e) of AS 3959. This area will be maintained by the proponent until the lots are sold and after that will be maintained by the lot owners.



Plot:

4

Photo ID:

8

Vegetation classification or exclusion clause and effective slope

Exclusion clause 2.2.3.2(e) (Non-vegetated)

Description / Justification for

Areas cleared of vegetation to the north-west of the site have been excluded in accordance with clause 2.2.3.2(e) of AS 3959. This area is being maintained by the proponent until future subdivision development is progressed (Stage 5D).

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Table 2: AS3959 Vegetation Classification (refer to Figure 2) (continued)



2.1.2 Assumptions

The BAL assessment includes the following assumptions:

- Designated FDI: 80
- Flame temperature: 1090 K
- Vegetation classification: as per Table 2 and Figure 2), Class C Shrubland, Class D Scrub.
- Effective slope beneath classified vegetation: Flat/Upslope, Downslope 0-5°, Downslope 5-10° (see Table 2 and Figure 2)

In addition to the above, the following key assumptions have informed this assessment:

- Existing classified shrubland (Class C) and scrub (Class D) vegetation within 100 m of the site identified external to the north of the site (within Lot 3 Mandurah Road) and outside of the proponent's landholdings is assumed to remain the same post-development of the site.
- Areas of low threat vegetation or non-vegetated areas identified within 100 m of titled lots
 where the land is under the control of the proponent will continue to be maintained in
 accordance with the existing maintenance regimes and will achieve low threat based on Section
 2.2.3.2 of AS 3959, until future staged development is progressed. This excludes areas within
 100 m of the site within Lot 3 to the north, as this lot is not under the ownership of the
 proponent.
- The site will be maintained in accordance with the City of Rockingham Fire Control Notice. Whilst the proponent owns subdivided lots and the balance of the development site, maintenance responsibility will remain with the proponent. Once subdivided lots are sold this requirement will then be with the new landowner.



2.2 Assessment outputs

Based on the outcomes of the BAL assessment (shown in Figure 3):

- 21 lots are exposed to BAL-12.5
- 13 lots are exposed to BAL-LOW.

The BAL ratings for each lot are shown on Figure 4.

2.3 Construction of buildings and ongoing management

2.3.1 Construction of buildings

A BAL certificate detailing the BAL ratings for each lot have been provided in **Appendix A**. This includes a summary certificate and individual lot certificates. Either can be used to support the building licence process.

Only those buildings in a designated bushfire prone area (see **Plate 1**, or as updated by OBRM) are required to be constructed in accordance with AS 3959 and the determined BAL rating.

2.3.2 Ongoing management

All lot owners will be responsible for their own property and ensuring these are maintained to a low threat standard in accordance with Clause 2.2.3.2 (e) or (f) of AS 3959, as per the requirements of the City of Rockingham Fire Control Notice (as published). Advice on maintaining their property to a low threat standard can be provided by the City of Rockingham.



3 Certification by Bushfire Consultant

3.1 Accreditation

This BAL assessment has been prepared by Emerge Associates who been providing bushfire risk management advice for more than 10 years, undertaking detailed bushfire assessments (and associated approvals) to support the land use development industry. Emerge Associates have a number of team members who have undertaken Bushfire Planning and Design (BPAD) Level 1 and Level 2 training and are Fire Protection Association of Australia (FPAA) accredited practitioners (or are progressing).

Anthony Rowe is a FPAA Level 3 BPAD accredited practitioner (BPAD No. 36690) in accordance with clause 6.12 of the Guidelines.

3.2 Declaration

I declare that the information provided is true and correct to the best of my knowledge.

Signature:

Name: Anthony Rowe

Company: Envision Bushfire Protection/Emerge Associates

Date:

BPAD Accreditation: Level 3 BPAD no. 36690



4 References

4.1 General references

Standards Australia 2018, *AS 3959:2018 Construction of buildings in bushfire-prone areas,* Sydney.

Western Australian Planning Commission (WAPC) 2015, State Planning Policy 3.7 Planning in Bushfire Prone Areas, Perth.

Western Australian Planning Commission and Department of Fire and Emergency Services (WAPC and DFES) 2021, *Guidelines for Planning in Bushfire Prone Areas Version 1.4*, Western Australian Planning Commission, Western Australia.

