



Guidance for the Preparation of BUSHFIRE MANAGEMENT PLANS on the Dampier Peninsula



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Locked Bag 2506 Perth WA 6001

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website: www.dplh.wa.gov.au email: info@dplh.wa.gov.au

tel: 08 6551 8002 fax: 08 6551 9001

National Relay Service: 13 36 77

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BUSHFIRE MANAGEMENT PLANS on the Dampier Peninsula

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INTRODUCTION

This document is designed to provide high-level guidance regarding the structure and content of bushfire management plans (BMPs) prepared for vulnerable tourism land uses on the Dampier Peninsula. This guidance should be read in conjunction with *State Planning Policy 3.7 Planning in Bushfire Prone Areas* (SPP 3.7) and its associated *Guidelines for Planning in Bushfire Prone Areas* (the Guidelines).

It is envisaged that this advice will be used as a first step in project planning for bushfire management; outlining to applicants what is required for the preparation of a BMP on the Dampier Peninsula. This guidance, while providing a straightforward pathway for a BMP's preparation, will not negate the potential to engage suitably qualified bushfire planning practitioners.

A sub-regional risk assessment covering nine communities was undertaken in September 2019 and determined that generally, the bushfire risk across the Dampier Peninsula is extreme; however, several properties have been able to lower this to medium through the careful application of a BMP and maintaining an appropriate level of preparedness.

Tourism land uses are considered vulnerable land uses where they involve visitors who are unfamiliar with the surroundings and/or where they present evacuation challenges.

The preparation of a BMP, using the guidance materials below to demonstrate compliance with the acceptable solutions in Element 5 of the Guidelines, should be undertaken. An EEP should also accompany the development application, using the *Emergency Evacuation Plan Guidance for Tourism Developments on the Dampier Peninsula* as guidance. Where Element 5 requires a risk assessment, reference to and alignment with the Dampier Peninsula Strategic Bushfire Management Plan may be acceptable.

It is recommended that the following structure should be followed for preparing a BMP (see also template in Attachment 1):

- proposal details
- environmental and cultural considerations
- bushfire assessment results
- · identification of bushfire hazard issues
- assessment against the bushfire protection criteria in Element 5 of the Guidelines
- responsibilities for implementation and management of the bushfire measures.

The bushfire protection criteria in Element 5 of the Guidelines vary depending on the type of tourism land use. Assessment against the bushfire protection criteria should ensure it references the correct tourism land use for the proposal.

Figure 1: Risk ratings at specific sites on the Dampier Peninsula in September 2019

LOCATION	CONSEQUENCE	LIKELIHOOD	RISK RATING
Koojaman	CATASTROPHIC	ALMOST CERTAIN	EXTREME
Gambanan	MAJOR	POSSIBLE	HIGH
Ardyaloon/One Arm Point	MODERATE	POSSIBLE	MEDIUM
Cygnet Bay	MODERATE	POSSIBLE	MEDIUM
Djarindjin	MODERATE	POSSIBLE	MEDIUM
Lombadina	MODERATE	POSSIBLE	MEDIUM
Embalgun	MAJOR	POSSIBLE	HIGH
Middle Lagoon	MODERATE	POSSIBLE	MEDIUM
Beagle Bay	MINOR	POSSIBLE	LOW

The primary consideration of the BMP is life safety. All the measures outlined below must contribute directly to keeping staff and visitors safe, either by preventing the impact of bushfire, or more likely, reducing the impact should a bushfire occur. Ideally the BMP for the site will be created in concert with development plans. Bushfire risk mitigation measures MUST be designed into the development from the very beginning, the layout of the site, the way that buildings are clustered together, the type of vegetation and landscaping, are all key elements of reducing bushfire risk.

