

Bushfire Assessment Report

Proposed:
**New sole occupancy
dwelling**

At:
**60 Castle Circuit,
Seaforth NSW**

Reference Number: 230669

28th April 2023

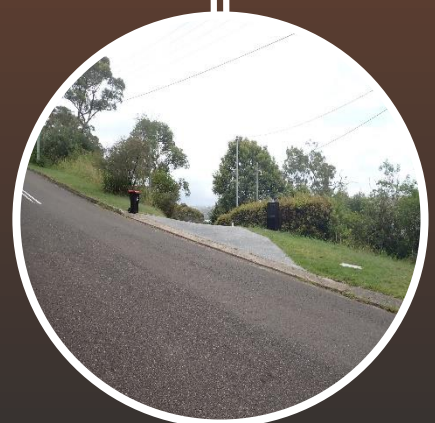


Prepared By:
**Building Code & Bushfire
Hazard Solutions Pty Limited**

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Contents

	<u>Page No.</u>
Copyright and Disclaimer	2
List of Abbreviations	3
1.0 Introduction	4
2.0 Legislative Requirements	5
3.0 Purpose of Report	6
4.0 Scope of Report	6
5.0 Compliance Table and Notes	6 - 7
6.0 Aerial view of the subject allotment	8
7.0 Site Assessment	9 - 13
8.0 Bushfire Protection Measures	14 - 17
9.0 Recommendations	18
10.0 Conclusion	19
11.0 Annexure	20
- List of referenced documents and attachments	
- Attachments	

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S4.14 applications (under the Environmental Planning and Assessment Act 1979) and all infill development applications may be referred by Council to the NSW Rural Fire Service for review and concurrence during the DA process. S100B applications under the Rural Fires Act 1997 (subdivisions and Special Fire Protection Purpose Developments), Flame Zone determinations and Alternate Solutions must be referred by Council to the NSW Rural Fire Service for review and receipt of a Bushfire Safety Authority (BSA) or other such recommended conditions from the NSW Rural Fire Service before the consent can be granted.

The onus is on the applicant to cross reference this document with any conditions of consent issued by Council or any requirements supplied by the NSW Rural Fire Service following development approval. BCBHS can review and cross reference these documents however the onus is on the applicant to provide them to us and request this review – Building Code and Bushfire Hazard Solutions Pty. Ltd. is not in a position to track every DA through Council and we rely upon the applicant to undertake this role as project co-ordinator.

Where any discrepancy between this document and the development approval or the NSW Rural Fire Service requirements is found, the conditions of consent always take precedence until such time as an application to review, amend or vary these conditions is approved.

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Version Control				
Version	Date	Author	Reviewed by	Details
1	28/04/2023	Rob Crump	Andrew Muirhead	Final Report

List of Abbreviations:

APZ	Asset Protection Zone
AS3959	Australian Standard 3959 – 2018
BAL	Bushfire Attack Level
BPMs	Bushfire Protection Measures
BPLM	Bushfire Prone Land Map
Council	Northern Beaches Council
DA	Development Application
ELVIS	Elevation and Depth Foundation Spatial Data
EP&A Act	<i>Environmental Planning and Assessment Act - 1979</i>
ESD	Ecologically Sustainable Development
FRNSW	Fire and Rescue NSW
IPA	Inner Protection Area
NASH	National Association of Steel-framed Housing
NCC	National Construction Code
NP	National Park
NSP	Neighbourhood Safer Place
OPA	Outer Protection Area
PBP	<i>Planning for Bush Fire Protection - 2019</i>
ROW	Right of Way
RF Act	<i>Rural Fires Act - 1997</i>
RFS	NSW Rural Fire Service
SEPP	State Environmental Planning Policy
SFPP	Special Fire Protection Purpose
SWS	Static Water Supply

1.0 Introduction

The development proposal relates to the construction of a new sole occupancy dwelling within an existing vacant residential allotment located at 60 Castle Circuit, Seaforth (Lot 16 DP 200638).

The subject property has a street access via an access drive to Castle Circuit to the north and abuts a similar residential allotment to the south and a large vegetated allotment to the west.

Properties considered to be affected by possible bushfire impact are determined from the local Bushfire Prone Land Map as prepared by Council and or the Rural Fire Service. All property development within affected areas is subject to the conditions detailed in the document 'Planning for Bush Fire Protection - 2019' (PBP).

PBP formally adopted on the 1st March 2020 provides for the protection of property and life (including fire-fighters and emergency service personnel) from bushfire impact.

Northern Beaches Council's Bushfire Prone Land Map identifies the subject property as containing the Category 1 Vegetation and the Vegetation Buffer.

As the application relates to the construction of a sole occupancy dwelling within an existing residential allotment the relevant specifications and requirements under PBP are the aim and objectives detailed in Chapter 1 'Introduction' and specific objectives and bushfire protection measures detailed in Chapter 7 'Residential Infill Development'.