4.2 Online references

Department of Water 2008, *LIDAR derived 1 m elevation contours* dataset, Government of Western Australia.

Office of Bushfire Risk Management (OBRM) 2022, Map of Bush Fire Prone Areas, viewed October 2023, https://maps.slip.wa.gov.au/landgate/bushfireprone/



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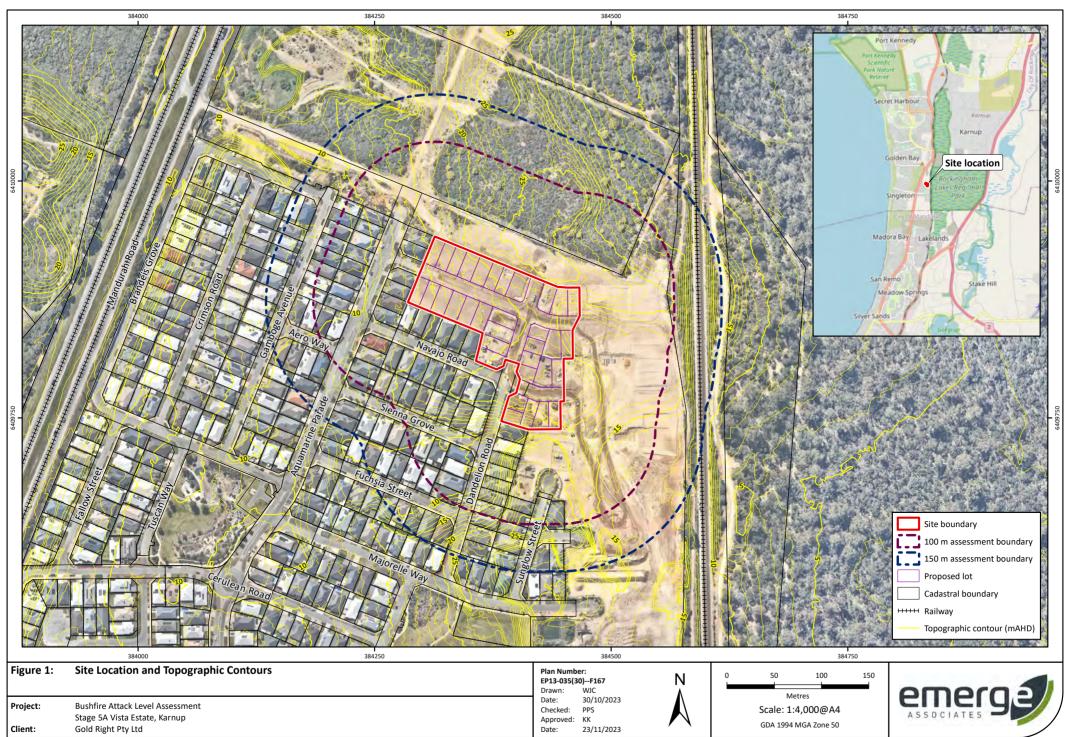
Figures

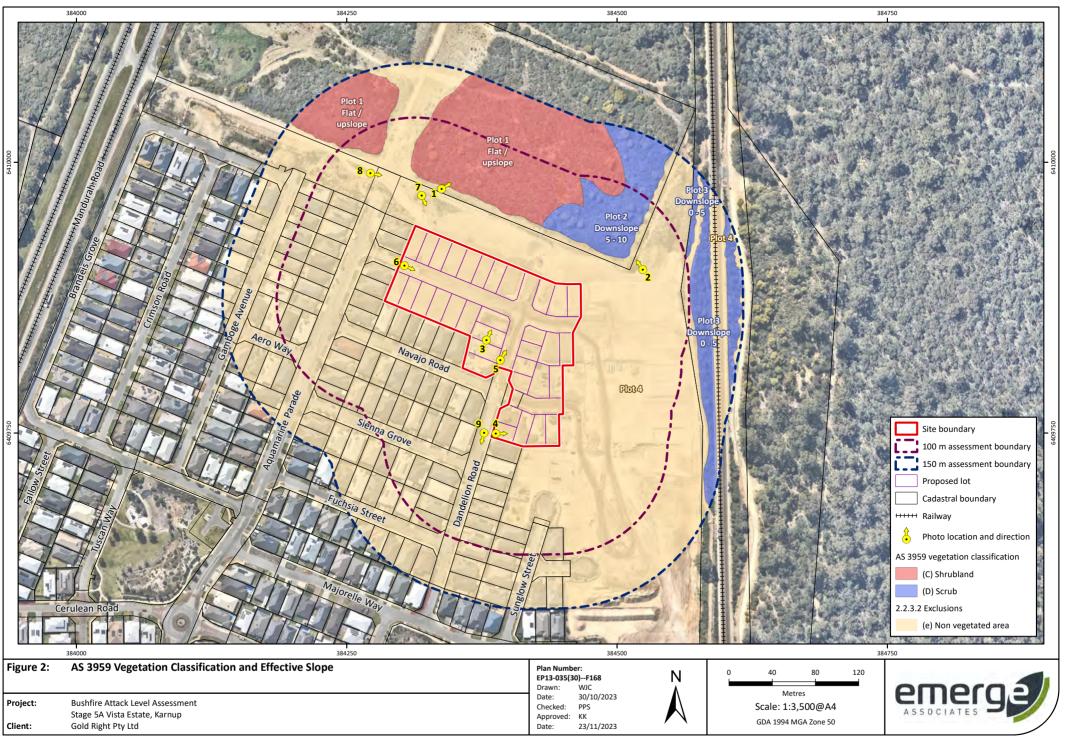
Figure 1: Site Location and Topographic Contours

