


Bushfire Management Statement

Pathway 2 Application (Clause 52.02-4)

- Construction of a dwelling (including an extension or alteration to a dwelling)
- Dependant Persons Unit
- Industry
- Office / Education Centre
- Retail Premises
- Service Station
- Warehouse

Property Address:	35 Schier Street Barmah
Local Government Area:	Moira Shire
Overlays:	BMO
Zoning	Township Zone (TZ)
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Introduction

This Bushfire Management Statement has been prepared in response to the requirements of Clause 44.06 – Bushfire Management Overlay, and in accordance with the application requirements of Clause 53.02 – Bushfire Planning.

The statement contains four components:

1. A **bushfire hazard landscape assessment** including a plan that describes the bushfire hazard of the general locality more than 150 metres from the site.
2. A **bushfire hazard site assessment** including a plan that describes the bushfire hazard within 150 metres of the proposed development.
3. A **bushfire management plan** including a plan that describes the defensible space and access to the site and also shows the location of available water supplies.
4. A **bushfire management statement** describing how the proposed development responds to the requirements of Clause 44.06 and 53.02.

Bushfire Hazard Landscape Assessment

The bushfire hazard landscape assessment provides information on the bushfire hazard more than 150 metres away from a development site.

Considering bushfire from this broader landscape perspective is important as it affects the level of bushfire risk a development and its future occupants may be exposed to.

The landscape assessment:

- provides factual information on the bushfire hazard (vegetation extent and slope)
- provides information on key features of the general locality that are relevant to better understanding the protection provided by the location
- provides contextual information on a site

Landscape Scenario	Landscape Scenario 3
Description	<ul style="list-style-type: none"> • The type and extent of vegetation located more than 150 metres from the site may result in neighbourhood-scale destruction as it interacts with the bushfire hazard on and close to a site. • Bushfire can approach from more than one aspect. • The site is located in an area that is not managed in a minimum fuel condition. • Access to an appropriate place that provides shelter from bushfire is not certain.

Bushfire Landscape Assessment Plan



Bushfire Hazard Assessment

The bushfire hazard site assessment (the site assessment) documents the bushfire hazard on and near a site.

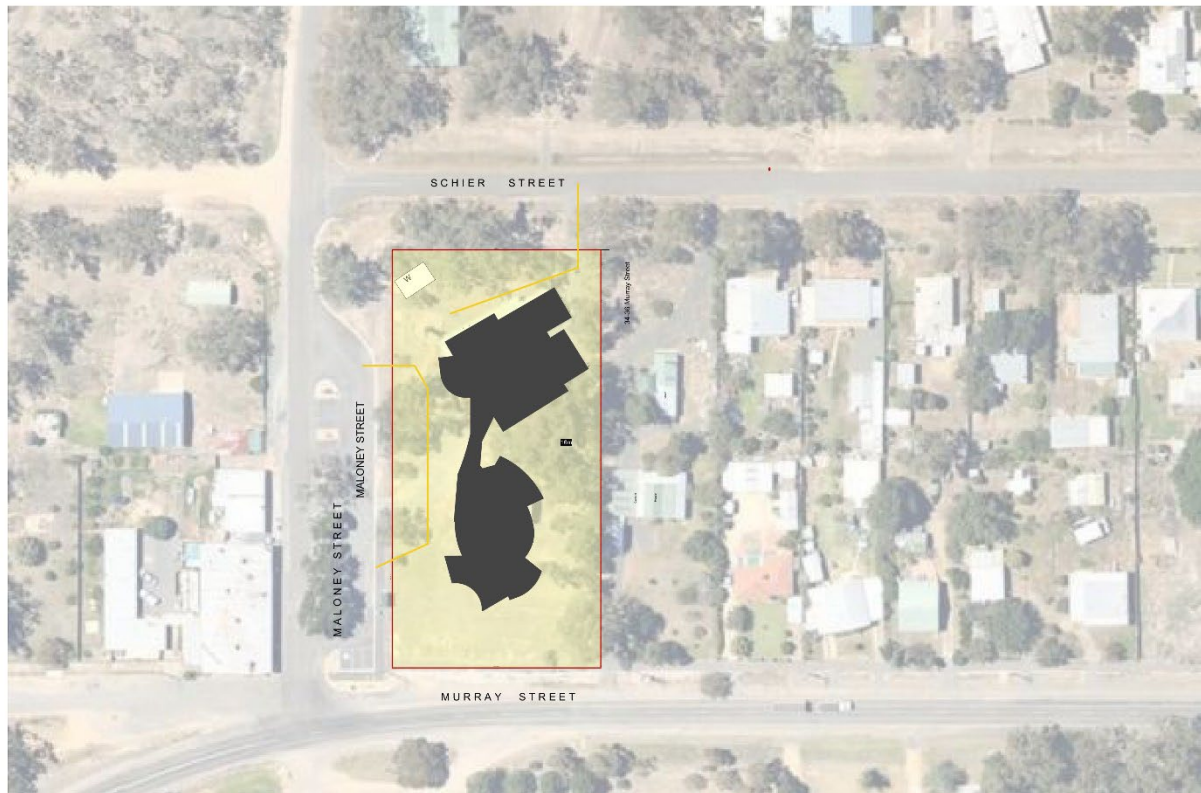
The assessment:

- provides factual information on the bushfire hazard (vegetation type and slope)
- informs defensible space and building construction requirements
- Is informed by the methodology contained in Australian Standard AS3959:2009 Construction of buildings in bushfire prone areas (AS3959) to provide contextual information on a site.

Bushfire Site Hazard Plan



Bushfire Management Plan



- Legend:**
- Water Tank
 - Emergency
 - Building Works
 - 150m Fire Radius
 - 100m Fire Radius
 - Vegetation Boundaries
 - Low Threat Vegetation
 - Defensible Space
 - Access

Bushfire Management Statement

53.02-4.1 Landscape, Siting and design objective

- Development is appropriate having regard to the nature of the bushfire risk arising from the surrounding landscape.
- Development is sited to minimise the risk from bushfire.
- Development is sited to provide safe access for vehicles, including emergency vehicles.
- Building design minimises vulnerability to bushfire attack.

Approved Measures

Approved Measure (AM) 2.1 – Landscape

Requirement:

The bushfire risk to the development from the landscape beyond the site can be mitigated to an acceptable level.

Has the requirements of AM 2.1 been met? **Yes** **No**

Approved Measure (AM) 2.2 – Siting

Requirement:

A building is sited to ensure the site best achieves the following:

- **The maximum separation distance between the building and the bushfire hazard**
- **The building is in close proximity to a public road**
- **Access can be provided to the building for emergency service vehicles**

Has the requirements of AM 2.2 been met? **Yes** **No**

Approved Measure (AM) 2.3 – Building Design

Requirement:

A building is designed to be responsive to the landscape risk and reduce the impact of bushfire on the building.

Has the requirements of AM 2.3 been met? **Yes** **No**

53.02-4.2 Defendable Space and Construction Objective

Defendable space and building construction mitigate the effect of flame contact, radiant heat and embers on buildings.

Approved Measures

Approved Measure (AM) 3.1 – Bushfire Construction and Defendable Space

Requirement:

A building used for a dwelling (including an extension or alteration to a dwelling), a dependent person's unit, industry, office or retail premises is provided with defendable space in accordance with:

- Table 2 Columns A, B or C and Table 6 to Clause 53.02-5 wholly within the title boundaries of the land; or
- If there are significant siting constraints, Table 2 Column D and Table 6 to Clause 53.02-5.

The building is constructed to the bushfire attack level that corresponds to the defendable space provided in accordance with Table 2 to Clause 53.02-5.