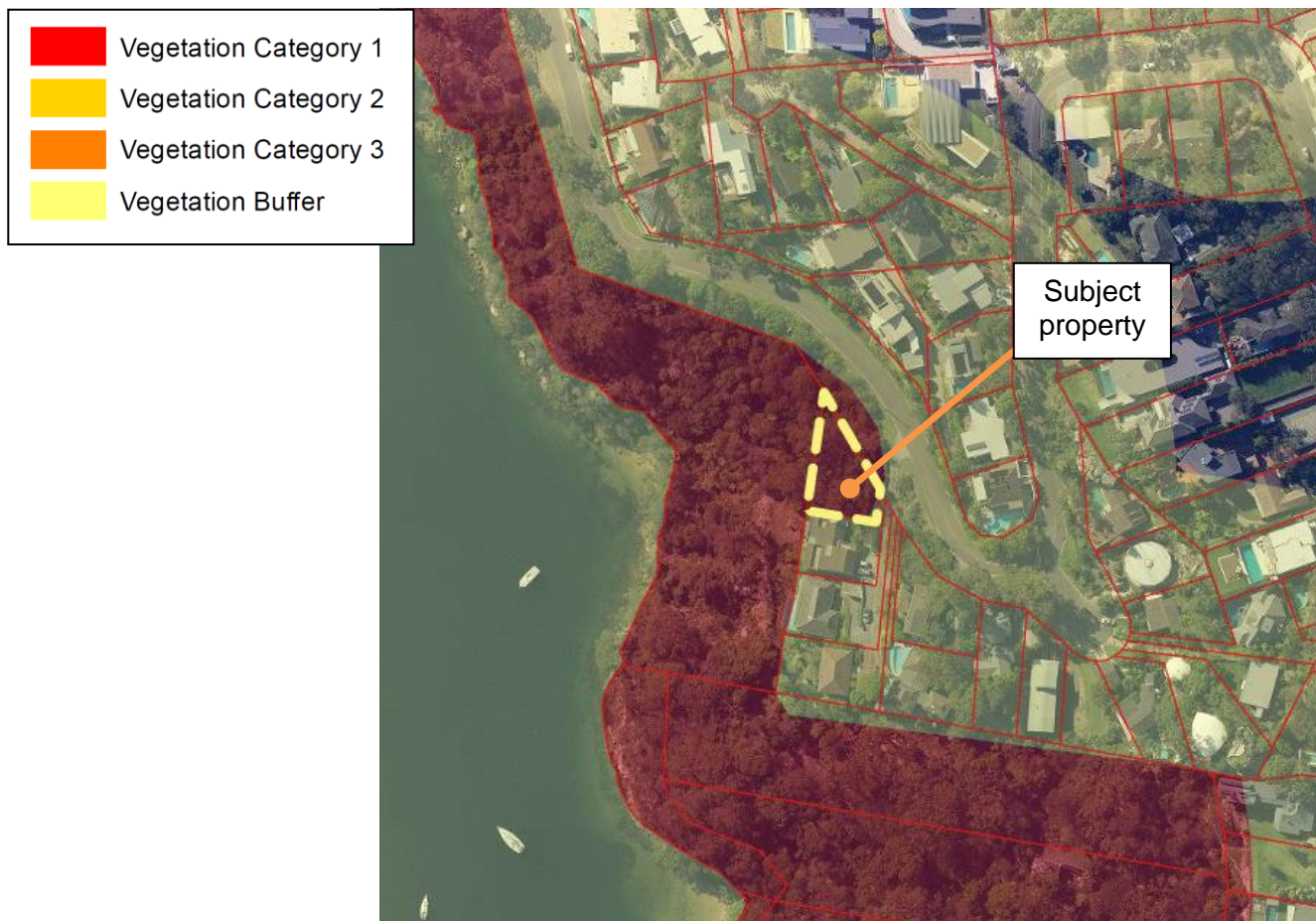


Figure 01: Extract from Northern Beaches Council's Bushfire Prone Land Map

2.0 Legislative Requirements

The subject site is designated as Bushfire Prone Land (Figure 01).

In accordance with section 4.14 of the *Environmental Planning and Assessment Act 1979* development consent cannot be granted for the carrying out of development for any purpose (other than a subdivision of land that could lawfully be used for residential or rural residential purposes or development for a special fire protection purpose) on bush fire prone land unless the consent authority:

- (a) *is satisfied that the development conforms to the specifications and requirements of the version (as prescribed by the regulations) of the document entitled Planning for Bush Fire Protection, or*
- (b) *has been provided with a certificate by a person who is recognised by the NSW Rural Fire Service as a qualified consultant in bush fire risk assessment stating that the development conforms to the relevant specifications and requirements.*
- (1A) *If the consent authority is satisfied that the development does not conform to the relevant specifications and requirements, the consent authority may, despite subsection (1), grant consent to the carrying out of the development but only if it has consulted with the Commissioner of the NSW Rural Fire Service concerning measures to be taken with respect to the development to protect persons, property and the environment from danger that may arise from a bush fire.*

This Bushfire Assessment Report and accompanying certificate has been prepared by a person who are recognised by the NSW Rural Fire Service (RFS) as qualified in bushfire risk assessment and has been accredited by the Fire Protection Association of Australia as a Level 2 BPAD qualified practitioner.

In addition, the National Construction Code 2019 includes the following provisions:

3.10.5.0 is replaced with the following clause in New South Wales:

Performance Requirement P2.7.5 is satisfied, for—

- (a) *a Class 1 building; or*
- (b) *a Class 10a building or deck associated with a Class 1 building, located in a designated bushfire prone area, if it is constructed in accordance with the following:*
- (c) *AS 3959 except—*
 - (i) *as amended by Planning for Bush Fire Protection; and*
 - (ii) *for Section 9 for Bushfire Attack Level FZ (BAL-FZ).*
- (d) *NASH Standard – Steel Framed Construction in Bushfire Areas except—*
 - (i) *as amended by Planning for Bush Fire Protection; and*
 - (ii) *for buildings subject to Bushfire Attack Level FZ (BAL-FZ).*
- (e) *the requirements of (c), or (d) above as modified by the development consent following consultation with the NSW Rural Fire Service under section 4.14 of the Environmental Planning and Assessment Act 1979 if required;*

3.0 Purpose of Report

The purpose of this Bushfire Assessment Report is to provide the owners and Council with an independent bushfire assessment together with appropriate recommendations for both new building construction and bushfire mitigation measures considered necessary having regard to construction within a designated 'bushfire prone' area.