BUSHFIRE PROTECTION CRITERIA

SPP 3.7 and the associated Guidelines provide acceptable solutions to guide the development of a variety of land uses and a framework for the development of performance principle-based solutions. The following is provided to assist in the preparation of a BMP and the identification of suitable bushfire risk mitigation measures for tourism development proposals on the Dampier Peninsula. The depth of information required to demonstrate compliance with the bushfire protection criteria should be commensurate with the application stage in the planning process.

Element 5 of the Guidelines lists acceptable solutions relating to a variety of vulnerable tourism 'use classes' as defined in the *Planning and Development (Local Planning Schemes) Regulations 2015*. These acceptable solutions are grouped into categories, which are explained further in the context of the Dampier Peninsula in the following sections:

- siting and design
- · vehicular access
- provision of water.

Where the acceptable solutions of Element 5 cannot be achieved, a performance principle-based solution should be proposed which demonstrates compliance with the performance principle. Where a performance principle in Element 5 provides the option of undertaking a risk assessment, reference to the relevant components of the Dampier Peninsula Strategic Bushfire Management Plan should be provided. The Dampier Peninsula Strategic Bushfire Management Plan includes a sub-regional (high-level) bushfire risk assessment and has identified access and egress options, location of water and places for shelter-in-place for the entire Peninsula. It is not expected that a further site-specific risk assessment will

be necessary. The BMP should demonstrate compliance with the performance principle and align options for access and egress or shelter-in-place with the Dampier Peninsula Strategic Bushfire Management Plan.

1 SITING AND DESIGN

Element 5 outlines acceptable solutions relating to siting and design for different tourism land uses; these generally cover the use of asset protection zones, siting of structures, siting and design of on-site shelters, as well as pedestrian connectivity and landscaping.

The site layout will significantly affect the way a bushfire could impact a site, so careful consideration should be given to the siting or placement of buildings or structures, and importantly how they are linked with tracks, paths and landscaping. There are four primary bushfire protection principles related to site layout:

- create defendable space
- remove flammable material around structure
- · break up fuel continuity and
- carefully select and manage on-site vegetation.

These principles interact across the site to create a layered defence against bushfire, with each layer reinforcing and building upon the next layer to maximise bushfire resilience.

1.1 ASSET PROTECTION ZONE (APZ)

An APZ is a low fuel area maintained around a building or a group of clustered buildings, to increase the likelihood that the building(s) will survive a bushfire. The size of the APZ is dependent on adjacent vegetation type and slope.

Element 5 requires the provision of an APZ to achieve 29kW/m² around habitable buildings, including campground facilities, such as the office, manager's residence and camper's kitchen. However, under the Shire of Broome's firebreak notice, a 20-metre APZ around all buildings, inclusive of all dwellings, sheds etc, is required. As a general rule, whichever requires the greatest APZ should be used.

In most instances the clearing of an APZ does not require a permit, however it is recommended that advice is sought from the Shire of Broome or the Department of Biodiversity, Conservation and Attractions, before clearing any vegetation. A re-design or reduction in development yield may be necessary to minimise the

Vegetation is the fuel that burns and carries a bushfire into the site, so it should be carefully considered and broken up into manageable areas with internal tracks, fire breaks, perimeter roads or non-flammable landscaping.

Natural vegetation on the Peninsula is highly flammable in the dry season and grows rapidly during the wet, so the ability to access the vegetation and manage it, through clearing, pruning or burning is important. The ideal arrangement is a mosaic of different vegetation types or densities across the site with unmanaged natural vegetation surrounded by open thinner vegetation. Remember the intent is to prevent or slow down the way that bushfire can spread across the site. It is recommended to map out the vegetation across the site and detail how the different areas interact, both from an amenity perspective as well as bushfire protection.

