

## LOTS 9000 BUSSELL HIGHWAY, MARGARET RIVER

# STRUCTURE PLAN

Margaret River South

Prepared by Hex Design & Planning

> June 2024 (January 2023)

29A Bartlett Crescent Karrinyup WA 6018 T +61 438 000 235 E admin@hexdesignplanning.com.au ABN 34627142299 SCUDERIA HOLDINGS PTY LTDT/AS HEX DESIGN AND PLANNING

SHARE.

## **ENDORSEMENT PAGE**

This Structure Plan is prepared under the provisions of the Shire of Augusta-Margaret River Local Planning Scheme No. 1

IT IS CERTIFIED THAT THIS STRUCTURE PLAN WAS APPROVED BY RESOLUTION OF THE WESTERN AUSTRALIAN PLANNING COMMISSION ON:

#### 02 July 2024

Signed for and on behalf of the Western Australian Planning Commission:

An officer of the Commission duly authorised by the Commission pursuant to section 24 of the *Planning and Development Act 2005* for that purpose, in the presence of:

Witness:

Date:

03 July 2024

Date of Expiry: 03 July 2034

## TABLE OF AMENDMENTS

Amendment No.	Summary of Amendment	Amendment Type	Date approved by WAPC

## TABLE OF DENSITY PLANS

WAPC Subi Ref	Density Plan Ref	Date approved by WAPC

## **EXECUTIVE SUMMARY**

#### Structure Plan – Margaret River South

This report represents an application to the Shire of Augusta Margaret River to consider-a proposed Structure Plan comprising Lot 9000 Bussell Highway, Margaret River, herein referred to as the 'subject land'.

The site comprises one certificate of title, 67.63ha and is situated approximately 2.5 km south of the Town Centre. The site is located at the junction of Bussell Highway and the Perimeter Road, with the land bound by Bussell Highway, Perimeter Road and Darch Road, Margaret River ('the subject site').

The Structure Plan has been prepared following a Local Scheme Amendment to rezone the land within the 'Future Development'. The subject land was rezoned by Amendment 52 to the Scheme, which was considered by the Shire in July 2022.

The Margaret River South Structure Plan will facilitate the future subdivision and development of residential lots at a variety of densities ranging from R10 – R40 and accommodate a site for a future Primary School and retirement/lifestyle village. The vision for the development also incorporates a residential clubhouse facility (social club) that will be under the ownership and control of a future residential association.

It is also supported by various technical investigations to address issues associated with environmental impact, bushfire management, servicing and noise attenuation due to its proximity to the Margaret River Perimeter Road. This Structure Plan has been prepared in accordance with the relevant planning framework and will provide appropriate guidance to the future subdivision and development assessment of the land.

The Structure Plan Summary Table below details the nature and key outcomes of the Structure Plan.

#### **Structure Plan Summary Table**

ITEM	DATA	Structure Plan REF (section no.)	
Total area covered by the Structure Plan	67.63 ha	Section 1.2	
<ul> <li>Area of each land use proposed:</li> <li>Residential</li> <li>Education (Primary School)</li> <li>Retirement / Lifestyle</li> <li>Common Property / Community Facility</li> </ul>	25.33 ha (37.5%) 3.5 ha (5.2%) 10.6 ha (15.7%) 1.5 ha (2.2%)	Section 4.5.1 Section 4.5.7 Section 4.5.5 Section 4.5.4	
Total estimated lot yield	382 lots + 1 land lease landholding (250)	Section 1.1, 4.5.1	
Estimated number of dwellings	411 dwellings + 250 land lease (661)	Section 4.5.1	
Estimated population	1,068 persons + 375 land lease persons (1,443)	Section 4.5.1	
Estimated residential site density	16.2 dwellings per site hectare	Section 4.5.1	
Estimated area and percentage of Public Open Space given over to:		1 I	
<ul> <li>Regional open space</li> <li>District POS</li> <li>Local parks</li> </ul>	Nil 3.5 ha (6%) 11.1 ha (18%)	Section 4.3, 4.4	

## **Part One - Implementation**

Margaret River South Structure Plan

## Part One - Implementation

#### Structure Plan – Margaret River South

#### 1. Structure Plan Area

This Structure Plan shall apply to Lot 9000 Bussell Highway, Margaret River. The Structure Plan area is defined by the line denoting the Structure Plan boundary on the Structure Plan Map (Plan 1).

#### 2. Operation

The date the Structure Plan comes into effect is the date the Structure Plan is approved by the WAPC.

#### 3. Subdivision and Development Requirements

- 3.1 Land use permissibility within the Structure Plan area shall be in accordance with the corresponding zone or reserve under the Scheme.
- 3.2 At the time of subdivision, the following strategies and plans may be required via conditions of subdivision approval:
  - a) Urban Water Management Plan;
  - b) Fauna Management Plan;
  - c) Landscape and Streetscape Plan;
  - d) Bushfire Management Plan; and
  - e) Noise Assessment.
- 3.3 As a condition of subdivision, the applicant will be required to:
  - a) Undertake and implement the recommendations of Transcore Consultants Transport Impact Assessment dated December 2022 (as amended) as part of the first stage of subdivision for the structure plan area.
  - b) Cede and reserve land identified for public open space free of cost.
  - c) Ensure earthwork programs protect existing vegetation where possible.
  - d) Prepare a water management report for each of the cells which addresses the water management for each of the cells within the local structure plan area in their entirety.
  - e) Implement the recommendations of an approved Sustainability Report for the local structure plan.
  - f) Prepare and implement a landscaped earthbund within the Public Open Space reserve adjoining Bussell Highway and the Margaret River Perimeter Road, as outlined on the Structure Plan Map, which forms a visual amenity/landscape function and provides for noise attenuation to adjoining residential areas.
- 3.4 This Structure Plan is to be read in conjunction with the special provisions relating to the land (SPA 5) contained in Schedule 11 of the Shire of Augusta Margaret River Local Planning Scheme No. 1
- 3.5 Residential Density
  - a) Plan 1 defines the residential density code, or residential density code range, that apply to specific areas within the Structure Plan. Except where already specified on Plan 1, lot specific residential densities, within the defined residential density ranges, are to be assigned in accordance with a Residential Density Code Plan approved by the WAPC.
  - b) A Residential Density Code Plan is to be submitted at the time of subdivision to the WAPC and shall be consistent with the SP, the Residential Density Ranges identified on Plan 1.
  - c) The Residential Density Code Plan is to include a summary of the proposed dwelling yield

of the subdivision.

- d) Approval of the Residential Density Code Plan shall be undertaken at the time of determination of the subdivision application by the WAPC. The approved Residential Density Code Plan shall form part of the SP and shall be used for the determination of future development applications.
- e) Variations to the Residential Density Code Plan will require further approval of the WAPC, with a revised Residential Density Code Plan submitted generally consistent with the approved plan of subdivision issued by the WAPC. The revised Residential Density Code Plan shall be consistent with Residential Density ranges identified on Plan 1
- f) A revised Residential Density Code Plan, consistent with Clause 3.5(e) will replace, wholly or partially, the previously approved Residential Density Code Plan, and shall then form part of the SP as outlined in Clause 3.5(d).
- g) Residential Density Code Plans are not required if the WAPC considers that the subdivision is for one or more of the following:
  - i. The amalgamation of lots;
  - ii. Consolidation of land for "superlot" purposes to facilitate land assembly for future development;
  - iii. The purposes of facilitating the provision of access, service or infrastructure; or
  - iv. Land which by virtue of its zoning or reservation under the SP cannot be developed for residential purposes.
- 3.6 The Developer implementing the requirements of an approved Bushfire Management Plan applicable to the Structure Plan area which includes all dwellings to comply with AS 3959-1999 –Construction of Houses within Bushfire Prone Areas and other 'owner/occupier' responsibilities as prescribed.
- 3.7 A notification, pursuant to Section 165 of the Planning and Development Act 2005 is to be placed on the certificate(s) of title of the proposed lot and also included in the lease contract for each grouped dwelling that is impacted by a Bushfire Attack Level (BAL) rating of 12.5 or above, advising of the existence of a hazard or other factor.
- 3.8 The Developer implementing the building construction recommendations for Grouped Dwellings adjacent to Bussell Highway as provided in the acoustic report provided of this Structure Plan Report.
- 3.9 The developer preparing and implementing an approved comprehensive risk management plan for the ongoing management of all phases of the planning, construction and operation of the community. This includes traffic management and movement plan (construction phase and delivery and installation of homes) and dust and rubbish management during construction
- 3.10The primary school site is to be delivered in accordance with Operational Policy 2.4 (WAPC) requirements when subdivided.
- 3.11Retaining walls greater than 500mm in height are generally not supported, unless they have been installed by the subdivider as part of subdivisional works.

#### 4. Public Open Space

4.1 Public Open Space is to be provided generally in accordance with Plan No. 1 and the POS Schedule included within Part 4.3.

#### 5. Local Development Plans

5.1 Lots affected by road traffic noise associated with Bussell Highway may require a Local Development Plan.

Local Development Plans shall address the following matters:

- lots where specific vehicle access and egress control are required;
- lots abutting public open space; and
- "Quiet House Design" requirements.
- 5.2 A Local Development Plan is to be prepared and approved for grouped dwellings and associated land uses applied to the land contained within the inner edge of the Residential Retirement/Lifestyle Village zone shown and identified for land lease on the Structure Plan.

Grouped Dwellings and associated land uses that are consistent with the approved Local Development Plan are exempt from the requirement to obtain development approval in the area to which the plan relates.

The Local Development Plan is to set out site and development standards that are to apply to the development which will include the following –

- a) Residential Design Code applicable to the grouped dwelling development;
- b) Internal road design, dimensions construction standards;
- c) Streetscape and dwelling orientation;
- d) Building design elements;
- e) Setback requirements;
- f) Uniform permeable fencing and gated access located at the boundary between the Local Development Plan Area and surrounding public open space and road reserve areas;
- g) Incidental development (storage / clothes drying / outbuildings / controls on caravan / trailer / boat locations);
- h) Private open space/site coverage for each grouped dwelling;
- Private open space, landscape buffers (which also demonstrates retention of existing mature trees where practicable and protects/enhances visual amenity) and streetscape treatments in accordance with a detailed landscape plan prepared and approved by the Local Government;
- Grouped Dwelling model design options and associated buildings supporting the needs of its residents;
- k) An Urban Water Management Plan prepared and approved by the Local Government;
- Visitor car parking allocation and provision of landscaping (to include shade trees) to be planted and protected from damage by cars;
- m) Servicing details for all land uses (including service areas, bin storage areas, and other mechanical plant equipment such as air conditioners), be screened from view from streets, car parks and private open space areas by enclosures consistent with the style and material of the building.
- 5.3 A Local Development Plan is to be prepared and approved for the Village Centre zone shown and identified on the Structure Plan.

The Local Development Plan is to set out site and development standards that are to apply to the development which will include the following –

- a) Development to address street frontage;
- b) Integration with land lease lifestyle site;
- c) Land use and floor area allocation.

- 5.4 A Local Development Plan will be required as a condition of subdivision for all lots adjoining public open space, with a LDP to consider, but not to be limited to, the following matters:
  - a) Fencing,
  - b) Dwelling orientation,
  - c) Surveillance,
  - d) Interface/design of dwellings,
  - e) Mandatory outdoor living areas.
- 5.5 A Local Development Plan will be required as a condition of subdivision for all lots adjoining Andrews Way and Darch Road, with a LDP to consider, but not to be limited to, the following matters:
  - a) Fencing,
  - b) Dwelling orientation,
  - c) Surveillance,
  - d) Interface/design of dwellings,
  - e) Bushfire setbacks.

#### 6. Other Requirements

1. The subdivider/developer is to make financial contributions to the Local Government towards the costs of providing community/or common infrastructure in accordance with the Shire of Augusta-Margaret River Local Planning Scheme No.1.



## Part Two-Explanatory Report

Margaret River South Structure Plan

#### **Document Summary**

VERSION	Ref	COMMENT	PREPARED BY	REVIEWED BY	REVIEW DATE	APPROVED BY	ISSUE DATE
Revision 1	YPGMRLSP	Draft	SLD		30/11/22	SLD	
Revision 4	YPGMRLSP	Draft	SLD		21/12/22	SLD	
Revision 5	YPGMRLSP	Issue	SLD		6/1/12	SLD	
	-	Submit SAMR	SLD		10/1/23	SLD	10/1/23
Revision 6	YPGMRLSP	WAPC Amd Final	SLD	SLD	4/6/24	SLD	6/6/24

Yolk Urban No.18 Pty Ltd & Yolk Urban No.19 Pty Ltd. (Yolk Property Group)

Prepared for:

**Prepared by:** 

Hex Design and Planning

 29a Bartlett Crescent, KARRINYUP

 T: 0438000235
 E: sheldon@hexdesignplanning.com.au

#### Disclaimer / Copyright

This document was prepared by Hex Design and Planning (Hex) for the exclusive use of the Client (Yolk Property Group). It is subject to and issued in accordance with the agreement between the Client and Hex Design and Planning.