The recommendations contained within this report may assist in forming the basis of any specific construction conditions and/or bushfire mitigation measures that Council and/or the NSW Rural Fire Service may elect to place within any consent conditions issued for the subject Development Application.

4.0 Scope of this Report

The scope of this report is limited to providing a bushfire assessment and recommendations for the subject property. Where reference has been made to the surrounding lands, this report does not purport to directly assess those lands; rather it may discuss bushfire impact and/or progression through those lands and possible bushfire impact to the subject property.

5.0 Compliance Tables & Notes

The following table sets out the projects compliance with *Planning for Bush Fire Protection – 2019*.

	North	South	East	West
Vegetation Structure	Maintained curtilages	Forest	Maintained curtilages	Forest
Slope	N/A	15 - 20 degrees down	N/A	>20 degrees down
Available Asset Protection Zone	N/A	>63 metres	N/A	>4 metre
Significant Landscape Features	Castle Circuit	Neighbouring private residential allotments	Neighbouring private residential allotments	Vegetated allotment
Bushfire Attack Level	N/A	BAL 29	N/A	BAL FZ
Required Construction Level	BAL FZ	BAL FZ	BAL FZ	BAL FZ

Compliance Summary of Bushfire Protection Measures			
Bushfire Protection Measure (s7 PBP)	Acceptable Solution	Performance Solution	Report Section
Asset Protection Zones	<input type="checkbox"/>	<input checked="" type="checkbox"/>	8.02
Construction Standards	<input type="checkbox"/>	<input checked="" type="checkbox"/>	8.03
Access	<input checked="" type="checkbox"/>	<input type="checkbox"/>	8.04
Water Supplies	<input checked="" type="checkbox"/>	<input type="checkbox"/>	8.05
Electricity and Gas Services	<input checked="" type="checkbox"/>	<input type="checkbox"/>	8.05
Landscaping	<input checked="" type="checkbox"/>	<input type="checkbox"/>	8.07

6.0 Aerial view of the subject allotment

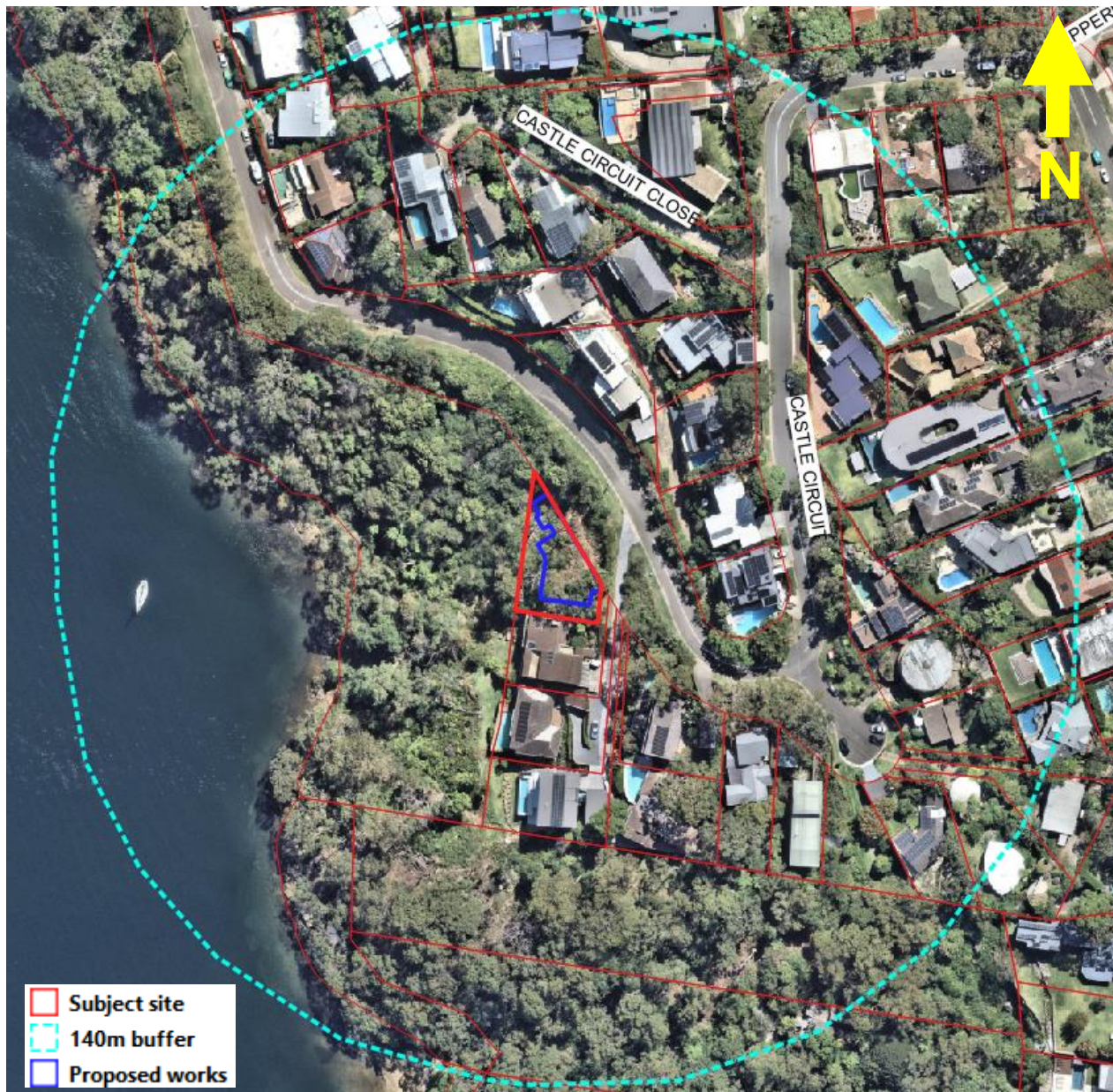


Figure 02: Aerial view of the subject area C/- Nearmap

7.0 Site Assessment

A representative of Building Code & Bushfire Hazard Solutions completed a site inspection of the subject site and surrounding area on 27 January 2023.