Some landscaping measures may include, but are not limited to:

- Shade trees can be retained, provided that the ground below them does not include flammable material, and they are pruned to provide a clean trunk to about 2 - 3 metres above ground and they are separated from each other sufficiently to stop bushfire spread in the canopy.
- Screening bushes should be in isolated clumps and separated so that fire cannot easily jump between them.
- Areas of landscaping that include green ground cover can provide an effective barrier to bushfire spread and provide guest amenity. Having green grass around barbecues or fire pits not only makes them more attractive to picnickers but helps contain any fire.
- Native "tucker" plants or trees can be a fascinating education to visitors as well as provide food or revenue, however these must be managed, and many require burning at the right time to propagate and fruit.

It may be useful for landowners to refer to Queensland's Bushfire Resilient Building Guidance and the Country Fire Authority's Landscaping for Bushfire: Garden Design and Plant Selection when designing, constructing and landscaping an APZ.

removal and modification of vegetation and to ensure habitable buildings are not subject to direct flame contact.

An APZ does not need to be bare earth; managed vegetation can be incorporated as long as it is a strategically managed space that gives holistic consideration to how existing or proposed vegetation or non-combustible features interact with or affect the building's bushfire resilience. APZs should be managed to a low threat state in perpetuity in accordance with Schedule 1 in the Guidelines which outlines the standards for APZs.

Clustering of camp sites is recommended where possible to reduce clearing of existing vegetation.

It is important that the APZ includes a detailed landscape plan to ensure the ongoing vegetation management requirements are understood. The ongoing management requirements should also be included as a measure within the implementation table.

1.2 SITING OF STRUCTURES IDENTIFIED AS A TOLERABLE LOSS

There is currently no legislative requirement for commercial buildings to be built to bushfire construction standards and for some tourism land uses such as tents, caravans and cabins, construction under AS 3959 may be impossible. The bushfire planning practitioner should discuss options such as APZs, construction methods and materials for buildings to improve resilience to bushfire, over and above the requirements contained within the bushfire protection measures and AS 3959. Where a landowner/developer makes the decision that, in order to preserve existing vegetation, that in the event of a bushfire, the loss of some or all of the built structures is a 'tolerable' loss, then these structures can be within uncleared areas of 40kW/m² or above. This should be clearly documented in the BMP.

1.3 LANDSCAPING

Landscaping, and the design and maintenance of an APZ in a bushfire prone area can significantly improve the bushfire resilience of a building. Element 5 requires a landscape management plan to be submitted where applicable. A landscape management plan is an excellent visual tool for depicting the vegetation on-site and particularly within the APZ, and importantly how the vegetation should be managed.

1.4 SHELTERING ON-SITE

Bushfire safer places offer improved protection if people are caught by a bushfire and cannot evacuate away from the bushfire threat to an area that is not being threatened. It is important for people to understand that there are risks associated with sheltering in safer places even when assessed to the accepted standards.

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Safer places do not guarantee people's safety, but from a risk mitigation perspective, the 2009 Victorian Bushfire Royal Commission Final Report identified the need for a range of community shelter and relocation options in the event of a bushfire. This is particularly important on the Dampier Peninsula with existing communities, increasing

tourism numbers and limited road access.

Element 5 requires an on-site shelter where vehicular access in two different directions to two different suitable destinations cannot be provided, except for bed and breakfasts and holiday houses. It should be noted that a suitable destination is an area that is not classified as bushfire prone on the Map of Bush Fire Prone Areas, or is greater than 100 metres from classified vegetation, as per AS 3959, and can provide shelter during a bushfire. Therefore, for some proposals a suitable destination may include the subject site or adjoining community.

Early evacuation of visitors and staff should always be the first consideration and will form the basis of a successful EEP. Care must be taken to avoid creating a perception that sheltering on-site within a designated building or open space area, will provide a degree of protection that aligns with it being considered a first resort option.

Several potential safer places have been identified within the Dampier Peninsula Strategic Bushfire Management Plan, where people could shelter either within a designated building or a suitable beach, during a 1 in 200-year bushfire weather condition. If it is proposed within the BMP or EEP to move onto someone else's property as part of the evacuation strategy, prior agreement must be obtained from the land/property owner. It may also be necessary to discuss the proposal with the Shire of Broome and the Local Emergency Management Committee.