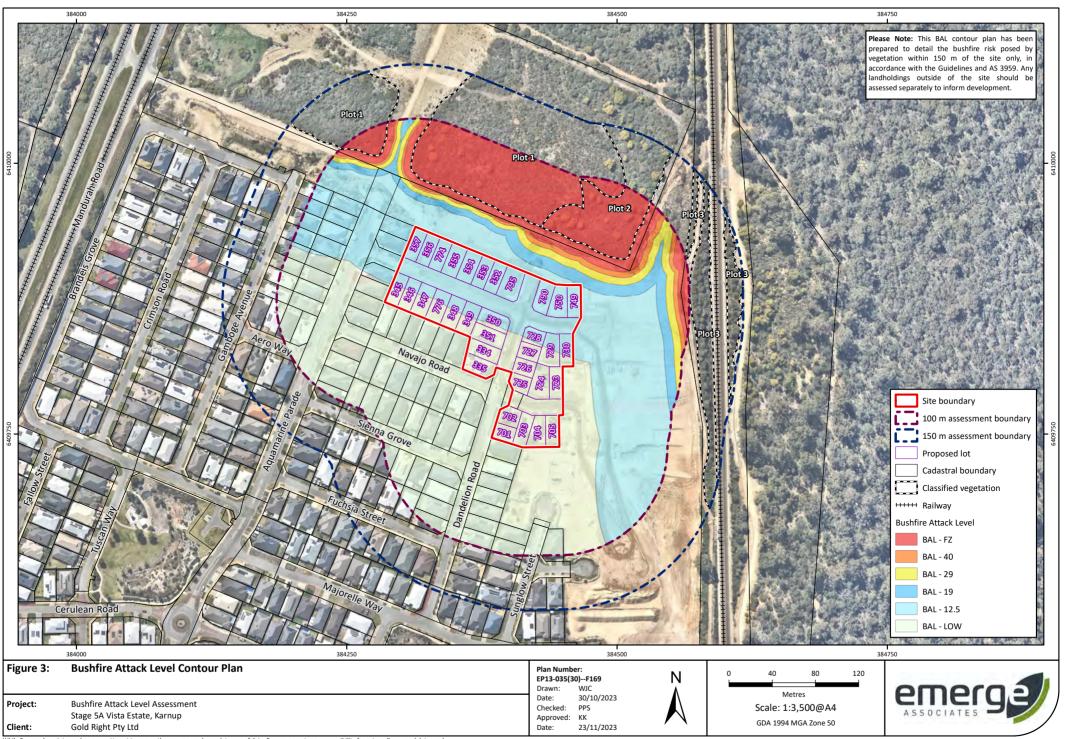
Figure 2: AS 3959 Vegetation Classification and Effective Slope