The following external data sources have been relied upon for this assessment:

- Aerial imagery of the subject area (NSW Spatial Services & Nearmap);
- 1 metre contour mapping of the subject area (Elevation and Depth Foundation Spatial Data – Geoscience Australia)
- NSW Planning Portal Spatial Viewer
- Vegetation mapping (NSW State Vegetation Type Map)
- NSW Bush Fire Prone Land (NSW Rural Fire Service)

7.01 Location

The subject property is known as 60 Castle Circuit, Seaforth (Lot 16 DP 200638) and is a residential allotment (zoned R2: Low Density Residential) located within Northern Beaches Councils Local Government Area.

The subject property has a street access via an access drive to Castle Circuit to the north and abuts a similar residential allotment to the south and a large vegetated allotment to the west.

The vegetation identified as being the hazard is within vegetated foreshore reserve to the west and within vegetated allotments to the south of the proposed dwelling.



Figure 03: Extract from Street-directory.com.au

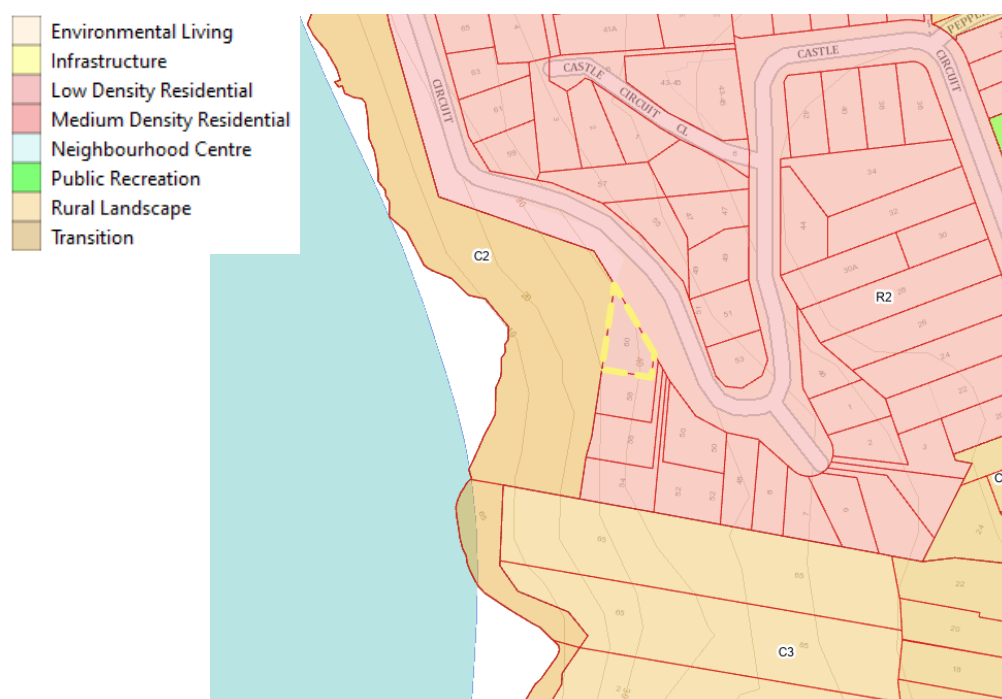


Figure 04: Land zoning of subject area (source NSW Planning Portal)

7.02 Vegetation

In accordance with Appendix 1 'Site Assessment Methodology' of PBP an assessment of all vegetation formations within 140 metres of the subject site for each aspect as per Keith (2004) has been undertaken.

The predominant vegetation within the neighbouring private residential allotments was found to consist of landscaped gardens and urban landscaping.

The vegetation identified as being the hazard is within vegetated foreshore reserve to the west and within vegetated allotments to the south. The vegetation posing a hazard was found to consist of trees 10 - 20 metres in height with 50 - 70% foliage cover, the understorey consisted of low trees, ferns and exotics. A high concentration of known hard to burn species was observed with the adjacent foreshore reserve adjacent the subject site.

The vegetation to the west has a potential fire run of less than 50 metres directly towards the site. For the purpose of assessment under PBP would determine the vegetation posing a hazard to the west to be Remnant in accordance with A1.11 of PBP. However, it is acknowledged that there is a greater than 50 metre fire run to the northwest and although this was not deemed the highest threat to this aspect a conservative assessment has been taken. Regardless this would not alter the determined Bushfire Attack Level.

For the purpose of assessment under PBP we have determined the vegetation posing a hazard to the south and west to be Forest.

Forest



Photograph 01: View into the vegetation to the west of the subject property.