If an on-site shelter is proposed, details should be included within the BMP and the EEP. The BMP should provide a site map of the location of the 'on-site' shelter and pedestrian paths leading to it. The paths should also be clearly signposted.

2 VEHICULAR ACCESS

The existing road network on the Dampier Peninsula comprises the main Broome-Cape Leveque Road. Many of the communities, tourist development and camping grounds are accessed by minor roads and tracks, some of which are in poor condition and become impassable in the wet season. The accessibility of the site, and importantly the ability to evacuate the site if required, may be critical to the safety of staff and guests.

The provision of vehicular access in two different directions to two different suitable destinations should always be the goal. Discussions may need to be held with the Shire of Broome and/or any adjoining landowners, regarding the provision of additional access tracks, emergency access ways and roads. As discussed above, a suitable destination may be on the subject site. The town of Broome is a suitable destination; however, consideration should be given to the long travel distance in the event of a bushfire. The larger communities on the Peninsular of Beagle Bay, Djarindjin/Lombadina and Ardyaloon may provide an alternative suitable destination. Reference to the Dampier Peninsula Strategic Bushfire Management Plan should be made regarding options for suitable evacuation destinations. Consideration should be given to following:

- the closest potential safer place (this may be off the property)
- whether the safer place is a different destination to evacuate to via vehicle or is in the adjoining community within walking distance
- means of access to the safer place
- time required to evacuate to the safer place and
- whether the safer place is in an identified building or an open-space area.

Where public roads or internal access roads cannot achieve the technical requirements of the Guidelines, improvements should be made to ensure access and egress in the event of a bushfire is improved. Improvements may include, widening of roads/tracks, the inclusion of passing bays at regular increments along the road/track, turnaround areas, compacting or sealing key sections and regular on-going grading/stabilising of tracks particularly during the tourist season. Where caravans are anticipated, the road should be well maintained with clear indicators of distance to the site and the next turnaround. Remember that many of the guests may not be comfortable with four-wheel driving, particularly while towing a heavy van.

3 PROVISION OF WATER

While the four larger communities (Ardyaloon, Beagle Bay, Djarindjin and Lombadina) have production bores, tanks and distribution pipework, water infrastructure in the smaller communities is limited.

The proponent should consult with the Shire of Broome and/or the local emergency services to discuss suitable options for the provision of water for firefighting purposes. The requirements for dedicated water tanks

will be at the discretion of the local government, but as a general guide, if drinking water is not provided on-site, it may not be necessary to provide water for firefighting.

The BMP should outline the following to justify whether a water tank dedicated for firefighting is not being proposed:

- if a local brigade may attend the site in the event of a bushfire
- if drinking water is provided on-site
- if the staff of the facility intend to actively defend the site
- comments from the local government regarding their preference for water tanks dedicated for firefighting to be provided.

BUSHFIRE MANAGEMENT PLANS on the Dampier Peninsula

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COVERPAGE DETAIL

COVERSHEET

Insert a Bushfire Management Plan (BMP) coversheet at the front of the BMP. This is available online at www.dplh.wa.gov.au under Bushfire planning reform>Bushfire planning publications (Forms).

Complete all relevant details on the coversheet.

COVER PAGE

Content determined by report author.

DOCUMENT CONTROL

Client: Insert client name	

REPORT VERSION	PURPOSE	AUTHOR/REVIEWER AND ACCREDITATION DETAILS	DATE SUBMITTED



EXECUTIVE SUMMARY

(optional)

This section is useful in providing a short summary of the following information, particularly for more complex planning proposals:

- overview of the planning proposal
- results of bushfire assessment
- bushfire management strategies that will be incorporated into the development design in order to demonstrate compliance with bushfire protection criteria
- key implementation and management responsibilities going forward.