Hex acts in all professional matters as a faithful advisor to its Clients and exercises all reasonable skill and care in the provision of professional services. The information presented herein has been compiled from a number of sources using a variety of methods. Except where expressly stated, Hex does not attempt to verify the accuracy, validity or comprehensiveness of this document or the misapplication or misinterpretation by third parties of its contents.

All of the information details included in this report are based upon the existing land area conditions and research provided and obtained at the time the Consultant conducted its analysis.

Please note that the information in this report may not be directly applicable to another client. The Consultant warns against adapting this report's strategies/contents to another land area which has not been researched and analysed by the Consultant. Otherwise, the Consultant accepts no liability whatsoever for a third party's use of, or reliance upon, this specific document.

This document cannot be copied or reproduced in whole or part for any purpose without the prior written consent of Hex.

## Contents

1	PLANN	NING BACKGROUND	1
	1.1	INTRODUCTION AND PURPOSE	1
	1.2	LAND DESCRIPTION	3
		1.2.1 Location	3
		1.2.2 Legal Description, Ownership	6
	1.3	SURROUNDING TRAFFIC AND TRANSPORT ENVIRONMENT	8
	1.4	SURROUNDING LAND USES	8
2	PLANN	NING FRAMEWORK	11
	2.1	ZONING AND RESERVATIONS	11
		2.1.1 Shire of Augusta Margaret River Town Planning Scheme No.1	11
	2.2	STRATEGIC PLANNING FRAMEWORK	11
		2.2.1 State Planning Strategy 2050	11
		2.2.2 Leeuwin-Naturaliste Sub-regional Strategy (WAPC: May 2019)	12
		2.2.3 Local Planning Strategy 2036	13
		2.2.4 East Margaret River District Structure Plan (2017)	15
		2.2.5 Rural Hamlet Design Guidelines	18
		2.2.6 Statement of Planning Policy (WAPC)	19
		2.2.7 Other Approvals and Decisions	24
3	SITE CO	ONDITIONS AND CONSTRAINTS	27
	3.1	BIODIVERSITY AND NATURAL AREA ASSETS	27
	3.2	BIODIVERSITY AND NATURAL ASSETS	29
		3.2.1 Vegetation, Flora & Fauna	29
		3.2.2 Threatened and priority ecological communities	33
		3.2.3 Threatened and priority flora	33
		3.2.4 Terrestrial Fauna	33
		3.2.5 Black Cockatoo	34
	3.3	LANDFORM / SOIL / GEOLOGY	34
	3.4	GROUNDWATER / SURFACE WATER / WETLANDS	36
		3.4.1 Groundwater	36
		3.4.2 . Surface Water	36
		3.4.3 Wetlands	37
	3.5	BUSHFIRE HAZARD	37
	3.6	ROAD NOISE	42
	3.7	CONTAMINATED SITE	44

	3.8	ACID SULFATE SOILS	44
	3.9	HISTORIC LAND USE	46
	3.10	UNEXPLODED ORDINANCE (UXO)	46
	3.11	ABORIGINAL HERITAGE PLACES	46
	3.12	NON-INDIGENOUS HERITAGE	47
4	LAND	USE AND SUBDIVISION REQUIREMENTS	49
	4.1	DESIGN OVERVIEW	49
	4.2	INTEGRATION WITH ADJOINING LOTS	49
	4.3	PUBLIC OPEN SPACE (HAMLET CORRIDORS)	49
	4.4	LANDSCAPE CONCEPT	53
		4.4.1 POS 1	57
		4.4.2 POS 2, 3 & 4	58
		4.4.3 POS 5	59
		4.4.4 POS 6	60
		4.4.5 POS 7	61
		4.4.6 POS 8	63
		4.4.7 Stormwater Strategy	64
		4.4.8 Streetscape	64
	4.5	RESIDENTIAL	67
		4.5.1 Land Use and Residential Density	67
		4.5.2 Residential Lot Layout	68
		4.5.3 Residential Lot Size	70
		4.5.4 Village Centre - Private Recreation / Child Care	71
		4.5.5 Land Lease (Retirement / Lifestyle Estate)	57
		4.5.6 Tiny Home (Grouped Dwellings)	62
		4.5.7 Primary School Site	65
	4.6	MOVEMENT NETWORKS	65
		4.6.1 Existing Movement Network	65
		4.6.2 Proposed Movement Network	67
		4.6.3 Traffic Generation	70
	4.7	WATER MANAGEMENT	71
	4.8	EDUCATION FACILITIES	
	4.9	INFRASTRUCTURE COORDINATION, SERVICING AND STAGING	74
		4.9.1 Topography	74
		4.9.2 Water, Drainage, Sewer, Power	74
		4.9.3 Sewerage	75
		4.9.4 Water Supply	75

	4.9.5 Drainage	76
	4.9.6 Electricity and Gas Supply	77
	4.9.7 Telecommunications	77
	4.9.8 Groundwater	78
4.10	OTHER REQUIREMENTS	78
	4.10.1 Bushfire Management	78
4.11	IMPLEMENTATION	79
TECHN	IICAL APPENDICES INDEX	81

## **APPENDICES**

5

APPENDIX 1 – CERTIFICATE OF TITLE
APPENDIX 2 – STRUCTURE PLAN
APPENDIX 3 – ENVIRONMENTAL ASSESSMENT & MANAGEMENT STRATEGY
APPENDIX 4 – ACOUSTIC REPORT (EAMS EXTRACT)
APPENDIX 5 – BUSHFIRE MANAGEMENT PLAN
APPENDIX 6 – OPEN SPACE PLAN & CONCEPT SUBDIVISION PLAN
APPENDIX 7 – LANDSCAPE MASTERPLAN
APPENDIX 8 – LOCAL WATER MANAGEMENT STRATEGY
APPENDIX 9 – TRAFFIC IMPACT ASSESSMENT
APPENDIX 10 – VILLAGE CENTRE CONCEPT (LDP)
APPENDIX 11 – ECONOMIC REPORT
APPENDIX 12 – LAND LEASE CONCEPT (LDP)
APPENDIX 13 – ENGINEERING SERVICING REPORT

## **1 PLANNING BACKGROUND**

### 1.1 INTRODUCTION AND PURPOSE

This submission has been prepared by Hex Design and Planning on behalf of the landowners of Lots 9000 Bussell Highway, Margaret River (subject site) and represents the subject site.

The area subject of the structure plan is located in Margaret River and is situated approximately 2.5 km south of the Town Centre. The site is located at the junction of Bussell Highway and the Perimeter Road, with the land bound by Bussell Highway, Perimeter Road and Darch Road, Margaret River ('the subject site').

With the area zoned 'Future Development', and development having occurred over the past decade, the subject site is seen as the southernmost parcel of land identified by the Shires strategic planning framework to complete the town's urban footprint.

The ultimate objective of this proposal is to facilitate the subdivision and development of the land subdivision and development of the land for a range of residential land uses in a manner that interacts appropriately with the development that has occurred in the locality.

The intended land uses within the Structure Plan include:

- Approximately 400 hundred (411) residential lots, with residential density coding of R10-R60;
- Land Lease Retirement Site;
- Public Primary School Site; and
- Integrated open space network, nestled between hamlets of development.

This submission is accompanied by a Structure Plan Map (Plan 1) prepared in accordance with the *Planning and Development (Local Planning Scheme) Regulations, 2015* which is included in Part One of this Report.

The Explanatory Section of this Structure Plan Report includes a detailed description of the proposal, provides an evaluation of the relevant town planning, environmental, fire management, local water management and servicing considerations applicable to the land, and details the rationale supporting the proposed Structure Plan.

The Structure Plan has been developed having regard to the physical features of the land, surrounding development, recommendations from technical reports and discussions with technical staff at the Shire of Augusta Margaret River.

The Structure Plan has been prepared by Hex Design in collaboration with a team of specialist consultants, who have provided input in relation to matters as follows:

Hex Design and Planning	-	Urban Design, Town Planning
Emerge Associates	-	Environmental Report / Land Capability
Emerge Associates	-	Bushfire Management Plan
Emerge Associates	-	Landscape
Stantec Engineering	-	Engineering Services Report
Emerge Associates	-	Local Water Management Strategy
Transcore	-	Transport Assessment
Lloyd George	-	Acoustic
Location IQ	-	Retirement Analysis

Copies of the relevant consultant reports are included as Appendices in this report, with key findings from the respective reports incorporated within the core of this report.

A Local Water Management Strategy (LWMS) has been prepared to support the Structure Plan and has been submitted concurrently to the Structure Plan Report by Emerge Associates for approval by the Department of Water. The Consultants' Reports confirm there are no significant constraints to progressing urban development of the land and is capable of being supported by the Council.

Once the concurrent Scheme Amendment has been gazetted and the Structure Plan endorsed, it will be possible for urban development and subdivision to proceed in a coordinated manner as envisaged by the earlier rezoning of the site.

## 1.2 LAND DESCRIPTION

#### 1.2.1 Location

The subject site comprises one certificate of title, 67.63ha and is situated approximately 2.5 km south of the Town Centre. The site is located at the junction of Bussell Highway and the Perimeter Road, with the land bound by Bussell Highway, Perimeter Road and Darch Road, Margaret River ('the subject site').

The location of the subject site is indicated in Figure 2 – Location Plan, and also the figure below being an extract from The East Margaret River District Structure Plan. (refer *Figure 1 – Regional Context Plan and Figure 2 Location Plan*).



The site fronts Bussell Highway to the west and links with the surrounding road network, including the Perimeter Road which provides access to the wider locality. Access to the subject site is best afforded via Bussell Highway to the west and Andrews Way to the north, with Future Development zoned landholdings to the north also gaining primary access from both these roads.

The subject site is predominantly surrounded by a mix of medium and low-density residential development to the north, which was previously zoned Future Development. Land to the south, east and west on the adjacent side of the abutting roads is zoned General Agriculture, though partially identified for future development by the DSP.





© COPYRIGHT PROTECTS THIS PLAN Unauthorised reproduction or amendment not permitted. Please contact the author.

### 1.2.2 Legal Description, Ownership

The site subject of this Structure Plan is legally described as Lot 9000 on Plan 417446 on Certificate of Title Volume 2973 Folio 51.

Table 1 below provides a summary of the land details pertaining to the subject site.

Table 1 - Lot Detail
----------------------

Lot / Address	Lot No.	Deposited Plan	Volume	Folio	Area / Ha
9000 Bussell Highway	9000	417446	2973	51	67.63ha
Total Lot Area				67.63ha	

A copy of the Certificates of Title listed above is included in *Appendix 1* of this submission.



Figure 3 - Subject site / Landgate

With the site currently zoned 'Future Development' via Scheme Amendment No.54 to the provisions of the Shire of Augusta Margaret River Local Planning Scheme No.1 (LPS1), there is a requirement for the preparation of a Structure Plan to guide development and subdivision of the site.

There are currently no structures or buildings on the site. (refer to Figure 4 – Aerial)



### 1.3 SURROUNDING TRAFFIC AND TRANSPORT ENVIRONMENT

The subject site has excellent access to the Margaret River road network, with Bussell Highway a designated Main Road under the provisions of LPS 1. The Perimeter Road which abuts the southern boundary of the site and connects to Bussell Highway at the southwestern corner of the site provides a further connection to the wider Margaret River region.

Access to the site in the context of the approved East Margaret River DSP shows that the site is highly connected and suited for residential development, as identified by the planning framework of the Shire.

### 1.4 SURROUNDING LAND USES

The land in the immediate locality of the subject site has been developed for residential purposes over the past decade, with several structure plans having been adopted by the Shire. The urban development layout for these areas has been progressing on a staged basis, with various other land uses including commercial having been delivered to date.

Figure 5 shows the context of the subject site with the surrounding structure plans. These include;

- Rapids Landing Structure Plan
- Brookfield (Spindrift) Structure Plan
- East Margaret River District Structure Plan

Land on the southern and eastern sides of Perimeter Road is identified as industrial land. There is no residential land uses identified on the adjacent side of Perimeter Road.