Known hard to
burn species



Photograph 02: View across the subject property toward the vegetation to the northwest

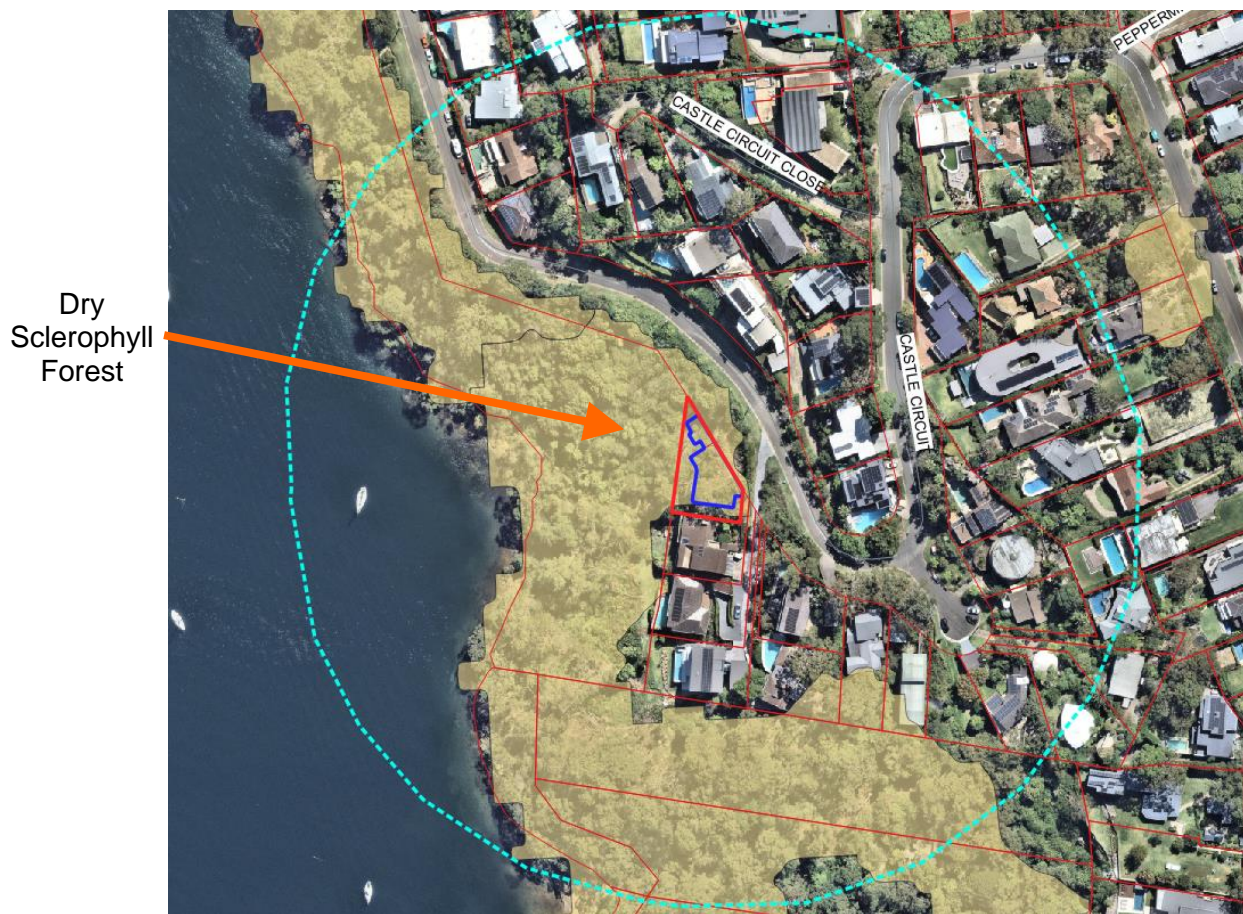


Figure 05: Extract from Vegetation Mapping NSW, showing the vegetation type to the south and west of the subject property.

7.03 Slope and Topography

The slope of the land under the classified vegetation has a direct influence on the forward rate of spread, fire intensity and radiant heat exposure. The effective slope is considered to be the slope under the classified vegetation which will most significantly influence bushfire behaviour toward the development site.

In accordance with A1.4 'Determine slope' of PBP the slope assessment is to be derived from the most detailed contour data available.

The slope that would most significantly influence bushfire behaviour was determined from topographic imagery in conjunction with site observations to be:

- > 20 degrees down slope within the hazard to the west
- 15 - 20 degrees down slope within the hazard to the south