SECTION 1: PROPOSAL DETAILS

Do not: paraphrase or repeat sections from State Planning Policy 3.7 or the Guidelines for Planning in Bushfire Prone Areas

Do not include: details on climate, bushfire history, prevailing winds.

• Explain the type of development proposed and resulting intensification of land use. Include the use proposed. For example:

Caravan Park

Bed and Breakfast

Cabins

Tents/Eco-Tents

- include area of the subject site and
- area of proposed development footprint.
- · Location of the proposal on the Dampier Peninsula.
 - include map showing the location relative to other settlements.
- Maximum number of guests that can be accommodated.
- · Average number of guests.

JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC

- · Maximum number of staff accommodated.
- Facilities description.
- Acknowledge any known reports or plans that refer to the subject area and may or will impact
 the assessment and/or the implementation of bushfire risk management measures, and will be
 referenced in the BMP (e.g. Dampier Peninsula Strategic Bushfire Management Plan, layout plans,
 development application, environmental report, landscaping plan or any relevant bushfire risk
 assessments).

FIGURE 1: The copy of the planning proposal

FIGURE 2: Location map

FIGURE 3: Screen shot of Map of Bush Fire Prone Areas for the subject site

SECTION 2: ENVIRONMENTAL AND CULTURAL CONSIDERATIONS

The Dampier Peninsula contains areas with significant biodiversity and cultural values. State Planning Policy 3.7 (SPP 3.7) objective 5.4 recognises the need to consider bushfire risk mitigation measures alongside environmental, biodiversity and conservation values. In the context of the Dampier Peninsula it is also relevant to consider cultural heritage.

• Identify any environmental, biodiversity, conservation and heritage (cultural) values on the subject site (or adjoining if relevant).

This information can be provided by the environmental/cultural/planning consultant or alternatively, obtained through publicly available databases (SLIP database www.data.wa.gov.au or WA map database http://nationalmap.gov.au) and/or a local government's local biodiversity strategy or local planning strategy). If any of these values exist, an environmental or planning consultant will be required to undertake necessary environmental reports, and the BMP will need to respond to this report. This may trigger potential environmental impact/referral requirements under State and Federal environmental legislation.

Relevant datasets include:

- a) Department of Biodiversity, Conservation and Attractions (DBCA)
 - Threatened and priority flora (DBCA-036)
 - Threatened Ecological Communities (DBCA-038)
- b) Department of Planning, Lands and Heritage
 - Aboriginal Heritage Places (Aboriginal Heritage Places)
- c) Department of Water and Environmental Resources (DWER)
 - Clearing regulations Environmentally Sensitive Areas (DWER-046)
- d) Department of Primary Industries and Regional Development (DPIRD)
 - Conservation Covenants Western Australia (DPIRD-023) This data needs to be requested through the DPIRD Geographic Information Services team, and requires permission from the Commissioner for Soil and Land before they can be supplied.
- e) Department of Agriculture, Water and the Environment
 - National Heritage List (The West Kimberley)

Sub-section 2.1: Native vegetation – modification and clearing

- 1. Identify whether on-site clearing of native vegetation will be required.
 - Generally, if the subject site does not contain those values mentioned above and is not identified in a local planning strategy or local biodiversity strategy, clearing requirements will be in accordance with the *Environmental Protection (Clearing of Native Vegetation) Regulations 2004*.
 - Confirmation should be included from the relevant agencies that the proposed clearing is acceptable.

- 2. Identify alternative bushfire management strategies that may reduce the extent of vegetation clearing. These include:
 - · modification to the development site
 - locating development within existing cleared portions of the lot(s) and/or
 - increased hazard separation between proposed development and classified vegetation.