DESIGN

©COPYRIGHT PROTECTS THIS PLAN Usavisorised reproduction or amendment notpermitted. Please contact the aution.

## 2 PLANNING FRAMEWORK

### 2.1 ZONING AND RESERVATIONS

#### 2.1.1 Shire of Augusta Margaret River Town Planning Scheme No.1

The site was recently rezoned from 'General Agriculture' to 'Future Development' by Amendment 52 to the Scheme. Clause 4.2.7 of the Scheme (outlined below) sets out the purpose and objectives of the Future Development Zone:

"Purpose of the Future Development Zone:

To provide for additional sustainable urban development within and around existing settlements within the Scheme area.

Objectives of the Future Development Zone:

- (a) To designate land considered to be generally suitable for future urban development and to prevent such land being used or developed in a manner which could prejudice its possible future use for planned urban development;
- (b) To provide for the sustainable development of land in an orderly manner with appropriate levels of physical infrastructure and human services;
- (c) To require, as a pre-requisite to the local government's support for subdivision proposals and approval to development for urban purposes, the preparation and approval by the local government together with endorsement by the Western Australian Planning Commission of a Structure Plan in accordance with the provisions of Part 6 of the Scheme;

and;

(d) To guide and control the development so as to achieve compact urban areas linked by open space, natural areas and functional open space consistent with the objectives"

The Scheme states in Clause 4.2.9 (a) that:

"Prior to the local government granting approval to any development or supporting any proposal for the subdivision of land within the Future Development Zone, other than the erection of a single dwelling or minor changes in the use of land, a Structure Plan shall be prepared and approved pursuant to the provisions of Part 6."

The proposed Structure Plan has been prepared having regard to the relevant provisions of the Scheme for consideration by the Shire or Augusta Margaret River and State Government Agencies.

### 2.2 STRATEGIC PLANNING FRAMEWORK

#### 2.2.1 State Planning Strategy 2050

State Planning Strategy 2050 ('the Strategy') is the highest-order planning instrument in the Western Australian planning system. The Strategy represents a guide from which public and local authorities can express or frame their legislative responsibilities in land-use planning, land development and related matters.

The Strategy offers an integrated whole-of-government view of strategic planning needed to respond to various challenges, including population growth, an ageing population, and an orientation towards sustainable living. The Strategy reinforces this where it states –

'The Western Australian population is ageing. Over the next 40 years, the proportion of the population aged 65 or over

is likely to increase from 13% to 22% and, in contrast, the proportion aged 15 or under is likely to decrease slightly from 19% to 18%.

Such a change in the State's demographics has direct impacts on planning directions and priorities (e.g. access to health care, mobility, labour pressures and internal migration).

The ageing of our population will increase the demand for dwellings such as apartments or units in suitable locations.

This demographic shift will impact most aspects of the economy, in particular the composition of the labour force, healthcare requirements, education and social services, and the mix of dwelling types.'

The Strategy further recognizes that Western Australia's demographic and household structures are changing rapidly. Hence, in achieving a vision of sustained growth and prosperity, communities will require access to diverse housing and services that complement their values and lifestyle choice.

The Structure Plan in addition to the conventional residential dwellings proposes to provide a framework to implement an innovative community lifestyle model for the ageing population within Margaret River and its surrounds that offers diverse and affordable housing opportunities.

The housing model tenure will see the landowner lease the land with each resident owning their own home and protected by the Residential Parks (Long-stay Tenants) Amendment Act 2020. By separating land ownership and home ownership and introducing a unique long-term lease (60 years) for siting resident-owned dwellings, the landowner can provide security of tenure and entry affordability to its residents, within a managed community environment.

This model structure also facilitates access by residents to Commonwealth rental assistance for eligible Centrelink benefit recipients which reduces resident land rents by about a third.

One of the Strategy's objectives is to 'encourage active lifestyles, community and betterment. In considering this objective the Strategy recognises that:

'An ageing population exhibits increasing demand for healthy recreation and experiences, presenting opportunities for emergent lifestyle services and facilities.'

The lifestyle community model will respond to these demands through the provision of facilities for residents that support sporting and leisure activities (including bowls and swimming), fitness centre, clubhouse, catering facilities, library, internet kiosk, outdoor facilities and entertaining. The design and range of facilities also assist greatly in establishing a sense of community and belonging and as a result, a significant reduction in social isolation.

#### 2.2.2 Leeuwin-Naturaliste Sub-regional Strategy (WAPC: May 2019)

The Leeuwin-Naturaliste Sub-regional Strategy (LNSS) is an overarching strategic land use planning document outlining the WAPC's approach and guidance to implement State strategic priorities and inform local planning strategies and schemes. Its purpose is to manage and plan for growth within the sub-region and to inform a review of State Planning Policy 6.1- Leeuwin Naturalist Ridge.

A key strategic direction of the LNSS relevant to this Structure Plan is to 'promote the growth of the Margaret River townsite through consolidation of existing urban areas and urban expansion consistent with the East Margaret River District Structure Plan (2017), generally in the area bounded by the Margaret River, Bussell Highway and the Margaret River Perimeter Road.'

This Structure Plan reinforces the above strategic direction by providing the land use framework to support the future development of the site – which is also consistent with the land uses identified for the land in the EMRDSP.

### 2.2.3 Local Planning Strategy 2036

The proposed structure plan and envisaged development are consistent with the objectives of the Shires Local Planning Strategy (LPS), with the site which is a logically identified expansion area of the townsite and will contribute to addressing several objectives outlined by the LPS.

The Local Planning Strategy for Augusta Margaret River Council was adopted in May 2021 (awaiting final endorsement by WAPC) and is a key planning document to guide land use and population change across the region through to 2036.

The LPS acknowledged the increasing population of the Margaret River area and focuses on accommodating population change through the use of land which has already been committed to future development, through various council planning documents.

The subject site is identified as 'Future Urban – M8' by LPS, with an extract of the LPS mapping shown in **Figures 6 & 7**.

With the identification of the subject site as a Future Urban Growth Area (M8), there is the acknowledgement that the development of the site is in accordance with the town site's planned expansion, with it acknowledged that rezoning of the subject site to 'Future Development' will then enable the progression of a Structure Plan to guide the development of the site.

Planning Precinct:	M8
Proposed Land Use:	Residential
Current Zoning:	Rural
Proposed Use:	Residential R10-R40, Parks and Recreation.



Figure 6 – Margaret River Townsite LPS 2036



riguic 7 Sinic of Augustu Murguict Niver Locul I funning Strutegy 2030
--

### 2.2.4 East Margaret River District Structure Plan (2017)

The East Margaret River District Structure Plan (EMRDSP) is a strategic planning document that was prepared by the Shire to help guide future development and expansions within the municipality.

It is predicted that by 2031, Margaret River's existing population of 7000 will have increased to approximately 11,000 persons. The Local Planning Strategy 2010 identifies Development Investigation Areas (DIA's), on the periphery of the existing town site which provides the land needed for the development of new residential communities, inclusive of employment, recreation and social infrastructure. The East Margaret River District Structure Plan is the next layer in the planning process, a high-level strategic document that has been prepared to guide the future development of more detailed Local Structure Plans within and across each of the DIA areas.

The District Structure Plan guides the preparation of more detailed structure plans and subsequent subdivision and development of the East Margaret River area. In summary, it provides a framework for future urban development which will cater for the growth of the Margaret River population until at least 2031. Its main features are:

- Provision for approximately 2000 new residential lots located within discreet neighbourhoods or hamlets;
- An alternative form of urban development recognising the principles of the Hamlet Design Guidelines in detailed planning;
- An interconnected road system that provides strong north/south and east/west options;
- The protection of natural assets including over 60ha of native vegetation;
- A focus on non-motorised forms of transport with multiple connections to the Darch and Rail trails which provide strong links to the Margaret River and other nature-based recreation facilities;
- Opportunities for local shopping;
- A primary school;
- District open space which in the future, will be developed to provide additional active recreation facilities such as playing fields;
- Provision for a range of lot types and sizes;
- Employment opportunities across a variety of sectors; and
- Best practice water management including treatment and reuse of wastewater for irrigation purposes.

The subject site is identified as Development Investigation Area M4, which has been reaffirmed as suitable for residential development and an expansion area for the Margaret River Townsite. This subject site is also prescribed as Hamlet 4 (south of Andrews Way) – and is capable of sustaining a Residential development with a lower-density eastern fringe. The area east of the subject site – east of Darch Road (Pt Lot 4 and Lots 31 & 5 Darch Road, Margaret River) was recently subject to a low-density structure plan that was submitted to Council in 2022.

As depicted on the plan, the existing (under construction) neighbourhoods of Rapids Landing and Brookfield are to be complemented by 4 residential DIA areas forming in whole or in part, 4 discreet hamlets or neighbourhoods, which are defined by 400m-450m walkable catchments, and constitute areas of 50-63ha. For each hamlet to be functional and sustainable in its own right, it is necessary for residential development to be focussed around a central node (which may be in the form of commercial or community-focused land uses), the location of which is indicatively shown on the plan.

Hamlet 4 is identified as being capable of sustaining a neighbourhood of up to 750 dwellings, with a lower density eastern fringe, consistent with this proposal. This proposal seeks a yield in the order of 400 residential lots and an additional land lease retirement landholding and covers the area previously defined as DIA M4 by the 2011 Local Planning Strategy.



Figure 8 - Development Investigation Area (DIA)


### 2.2.5 Rural Hamlet Design Guidelines

The Rural Hamlet Design Guidelines (the Guidelines) provide the Shire's aims, goals and urban design principles to which future development within identified development investigation areas will be assessed. Concerning rezoning and/or structure plans, all proposals are required to demonstrate that the requirements of the Guidelines have been satisfied.

The general philosophy behind the Guidelines is broadly focussed on using 30% of the overall land area for housing, 30% for ecological restoration and 40% for productive agricultural land. It also follows a general layered approach to site analysis and planning investigation to ensure the ultimate use, design and development of the land are thoroughly considered thus resulting in an appropriate design outcome and response.

This includes aims, objectives and the use of checklists to address various elements such as sustainability, land capability, street and block patterns, areas of ecological restoration, productive land patterns, open space networks, land use and densities to name a few.

In the context of the subject site, many of these elements are not entirely relevant or considered critical to its initial structure planning, largely due to DIA M4 being a natural progression of the Margaret River residential expansion, plus an identified vegetation link along the eastern boundary of the structure plan area.

It is noted that the structure plan does seek to address the objectives and principles of the Hamlet Design Guidelines (Phase 3) concerning an Urban (residential context) by adhering/achieving the following objective of the guidelines where applicable;

- Block Pattern
  - o Lot sizes and density are appropriate scale for the site/area, and character of Margaret River;
  - Encourage pedestrian activity and parks based around street layout passive surveillance is a high priority;
  - Blocks are artfully created with views and vistas, public spaces and a sense of identity;
  - Block layout respects aspect, views and topography
  - Block design encourages active and overlooked public spaces
- Permeability
  - Provide a clear circulation network that allows for ease of movement and reduces the impact of the car;
  - Allows a variety of street types, that help define public and private spaces, and assists in creating distinctive and legible places;
  - Provides for a community that fits legibly into the surrounding recreational and pedestrian networks;
  - Provides gateways that make the connections more legible and memorable.
- Legibility
  - Material and colours drawn from the local environment;
  - Responsive design that promotes a sense of place;
  - Designs that encourage and facilitate the personalisation of building and spaces;
- Open Space Network
  - o Provide a clear hierarchy and variety of well-connected open spaces;
  - o Be overlooked by a building frontage for enclosure and surveillance;
  - Provide a variety of open space opportunities active and passive within easy walking distance of residents;
  - Create a network of formal parks within the development area;
  - o Designed to accommodate pedestrian and cycleways;
  - o Connect the community with the wider natural environment

- The Street
  - Sympathetic to local character and activity context, in design and detail;
  - Visually simple, and free of clutter.
  - o Street designed to accommodate a range of functions, not dominated by any one function;
  - Comfortable, slow speed and safe streets for pedestrians, cyclists and the disabled.
- Character Areas
  - o To create a distinct identity
  - To create an identity that allows people to form an attachment to places and take ownership of this unique community;
  - Build upon a local architectural vernacular;
  - Street and public spaces that encourage people to wander, explore and spnce==de time in;
  - To integrate nature with the townscape.
- Land Use and Density
  - Encourage a variety of household types, groups, ages and ethnicities within communities by allowing for a variety of densities, lot sizes and housing typologies;
  - Creation of a compact community that avoids unnecessary urban sprawl;

This proposal is aligned with the Guidelines and its objectives and will not undermine the hamlet vision or character for East Margaret River and is also supported by various studies and investigations that have analysed and considered the crucial elements, such as environmental protection, servicing, noise, bushfire and dwelling locations.