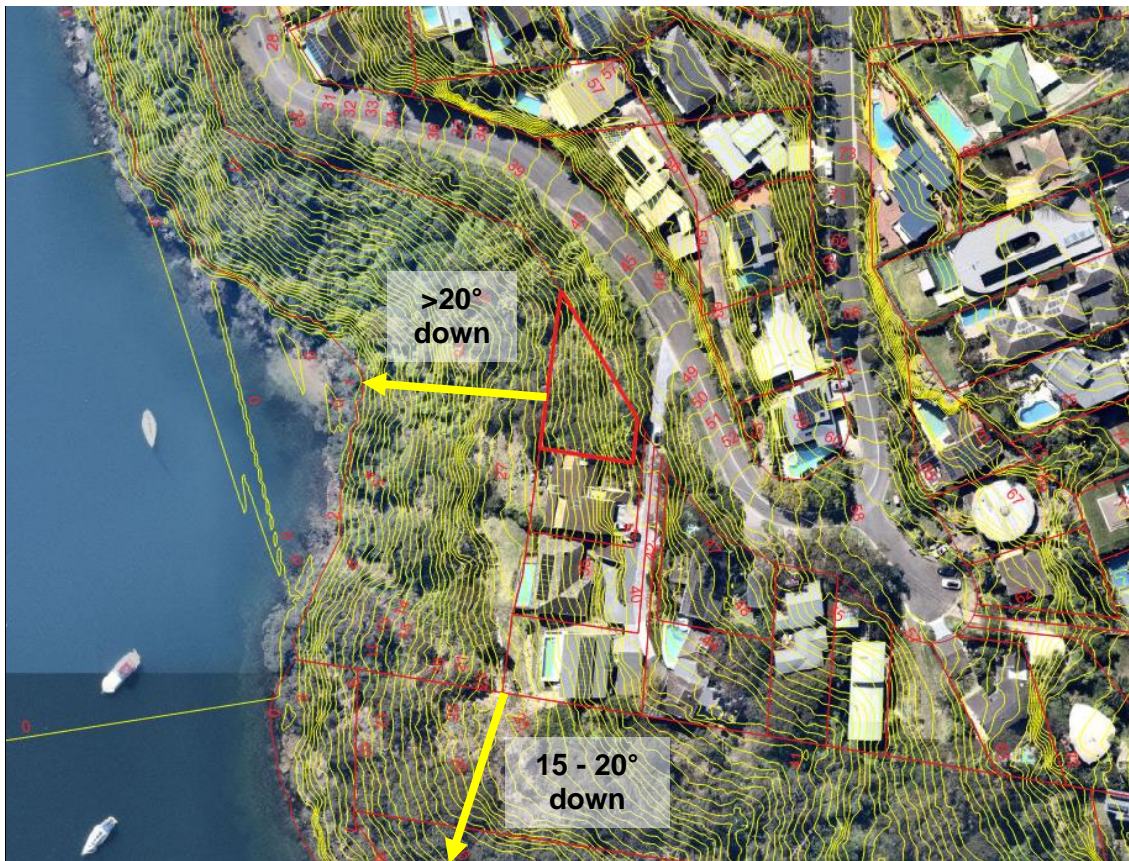


Figure 06: Extract from ELVIS – Geoscience Australia

7.04 Fire Weather

All development which attracts an Asset Protection Zone under PBP requires the identification of the relevant Forest Fire Danger Index (FFDI). The FFDI required to be used for development assessment purposes is based on the local government boundaries, being Northern Beaches Council in this instance.

In accordance with the NSW Rural Fire Service publication 'NSW Local Government Areas FDI' (2017) Northern Beaches Council forms part of the Greater Sydney Region Fire Weather District and attracts an FFDI of 100.

8.0 Bushfire Protection Measures

8.01 Planning for Bush Fire Protection - 2019

Planning for Bush Fire Protection – 2019 (PBP) is applicable to development located on land determined as being 'bushfire prone' in accordance with the local Bushfire Prone Land Map.

Bushfire prone land are defined as those areas;

- *containing or within 100m of Category 1 Vegetation; or*
- *containing or within 30m of Category 2 or 3 Vegetation.*

Northern Beaches Council's Bushfire Prone Land Map identifies the subject property as containing the Category 1 Vegetation and Vegetation Buffer therefore PBP must apply in this instance.

The application of Planning for Bush Fire Protection requires satisfactory demonstration of the aim and objectives and the following bushfire protection measures (BPMs):

- Asset Protection Zones
- Building construction, siting & design
- Access arrangements
- Water supply & utilities
- Landscaping

As the proposal relates to the construction of a new sole occupancy dwelling the proposal must comply with the bushfire protection measures detailed within Chapter 7 'Residential Infill Development' of PBP.

8.02 Asset Protection Zones

An Asset Protection Zone (APZ) is an area between the development (in this instance the building footprints) and the identified bushfire hazards where the fuels are maintained to a minimum to prevent the spread of fire between a hazard and an asset.

The width of the APZ is determined by the vegetation structure of the identified hazard, Forest Fire Danger Index, effective slope and the type of development (residential development or Special Fire Protection Purpose).

The Acceptable Solution under Table 7.4a of PBP requires APZs be provided in accordance with Table A1.12.2, consistent with that for residential subdivisions.

The minimum required APZ for the proposed works are determined from Table A1.12.2 of PBP or bushfire design modelling to achieve a maximum radian heat level of 29 kW/

The existing building footprints and allotment configuration precludes the ability to provide APZs achieving compliance with the minimum required APZs in accordance with Table A1.12.2, with an available APZ of >4 metre to the bushfire hazard to the west and >63 metres to the bushfire hazard to the south. Compliance with the Performance Criteria is therefore necessary. The corresponding Performance Criteria being;

- *APZs are provided commensurate with the construction of the building; and*
- *A defensible space is provided.*

Section 7.1 of PBP recognises the expectation of building in pre-existing subdivisions even though the ability to provide for APZs or access requirements now required for residential development may not be possible.

It is proposed that all grounds not built upon within the subject site be maintained in accordance with an APZ (Inner Protection Area). This will result in the provision of a defendable space for attending fire service and in conjunction with the application of the recommended construction provisions will provide APZs commensurate with the construction.

In this instance the subject dwelling will comply with a Bushfire Attack Level of Flame Zone being the relevant BAL.

In consideration of the attributes of the hazard and surrounding landscape the available APZs are considered to provide an adequate defendable space.

It is therefore my opinion that the application satisfies the Performance Criteria as detailed above.

8.03 Building construction, siting & design

Australian Standard 3959 – 2018 ‘Construction of buildings in bushfire-prone areas’ (AS3959) specifies construction standards for buildings within various Bushfire Attack Levels as determined by Planning for Bush Fire Protection – 2019.

AS3959 provides for six (6) levels of building construction these being BAL - Low, BAL - 12.5, BAL - 19, BAL - 29, BAL - 40 and BAL - FZ.