Sub-section 2.2: Cultural heritage

- 1. Identify whether on-site clearing/development will impact on heritage assets/places.
 - Confirmation should include that relevant agencies have been consulted.
- 2. Identify alternative bushfire management strategies that may reduce the extent of impact clearing. These include:
 - construction of the building to a higher standard as per BCA and AS3959 and/or
 - modification to the development location.
- 3. Potential impacts on heritage places may still require referral of a development application under a separate process to relevant agencies under the particular legislation, i.e. Aboriginal Heritage Act 1972, Environment Protection and Biodiversity Conservation Act 1999 (Australian Heritage Council).

Sub-section 2.3: Revegetation/Landscape plans

- 1. Identify those areas required or intended to be revegetated or retained as part of the proposal.
 - These may, for example, include monsoon thickets or foreshore buffers.
- 2. Provide written evidence and/or an approved landscape management plan to demonstrate that agencies responsible for the ongoing management (i.e., Shire of Broome and/or Department of Biodiversity, Conservation and Attractions) understand and commit to maintaining in perpetuity the vegetation classification assigned to the subject area where it does not represent the potential for revegetation and relies on ongoing management.

FIGURE 4: Landscape management plan (where relevant)

SECTION 3: BUSHFIRE ASSESSMENT RESULTS

A BAL assessment or BAL Contour Map is required, in accordance with clause 6.5 of SPP 3.7 and should be undertaken by at least a level 2 bushfire planning practitioner. A significant amount of information is already available for a number of communities on the Dampier Peninsula to assist with the preparation of a BAL assessment, including Bushfire Hazard Level (BHL) assessments and site assessments.

Sub-section 3.1: Assessment inputs

- BHL Assessments were prepared as part of the Strategic Guidance for the Preparation of Bushfire Management Plans for Tourism Proposals on the Dampier Peninsula for the following communities:
 - Kooljaman
 - Gumbanan
 - Ardyaloon
 - Cygnet Bay
 - Djarindjin
 - Lombadina
 - Embalgun
 - Middle Lagoon
 - Beagle Bay.
- Provide results of a site assessment in accordance with Australian Standard 3959.
 - Site assessments were prepared as part of the Strategic Guidance for the Preparation of Bushfire Management Plans for Tourism Proposals on the Dampier Peninsula for the following communities:
 - Beagle Bay
 - · Middle Lagoon
 - Lombadina
 - Djarindjin
 - Kooljaman
 - Gumbanan
 - Ardyaloon.
- Insert site photos to support the vegetation classification.
- Accredited practitioners should use the Fire Protection Association template.

Photo ID	
Plot number	In control of the
Vegetation classification or exclusion clause	Insert photo
Description/justification for classification	

FIGURE 5: Include a vegetation class and effective slope map as per Appendix 3 of the Guidelines.

- 1. Present any additional site data for BAL determination using Method 2.
- 2. Present verification of all variables used in Method 2 BAL determination calculations.

Sub-section 3.2: Assessment outputs

- 1. Map the BAL assessment.
- 2. Provide the BAL assessment/BAL Contour Map results in a table showing:
 - the results of the BAL assessment
 - the separation distances assessed as being achievable and that apply to each indicative BAL presented
 - whether Method 1 or Method 2 has been applied in the calculation of each BAL rating.

Method 1 or 2 BAL determination						
Vegetation area/ plot	Applied vegetation classification	Effective slope under the classified vegetation (degrees)	Separation distance to the classified vegetation (metres)	Bushfire Attack Level		
1						
2						
Determined Bushfire Attack Level						

Figure 6: BAL assessment or BAL contour map



SECTION 4: IDENTIFICATION OF BUSHFIRE HAZARD ISSUES

• Identify any bushfire hazard issues through examination of the environmental considerations and the BAL/BAL Contour Map assessment. This will assist in the understanding of whether the proposal is likely to be able to comply with the bushfire protection criteria.