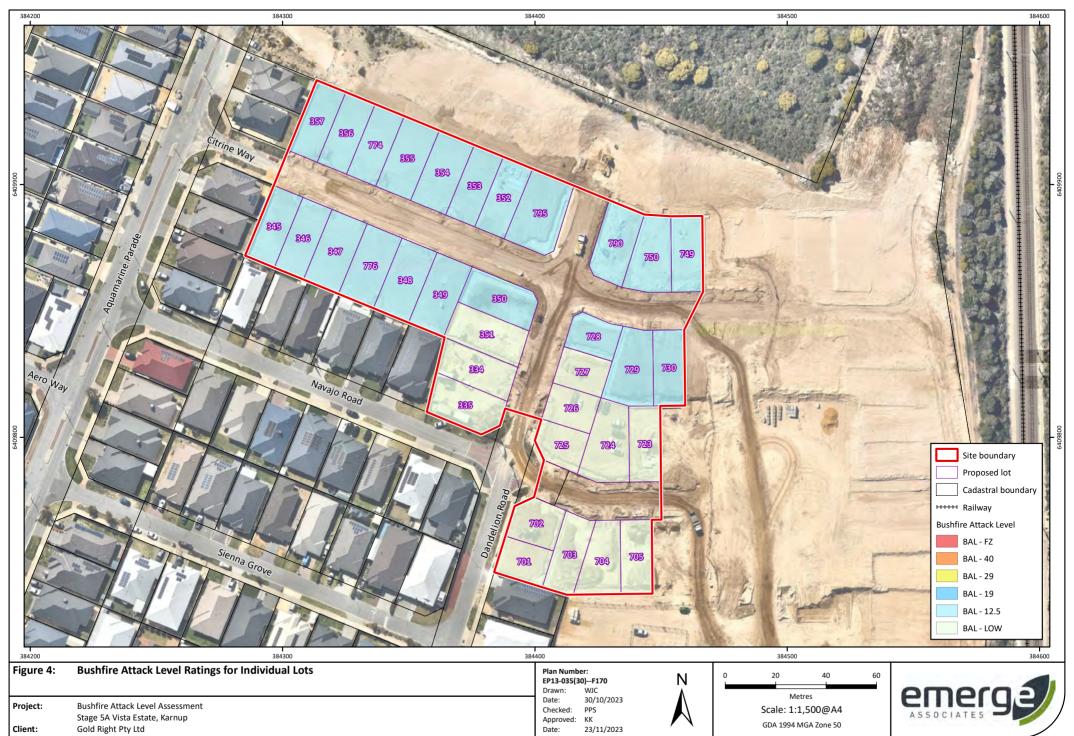
Figure 3: Bushfire Attack Level Contour Plan

Figure 4: Bushfire Attack Level Ratings for Individual Lots









Appendix A

BAL Assessment Certificate



BUSHFIRE ATTACK LEVEL (BAL) CERTIFICATE

Determined in accordance with Australian Standard (AS) 3959-2018 Construction of buildings in bushfire prone areas

Site details							
Address Stage 5A Vista Estate Karnup Lots 334 -335, 345 – 357, 701 – 705, 723 – 730, 749 – 750, 774 790 and 795 (deposited plan 424541)							
Suburb	Karnup	State	WA				
Local government area City of Rockingham							
Date of assessment	22 September 2023	Date of report	24 November 2023				
Project no.	EP13-035(30)	Document no.	EP13-035(30)079 PPS				

Determination of highest Bushfire Attack Level (BAL)					
Lot number	Classified vegetation and plot number	Distance of lot boundary from vegetation	Effective slope	Building BAL rating (see Figure 4)	Exceptions/notes for building BAL rating
334	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil
335	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil
345	Plot 1 – Shrubland	87.5 m	Flat/Upslope	BAL-12.5	N/A
346	Plot 1 – Shrubland	88.5 m	Flat/Upslope	BAL-12.5	N/A
347	Plot 1 – Shrubland	89 m	Flat/Upslope	BAL-12.5	N/A
348	Plot 1 – Shrubland	87 m	Flat/Upslope	BAL-12.5	N/A
349	Plot 1 – Shrubland	87 m	Flat/Upslope	BAL-12.5	N/A
350	Plot 1 – Shrubland	88 m	Flat/Upslope	BAL-12.5	N/A
351	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil
352	Plot 1 – Shrubland	42.5 m	Flat/Upslope	BAL-12.5	N/A
353	Plot 1 – Shrubland	42 m	Flat/Upslope	BAL-12.5	N/A
354	Plot 1 – Shrubland	42 m	Flat/Upslope	BAL-12.5	N/A
355	Plot 1 – Shrubland	44.5 m	Flat/Upslope	BAL-12.5	N/A
356	Plot 1 – Shrubland	44 m	Flat/Upslope	BAL-12.5	N/A
357	Plot 1 – Shrubland	42.5 m	Flat/Upslope	BAL-12.5	N/A
701	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil
702	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil
703	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil



Determination of highest Bushfire Attack Level (BAL)						
Lot number	Classified vegetation and plot number	Distance of lot boundary from vegetation	Effective slope	Building BAL rating (see Figure 4)	Exceptions/notes for building BAL rating	
704	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil	
705	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil	
723	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil	
724	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil	
725	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil	
726	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil	
727	No classified vegetation identified within 100 m.	>100 m	Not applicable	BAL - LOW	Nil	
728	Plot 2 – Scrub	88 m	Downslope 5-10	BAL-12.5	N/A	
729	Plot 2 – Scrub	83.5 m	Downslope 5-10	BAL-12.5	N/A	
730	Plot 2 – Scrub	78.5 m	Downslope 5-10	BAL-12.5	N/A	
749	Plot 2 – Scrub	35 m	Downslope 5-10	BAL-12.5	N/A	
750	Plot 2 – Scrub	40.5 m	Downslope 5-10	BAL-12.5	N/A	
774	Plot 1 – Shrubland	44 m	Flat/Upslope	BAL-12.5	N/A	
776	Plot 1 – Shrubland	88 m	Flat/Upslope	BAL-12.5	N/A	
790	Plot 2 – Scrub	43.5 m	Downslope 5-10	BAL-12.5	N/A	
795	Plot 2 – Scrub	44 m	Downslope 5-10	BAL-12.5	N/A	

Section 3.5 of AS3959 would not be applicable as all lots achieve BAL-12.5 or BAL-LOW and shielding is only applicable where a BAL rating is greater than BAL-12.5.

Accreditation details

I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of the National Construction Code and AS 3959-2018.

Signature:	Allen
Certificate date:	24 November 2023



Individual BAL certificates





Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works								
Address Details	Unit no	Street no	Lot no	Street name / Deposited Plan				
	Suburb Karnup			State WA	Postcode 6176			
Local government area	City of Rockingham							
Main BCA class of the building	N/A		Jse(s) of the ouilding	N/A				
Description of the building or works	Single lot	·						

Determination of Highest Bushfire Attack Level						
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL		
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW		

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no	Street no Lot no			Street name / Plan Reference Deposited Plan Ref 424541	
	Suburb Karnup			State WA	Postcode 6176	
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A Use(s) of the building			N/A		
Description of the building or works	Single lot					

Determination of Highest Bushfire Attack Level						
AS 3959 Assessment Vegetation Effective Separation BAL Classification Slope Distance						
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW		

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no	sit no Street no Lot no 345			Street name / Plan Reference Deposited Plan Ref 424541	
	Suburb Karnup				State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A Use(s) of the building			:	N/A	
Description of the building or works	Single lot					

Determination of Highest Bushfire Attack Level						
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL		
Method 1	Class C Shrubland	Flat/Upslope	87.5 m	BAL – 12.5		

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no Street no Lot no 346			Street name / Plan Reference Deposited Plan Ref 424541		
	Suburb Karnup			State WA	Postcode 6176	
Local government area	City of Rockingham					
Main BCA class of the building	N/A Use(s) of the building			N/A		
Description of the building or works	Single lot					

Determination of Highest Bushfire Attack Level						
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL		
Method 1	Class C Shrubland	Flat/Upslope	88.5 m	BAL – 12.5		

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no	no Street no Lot no 347			Street name / Plan Reference Deposited Plan Ref 424541	
	Suburb Karnup			State WA	Postcode 6176	
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A Use(s) of the building			e	N/A	
Description of the building or works	Single lot					

Determination of Highest Bushfire Attack Level				
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	Class C Shrubland	Flat/Upslope	89 m	BAL – 12.5

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no	Street no	Lot no 348	Street name / Deposited Plan	Plan Reference n Ref 424541	
	Suburb Karnup			State WA	Postcode 6176	
Local government area	City of Rockingham					
Main BCA class of the building	I NI/A		Use(s) of the building	N/A	N/A	
Description of the building or works	Single lot					