Bushfire Attack Level	Maximum radiant heat impact (kW/m ²)	Level of construction under AS3959-2018
Low		No special construction requirements
12.5	≤12.5	BAL - 12.5
19	12.6 to 19.0	BAL - 19
29	19.1 to 29.0	BAL - 29
40	29.1 to 40.0	BAL - 40
Flame Zone	>40.0	BAL FZ No deemed to satisfy provisions

Table 01: Correlation between bushfire impact and AS3959

The highest Bushfire Attack Level to the proposed works was determined from Table A1.12.5 of PBP to be ‘Flame Zone’.

While the NSW variation to the National Construction Code (NCC) excludes both AS3959 and the NASH Standard as a Deemed to Satisfy solution for buildings in the Flame Zone, they should still be used as a basis for a performance based solution.

The proposed works will be constructed to sections 3 & 9 (BAL FZ) under AS 3959 – 2018 and the additional construction requirements detailed in section 7.5 of PBP or the relevant BAL-FZ requirements of the NASH Standard - *Steel Framed Construction in Bushfire Areas (incorporating amendment A - 2015)*.

8.04 Property Access

The subject property has street frontage to Castle Circuit to the east. Persons seeking to egress from the subject property will be able to do so via the proposed access drive and public roads.

The most distant external point of the proposed footprint is less than 70 metres from a public road supporting the operational use of fire fighting vehicles and therefore the Access requirements detailed in Table 7.4a of PBP are not applicable.

Access to the hazard is available via the Castle Circuit and / or Middle Harbour for hazard reduction for fire suppression activities.

The proposed access is considered adequate for this development.

8.05 Water Supply & Utilities

Hydrants are available throughout Castle Circuit and surrounding streets for the replenishment of fire service vehicles. The most distant external point of the subject dwelling is <70 metres from a hydrant and therefore a Static Water Supply is not required in consideration of AS2419.1 and section 7.4 of PBP. Regardless the proposed pool will provide an additional water supply.

The existing water supply is considered adequate for the replenishment of attending fire services and will be supplemented as part of this application.

The proposed dwelling will be connected to the existing electrical network.

Any new gas connections must comply with Table 7.4a of PBP.

8.06 Emergency management arrangements

Evacuation is possible by utilising existing road infrastructure.

It is encouraged that the occupants complete a Bush Fire Survival Plan. The template for this plan is available at <https://www.rfs.nsw.gov.au/resources/bush-fire-survival-plan>.

8.07 Landscaping

Any new landscaping must comply with Section 3.7 'Landscaping' of *Planning for Bush Fire Protection* 2019.

8.08 Aim & Objectives of PBP

The following table details the aim and objectives of *Planning for Bush Fire Protection* 2019 and the proposals ability to comply.

Aim / Objective	Comment
The aim of PBP is to provide for the protection of human life and minimise impacts on property from the threat of bush fire, while having due regard to development potential, site characteristics and protection of the environment.	With the inclusion of the recommendations made herein it is of our opinion that the aim of PBP has been satisfied.

Aim / Objective	Comment
(i) afford buildings and their occupants protection from exposure to a bush fire;	The dwelling will be constructed to the applicable BAL providing occupants protection from the exposures of a bushfire.
(ii) provide for a defensible space to be located around buildings;	<p>A >4 metre APZ is provided to the west, consisting of maintained grounds within the subject site and neighbouring residential allotments.</p> <p>In consideration of the site circumstances a suitable defensible space is provided.</p>
(iii) provide appropriate separation between a hazard and buildings which, in combination with other measures, prevent the likely fire spread to buildings;	The proposed works being constructed to the applicable BAL will minimise potential material ignition.
(iv) ensure that appropriate operational access and egress for emergency service personnel and occupants is available;	The existing access drive and road network provide appropriate access and egress for emergency services and occupants.
(v) provide for ongoing management and maintenance of bush fire protection measures, (BPMs); and	<p>All grounds within the subject site shall be maintained in accordance with an Asset Protection Zone / Inner Protection Area as detailed in Appendix 4 of Planning for Bush Fire Protection 2019 and the NSW Rural Fire Service publication 'Standards for Asset Protection Zones'.</p> <p>Any new landscaping is to comply with the provisions of Table 7.4a and Appendix 4 of PBP.</p>
(vi) ensure that utility services are adequate to meet the needs of firefighters.	<p>Hydrants are available throughout Castle Circuit and surrounding streets for the replenishment of fire service vehicles.</p> <p>The existing water supply is considered adequate for the replenishment of attending fire services.</p>

It is therefore of our opinion that the proposal can satisfactorily comply with the aim and objectives of *Planning for Bush Fire Protection 2019*.

9.0 Recommendations

The following recommendations are provided as the minimum necessary for compliance with *Planning for Bush Fire Protection* – 2019 and Australian Standard 3959 'Construction of buildings in bushfire-prone areas - 2018. Additional recommendations are provided to supplement these minimum requirements where considered necessary.

Asset Protection Zones

1. At the commencement of construction and in perpetuity all grounds within the subject property are to be maintained as an Asset Protection Zone (Inner Protection Area) as detailed in the NSW Rural Fire Service's document 'Standards for Asset Protection Zones' and Appendix 4 of *Planning for Bush Fire Protection* 2019.

Construction

2. That the new dwelling must comply with Section 3 (excluding section 3.5) and Section 9 (BAL FZ) of the Australian Standard AS3959-2018 *Construction of buildings in bushfire-prone areas* or the relevant BAL-FZ requirements of the NASH Standard - *Steel Framed Construction in Bushfire Areas (incorporating amendment A - 2015)*. New construction must also comply with the construction requirements in Section 7.5 of *Planning for Bush Fire Protection* 2019.

