

Andrea Smith, Development Manager Villawood Properties PO Box 1104, Bendigo, Victoria, 3552 Phone: (03) 5444 0002 Mobile: 0418 325 142 Email: <u>andrea@villawoodproperties.com</u>

5<sup>th</sup> May 2025

Dear Andrea,

# Bushfire Attack Level Assessment - Imagine Estates - Stage 18

Practical Ecology Pty Ltd was commissioned to provide a Bushfire Attack Level Assessment for the proposed subdivision in Strathfieldsaye. It is understood that this subdivision will form part of the larger Imagine Estates being established in this area with this property being Stage 18 of this development (see Figure 1).

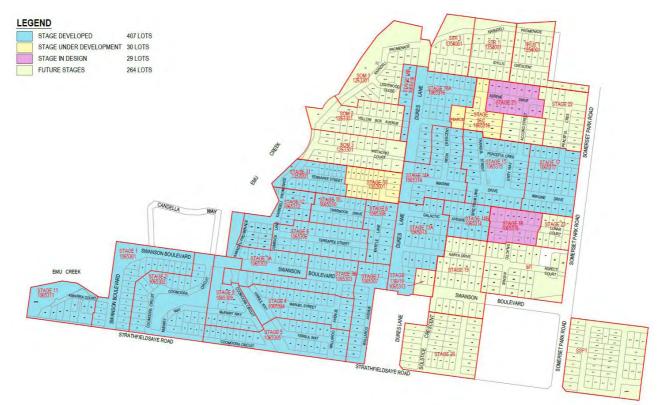


Figure 1. Proposed/existing stages of Imagine Estates

An overview of the Study Area is presented in 0. The property is approximately 1.93 ha and consists of a single vacant lot with some signage showing the existing lots but no other infrastructure has been installed at present.



A subdivision application has already been approved for this property with lots already present in public records. Stage 18 incorporates 15 lots with an internal road network established to existing lots to the west and future lots to the east and south. The eastern side will have lots placed as part of Stage 23 and the southern side as part of Stage M1 in the future.

The entire Study Area is located within a Bushfire Prone Area under the Victorian *Building Regulations* 2018. As such, the provisions within the Building Code of Australia (BCA) require residential development to be protected from the effects of bushfire. The deemed-to-satisfy solutions require an assessment of the Bushfire Attack Level (BAL) in accordance with *Australian Standards* 3959–2018: Construction of buildings in bushfire-prone areas (AS3959–2018). Dwellings must then be built to the relevant BAL as per the BCA.

Currently there are two deemed-to-satisfy methods of building construction to satisfy the BAL:

- AS3959-2018
- NASH Standard 'Steel Framed Construction in Bushfire Areas'

The land is zoned General Residential (GRZ1) and is not covered by a Bushfire Management Overlay. Planning Authorities may seek assurance that bushfire protection measures have been considered at the planning application stage. This report can be expanded on request if this is the case.

There are three potential methods of BAL assessment under the building and planning regulations:

- Method 1 of AS3959–2018
- Method 2 of AS3959–2018
- An Alternative Solution in accordance with the BCA for building permits or as approved by the Relevant Authority for planning permits.

Considering the nature of the development and the condition of the surrounding vegetation. Method 1 as per AS3959-2018 is considered suitable.

Document date & version	05/05/2025 - Version 1.0		
Assessor	ulian Drummond		
BPAD Accreditation	BPAD 44709		
Assessors Contact	Phone: (03) 9484 1555 Mobile: 0421 695 276 Email: juliand@practicalecology.com.au		

## **Bushfire Attack Level Assessment**



#### SITE DETAILS

Municipality	City of Greater Bendigo
Address	Galactic Avenue, Strathfieldsaye (Lot B P 904143)
Applicant	Villawood Properties
Zoning	General Residential Zone (GRZ)
Overlays	Development Plan Overlay - Schedule 26 (DPO26)
Bushfire Prone Area	Yes
Proposal	Subdivision (15 residential lots and one service lot with the remainder of the property which will be subdivided at a later date)

#### AS3959 METHOD 1

Patch	1	2	3	4
Direction	East	South-east	South	North
Fire Danger Index	100	100 100		100
Vegetation type	Forest	Grassland	Grassland	Low Threat
Exclusions (from section 2.2.3.2b, c, d, e and/or f)	N/A	N/A N/A		e & f
Slope (up/down)	Down	Down Upslope/level		Upslope
Slope (degrees)	0-5°	0-5°	0-5°	0-5°
Defendable space for BAL-12.5 (m)	57	22	19	N/A
Defendable space for BAL-19 (m)	43	15	13	N/A
Defendable space for BAL-29 (m)	32	10	9	N/A
Defendable space for BAL-40 (m)	24	7	6	N/A
Distance from classified vegetation (m)*	84	126	0	0
BAL rating (based on the separation from the nearest lot boundary)	BAL-12.5	BAL-12.5	Flame Zone	BAL-12.5

\* Distances have been measured from the edge of the proposed residential lots as opposed to the property boundary as a large section of the property is not being developed at this stage (Lot C on the plans)



#### SUMMARY AND RECOMMENDATIONS

The Classified Vegetation as per AS3959-2018 within 100m of the Study Area is displayed on Map 2 and the results of the BAL assessment are displayed on Map 3.