### 2.2.6 Statement of Planning Policy (WAPC)

#### 2.2.6.1 SPP7.3 – Residential Design Codes

State Planning Policy No. 7.3 Residential Design Codes (the Codes) provides the basis for control of residential development throughout Western Australia.

The Codes are adopted by the Scheme and have the following objectives:

- To provide residential development of an appropriate design for the intended residential purpose, density, context of place and scheme objectives.
- To encourage design consideration of the social, environmental and economic opportunities possible from new housing and an appropriate response to local amenity and place.
- To encourage design that considers and respects heritage and local culture.
- To facilitate residential development which offers future residents the opportunities for better living choices and affordability.

The Scheme adopts the provisions of the Codes to guide the assessment of proposed development on residential or future development-zoned land.

With regard to the Structure Plan, a density range between R10-R40 has been applied, reflecting that envisioned by the Local Planning Strategy (Section 2.2.3). This will accommodate lots ranging from circa 180-2,700 sqm in area.

It is intended that R-MD provisions of Western Australian Planning Commission (WAPC) Planning Bulletin 112/2016 will be applied to the site, for zones R25-R40, with the following provisions being applicable. This is being proposed via the structure plan or via an LDP if required.

R-Code	Lot type and size	ot type and size Street setback and front fences		Lot boundary setback		Open space		Garage setback and width and vehicular access		Parking		Overshadowing		Privacy	
		R-Codes	R-MD provision	R-Codes	R-MD provision	R-Codes	R-MD provision	R-Codes	R-MD provision	R-Codes	R-MD provision	R-Codes	R-MD provision	R-Codes	R-MD provision
R-MD - R40	Rear load 7.5m x 30m - 225m2 Front-load 8.5m x 30m - 255m2 8.5m x 25m - 212.5m2 10 x 20m - 200m2 10 x 25m - 250m2 12.5m x 20m - 250m2	4m	2m minimum, no average 1.5m to porch/veranda no maximum length 1m minimum to secondary street Front fences within the primary street setback area being a maximum height of 900mm above natural ground level, measured from the primary street side of the front fence	Boundary setbacks 1 to 1.5m for wall height 3.5m and less (subject to wall length and major openings) Boundary walls 2/3 length one side boundary, maximum 3.5m high and 3m average height	Boundary setbacks 1.2m for wall height 3.5m or less with major openings 1m for wall height 3.5 or less without major openings Boundary walls To both side boundary walls To both side boundary, 2/3 max length to second side boundary for wall height 3.5m or less	45% open space (55% site cover) 20m2 courtyard 1/3 required OLA area may be covered Minimum dimension 4m	An outdoor living area (OLA) with an area of 10% of the lot size or 20m2, whichever is greater, directly accessible from a habitable room of the dwelling and located behind the street setback area At least 70% of the OLA must be uncovered and includes areas under eaves which adjoin uncovered areas The OLA has a minimum 3m length or width dimension No other R-Codes site cover standards apply	Rear load Nil – provided laneway is minimum of 6m wide <u>Front-load</u> 4.5m or 0.5m behind dwelling alignment subject to averaging requirements	Rear load         0.5m garage setback to laneway         Front-load         4.5m garage setback from the primary street and 1.5m from a secondary street         The garage setback from the primary street may be reduced to 4m where an existing or planned footpath or shared path is located more than 0.5m from the street         Boundary         For front-loaded lots with street frontages between 10.5 and 12m, a double garage is permitted to a maximum width of 6m as viewed from the street subject to:         - Garage setback a minimum of 0.5m behind the building alignment         - A major opening to a habitable room directly facing the primary street         - An entry feature consisting of a porch or veranda with a minimum depth of 1.2m; and         - No vehicular crossover wider than 4.5m where it meets the street         Lots with a frontage less than 10.5m or not compliant with above require single or tandem garaging	Two on- site bays	As per R- Codes	35% of the Adjoining site area	No maximum overshadowing for wall height 3.5m or less No maximum overshadowing for wall height greater than 3.5m where overshadowing is confined to the forth half of the lot. If overshadowing intrudes into rear half of the lot, shadow cast does not exceed 35%	<ul> <li>4.5m to bedrooms and Studies</li> <li>6m to all other major openings</li> <li>7.5m to balconies or similar</li> </ul>	R-Codes clause 5.4.1 C1.1 applies; however the setback distances are 3m to bedrooms and studies, 4.5m to major openings to habitable rooms other than bedrooms and studies and 6m to unenclosed outdoor active habitable spaces

R-Code	ode Lot type and size Street setback and front fences		Lot boun	dary setback	Open space		Garage setback and width and vehicular access		Parking		Overshadowing		Privacy		
		R-Codes	R-MD provision	R-Codes	R-MD provision	R-Codes	R-MD provision	R-Codes	R-MD provision	R-Codes	R-MD provision	R-Codes	R-MD provision	R-Codes	R-MD provision
R-MD – R30	Rear load           10m x 30m -           300m2           Front-load           10m x 30m -           300m2           15m x 20m -           300m2	4m	2m minimum, no average 1.5m to porch/veranda no maximum length 1m minimum to secondary street Front fences within the primary street setback area being a maximum height of 900mm above natural ground level, measured from the primary street side of the front fence	Boundary setbacks 1 to 1.5m for wall height 3.5m and less (subject to wall length and major openings) Boundary walls 2/3 length one side boundary, maximum 3.5m high and 3m average height	Boundary setbacks 1.2m for wall height 3.5m or less with major openings 1m for wall height 3.5 or less without major openings Boundary walls To both side boundaries subject to: 2/3 length to one side boundary, 1/3 max length to second side boundary for wall height 3.5m or less	45% open space (55% site cover) 24m2 courtyard 1/3 required OLA area may be covered Minimum dimension 4m	An outdoor living area (OLA) with an area of 10% of the lot size or 20m2, whichever is greater, directly accessible from a habitable room of the dwelling and located behind the street setback area At least 70% of the OLA must be uncovered and includes areas under eaves which adjoin uncovered areas The OLA has a minimum 3m length or width dimension No other R-Codes site cover standards apply	Rear load NI – provided laneway is minimum of 6m wide <u>Front-load</u> 4.5m or 0.5m behind dwelling alignment subject to averaging requirements	<ul> <li><u>Rear load</u></li> <li>0.5m garage setback to laneway</li> <li><u>Front-load</u></li> <li>4.5m garage setback from the primary street and 1.5m from a secondary street</li> <li>The garage setback from the primary street may be reduced to 4m where an existing or planned footpath or shared path is located more than</li> <li>0.5m from the street</li> <li>Boundary</li> <li>For front-loaded lots with street frontages between 10.5 and 12m, a double garage is permitted to a maximum width of 6m as viewed from the street subject to:</li> <li>- Garage setback a minimum of 0.5m behind the building alignment</li> <li>- A major opening to a habitable room directly facing the primary street</li> <li>- An entry feature consisting of a porch or veranda with a minimum depth of 1.2m; and</li> <li>- No vehicular crossover wider than 4.5m where it meets the street</li> <li>Lots with a frontage less than 10.5m or not compliant with above require single or tandem garaging</li> </ul>	Two on- site bays	As per R- Codes	35% of the Adjoining site area	No maximum overshadowing for wall height 3.5m or less No maximum overshadowing for wall height greater than 3.5m where overshadowing is confined to the front half of the lot. If overshadowing intrudes into rear half of the lot, shadow cast does not exceed 35%	<ul> <li>4.5m to bedrooms and Studies</li> <li>6m to all other major openings</li> <li>7.5m to balconies or similar</li> </ul>	R-Codes clause 5.4.1 C1.1 applies; however the setback distances are 3m to bedrooms and studies; 4.5m to major openings to habitable rooms other than bedrooms and studies and outdoor active habitable spaces

Provisions from WAPC Planning Bulletin 112/2016- R25-40

#### 2.2.6.2 State Planning Policy 3.7 – Planning in Bushfire Prone Areas

State Planning Policy 3.7 (SPP 3.7) seeks to guide the implementation of effective risk-based land use planning and development to preserve life and reduce the impact of bushfire on property and infrastructure. SPP 3.7 applies to strategic planning proposals, including Structure Plans, overland designated as bushfire prone by the Map of Bushfire Prone Areas prepared by the Department of Fire and Emergency Services.

The subject land is designated as Bush Fire Prone, and SPP 3.7 is applicable to the Structure Plan area. The requirements of SPP 3.7 are addressed by a Bushfire Management Plan prepared in support of the Structure Plan.

Further details are provided in section 3.5 and **Appendix 5** of this Report.

#### 2.2.6.3 State Planning Policy 5.4 – Road and Rail Transport Noise and Freight Considerations in Land Use

State Planning Policy 5.4 (SPP 5.4) includes the following objectives which are relevant to the proposed Scheme Amendment:

- Protect people from unreasonable levels of transport noise by establishing a standardised set of criteria to be used in the assessment of proposals;
- Protect major transport corridors and freight operations from incompatible urban encroachment;
- Encourage best-practice design and construction standards for new development proposals and new or redeveloped transport infrastructure proposals;

Given the subject land abuts the Perimeter Road to the south and Bussell Highway to the west, which is a specified transport route under the policy, and the potential to exceed the noise limit specified by SPP 5.4, Noise Assessment was considered appropriate.

The assessment concludes that indoor noise levels in noise-sensitive areas (e.g. bedrooms and living rooms of houses) are satisfactory, though some dwellings fronting in proximity to Bussell Highway (west) will require quiet house design to be implemented.

No noise wall is deemed necessary given the dwelling setback from Bussell Highway, and rear open space areas being protected. All development on the south edge of the structure plan area is proposed to be set back sufficiently from the Perimeter Road so that no impact will be at ground level.

• No noise wall or acoustic bund is required for the structure plan area.

Where dwellings are constructed at levels that result in dwellings being contained within areas that are still above the outdoor noise target, the following Packages (contained in Appendix A of the assessment report) are required:

- Package A where noise levels are between 56 dB and 58 dB LAeq(Day);
- Package B where noise levels are between 59 dB and 62 dB LAeq(Day);
- Package C where noise levels are between 63 dB and 66 dB LAeq(Day);
- Alternative constructions from the deemed to satisfy packages may be acceptable if supported by a report undertaken by a suitably qualified acoustical consultant (member firm of the Association of Australasian Acoustical Consultants (AAAC)), once the lots' specific building plans are available.
- All affected lots are to have notifications on lot titles as per SPP 5.4 requirements

Further details addressing SPP 5.4 are included in section 3.6 and Appendix 4 of this Report.

### 2.2.6.4 Liveable Neighbourhoods

The WAPC's Liveable Neighbourhoods is an operational policy that guides the design and assessment of structure plans (regional, district and local) and subdivision of new urban neighbourhoods in the metropolitan area and country centres, on greenfield and large urban infill sites.

Principles of Liveable Neighbourhoods are applicable in regional areas, promoting quality-built form outcomes. Many of the objectives are complementary and similar to that encompassed in the Hamlet Design Guidelines and seek to promote/achieve a highly desirable and liveable urban framework.

Liveable Neighbourhoods includes the following Principle Aims that are particularly relevant to the Study Area:

- To foster a sense of community and strong local identity and sense of place in neighbourhoods and towns.
- To ensure the avoidance of key environmental areas and the incorporation of significant cultural and environmental features of a site into the design of an area.
- To provide for a more integrated approach to the design of open space and urban water management.
- To ensure cost-effective and resource-efficient development to promote affordable housing.
- To maximise land efficiency wherever possible.
- To provide a variety of lot sizes and housing types to cater for the diverse housing needs of the community at a density that can ultimately support the provision of local services.

Liveable Neighbourhoods outlines that Local Structure Plans should depict:

- walkable neighbourhood catchments of approximately 400m–450m radii around proposed commercial centres;
- density targets expressed as dwellings per hectare;
- existing and proposed commercial centres;
- natural features to be retained;
- proposed street block layout;
- proposed street network, including street types and path networks;
- proposed transportation corridors, public transport networks and cycle and pedestrian networks;
- proposed land uses, including distribution of higher, medium and lower density residential;
- proposed schools and community facilities;
- public parkland; and
- proposed urban water management measures.

The structure plan has been prepared and given due consideration/regard to all the above.