The building will be provided with defendable space in accordance with **Column C**

The defendable space distance required is **16** metres

Table 6 of Clause 53.02-5 – Vegetation management requirement:

Vegetation management requirement	CONFIRM ACCEPTANCE
<ul style="list-style-type: none"> • Grass must be short cropped and maintained during the declared fire danger period. • All leaves and vegetation debris must be removed at regular intervals during the declared fire danger period. • Within 10 metres of a building, flammable objects must not be located close to the vulnerable parts of the building. • Plants greater than 10 centimetres in height must not be placed within 3 metres of a window or glass feature of the building. • Shrubs must not be located under the canopy of trees. • Individual and clumps of shrubs must not exceed 5 square metres in area and must be separated by at least 5 metres. • Trees must not overhang or touch any elements of the building. • The canopy of trees must be separated by at least 5 metres. • There must be a clearance of at least 2 metres between the lowest tree branches and ground level. 	<input checked="" type="checkbox"/>

Are there significant siting constraints that would allow Column D of Table 2 to Clause 53.02-5?

Yes No Not Applicable

A building is constructed to the bushfire attack level:

- That corresponds to the defensible space provided in accordance with Table 2 to Clause 53.02-5. The building will be constructed to **BAL 29**

Is the defensible space wholly contained within the boundaries of your property?

Yes No if no, see Alternative Measure 3.3

Has the requirements of AM 3.1 been met? Yes No

Alternative Measures

Alternative Measure (AltM) 3.3 – Defendable Space on adjoining land

Requirement:

Adjoining land may be included as defendable space where there is reasonable assurance that the land will remain or continue to be managed in that condition as part of the defendable space.

Has Alternative Measure (AltM) 3.3 been met? **Yes** **No** **N/A**

Alternative Measure (AltM) 3.4 – Calculate defendable space using Method 2 of AS3959-2009

Requirement:

Defendable space and the bushfire attack level is determined using Method 2 of AS3959:2009 Construction of buildings in bushfire prone areas (Standards Australia) subject to any guidance published by the relevant fire authority.

Has Alternative Measure (AltM) 3.4 been met? **Yes** **No** **N/A**

Alternative Measure (AltM) 3.5 – Dwellings subject to direct flame contact

Requirement:

A building used for a dwelling (including an extension or alteration to a dwelling) may provide defendable space to the property boundary where it can be demonstrated that:

- The lot has access to urban, township or other areas where:
 - Protection can be provided from the impact of extreme bushfire behaviour
 - Fuel is managed in a minimum fuel condition
 - There is sufficient distance or shielding to protect people from direct flame contact or harmful levels of radiant heat
- Less defendable space and higher construction standard is appropriate having regard to the bushfire hazard landscape assessment
- The dwelling is constructed to a bushfire attack level of BAL-FZ

This alternative measure only applies where the requirements of Approved Measure 3.1 cannot be met.

Has Alternative Measure (AltM) 3.5 been met? **Yes** **No** **N/A**

53.02-4.3 – Water Supply and Access Objectives

- A static water supply is provided to assist in protecting property.
- Vehicle access is designed and constructed to enhance safety in the event of a bushfire.

Approved Measure (AM) 4.1 – Water Supply and Access

Water Supply Requirement

A building used for a dwelling (including an extension or alteration to a dwelling), a dependant person's unit, industry, office, retail premises service station or warehouse is provided with a static water supply for fire fighting and property protection purposes as specified in Table 4 to Clause 53.02-5.

The water supply may be in the same tank as other water supplies provided that a separate outlet is reserved for fire fighting water supplies.