Landscaping

3. That any new landscaping is to comply with Section 3.7 'Landscaping' under *Planning for Bush Fire Protection* 2019.

Emergency management

4. That the occupants of the subject dwelling complete a Bush Fire Survival Plan.

Gas (where applicable)

5. That any new gas services are to comply with Table 7.4a of *Planning for Bush Fire Protection* 2019 as follows:
 - reticulated or bottled gas is installed and maintained in accordance with AS/NZS 1596:2014 and the requirements of relevant authorities, and metal piping is used;
 - all fixed gas cylinders are kept clear of all flammable materials to a distance of 10m and shielded on the hazard side;
 - connections to and from gas cylinders are metal;
 - polymer-sheathed flexible gas supply lines are not used; and
 - above-ground gas service pipes are metal, including and up to any outlets.

10.0 Conclusion

Northern Beaches Council's Bushfire Prone Land Map identifies the subject property as containing the Category 1 Vegetation and Vegetation Buffer and therefore the site is considered 'bushfire prone'.

As the subject site is bushfire prone in accordance with section 4.14 of the *Environmental Planning and Assessment Act* 1979 development consent cannot be granted unless the proposal satisfies the relevant specifications and requirements of *Planning for Bush Fire Protection* 2019 (PBP) or the consent authority has consulted with NSW RFS.

As the proposal relates to the construction of a new sole occupancy dwelling the proposal must comply with the bushfire protection measures detailed within Chapter 7 'Residential Infill Development' of PBP.

The highest Bushfire Attack Level to the proposed works was determined from Table A1.12.5 of PBP to be 'Flame Zone' and construction requirements within NSW are therefore outside the scope of AS 3959 – 2018. The proposed dwelling will be constructed to sections 3 & 9 (BAL FZ) under AS 3959 – 2018 or the relevant BAL-FZ requirements of the NASH Standard - *Steel Framed Construction in Bushfire Areas (incorporating amendment A - 2015)* and the additional construction requirements detailed in section 7.5 of PBP.

In accordance with the bushfire safety measures contained in this report, and consideration of the site specific bushfire risk assessment it is our opinion that when combined, they will provide a reasonable and satisfactory level of bushfire protection to the subject development.

We are therefore in support of the development application.

Should you have any enquiries regarding this project please contact me at our office.

Prepared by
Building Code & Bushfire Hazard Solutions



Rob Crump
Bushfire Consultant

Reviewed and endorsed by
Building Code & Bushfire Hazard Solutions



Andrew Muirhead
Bushfire Consultant
Graduate Certificate in Bushfire Protection
Diploma of Engineering.
FPA Australia BPAD Level 2 Accredited Practitioner
BPAD Accreditation No. BPAD46966



11.0 Annexure 01

List of Referenced Documents

Australian Building Codes Board (2019). *National Construction Code Volume Two - Building Code of Australia*. ABCB

ELVIS -Elevation -Foundation Spatial Data. Elevation.fsdf.org.au. Available at:
<http://elevation.fsdf.org.au/>

Keith, D. (2004). "Ocean Shores to Desert Dunes" Department of Environment and Conservation, Sydney

NSW Department of Planning and Environment (2019). *Planning Portal*. Accessed at:
<https://www.planningportal.nsw.gov.au/>

NSW Rural Fire Service (2019). *Planning for Bush Fire Protection. A Guide for Councils, Planners, Fire Authorities and Developers*.

Rural Fire Service NSW (2005). *Standards for Asset Protection Zones*

Site plan prepared by Cadence and Co, date 20/04/2023

Standards Australia (2018). *AS3959 Construction of buildings in bushfire-prone areas*.

Standards Australia (2014). *AS/NZS 1596 The storage and handling of LP Gas*

Acknowledgements to:

Nearmap
Geoscience Australia
NSW Department of Lands – SIXMaps
Street-directory.com.au

Attachments

Attachment 01: s4.14 Compliance Certificate



Bushfire Hazard Solutions

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BUSHFIRE RISK ASSESSMENT CERTIFICATE UNDER PART 4 DIVISION 4.3 SECTION 4.14 OF THE EP&A ACT 1979 NO 203

PROPERTY ADDRESS:	60 Castle Circuit, Seaforth
DESCRIPTION OF PROPOSAL:	Sole Occupancy Dwelling
PLAN REFERENCE: (relied upon in report preparation)	Site plan prepared by Cadence & Co Pty Ltd, Rev. 01, Dated 20.04.2023
BAL RATING:	BAL FZ
BUSHFIRE ASSESSMENT REPORT REFERENCE:	230669
REPORT DATE	28 April 2023
CERTIFICATION NO/ACCREDITED SCHEME	BPAD46966

I, Alvin, of Building Code and Bushfire Hazard Solutions Pty Ltd hereby certify, in accordance with Part 4 Division 4.3 Section 4.14 of the *Environmental Planning and Assessment Act 1979 No 203*:

1. That I am a person recognised by the *NSW Rural Fire Service* as a qualified consultant in bushfire risk assessment; and
2. That subject to the recommendations contained in the Bushfire Risk Assessment Report the proposed development conforms specifications and requirements of the documents entitled *Planning for Bush Fire Protection* prepared by the NSW Rural Fire Service in co-operation with the Department of Planning and any other documents as prescribed by Part 4 Division 4.3 Section 4.14 of the *Environmental Planning and Assessment Act 1979 No 203*.

I am aware that the Bushfire Assessment Report, prepared for the above mentioned site is to be submitted in support of a development application for this site and will be relied upon by Council as the basis for ensuring that the bushfire risk management aspects of the proposed development have been addressed in accordance with *Planning for Bush Fire Protection 2019*.

Signature: Alvin Date: 28 April 2023