#### 2.2.6.5 Shire of Augusta Margaret River Local Planning Policies

Relevant Local Planning Policies prepared by the Shire of Augusta Margaret River have been considered during the preparation of the proposed Structure Plan design and documentation.

#### 2.2.7 Other Approvals and Decisions

# 2.2.7.1 Scheme Amendment – Amendment 52 to Shire of Augusta Margaret River LPS1.

An application for a Local Scheme Amendment is currently underway for the subject land, which will see the site rezoned from 'General Rural' to "Urban Development'. This rezoning will align the Scheme with the MRS, which at the regional level zones the subject land 'Urban'.

### 2.2.7.2 **Pre-Lodgement Consultation**

Co-ordinated planning for subject land has been the subject of consultation with the Shire of Augusta Margaret River, through 2021/2022. The Shires' preliminary comments from those consultations are reflected in the Structure Plan Report and have been incorporated into the design of the Structure Plan.

Pre-consultation has also included extensive site investigations and site inspections with state government agencies, including the Environmental Protection Agency (EPA) and the Department of Water and Environment Regulation (DWER) which occurred through the rezoning process, which has further led to the refinement of the structure plan prior to submission.

From these meetings with technical staff at the Shire of Augusta Margaret River, it was generally agreed;

- Road layout considered appropriate for the site;
- Land uses are considered appropriate for the site; and
- Open space configuration and bushland retention areas. (These areas were subject to detailed discussions through the rezoning process).

The proponent also sought early engagement with the local community in the preparation of the structure plan, with questionnaires being undertaken during the rezoning process, and public information sessions (also advertised in local newspapers and on Council's website) being held in Margaret River by the proponent. These were held through March and April 2022.

# **3** SITE CONDITIONS AND CONSTRAINTS

Site conditions and constraints have been ascertained through the site-specific Environmental Assessment (EAMS) undertaken by Emerge Associates. (Appendix 3).

The following information has been extracted from the environmental assessment undertaken by Emerge Associates (**Appendix 3**).

# 3.1 **BIODIVERSITY AND NATURAL AREA ASSETS**

An Environmental Assessment and Management Strategy (EAMS) prepared by Emerge Associates (Emerge) in **Appendix 3** has investigated and reported on the environmental characteristics of the land within the Structure Plan area.

This EAMS provides a synthesis of information from a range of sources regarding the environmental features, attributes and values of the site and provides an outline of the management strategies that can be adopted as part of the future subdivision and development process to address environmental values and minimise impacts.

The relevant environmental attributes and values of the site are summarised as follows:

- Topography varies throughout the site and is 96 m (m AHD) at the highest points in portions to the north and south with areas to the east decreasing to 90 m AHD.
- Available regional mapping has identified the southeast portion of the site as having 'low to moderate risk' of acid sulfate soils (ASS) occurring within 3 m of the natural soil surface.
- The site is identified as being able to support the proposed residential development from a land capability perspective. It is currently identified as having moderate suitability for agricultural purposes, mainly associated with grazing which is well represented in the broader region.
- The entire site is cleared of native vegetation and is composed of cleared paddocks, with only scattered paddock trees remaining. It is highly unlikely that the site contains threatened or priority flora species, threatened or priority ecological communities or habitat important for conservation significant fauna species.
- Groundwater monitoring within the site indicates that the maximum groundwater level (MGL) varies across the site, ranged from 0 meters below ground level (mBGL) to 2.95 mBGL. A significant proportion of the site exhibits groundwater close to or at the surface especially over the months of July through October. It is likely that groundwater is confined by the underlying granite and saturated clay which would act as a low permeability aquitard.
- Groundwater levels observed are inferred to be seasonally **perched** groundwater and not an expression of the permanent groundwater.
- Darch Brook, a tributary of the Margaret River, is located directly adjacent to the eastern boundary of the site. Riparian vegetation associated with Darch Brook does not occur within the site.
- No registered Aboriginal or non-indigenous heritage sites were mapped within the site. A portion of an 'other heritage place' (ID# 4494), which appears to be associated with a ceremonial ground, is identified in the eastern portion of the site. It is likely to be a buffered applied to the specific ceremonial ground further east (based on the shape). A Registered Aboriginal heritage site (Site 4495) is located 630 m north of the site and is associated with Darch Brook.
- Bussell Highway is located adjacent to the western boundary of the site and is identified as an 'other significant freight/traffic route' under the State Planning Policy 5.4 Road and Rail Noise (DPLH 2019) (SPP 5.4). The trigger distance for considering noise impacts associated with these roads is 200 m and is mapped to reach

the western portion of the site.

• The site is designated as a bushfire-prone area within the state-wide Map of Bush Fire Prone Areas (OBRM 2021). Areas of bushfire hazard have been identified within and adjacent to the site, associated with the existing grassland vegetation within the site, and grassland and forest vegetation within adjacent road verges and landholdings.

As part of future development, a number of the identified environmental attributes/values will require management to minimise potential impacts in accordance with the relevant federal, state and local requirements. The key requirements of the future management for the site as part of a subdivision and/or future development are summarised as follows:

- Acid sulfate soils: ASS is not considered to pose a significant constraint to the proposed future residential development. It is only likely to require management where deep services extend below the permanent groundwater table and can be managed in accordance with the WAPC and Department of Water and Environmental Regulation (DWER) guidelines.
- Flora, vegetation and fauna values: the site has been historically cleared of native vegetation with only a few scattered paddock trees remaining over pasture grasses. The management of remaining vegetation and fauna values as part of future development of the site will be appropriately managed through the planning and development process, with consideration given through the retention of existing scattered paddock trees within the lifestyle village cell and the proposed introduction of extensive native planting within public open space (POS) areas.
- Overall, the proposed development of the site will be able to contribute to improving the flora, vegetation and fauna values through the proposed POS network and green linkages, which will provide an opportunity to increase the composition of plant species and vegetation structure, improving biological diversity and ecological integrity. This additional planting has been considered as part of the bushfire risk assessment and is summarised below.
- Hydrology: water management within the site will be based on maintaining the existing peak hydrological flow
  rates and will include managing surface water runoff into Darch Brook, applying water-sensitive urban design
  principles and providing separation to groundwater. This is further detailed within the Local Water
  Management strategy (LWMS) prepared by Emerge Associates. Future development will be supported by an
  Urban Water Management Plan(s) as per standard planning and development processes.
- Aboriginal heritage: No registered Aboriginal heritage sites are located within the site, and the portion of 'other heritage place' (ID 5337) mapped as extending into the eastern portion of the site is not considered 'a site' as defined by the Aboriginal Heritage Act 1972. No specific heritage approvals are required in accordance with current legislation.
- Noise impacts: Consideration of noise has been undertaken in accordance with SPP 5.4 and through a site-specific noise assessment completed by Lloyd George Acoustic. The assessment indicates that the majority of the development cells can achieve the noise target specified in SPP 5.4 based in the proposed setbacks provided by the POS areas and road network to Bussell Highway and the Perimeter Road. A small portion of the development cell along Bussell Highway may exceed the noise target, but is within the noise limit and can be addressed through quiet house design, specifically Package A or Package B.
- Bushfire risks: Bushfire hazards (classified vegetation) that have the potential to impact the site are associated with forest and grassland vegetation immediately surrounding the site (within the Andrews Way, Bussell Highway and Perimeter Road reserves), and grassland vegetation within rural landholdings to the west, south and north. -. In addition, and in line with the Shire of Augusta Margaret River Local Planning Policy 14 Margaret River Development Investigation Areas Design and Development Policy and the Rural Hamlet Design Guidelines, large portions of the POS areas have been assumed to be a bushfire hazard, associated with the

proposed extensive planting achieving woodland classification. The proposed structure plan layout accommodates the required setbacks to achieve a bushfire attack level (BAL) rating of BAL-29 or less (as per State Planning Policy 3.7 Planning in Bushfire Prone Areas) to identified bushfire hazards through the proposed road network, managed low-threat areas within the POS network (around the perimeter of woodland areas) or through development cells that can accommodate in-lot setbacks (and will be detailed as part of subdivision). Vehicle access will need to accommodate access to at least two destinations which for the southern development cells can be provided through the use of two emergency access ways (EAW's). The vegetation within Andrews Way will be modified and become low threat as part of the proposed developed, to remove and manage the existing weedy understorey and replace with managed surface treatments but retain the existing trees.

Overall, the environmental attributes and values of the site can be accommodated within the structure plan design (in particular, management of surface water and groundwater, management of noise impacts and introduction of extensive native tree planting and associated separation from bushfire risks), or can be managed appropriately through the future subdivision and development phases in line with standard development processes (e.g. acid sulfate soils) and the relevant state

# 3.2 **BIODIVERSITY AND NATURAL ASSETS**

### 3.2.1 Vegetation, Flora & Fauna

No site-specific flora, vegetation or fauna surveys have been undertaken within the site, however, observations during a site visit identified that the site is predominantly cleared of native vegetation, with only a small number of scattered paddock trees remaining over paddock grasses. Examples of the values within the subject site are shown in **Figure 10** and **Figure 11**.

This is consistent with the native vegetation mapping for Western Australia (DPIRD 2020), which identifies natives only likely to be present within the adjacent Darch Road, Andrews Way and Perimeter Road verge and east of the subject site within private landholdings.

The subject site would be in a 'completely degraded' condition in accordance with the Keighery (1994) scale. 'Completely degraded' vegetation is described as "structure of the vegetation is no longer intact and the area is completely or almost completely without native species. These areas are often described as 'parkland cleared' with the flora comprising weed or crop species with isolated native trees or shrubs".

No threatened or priority flora or threatened priority ecological communities are likely to occur within the site. The site is also considered to have an overall low biodiversity value from a fauna perspective due to the lack of native vegetation within the site when compared to surrounding remnant vegetation within private landholdings and Wooditjup National Park to the east, particularly given the lack of understorey vegetation and connectivity between the scattered trees.

The retention and protection of existing scattered paddock trees has been considered in detail as part of this local structure plan.

The spatial layout of the structure plan has specifically considered the Shire of Augusta Margaret River Local Planning Policy 14 - Margaret River Development Investigation Areas Design and Development Policy (Shire of Augusta Margaret River 2011) and the Rural Hamlet Design Guidelines (Shire of Augusta Margaret River 2009), which has included the provision of an extensive POS network, approximately 30% of the site (as shown in the landscape master plan in **Appendix 7**). These green networks will be identified as unmanaged and bushfire hazards and will be more natural in appearance and function. The POS areas have also been located to retain existing scattered trees. The lifestyle village development cell is sufficiently sized to enable future open space areas that can accommodate existing trees. In summary, the site has been historically cleared of native vegetation with only a few scattered paddock trees remaining over pasture grasses. The management of remaining vegetation and fauna values as part of future development of the site will be appropriately managed through the planning and development process, with consideration given through the retention of existing scattered paddock trees within the lifestyle village cell and the proposed introduction of extensive native planting within public open space (POS) areas.

Overall, the proposed development of the site will be able to contribute to improving the flora, vegetation and fauna values through the proposed POS network and green linkages, which will provide an opportunity to increase the composition of plant species and vegetation structure, improving biological diversity and ecological integrity.



Figure 10: Scattered paddock trees (Agonis flexuosa) through a central portion of the site, looking north-west



Figure 11: Cleared paddocks, looking north-east towards Andrews Way

Native vegetation within the site and adjacent land can be classified based on regional vegetation associations. Vegetation complex mapping undertaken by the Department of Biodiversity, Conservation and Attractions (DBCA 2018c) within the Margaret River Plateau subregion of the South West Forest region of Western Australia indicates the site is found within the Cowaramup (C1) Complex, with some areas to the north east and southeast of the site identified as the Cowaramup (Cw1) Complex. These are described below and illustrated in Figure 12:

- The Cowaramup (C1) Complex is described as open to tall open forest of jarrah (Eucalyptus marginata subsp. marginata), marri (Corymbia calophylla) and bull banksia (Banksia grandis) on the lateritic uplands in the hyperhumid zone.
- The Cowaramup (Cw1) Complex is described as a mixture of open forest to woodland of karri (Eucalyptus diversicolor), marri (Corymbia calophylla) and woodland of jarrah (Eucalyptus marginata subsp. marginata) and Corymbia calophylla on slopes and low woodland of moonah (Melaleuca preissiana) and swamp banksia (Banksia littoralis) on depressions in the hyperhumid zone.