SECTION 5: ASSESSMENT AGAINST THE BUSHFIRE PROTECTION CRITERIA

Sub-section 5.1: Compliance table

- 1. Tourism development on the Dampier Peninsula should demonstrate compliance with the bushfire protection criteria in Element 5 of the Guidelines, with 'performance principles' and 'acceptable solutions' being dependent on the particular land use that is being proposed. For Element 5 the 'intent' must be demonstrated by either addressing the relevant acceptable solutions; or where these acceptable solutions cannot be fully met, performance principle-based solutions can be developed to achieve the 'intent'.
- 2. Acceptable solutions should be provided within a table (example provided below) and not duplicated in the body of the BMP.

Acceptable solutions:

Present justification statements/discussion for the proposal's compliance or non-compliance with the relevant acceptable solutions. In every case, include all elements and their acceptable solutions but mark as N/A, where appropriate.

Performance based solutions:

Explanation and evidence-based justification of how the performance-based solution achieves the intent of the element. This must be presented to the extent that it clearly demonstrates the author understands the methodology being used to create the performance-based solution, and a decision-maker/advisor is able to verify the outcome.

The table below should be updated in accordance with the relevant tourism land use and its acceptable solutions in Element 5 to the proposal.

Below is an example based on the acceptable solutions for a remote camping ground or nature based park.

(Following is a format example with content to be deleted/added as applicable to the specific proposal.)

Bushfire	Method of compliance	Compliance Y/N or	Proposed bushfire management strategies
protection criteria	Acceptable solutions	N/A	Proposed businine management strategies
Siting and design	A5.10a APZ around camping ground facilities		Summarise the strategies proposed to meet compliance with this solution/stage and when they will be addressed.
	A5.10b Fire pits		
	A5.10c Pedestrian paths to on-site shelter		
	A5.10d On-site shelter		
Vehicular access	A5.11aa Two different access routes		
	A5.11b Through-roads		
	A5.11c Emergency access way		
	A5.11d On-site shelter		
	A5.11e Internal vehicular access		
	A5.11f Private driveway longer than 50m		
	A5.11g Signage		
Provision of water	A5.12a, b and c Non-reticulated water supply areas		

Sub-section 5.2: Additional management strategies

Discuss any additional bushfire management strategies that have been proposed, such as:

- consideration of landscaping and consistency between bushfire management, landscaping objectives and environmental objectives
- · any specific requirements of the local government's firebreak notice
- · buildings to function as an on-site shelter
- shelter on-site in a nominated open space area
- for a class of building not covered by AS 3959, the building is proposed to be constructed to utilise all of the elements of AS 3959 that apply to its appropriate Bushfire Attack Level (BAL)
- closure of the facility in response to a pre-determined fire danger rating and/or the issue of a total fire ban on any given day, or during the bushfire season.

Where an on-site shelter and/or off-site shelter is proposed, this section should outline how it aligns with the Dampier Peninsula Strategic Bushfire Risk Assessment and any safer places identified. The inclusion of maps is recommended.



The required bushfire risk mitigation measures that must be implemented and maintained on the specific lot (which include relevant bushfire protection criteria and the firebreak notice) should be represented spatially. This will form an easy reference guide for the local government and the landowner.

FIGURE 7: Spatial representation of the bushfire management strategies

Identify the following on the 'spatial representation of the bushfire management strategies' figure:

Spatial representation of the lot, identifying the:

- · lot boundary, any existing buildings and the proposed building footprint
- required APZ with annotated dimensions
- position of required internal access requirements
- position of required onsite water supply and associated access (if applicable)
- nearest water hydrant or direction and distance to hydrant (if applicable)
- buildings to function as on-site shelter and pedestrian paths leading to it (if applicable).