Lot Size (m ²)	Hydrant Available	Capacity (litres)	Fire Authority Fittings & Access Required	Select Response
Less than 500	Not Applicable	2,500	No	<input type="checkbox"/>
500 – 1000	Yes	5,000	No	<input type="checkbox"/>
500 – 1000	No	10,000	Yes	<input type="checkbox"/>
1001 and above	Not Applicable	10,000	Yes	<input checked="" type="checkbox"/>

Note: a hydrant is available if it is located within 120 metres of the rear of the building

<p>Confirm Static Water Supply meets the following requirements</p>	<ul style="list-style-type: none"> <input checked="" type="checkbox"/> Is stored in an above ground water tank constructed of concrete or metal <input checked="" type="checkbox"/> All fixed above ground water pipes and fittings for fire fighting purposes must be made of corrosive resistant metal. <input checked="" type="checkbox"/> Include a separate outlet for occupant use <p>The following additional requirements apply when 10,000 litres of static water is required:</p> <ul style="list-style-type: none"> <input checked="" type="checkbox"/> Be readily identifiable from the building or appropriate identification signage to the satisfaction of CFA must be provided. <input checked="" type="checkbox"/> Be located within 60 metres of the outer edge of the approved building. <input checked="" type="checkbox"/> The outlet/s of the water tank must be within 4 metres of the accessway and unobstructed <input checked="" type="checkbox"/> Incorporate a ball or gate valve (British Standard Pipe (BSP 65mm) and coupling (64mm CFA 3 thread per inch male fitting) <input checked="" type="checkbox"/> Any pipework and fittings must be a minimum of 65mm (excluding the CFA coupling)
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Has Approved Measure (AM) 4.1 (Water Supply) been met? **Yes** **No**

Access Requirement

A building used for a dwelling (including an extension or alteration to a dwelling), a dependant person's unit, industry, office, retail premises, service station or warehouse is provided with vehicle access designed and constructed as specified in Table 5 to Clause 53.02-5.

Column A	Column B
Length of access is less than 30 metres	<input checked="" type="checkbox"/> There are no design and construction requirements if fire authority access to water supply is not required under AM 4.1
Length of access is less than 30 metres	<input checked="" type="checkbox"/> Where fire authority access to the water supply is required under AM 4.1 fire authority vehicles must be able to get within 4 metres of the water supply outlet
Length of access is greater than 30 metres	<p>The following design and construction requirements apply:</p> <ul style="list-style-type: none"> <input type="checkbox"/> All weather construction <input type="checkbox"/> A load limit of at least 15 tonnes <input type="checkbox"/> Provide a minimum trafficable width of 3.5 metres <input type="checkbox"/> Be clear of encroachments for at least 0.5 metres on each side and at least 4 metres vertically <input type="checkbox"/> Curves must have a minimum inner radius of 10 metres <input type="checkbox"/> The average grade must be no more than 1 in 7 (14.4%)(8.1°) with a maximum grade of no more than 1 in 5 (20%)(11.3°) for no more than 50 metres <input type="checkbox"/> Dips must have no more than a 1 in 8 (12.5 per cent) (7.1 degrees) entry and exit angle.
Length of access is greater than 100 metres	<p>A turning area for fire fighting vehicles must be provided close to the building by one of the following:</p> <ul style="list-style-type: none"> <input type="checkbox"/> A turning circle with a minimum radius of eight metres <input type="checkbox"/> A driveway encircling the dwelling <input type="checkbox"/> The provision of other vehicle turning heads such as a T head or Y Head – which meet the specification of Austroad Design for an 8.8 metre service vehicle.
Length of access is greater than 200 metres	<ul style="list-style-type: none"> <input type="checkbox"/> Passing bays must be provided at least every 200 metres. <input type="checkbox"/> Passing bays must be a minimum of 20 metres long with a minimum trafficable width of six metres.

Has Approved Measure (AM) 4.1 (Access) been met? **Yes** **No**

Attachment 1 – Site Photos

Classifiable Vegetation



Photo 1 Forest
North West



Photo 2 Forest
North

Low Threat Vegetation



Photo 1
Photo West



Photo 2
South of Proposed Building



Photo 1 South



Photo 2 West

Water Supply



Photo 1
Water Tank



Photo 2
Fire Tanks