Figure 12: Vegetation Complex within the site (DBCA 2018c)



*Figure 13: Scattered Agonis flexuosa (Peppermint) trees toward the centre of the site.* 



Figure 14: Single large Eucalyptus diversicolour (Karri) tree over paddock grasses to the east of the site.



Figure 15: The site is predominantly cleared of native vegetation.

#### 3.2.2 Threatened and priority ecological communities

A review of the publicly available datasets (NatureMap (DBCA 2022), Locate SLIP (Landgate 2022), Protected Matters Search Tool (PMST) (DCCEEW 2022b) indicates no known TECs or PECs occur within 5 km of the site and none are anticipated to be present given the site is completely cleared of native vegetation apart from scattered paddock trees, described above.

#### 3.2.3 Threatened and priority flora

No detailed flora and vegetation surveys have been completed, based on multiple detailed site assessments and the observed condition of the site (completely cleared), it is considered unlikely that any occurrences of threatened or priority flora species would be found within the site (particularly given it has undergone intensive grazing through agricultural management).

#### 3.2.4 Terrestrial Fauna

No fauna surveys have been conducted for the site, and consideration of fauna values have been based on the habitat that may be present within the site, which is closely linked with native vegetation extent and condition. As discussed in Section 3.2.1 the site has been historically cleared of native vegetation and is composed of paddock grasses with a small number of scattered paddock trees. The site offers very limited and poor-quality fauna habitat, particularly when compared to the broader area which contains extensive areas of remnant native vegetation, particularly to the east.

#### 3.2.5 Black Cockatoo

The site is mapped within a buffer for an area known to provide roosting habitat for the Carnaby's Black Cockatoo (DBCA 2019), and therefore they may occur within the site or nearby. Emerge Associates identified that the scattered paddock trees within the site (predominantly Agonis flexuosa) would be unlikely to provide important habitat for the three black cockatoo species to any significant extent given they are generally a low-priority foraging plant and is not known to support roosting or breeding.

Given the lack of understorey and connectivity between the scattered paddock trees and the proximity between the Agonis flexuosa trees and intact vegetation adjacent to the site, it is considered unlikely that western ringtail possums would use the site. Without a canopy connection, possums would need to transit through open areas where they are at risk of predation and is therefore not a preference.

The site is considered to have overall low biodiversity value from a fauna perspective due to the lack of native vegetation within the site, when compared to surrounding remnant vegetation within private landholdings and Wooditjup National Park, particularly given the lack of understorey and connectivity between the scattered trees.

# 3.3 LANDFORM / SOIL / GEOLOGY

The subject site has an elevation ranging from 90 m in relation to the Australian height datum (mAHD) to 96 mAHD (DPIRD 1999), with low points in the northwest corner and easternmost extent of the subject site. This is shown in Figure 12. A slight north-south ridge occurs within the centre of the subject site, beginning at a high point in the south, which divides the subject site in half and would enable water to move to the low points in the northwest and east.



Figure 16: Topographic contour

The regional geological mapping (J.R. Marnham 2000) indicates that the subject site is underlain by the Leeuwin Complex, and is found within the Cowaramup uplands soil system, which is comprised of sandy gravel, loamy gravel and grey sandy duplex. Soil landscape mapping (DPIRD 2019) identifies two soil types within the site as part of this system (see **Figure 13**):

- 'Cowaramup, undifferentiated upland Phase' (216CoCOu) which is identified across the majority of the subject site. This soil unit is described as 'loamy gravels, duplex sandy gravels, semi-wet soils and grey deep sandy duplexes'. This is a mix of 'Forest Grove' and 'Mungite' soil types.
- 'Cowaramup wet flats Phase' (216CoCOw) which is identified within the eastern portion of the subject site, largely associated with the lower-lying portions. This soil unit is described as 'semi-wet and wet soils with grey deep sandy duplexes and pale sandy earths' and is predominantly the 'Mungite' soil type.



Figure 17: Soil landscape mapping

A preliminary geotechnical investigation (Galt Geotechnics 2021) was undertaken for the subject site and indicates that geology and soil aligns with the published regional information. Target soil sampling depths of 2.5 m and 3 m were achieved across the majority of the subject site. The results indicate that the subject site has predominantly a thin (100 mm) surficial gravelly or sandy soil over clayey soils of variable low to high plasticity.

# 3.4 **GROUNDWATER / SURFACE WATER / WETLANDS**

#### 3.4.1 Groundwater

A review of the Water Register (DWER 2021) indicates the site is found within the 'Blackwood' groundwater area and the 'Cape to Cape South' subarea. This groundwater subarea is composed of two aquifers, the surficial and fractured rock, both of which rely on rainfall for recharge. The site is situated above the Cape to Cape north combined Leeuwin superficial aquifer which is subject to faults/fractures (i.e. fractured rock aquifer). This aquifer is known to be highly seasonal, and have highly variable abstraction potential (DoW 2008).

14 monitoring bores were installed in July 2021 and have been subject to a levels monitoring program by Emerge Associates from July to November in 2021 and 2022. The location of the bores is shown in Figure 3 with the monitoring results outlined in Table 3 below. The maximum groundwater level (MGL) throughout the site occurred from months July to September and levels ranged from water located at the surface (particularly during winter) to 2.95 meters below ground level (m BGL).

Results suggest that groundwater may be located close to the surface (particularly during winter) across the majority of the site. The exception to this is bores MB02, MB05, MB07 and MB08, which generally sit higher within the landscape with corresponding groundwater levels which varied between 0.36 mBGL to 2.95 mBGL. Given the low permeability of in situ soils, levels are inferred to be seasonally perched groundwater and not an expression of the combined Leeuwin superficial

#### 3.4.2 . Surface Water

The subject site is located within the 'Busselton Coast' basin surface water catchment, with the majority of the subject site within the Margaret River sub-catchment, while the portion along the southern boundary is within the Boodjidup River sub-catchment.

The *Linear hydrography spatial database* (DWER 2018) indicates that two earth dams are located within or adjacent to the northwest corner of the subject site. Both features were observed during the site visit by Emerge Associates (2021). No other surface water features were mapped within the subject site, although a tributary of Darch Brook (which eventually connects to Darch Brook and the Margaret River) was observed east of the subject site, on the opposite side of Darch Road. Emerge Associates observed numerous informal flow pathways traversing east to eventually discharge off-site along the eastern boundary into the tributary of Darch Brook. A minor flow pathway within the north-western portion of the site was observed conveying runoff to the existing earth dams, and ultimately to Bussell Highway and further west. This aligns with the commentary detailed in the East Margaret River District Structure Plan (Shire of Augusta Margaret River 2015). Existing hydrological features are shown in **Figure 18**.

A District Water Management Strategy (DWMS) (Emerge Associates 2021) prepared for the site contains further assessment and consideration of managing surface water in relation to the proposed land use. This document formed part of the Scheme Amendment documentation.



Figure 18: Hydrological features

#### 3.4.3 Wetlands

*Geomorphic Wetlands Leeuwin Naturaliste Ridge and Donnybrook to Nannup – Unreviewed (DBCA 2018a)* identifies a geomorphic wetland within the eastern portion of the site and is described as a Floodplain feature. This floodplain flows into a palusvale wetland feature to the east-north-east of the site which is associated with a tributary of Darch Brook.

No wetlands of international importance (Ramsar wetlands) have been identified within the site or in proximity (DBCA 2017).

# 3.5 BUSHFIRE HAZARD

Bushfire hazard level (BHL) mapping completed for the site (Emerge Associates 2021a) indicates it is subject to a 'Moderate' bushfire hazard, associated with the areas of existing grassland vegetation, with no areas of 'Extreme' bushfire hazard occurring within the site. This is shown in **Figure 19**. As part of the proposed residential development, the majority of the site would be subject to a low bushfire hazard level rating, based on residential areas being able to be developed and managed to achieve low threat.



Figure 19: Areas within and surrounding the site identified as "bushfire-prone areas" (as indicated in purple) under the state-wide Map of Bush Prone Areas (OBRM 2021).

A Bushfire Hazard Level Assessment (Emerge Associates 2021a) and Bushfire Management Plan (BMP) (Emerge Associates 2022a) (**Appendix 5**) has been prepared in conjunction with the structure plan to support the proposed development and considers the potential mitigation and management of the bushfire risks to the site in accordance with State Planning Policy 3.7 Planning in Bushfire Prone Areas (SPP 3.7) (WAPC 2015a) and the Guidelines for Planning in Bushfire Prone Areas Version 1.4 (the Guidelines) (DPLH & WAPC 2021).

In accordance with SPP 3.7 and the Guidelines. Bushfire hazards that will be within and nearby the site have been identified in accordance with Table 2.5 of Australian Standard 3959-2018 Construction of buildings in bushfire prone areas (AS 3959) (Standards Australia 2018) to determine the associated bushfire hazard rating levels.

The areas of bushfire hazard include:

- Vegetation within the site:
  - Grassland vegetation, identified across the majority of the site, is associated with existing cleared paddocks with scattered paddock trees.
- Vegetation external to the site:
  - Existing forest vegetation adjacent to all boundaries of the site is largely associated with narrow strips within road reserves.
  - Existing grassland vegetation surrounding the site in all directions, associated with irregularly slashed road verges, grazed pasture and private landholdings.

Bushfire hazard level mapping completed for the site in accordance with the Guidelines indicates it is subject to a 'Moderate' bushfire hazard, associated with cleared paddock areas, identified as grassland (as shown in Figure 20).

Further detail on bushfire hazards is provided within the BMP (Emerge Associates 2022a).



Figure 20: Bushfire hazard level assessment (Emerge Associates 2021a)

The findings of the BMP demonstrate that as development progresses, it will be possible for an acceptable solution to be adopted for each of the applicable bushfire protection criteria outlined in the Guidelines. This includes:

- Location: The proposed development is at a higher-order strategic planning stage, namely structure planning, and as part of this, road layout and proposed development cells are generally shown. Accordingly, a BAL contour plan has been prepared for the site and shows that, on completion, development cells have sufficient area to accommodate habitable buildings that achieve BAL-29 or less.
- Siting and Design: The site accommodates a suitable asset protection zone (APZ) for all proposed lots through a mix of public road reserves, areas of managed public open space and inlot setbacks. This has considered portions of the POS areas being classified as vegetation and a higher classification than the current pre-development environment. The majority of lots are able to achieve BAL-29 or less. Due to the proximity of classified vegetation, particularly associated with existing vegetation within Andrews Way and Darch Road or proposed planting near the R40 cell in the central portion of the site, BAL-FZ and BAL-40 extend into the development cells. There is a sufficient area available in these cells to accommodate a setback to achieve BAL-29 or less. For upslope/flat forest vegetation, a 21 m setback is required. This will be addressed at the subdivision stage, as part of determining the lot layout.
- Vehicular Access: existing public roads occur along all boundaries of the site, with Andrews Way (and Brookfield Estate) to the north, Darch Road to the east, Perimeter Road to the south and Bussell Highway to the west. The site has access to Andrews Way, which provides access to the north and west, and Bussell Highway, which is a major regional connector providing egress to the north and south. Margaret River townsite is approximately 2.8 km to the north and is considered a suitable destination. Internally, the majority of the development cells include perimeter public roads, providing an interface to proposed lots and proposed woodland and grassland planting to be introduced as part of development. Where there is no perimeter road, appropriate asset protection zones will be accommodated through the POS or in-lot setbacks. As part of meeting Local Planning Policy 14 Margaret River Development Investigation Areas Design and Development Policy and the Rural Hamlet Design Guidelines, a hamlet

approach has been taken which means a number of internal roads that loop back on themselves would be considered 'no through roads' and exceed 200 m in length. However, the use of emergency access ways (EAWs) will connect the development cells and provide for multiple access options, demonstrating compliance with the acceptable solution.

• Water: the development will be provided with a permanent and reticulated water supply to support onsite firefighting requirements.

The management/mitigation measures to be implemented through the future development of the site have been outlined as part of this BMP, demonstrating that the acceptable solutions and/or intent of each element can be met. Consideration of the recommendations in this BMP should be adopted as part of the subdivision stage and can be addressed through the provision of a BMP or a Bushfire Statement.



Figure 21: Detailed Vegetation Mapping / Classification associated with Structure Plan Design (Emerge BMP)



Figure 22: BAL Mapping (Emerge BMP)



Figure 23: Bushfire Management Strategies (Emerge BMP)

Asset protection zones (AP2s) All habitable buildings must achieve BAL-29 or less. Asset protection zones will be required around thure habitable buildings to achieve BAL-29 or lower. These will be installed within areas of managed public goen space/public road reserves or within lots (a.g. as carparks, drive ways, manicured lawn/gardems etc). The asset protection zone should be designed and managed to achieve low threat in accordance with Section 2.2.3.2 of AS 3959.