Determination of Highest Bushfire Attack Level				
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	Class C Shrubland	Flat/Upslope	87 m	BAL – 12.5

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no	Street no	Lot 349	no	Street name / Plan Reference Deposited Plan Ref 424541	
	Suburb Karnup			State WA	Postcode 6176	
Local government area	City of Rockingham					
Main BCA class of the building	N/A		Use(s) of to	he	N/A	
Description of the building or works	Single lot					

Determination of Highest Bushfire Attack Level				
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	Class C Shrubland	Flat/Upslope	87 m	BAL – 12.5

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no Street		Lot no 350	10	Street name / Plan R Deposited Plan Ref 42	
	Suburb Karnup				State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A Use(s) building		• •	e	N/A	
Description of the building or works	Single lot					

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	Class C Shrubland	Flat/Upslope	88 m	BAL – 12.5	

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
2010	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works							
Address Details	Unit no Street no		10	Lot 351	no	Street name / Plan Re Deposited Plan Ref 42	
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A	N/A Use(s) of the building		N/A			
Description of the building or works	Single lot						

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW	

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

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Property Details and Description of Works							
Address Details			Lot 352	no	Street name / Plan Reference Deposited Plan Ref 424541		
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A Use(s) of the building		the	N/A			
Description of the building or works	Single lot						

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	Class C Shrubland	Flat/Upslope	42.5 m	BAL – 12.5	

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no Street		Lot 353	no	Street name / P Deposited Plan R	
	Suburb Karnup					Postcode 6176
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A		Use(s) of building	the	N/A	
Description of the building or works	Single lot					

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	Class C Shrubland	Flat/Upslope	42 m	BAL – 12.5	

BPAD Accredited Practitioner Details					
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire				
Company Details Envision Bushfire Protection/ Emerge Associates	practitioner. Signature:				
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner				
	Date: 24/11/2023				



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no Street no Lot no 354		no	Street name / Plan Reference Deposited Plan Ref 424541		
	Suburb Karnup				State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A Use(s) of the building			the	N/A	
Description of the building or works	Single lot					

Determination of Highest	Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	Class C Shrubland	Flat/Upslope	42 m	BAL – 12.5

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no Street no Lot no 355		Street name / Plan Ro Deposited Plan Ref 42			
	Suburb Karnup				State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A Use(s) of the building			е	N/A	
Description of the building or works	Single lot					

Determination of Highes	t Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	Class C Shrubland	Flat/Upslope	44.5 m	BAL – 12.5

BPAD Accredited Practitioner Details						
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire					
Company Details Envision Bushfire Protection/ Emerge Associates	practitioner. Signature:					
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner					
	Date: 24/11/2023					



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no Street no Lot no 356		no	Street name / Plan Reference Deposited Plan Ref 424541		
	Suburb Karnup				State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A Use(s) of the building			the	N/A	
Description of the building or works	Single lot					

Determination of Highes	t Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	Class C Shrubland	Flat/Upslope	44 m	BAL – 12.5

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no Street no Lot no 357		10	Street name / Plan Reference Deposited Plan Ref 424541		
	Suburb Karnup				State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A Use(s) of the building			ne	N/A	
Description of the building or works	Single lot					

Determination of Highest	t Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	Class C Shrubland	Flat/Upslope	42.5 m	BAL – 12.5

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

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This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works							
Address Details	Unit no	Street n	10	Lot r 701	10	Street name / Plan Ro Deposited Plan Ref 42	
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A Use(s) of the building			ne	N/A		
Description of the building or works	Single lot						

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW	

I hereby declare that I am a BPAD accredited bushfire
practitioner. Signature:
Bushfire Planning & Design Accredited Practitioner



Bushfire Attack Level (BAL) Certificate

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Property Details and Description of Works						
Address Details	Unit no	Street no	Lot 702	no	Street name / Plan F Deposited Plan Ref 4.	
	Suburb Karnup				State WA	Postcode 6176
Local government area	City of Rocl	City of Rockingham				
Main BCA class of the building	N/A Use(s) of building			the	N/A	
Description of the building or works	Single lot					

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW	

BPAD Accredited Practitioner Details	BPAD Accredited Practitioner Details				
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.				
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:				
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959 2018	Bushfire Planning & Design Accredited Practitioner				
	Date: 24/11/2023				