There is a small hilltop on the north-eastern side of the Study Area which results in downslopes of  $0-5^{\circ}$  to the north, east, south, and west. The highest risk vegetation present within 100m of the property boundary is the  $0-5^{\circ}$  Downslope Forest along Somerset Road (see Figure 2). The forest along the roadside is a thin strip but cannot be ruled exempt under AS3959-2018 due to another patch of juvenile Forest in the property to the east (see Figure 3).

The only other Classified Vegetation within 100m is Grassland on a paddock to the south-east and another property immediately to the south (see Figure 4). The remainder of the assessment contains Low Threat areas including the Study Area itself (see Figure 5), the residential areas to the north and west (see Figure 6 and Figure 7), and the Somerton Road reserve.

While the Upslope Grassland to the south is directly adjacent to Stage 18, and is a larger patch of Classified Vegetation, this area will soon be developed into similar residential lots based on the proposed layout in Figure 1 and the road network connecting to this property in the plans. Having higher BAL ratings on the adjacent properties and setbacks in lots is therefore a moot point. Therefore, while it is recommended that a fuel break be managed within the southern property until lot establishment eventuates, no setback or higher BAL ratings are required in response to this southern Grassland vegetation.

The eastern Forest is sufficiently separated from the proposed lots to allow for BAL-12.5 as per AS3959-2018. The proposed lots within Stage 23 (Lot C on the plans) may have issues with the adjacent Forest but this can be addressed as a part of future applications. See the table below for the BAL ratings and other details from this assessment.

Lot	BAL rating required	Setbacks required	Shielding as per Section 3.5 of AS3959-2018 applicable
1801	12.5	No	N/A
1802	12.5	No	N/A
1803	12.5	No	N/A
1804	12.5	No	N/A
1805	12.5	No	N/A
1806	12.5	No	N/A
1807	12.5	No	N/A
1808	12.5	No	N/A
1809	12.5	No	N/A
1810	12.5	No	N/A
1811	12.5	No	N/A
1812	12.5	No	N/A



Lot	BAL rating required	L rating required Setbacks required Shielding as per Section 3.5 of AS3959-2018 ap		
1813	12.5	No	N/A	
1814	12.5	No	N/A	
1815	12.5	No	N/A	

#### QUALIFICATIONS

We have taken all reasonable steps to ensure that the information provided in this assessment is accurate and reflects the conditions on and around the site on the date of this assessment. This assessment cannot guarantee safety during a bushfire event. There are additional measures that should be considered and implemented to improve the bushfire performance of buildings and the safety of occupants such as:

- a Personal Bushfire Plan for each household to detail how occupants will respond to an emergency event
- building design: e.g. minimise re-entrant corners, elevated floors, vulnerable elements
- access and egress for emergency services
- static water supply in case mains water is not available
- defendable space around building by managing vegetation and removing other fuel sources.

Please don't hesitate to contact me if you have any issues or queries,

Yours sincerely,

Julian Drummond Senior Bushfire / Ecological Consultant Ph: (03) 9484 1555 | Mobile: 0421 695 276 | E-mail: juliand@practicalecology.com.au Web: www.practicalecology.com.au | Address: PO Box 228 | Preston Vic 3072





#### PHOTOGRAPHS



Figure 2. Downslope Forest along Somerton Road



Figure 4.

Level Grassland in the property to the south



Figure 3. Juvenile Forest within property to the east



Figure 5.