#### Building construction requirements

Where designated bushfire prone, future Class 1, 2, 3 and associated 10a buildings will need to be constructed in accordance with BAL ratings determined in accordance with AS 3959.

unless agreed otherwise with the Shire of Margaret

uppy. - Will achieve the public road requirements as per A3.2 of Appendix Four of the Guidelines, unless agreed otherwise with the Shire of August Margaret River.



The subject site has sufficient area to accommodate setbacks to ensure a BAL rating of BAL-29 or less can be achieved at habitable buildings and is located in an area that provides opportunities for egress to at least two different destinations.

# 3.6 ROAD NOISE

Bussell Highway is identified by State Planning Policy 5.4 – Road and Rail Noise as a 'other significant freight/traffic route'.

State Planning Policy 5.4 (SPP 5.4) includes the following objectives which are relevant to the proposed Scheme Amendment:

- Protect people from unreasonable levels of transport noise by establishing a standardised set of criteria to be used in the assessment of proposals;
- Protect major transport corridors and freight operations from incompatible urban encroachment;
- Encourage best-practice design and construction standards for new development proposals and new or redeveloped transport infrastructure proposals;

Given the subject land abuts the Perimeter Road to the south and Bussell Highway to the west, which is a specified transport route under the policy, and the potential to exceed the noise limit specified by SPP 5.4, Noise Assessment was considered appropriate.



Figure 24: SPP 5.4 200 m strategic freight and major traffic route trigger distance

The assessment concludes that indoor noise levels in noise-sensitive areas (e.g. bedrooms and living rooms of houses) are satisfactory, though some dwellings fronting in proximity to Bussell Highway (west) will require quiet house design to be implemented.

There is a small portion along Bussell Highway where minor mitigation measures are required given the dwelling setback from Bussell Highway, and rear open space areas being protected. All development on the south edge of the structure plan area is proposed to be setback sufficiently from the Perimeter Road that no impact will be at ground level.

- An acoustic wall/bund is required for the section of Bussell Highway to height specified by the acoustic report.

Where dwellings are constructed at levels that result in dwellings being contained within areas that are still above the outdoor noise target, the following Packages (contained in Appendix A of the assessment report) are required:

- Package A where noise levels are between 56 dB and 58 dB LAeq(Day);
- Package B where noise levels are between 59 dB and 62 dB LAeq(Day);
- Package C where noise levels are between 63 dB and 66 dB LAeq(Day);
- Alternative constructions from the deemed to satisfy packages may be acceptable if supported by a report undertaken by a suitably qualified acoustical consultant (member firm of the Association of Australasian Acoustical Consultants (AAAC)), once the lots specific building plans are available.
- All affected lots are to have notifications on lot titles as per SPP 5.4 requirements

Further details addressing SPP 5.4 are included in **Appendix 4** of this Report.



Figure 25: Acoustic Impact of Residential Dwellings.

The proposed spatial layout of the structure plan has accommodated noise impacts, with the assessment indicating that the majority of the development cells can achieve the noise target specified in SPP 5.4 based on the proposed setbacks provided by the POS areas and road network to Bussell Highway and the Perimeter Road.

# 3.7 CONTAMINATED SITE

A review of the DWER Contaminated Sites Database (DWER 2022) indicates that the site is not registered as a contaminated site pursuant to the Contaminated Sites Act 2003, nor are any other registered sites located nearby. In addition, a review of the Department of Defence Unexploded Ordinance (UXO) search tool did not identify any potential risk of UXO occurring within the site (Department of Defence 2022).

# 3.8 ACID SULFATE SOILS

The majority of the subject site is not identified as having any risk of acid sulfate soil (ASS) based on the available regional mapping prepared by the Department of Water and Environment Regulation (DWER) (DWER 2017). An area within the eastern portion of the subject site is identified as having a 'low to moderate' risk of ASS within 3 m of the natural soil surface.



Figure 26: Acid Sulfate Soil Mapping (DWER).



Figure 27: Acid Sulfate Soil risk mapping (Emerge)

ASS is not considered to pose a significant constraint to the proposed future residential development. It is only likely to require management where deep services extend below the permanent groundwater table and can be managed in accordance with the WAPC and Department of Water and Environmental Regulation (DWER) guidelines.

Risk can be appropriately managed through future development.

### 3.9 HISTORIC LAND USE

A review of available historical aerial imagery indicates that a majority of the subject site was cleared of native vegetation prior to 2004 (Landgate 2021). The subject site appears to have been used for grazing historically, with pasture and cattle observed on-site during the site visit by Emerge Associates (2021).

Historic agricultural land uses, primarily low-intensity agricultural activities such as seasonal pasture production and grazing, are considered unlikely to raise any significant contamination risk concerns for the site.

# 3.10 UNEXPLODED ORDINANCE (UXO)

The subject site is not an area identified with having substantial, slight or other UXO potential.

# 3.11 ABORIGINAL HERITAGE PLACES

The Aboriginal Heritage Inquiry System (AHIS) is maintained pursuant to Section 38 of the *Aboriginal Heritage Act 1972* by the Department of Planning, Lands and Heritage (DPLH), and contains information on registered Aboriginal heritage sites and other heritage places throughout Western Australia. In accordance with the *Aboriginal Heritage Due Diligence Guidelines* (DAA 2013), a search of the AHIS online database (DPLH 2021a) was undertaken.

A portion of an 'other heritage place' (Site 4494), was identified within the eastern portion of the site and adjacent land to the east and southeast and is associated with values described as 'a ceremonial, camp, meeting place, other: battle ground' (DPLH 2022). Site 4494 is described as 'stored data/not a site' pursuant to the Aboriginal Heritage Act 1972.

One 'registered' Aboriginal heritage site (Site 4495) was identified approximately 580 m north of the subject site, and is described as having mythological significance and is associated with the Margaret River Waugal, which includes the downstream sections of Darch Brook.

The Aboriginal heritage features are shown in Figure 4 of EAMS



Figure 28: Aboriginal heritage sites

No spatial consideration for the 'Other Heritage Place' (Place ID: 4494) is required within the site.

# 3.12 NON-INDIGENOUS HERITAGE

A desktop search of the State Heritage Office database, which includes state and local lists (Heritage Council of WA 2021), the Australian Heritage Database, which includes the National and Commonwealth Heritage Lists (Department of Agriculture Water and Environment 2019) and the Shire of Augusta Margaret River Heritage Inventory (Greenward Consulting 2012) indicates that the subject site and adjacent areas do not contain any non-indigenous heritage sites.

# 4 LAND USE AND SUBDIVISION REQUIREMENTS

In light of the above, the primary planning considerations and objectives that have been applied to formulate the plan and its design philosophy encapsulate the objectives of the Hamlet Design Guidelines, whilst applying these to a logical expansion of the urban footprint of Margaret River. This is summarized in detail in the following section.

# 4.1 **DESIGN OVERVIEW**

The Structure Plan design has been developed having regard to the site-specific environmental assessment, detailed engineering investigation, local water management and fire planning requirements.

The Structure Plan has been prepared to guide the development of the 67ha site for residential subdivision and future land lease retirement development. In addition to this, a community corporation clubhouse is to be developed as part of the development, which will be run and owned by all residents within the estate.

The Structure Plan will facilitate the development of a high-quality, liveable urban precinct offering a diversity of lot product, and hence housing choice, with access to the full range of urban services and facilities in the area. The design is confined within the existing perimeter network and seeks to deliver on the objectives of the Hamlet Design Guidelines.

A concept subdivision plan has been prepared to demonstrate the potential yield of circa 400 dwellings for the subject land (**Appendix 6**), in addition to a concept layout for the retirement land lease development.

Detailed structure planning has been informed by an integrated approach with inputs from specialist consultants to appropriately address planning, water management environmental and bushfire management objectives. Collectively, these factors have influenced the proposed road and lot layout, as depicted in the Structure Plan included as Plan 1 in **PART ONE** of this document

# 4.2 INTEGRATION WITH ADJOINING LOTS

The Structure Plan is bound by existing road reserves on all boundaries, with an existing road network in place.

With land to the north having already been zoned and developed (being developed) for residential purposes, the proposed structure plan aligns with the development intent of the southern East Margaret River District Structure Plan.

The road network proposed reflects that of the EMRDSP and provides an extension to the regional road and path network, as envisaged by the Shire of Augusta Margaret River.

# 4.3 PUBLIC OPEN SPACE (HAMLET CORRIDORS)

The Structure Plan is an integrated network of open space, that provides a buffer between discreet residential hamlets, and also surrounding public road network.

The open space has been derived from extensive site visits and analysis undertaken in conjunction with the environmental, hydro, and landscape consultants, in order to deliver a site-appropriate development). Areas were subject to detailed review during the lifting of urban deferment process to the Metropolitan Region Scheme which resulted in extensive areas of open space being identified throughout the subject land.

The Structure Plan provides predominantly for five (5) large areas of open space, that will incorporate lineal tree planting and walk/cycle trails, with a central district playing field located in the heart of the estate. This open space network provides pedestrian movement throughout the estate, whilst providing ease of access to the community clubhouse by all residents.

The total structure plan incorporates eight (8) areas of open space throughout the subject site.

The objective of the Hamlet Design Guidelines with regard to open space in the context of urban development areas;

Open Space Network	Achieved
Provide a clear hierarchy and variety of well-connected open spaces;	
Be overlooked by a building frontage for enclosure and surveillance;	
Provide a variety of open space opportunities – active and passive – within easy walking distance of residents;	
Create a network of formal parks within the development area;	<
Designed to accommodate pedestrian and cycleways;	<
Connect the community with the wider natural environment	

The proposed open space configures meets all these objectives of the Hamlet Design Guidelines.

Whilst there is a statutory requirement to provide 10% of the land area as open space, given the character that is being sought by the structure plan, and also the objectives of the Hamlet Design Guidelines, 23% (14.6 ha) of the gross site area has been identified as 'green space' and is to be vested as open space in a combination of credited and uncredited areas.

The design and location of Public Open Space with the Structure Plan area are reflective of the following requirements;

- Provision of a district playing field (associated with the primary school site)
- Consolidation of drainage, vegetation areas to maximise available areas for a range of uses and functions, as well as achieving improved efficiencies in terms of maintenance and management;
- Be compatible with local water management requirements and accommodate drainage integrated with landscaping to improve useability and amenity for residents;
- Encourage maximum surveillance of POS areas to discourage opportunities for anti-social behaviour;
- Creation of active and passive recreation pursuits throughout the subject site;

A total of 14.6 ha of green space is provided by the structure plan. This area is made up of a combination of various open space categories as detailed in the table below. It is acknowledged that there are several 'green areas' that are not credited as open space, though form part of the overall open space network.

#### Table 1: Land Use Table (all areas in ha)

Developable Area		Site Area					
Site Area	Total			67.63	ha		
	1:1 Year Drainage (Emerge Calcs Oct 22)	1.73	ha				
	Uncredited Drainage	0.00	ha				
Deductions	Community Facility	1.50	ha				
	Primary School	3.50	ha				
	Total Deductions			6.73	ha		
Gross Subdivisible Area (GSA): 60.90							

Public Open Space Requirement									
	10% of Gross	Subdivisible Area			6.09	ha			
	Minimum 809	% Unrestricted			4.88	ha			
	Minimum 209	% Restricted			1.21	ha			
Open Space Provided									
	Unrestricted		8%						
	8 Local Parks				12.58	ha			
	POS 1		1.00	ha					
	POS 2		1.06	ha					
	POS 3		0.12	ha					
	POS 4		0.28	ha					
	POS 5		0.15	ha					
	POS 6		1.30	ha					
	POS 7		8.32	ha					
	POS 8		0.35	ha					
	Restricted		2%						
	Total Permiss	ible = 1.21ha)			0.29	ha			
	POS 1	Drainage 1:2-1:5 year event	0.05	ha					
	POS 2	Drainage 1:2-1:5 year event	0.02	ha					
	POS 6	Drainage 1:2-1:5 year event	0.03	ha					
	POS 7	Drainage 1:2-1:5 year event	0.11	ha					
	POS 8	Drainage 1:2-1:5 year event	0.08	ha					
	Total		21%		12.87	ha			
	* Surplus / Sl	ortfall		-	6.78	ha			
	* Area may b design	e reduced at time of detailed				11			

Notes:

1. In accordance with Liveable Neighbourhoods: the area subject to inundation more frequently than a one-year average recurrence interval rainfall event is not included as restricted or unrestricted open space and is a deduction from the net site area (LN R33); areas for the detention of stormwater for a greater than one-year average recurrence interval up to the five-year recurrence interval is restricted open space; areas for the detention of stormwater for a greater than five-year average recurrence interval is within unrestricted open space (LN R25)

As detailed in the above and following table an area of 12.87ha of creditable Public Open Space has been provided, some of which also serves a drainage function as detailed in the LWMS (including Engineering Plans) prepared to support the Structure Plan. This represents an overprovision of 8.85ha, though has been provided in order to meet the objectives of the Hamlet Design Guidelines and embrace the southwest character that is being sought by the structure plan.