Figure 7: Complex Development Application Example



LEGEND RETICULATED LANDSCAPING SUBJECT LAND TREE REMOVAL CADASTRE PROPOSED BUILDINGS TREE PLANTING >6m 20m WIDE ASSET SHRUBS PLANTING <6m PROTECTION ZONE WATER TANK SEALED ACCESS 3m BOUNDARY FIREBREAK **GRAVEL ACCESS** EMERGENCY ACCESS WAY PHOTO POINT 3.6m ACCESS GATE NOTES SCALE

NOTES

- Service Road access is effectively a cul-de-sac but 275m distance to two way access. General access improved by having an Emergency Access Way (EAW).
- 2) Woodland vegetation is the primary vegetation plot.
- 3) AS3959 construction standards do not apply to the development under the BCA. The 30m setback gives a BAL-12.5 rating. The landowner may consider constructing the building to reduce potential ember attack by limiting openings on the western side and reducing all gaps.
- Removal of trees to provide a 20m plus spacing from classified vegetation and the development site.
- 20m Asset Protection Zone to comply with Schedule 1 of the Guidelines.
 This will also extend to the western boundary of the site.
- 6) Fire fighting water supply provided in accordance with Element 5 of the Guidelines. Tank located next to the car park, for use as a hardstand and turn-around area. Higher capacity static water supply may be required under the BCA for structural fire fighting.
- Landscaping to be maintained as reticulated garden/low threat vegetation excluded 2.2.3.2(f).
- 8) Infill tree planting may be excluded vegetation pursuant to 2.2.3.2(d)
- 9) Road verge unmanaged grassland
- 10) Vegetation rehabilitation area must consider mature vegetation characteristics.
- 11) Firebreak is 3m wide with 4m vertical clearance.
- 12) EAW with 6m trafficable surface with 3.6m wide access gate and signage.

PROPERTY/ASSESSME	NT DETAILS
Owner:	
Lot/No:	
Street:	
Locality:	
Prepared by:	
Company:	
Accreditation Level:	
Accreditation Number:	
Accreditation Expiry Date.	



This section should set out the responsibilities of the developer/s, landowner/s and local government for the initial implementation and ongoing maintenance of the required actions. The requirements are to be set out in a table/s and provide the following:

- the required initial and ongoing actions and any associated works that need to be undertaken
- responsibilities separately identified and assigned to the developer/s, landowner, local government, as applicable to the development
- for each responsible entity, the actions are to be assigned a number and
- the required timing of the actions.

(Following is a format example with content to be deleted/added as applicable to the specific proposal.)

	DEVELOPER/LANDOWNER – PRIOR TO SALE OR OCCUPANCY/OPERATION					
No.	Implementation action					
1	Install the emergency access ways, fire service access routes and associated signs and gates to the standards stated in the BMP					
2	Install the private driveways and battle-axes to the standards stated in the BMP					
3	Establish the Asset Protection Zone and landscaping to the dimensions and standard stated in the BMP and any accompanying Landscape Management Plan					
4	Install the required water tank dedicated for firefighting within the lot with minimum 20,000 litres that are in accordance with the construction and vehicle access specifications stated in Schedule 2 of the Guidelines for Planning in Bushfire Prone Areas					

	LANDOWNER/OCCUPIER – ONGOING MANAGEMENT				
No.	Management action				
1	Maintain the Asset Protection Zone and landscaping to the dimensions and standard stated in the BMP and the Landscape Management Plan				
2	Comply with the relevant local government annual firebreak notice issued under s33 of the Bush Fires Act 1954				
3	Maintain vehicular access routes within the lot to the required standards stated in the BMP				
4	Maintain the water tank dedicated for firefighting and its associated fittings and vehicular access in good working condition				

Note: there is no need to list actions against other agencies, unless it is specific to the development and the BMP includes written evidence from the agency listed that they understand and are willing to carry out those measures.



- Include documentation to support the BMP and assist with demonstration of bushfire management
- Include Schedule 1: Standards for Asset Protection Zones, Appendix 4 of the Guidelines and the Fire Break Notice.
- Excerpts from SPP 3.7 and the Guidelines (or other), should not be included within the BMP and if deemed necessary for context, can be provided as a separate document to the landowner. These excerpts should not be paraphrased.