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

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Property Details and Description of Works							
Address Details	Unit no	Street n	10	Lot 703	no	Street name / Plan Deposited Plan Ref 4	
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A Use(s) of the building			the	N/A		
Description of the building or works	Single lot						

Determination of Highes	t Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW

BPAD Accredited Practitioner Details				
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.			
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:			
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner			
	Date: 24/11/2023			



Bushfire Attack Level (BAL) Certificate

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Property Details and Description of Works							
Address Details	Unit no	Street n	10	Lot 704	no	Street name / Plan Deposited Plan Ref 4	
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A Use(s) of the building			the	N/A		
Description of the building or works	Single lot						

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW	

BPAD Accredited Practitioner Details				
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.			
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:			
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner			
	Date: 24/11/2023			



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no Street no Lot no 705				Street name / Plan Reference Deposited Plan Ref 424541	
	Suburb Karnup		•		State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A Use(s) or building			e	N/A	
Description of the building or works	Single lot					

Determination of Highes	t Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW

BPAD Accredited Practitioner Details				
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.			
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:			
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner			
	Date: 24/11/2023			



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

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Property Details and Description of Works							
Address Details	Unit no	Street n	_	Lot 723	no	Street name / Plan Deposited Plan Ref 4	
	Suburb Karnup		•			State WA	Postcode 6176
Local government area	City of Rockingham						
Main BCA class of the building	N/A Use(s) of building		the	N/A			
Description of the building or works	Single lot						

Determination of Highes	t Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW

BPAD Accredited Practitioner Details				
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.			
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:			
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner			
	Date: 24/11/2023			



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works							
Address Details	Unit no	Street no	- -	ot 24	no	Street name / Plan R Deposited Plan Ref 42	
	Suburb					State	Postcode
	Karnup	Karnup				WA	6176
Local government area	City of Rockingham						
Main BCA class of the building	N/A Use(s) of the building			the	N/A		
Description of the building or works	Single lot						

Determination of Highes	t Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW

BPAD Accredited Practitioner Details	PAD Accredited Practitioner Details				
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.				
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:				
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959 2018	Bushfire Planning & Design Accredited Practitioner				
	Date: 24/11/2023				



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works						
Address Details	Unit no	Street no	Lot no 725		Street name / Plan Reference Deposited Plan Ref 424541	
	Suburb Karnup		•	State WA		Postcode 6176
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A		Use(s) of the puilding	N/A		
Description of the building or works	Single lot					

Determination of Highes	st Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL-LOW

BPAD Accredited Practitioner Details	BPAD Accredited Practitioner Details				
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.				
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:				
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner				
	Date: 24/11/2023				



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works							
Address Details	Unit no Street no Lot no 726		Street name / Plan Deposited Plan Ref 4	ime / Plan Reference d Plan Ref 424541			
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rockingham						
Main BCA class of the building	N/A		e(s) of ilding	the	N/A		
Description of the building or works	Single lot						

Determination of Highest Bushfire Attack Level				
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW

BPAD Accredited Practitioner Details				
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.			
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:			
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959 2018	Bushfire Planning & Design Accredited Practitioner			
	Date: 24/11/2023			



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works							
Address Details	Unit no Street no Lot no 727		Street name / Plan Deposited Plan Ref 4				
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A	Use(build		the	N/A		
Description of the building or works	Single lot						

Determination of Highest Bushfire Attack Level				
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	No classified vegetation identified within 100 m	N/A	>100 m	BAL – LOW

BPAD Accredited Practitioner Details				
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.			
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:			
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Bushfire Planning & Design Accredited Practitioner			
	Date: 24/11/2023			



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works							
Address Details	Unit no Street no Lot no 728		Street name / Plan R Deposited Plan Ref 42				
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A	N/A Use(s) of the building			the	N/A	
Description of the building or works	Single lot						

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	Class D Scrub	5-10° Downslope	88 m	BAL – 12.5	

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and Description of Works							
Address Details	Unit no Street no Lot no 729		Street name / Plan R Deposited Plan Ref 42				
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A	Use(build		the	N/A		
Description of the building or works	Single lot						

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	Class D Scrub	5-10° Downslope	83.5 m	BAL – 12.5	

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



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Determined in accordance with AS 3959-2018