Low Threat managed terrain within the Study Area



Figure 6. Low Threat terrain within the residential areas to the north



**Figure 7.** Low Threat terrain within the residential areas to the west





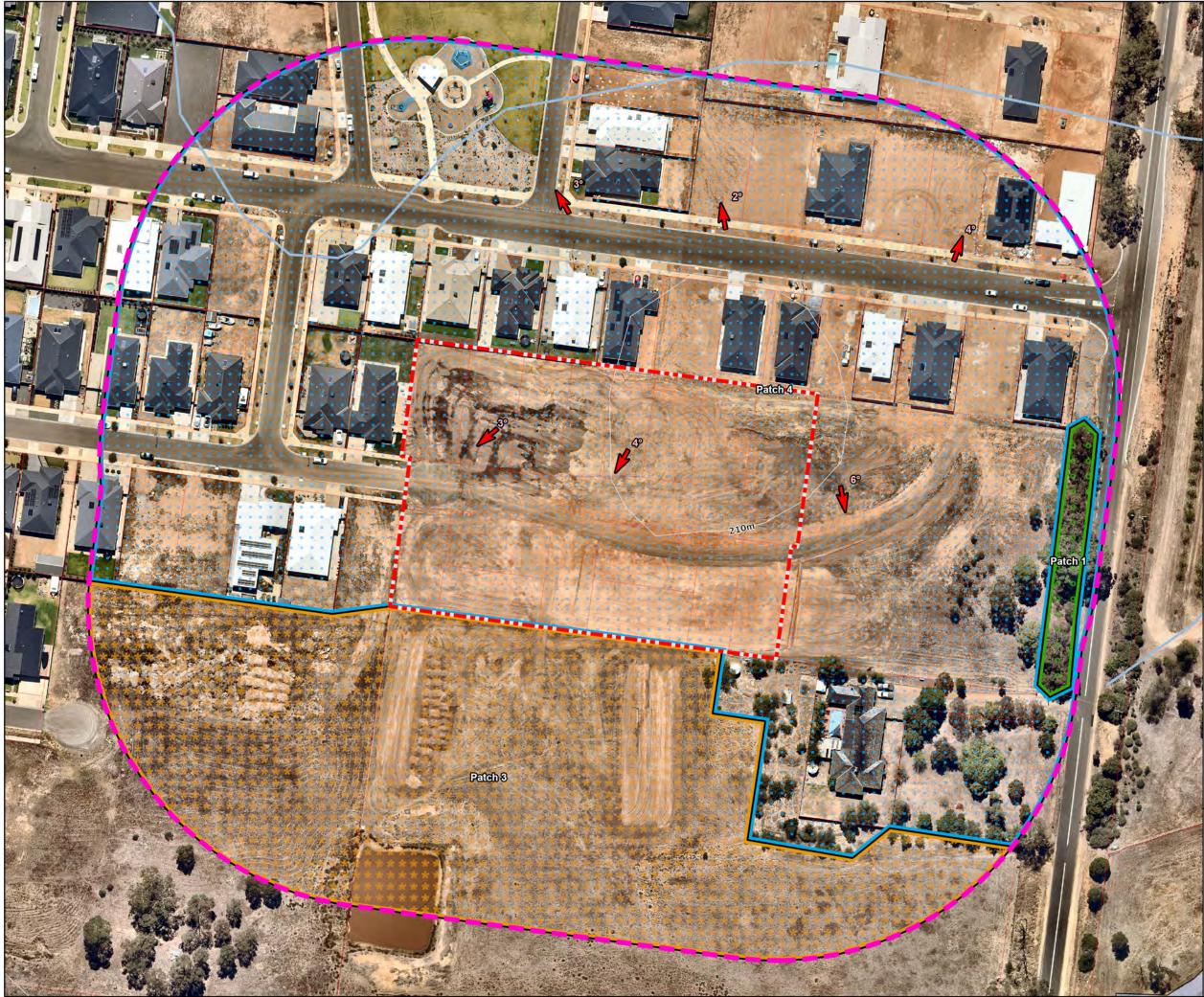
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# Map 1. Study Area Imagine Estates, Stage 18

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# Map 2. BAL Assessment - Classified Vegetation Imagine Estates, Stage 18

2		
空気の	Legend	
	000	Study area
	772	Assessment area (100m)
お子のため		Parcel boundary
and the second		Contour (10m interval)
		Stream
		Lake/dam
	4	Slope measurements
	Classifi	ed vegetation
The second second	000	0-5° Downslope Forest
The second	* * * *	Upslope Grassland
大学		Low Threat
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計画		
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		nature and circumstances are constantly changing.



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### Map 3. BAL Assessment - Setback Requirements Imagine Estates, Stage 18

Legend	
	Study area
52)	Assessment area (100m)
	Parcel boundary
	Contour (10m interval)
	Stream
Classifi	ed vegetation
0 0	0–5° Downslope Forest
***	Upslope Grassland
	Low Threat
Propose	ed layout
	Lot
	Road reserve
	back requirements (0-5° ope Forest)
	BAL-12.5 (57m)
	BAL-19 (43m)
	BAL-29 (32m)
	BAL-40 (24m)
Date: 14 Aerial im Basemap	<b>S</b> by: Julian Drummond /04/2025 hagery: Nearmap (19/02/2025) data: Vicmap Basemap © State hent of Victoria
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PLAN OF SUBDIVISION					EDIT	ION 1	PS	914901P	
Location of Land					Council Name: CITY OF GREATER BENDIGO Ref:				
Parish: STRA	THFIELDSAYE								
Township:	STRATHFIELDSAYE								
Section:									
	ment: 42 (PART) &	43 (PART)							
Crown Portio		( )							
	Ce: VOL.12529 FOL								
Last Plan Re	ference: LOT B PS	5904143N							
	ess: Galactic aver vision) strathfieldaye								
MGA Co-ordin (of approx. centr in plan)		265 950 5 923 550	Zone: 5 GDA 2020						
Ve	esting of Roads	and/or Re	eserves		Notations				
Identifie	r	Council/Body	y/Person		NIL				
ROAD R1 CITY OF GREATER BENDIGO RESERVE No.1 CITY OF GREATER BENDIGO									
	Nota	tions							
Depth Limitatio	on: Does not apply								
	an is based on survey								
Staging: This is	not a staged plan of su	bdivision							
Planning Perm	iit No. DS/188/2016								
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E-1	DRAINAGE		3	THIS PLAN		CITY OF G	REATER BENDIGO		

E-1 PIPELINES OR ANCILLARY PURPOSE	5 3	THIS PLAN - SEC 136 WATER ACT 1989	COLIBAN	REGION WATER CORF	PORATION
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