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Property Details and Description of Works							
Address Details	Unit no	Street no	-	Lot 730	no	Street name / Plan R Deposited Plan Ref 42	
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A		Use(build		the	N/A	
Description of the building or works	Single lot						

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	Class D Scrub	5-10° Downslope	78.5 m	BAL – 12.5	

BPAD Accredited Practitioner Details				
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.			
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:			
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner			
	Date: 24/11/2023			



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Determined in accordance with AS 3959-2018

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Property Details and Description of Works							
Address Details	Unit no	Street no	Lot 1749	no	Street name / Plan R Deposited Plan Ref 42		
	Suburb Karnup				State WA	Postcode 6176	
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A		Use(s) of the	he	N/A		
Description of the building or works	Single lot						

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	Class D Scrub	5-10° Downslope	35 m	BAL – 12.5	

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire
Company Details Envision Bushfire Protection/ Emerge Associates	practitioner. Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



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Property Details and Description of Works							
Address Details	Unit no	Street n	10	Lot 750	no	Street name / Plan Ro Deposited Plan Ref 42	
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A Use(s) obuilding			the	N/A		
Description of the building or works	Single lot						

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	Class D Scrub	5-10° Downslope	40.5 m	BAL – 12.5	

Name	
Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire
Common Details	practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
2018	Date: 24/11/2023



Bushfire Attack Level (BAL) Certificate

Determined in accordance with AS 3959-2018

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Property Details and Description of Works								
Address Details	Unit no	Street no	_ _	ot 74	no	Street name / Plan Reference Deposited Plan Ref 424541		nce
	Suburb Karnup					State WA	Post 617	tcode 6
Local government area	City of Rock	City of Rockingham						
Main BCA class of the building	N/A		Use(s	•	the	N/A		
Description of the building or works	Single lot							

Determination of Highest Bushfire Attack Level					
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL	
Method 1	Class C Shrubland	Flat/Upslope	44 m	BAL – 12.5	

BPAD Accredited Practitioner Details					
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.				
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:				
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner				
	Date: 24/11/2023				



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Property Details and De	scription of W	/orks					
Address Details	Unit no Street no Lot no 776		no	Street name / Plan Reference Deposited Plan Ref 424541			
	Suburb Karnup					State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A			e(s) of ilding	the	N/A	
Description of the building or works	Single lot						

Determination of Highest	t Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	Class C Shrubland	Flat/Upslope	88 m	BAL – 12.5

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



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This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and De	scription of W	/orks				
Address Details	Unit no	Street no	Lot 790	no	Street name / PI Deposited Plan R	
	Suburb Karnup				State WA	Postcode 6176
Local government area	City of Rock	City of Rockingham				
Main BCA class of the building	N/A		Use(s) of building	the	N/A	
Description of the building or works	Single lot					

Determination of Highest	t Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	Class D Scrub	5-10° Downslope	43.5 m	BAL – 12.5

BPAD Accredited Practitioner Details	
Name Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire
Company Details Envision Bushfire Protection/ Emerge Associates	practitioner. Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023



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Determined in accordance with AS 3959-2018

This Certificate has been issued by a person accredited by Fire Protection Association Australia under the Bushfire Planning and Design (BPAD) Accreditation Scheme. The certificate details the conclusions of the full Bushfire Attack Level Assessment Report (full report) prepared by the Accredited Practitioner.

Property Details and De	scription of W	/orks					
Address Details	Unit no Street no Lot 795			no	Street name / Plan Reference Deposited Plan Ref 424541		
	Suburb Karnup				State WA	Postcode 6176	
Local government area	City of Rock	City of Rockingham					
Main BCA class of the building	N/A		Use(:he	N/A	
Description of the building or works	Single lot						

Determination of Highest	Bushfire Attack Level			
AS 3959 Assessment Procedure	Vegetation Classification	Effective Slope	Separation Distance	BAL
Method 1	Class D Scrub	5-10° Downslope	44 m	BAL – 12.5

Name	
Anthony Rowe Level 3 BPAD no. 36690	I hereby declare that I am a BPAD accredited bushfire
	practitioner.
Company Details Envision Bushfire Protection/ Emerge Associates	Signature:
I hereby certify that I have undertaken the assessment of the above site and determined the Bushfire Attack Level stated above in accordance with the requirements of AS 3959-2018	Planning & Design Accredited Practitioner
	Date: 24/11/2023