The POS Schedule and Calculations in Table 1 illustrate the subject land is required to provide 6.09ha of land for public open space, in accordance with the 10% site contribution required by Liveable Neighbourhoods and the Planning and Development Act.

The drainage swale areas are included as restricted open space and have been calculated from the 1 in 5 yr Top of Water (ToW) level area but exclude the 1:1-year ToW for all proposed swales. These drainage areas are within the buffer areas of the identified wetlands, and hence have been grouped together and classified as restricted open space.

The drainage areas are detailed in the Local Water Management Strategy (LWMS) at **Appendix 8**. And have informed the Landscape Concept Plans in **Appendix 7**.
#### Table 2: Greenspace Provision

POS/Green Space Development Table						
	Uncredited			1.73	ha	
	Drainage 1:1*	1.73	ha			
Green Space	Restricted POS			0.29	ha	
Drainage)	Credited Drainage 1:1 – 1:5 (Restricted POS)*	0.29	ha			
	Unrestricted POS			12.58	ha	
	Unrestricted POS	12.58	ha			
Total Green Space Pi	rovided	23%		14.60	ha	
* Large portion of Co (30%) will include tre	ommunity Facility (50%) and Portion of Land Lease re retention and open space	29%		18.35	ha	
* If Community Hub treated as 100% benefit + Portion of Land Lease (30%)		30%		19.10	ha	
* If Community Hub + 50% of Primary Sch	treated as 100% benefit +Portion of Land Lease (30%) bool	31%		20.85	ha	

\* Area may be reduced at time of detailed design

POS	Area / Ha	15mm Event (1:1)	Catchment	20% AEP Event (1:5)	1% AEP (1:100)	Unrestricted POS	Credited Drainaae	Uncredited Drainaae
		,		,	(,			j.
1	1.32	2674	Ct 1	3152	3245	1.00	0.05	0.27
2	1.18	1033	Ct 2	1236	1780	1.06	0.02	0.10
3	0.12					0.12		
4	0.28					0.28		
5	0.15					0.15		
6	1.50	1691	Ct 3	2021	2200	1.30	0.03	0.17
7	9.00	5734	Ct 2,4,5,8	6811	8010	8.32	0.11	0.57
8	1.05	6155	Ct 6 & 7	6994	8210	0.35	0.08	0.62
	14.60	17287		20214	23445	12.58	0.29	1.73

#### Table 3: Drainage Areas of POS

\* Areas in hectares (ha) and square metres (sqm)

\* Areas taken from LWMS

# 4.4 LANDSCAPE CONCEPT

An indicative Landscape Concept prepared by landscape architect Emerge in **Appendix 7** demonstrates a proposed landscape outcome that respects the natural attributes of the site and its surrounds while delivering a quality urban outcome.

The LSP provides for a well-connected open space network that will provide the local community with safe parklands, supporting various open space functions whilst facilitating significant environmental outcomes through the retention and protection of existing vegetation and planned early planting to be undertaken.

The structure plan has been designed on the premise that all roads entering the subject site will be via a road abutting a green backdrop, with restricted crossovers in these areas. This results in long lineal open space areas, with uninterrupted pedestrian and cycle networks throughout.

All residential hubs (hamlets) within the structure plan are bordered by landscape spines, which will house a combination of tree-planted walk trails, mountain bike trails and also areas that ultimately may contain areas for community gardens, orchards or other initiatives such as a solar farm. The landscape masterplan has been done in collaboration with the fire consultant (BMP) to ensure fire management is addressed with regard to proposed planting.





Figure 30: Landscape Masterplan Elements

## 4.4.1 POS 1

This POS is located in the western edge of the structure plan, fronting Bussell Highway. The area will contain a drainage detention basis, and also look to retain/enhance upon the trees located along the subject site boundary.

- POS 1 1.32 ha
- Informal active recreation uses on open grassed areas;
- Gathering nodes with picnic / BBQ facilities;
- Stormwater retention and conveyance through a vegetated and stabilized swale;
- Retention of existing significant trees and vegetation where possible;
- Path network which links into the greater development; and
- Manicured landscape areas fully irrigated outside buffer areas.



### 4.4.2 POS 2, 3 & 4

These three (3) open spaces areas totalling 1.58ha provide a green gateway into the structure plan area from Andrews Way and comprise a widened verge area and two local pocket parks. The location and size of these parks facilitate the retention of remnant vegetation at these locations, whilst also providing a separation of residential development from the road frontage.

- POS 2,3,& 4 1.18, 0.12, 0.2539 & 0.28 ha
- Informal passive recreation area on open grassed areas and tree retention;
- Green entranceway into structure plan area from Bussell Highway (west)



### 4.4.3 POS 5

This area is located at the second entry to the subject site from Andrews Retreat, and also is on the adjacent corner to the primary school site. The location of this POS provides a refuse location for future students, whilst also retaining a natural environmental gateway into the site.

Whilst remnant vegetation will be retained within this local park, it is acknowledged that remnant vegetation will also be retained in the primary school site, providing the second green gateway into the site from the north.

- POS 5 0.15 ha;
- Informal passive recreation area; and
- Retention of existing significant trees and vegetation where possible.



## 4.4.4 POS 6

This central open space provides the east-west connection through the centre of the structure plan. The POS will contain native vegetation (planted) and cycle paths. The open space forms the northern boundary of the central entry road and will be bypassed by the majority of residents entering the structure plan area.

- POS 6 1.50 ha
- Informal active recreation uses on open grassed areas
- Gathering nodes and break out manicured grass area;
- Retention of existing significant trees and vegetation where possible; and
- Path network which links into the greater development;



## 4.4.5 POS 7

The main area of open space provides buffers between the three (3) southern development cells (hamlets), the primary school site and the Perimeter Road.

The spacing between development areas / surrounding road network varies between 20-30m in width, providing a visual buffer between areas that can accommodate tree planting of native vegetation on mass. The planting of these areas is to be compliant with the requirements of the bushfire management planning, to ensure residential development in the locality can still be achieved.

The open space also accommodates a formal full senior playing oval, that has been collocated with the primary school for dual use. The oval will by virtue form the active-passive recreation focus within the structure plan area, and also have other playground and public facilities associated in the central location as deemed appropriate by the Shire.

- POS 7 9.00 ha (15% open apace equivalent);
- Informal and active recreation uses on open grassed areas;
- Gathering nodes with picnic / BBQ facilities;
- Stormwater retention and conveyance through a vegetated and stabilized swale;
- Retention of existing significant trees and vegetation where possible;
- Community garden/farm areas \*
- Solar panel farm \*\*
- Path network which links into the greater development; and
- Manicured landscape areas fully irrigated outside buffer areas



\* Community garden/farm area to be investigated via lease mechanism with the Shire.

\*\* Potential for solar panel installation along the buffer area with the Perimeter Road to be investigated with the Shire.



Mountain Bike Trails within Open Space Spines



Acoustic Bund Bussell Highway and MTB Track (Initial Concept)

## 4.4.6 POS 8

POS 8 provides the stormwater detention/catchment area for the eastern portion of the site. The majority of this area will cater for a 1:100 years stormwater event, with stormwater culverts located at the Darch Road boundary.

This will provide a passive function of open space, whilst also providing a key linkage for pedestrians and cycles within the Structure Plan to Darch Road, which links northward to the Margaret River townsite.

- POS 1 1.04 ha;
- Passive recreation uses;
- Stormwater retention and conveyance through a vegetated and stabilized swale;
- Retention of existing significant trees and vegetation where possible; and
- Path network which links into the greater development, and regional path network (Darch Road);



## 4.4.7 Stormwater Strategy

All stormwater from the development will be directed into bio-retention treatment areas constructed along the edges of the POS. These will be sized to treat the flows from the small rainfall event in accordance with the principles of water-sensitive urban design.

Storm events in excess of these will be directed into flood storage areas in various open space areas as shown on the landscape masterplan and in *Figure 31*.

The stormwater strategy, LWMS and Landscape Masterplan have all been undertaken in conjunction with one another to ensure the proposed layout functions appropriately and the open space areas provide the intended recreational nodes.

#### 4.4.8 Streetscape

The streetscape planting strategy design will be translated through different palettes of street trees providing legibility through the development. (*Figure 32*)

Tree species selected are reflective of the Margaret River area, reliable and readily available whilst providing shade and amenity to each street. The proposed species offer consistencies in appearance with differences in size and scale. The planting regime for the structure plan area is to reflect the southwest character of Margaret River and utilise native species throughout.

Large tree species along the open space spines are proposed and will provide sufficient shade for walk and bicycle trails, whilst also offering a distinct separation between the residential nodes within the structure plan.



Figure 31: Stormwater Landscape Areas



Figure 32: Street Tree Masterplan

# 4.5 **RESIDENTIAL**

### 4.5.1 Land Use and Residential Density

The Structure Plan reflects the intended use of the subject land for primarily residential purposes and land uses permissible within the associated zone. Whilst the residential zoning will permit primarily single and grouped housing development, the development of a retirement land lease facility is proposed for the south-central portion of the site.

The proposed residential density is consistent with the strategic direction of the Shore of Augusta Margaret River Local Planning Strategy with residential densities of R10-R40 allocated.

A base residential density of R15-25 has been applied to the majority of the structure plan area (to facilitate more standardised residential dwelling development as requested by the building industry), with a lower R10 density providing a low-density interface for the eastern and northeast edges of the site. There are medium-density sites (R30/R40) located throughout the site, providing an opportunity for smaller lot development, and possible short-stay accommodation developments. Providing specific locations through the structure plan ensures that any potential conflict between densities is minimised, with the locations having been chosen due to the location of areas of amenity.

The base coding of R15-25 will facilitate the creation of a range of lot product, which will also address the affordability aspect of residential development, with a range of family dwellings able to accommodate sufficient open space on the smaller lot product, without compromising the house design.

The local planning strategy identified a yield of approximately 420 for residential dwellings, with the proposed structure plan yielding 382 lots with a yield of 411 dwellings. In addition to the residential dwellings, a lot for land lease retirement living is proposed, which has the potential to yield in the order of 250 retirement dwellings.

The density of development within the structure plan area is in line with the objectives of the local planning strategy, and also sympathetic to the area. The transition of density from the west to lower density in the east provides a buffer to Darch Road, whilst also providing sufficient development potential for the development of the expansive open space areas and a community clubhouse that is proposed.

The development generates a residential density of 16.2 dwellings per net site hectare for conventional residential lots, with a combined residential density of 18.4 dwellings per net site hectare with the inclusion of the land lease development. With Liveable Neighbourhoods stipulating for most new urban areas, urban densities of at least 15 dwellings per urban hectare, and an average of 22 dwellings per site hectare, should be provided with the proposed density allocation is considered appropriate for the site given its regional context.

The gross site hectare density proposed by the development is 9.8 dwellings per hectare, being less than the 15 stipulated by Liveable Neighbourhoods, but is considered appropriate given the regional context, retention of character for the site and also the 29% retention of open space.

		Residential	Land Lease	Combined / Total
Yield (Estimate)	Area / Ha	411	250	661
Gross Site Ha	67.63			9.8 Dwellings / Ha
Gross Site - Land Lease	57.03	7.2		111 1
Net Site Ha	35.90			18.4 Dwellings / Ha
Residential	25.30	16.2		12/7
Land Lease	10.60		23.6	

The proposed densities facilitate a residential development that can provide a broad lot product offering, and will enable the development of 400 residential lots required for the viability of the residential clubhouse (private recreation) and support of the land lease facility.

Based on 2021 ABS statistics and an expected dwelling yield of 411 residential dwellings and a further 250 retirement land lease dwellings, the estimated population of the Structure Plan area is 1,068 persons at 2.6 persons per residential dwelling, and an additional 375 persons at 1.5 persons per dwelling for land lease retirement (Total 1,443 residents).

The proposed residential yield and density mix addresses the objectives and principle of the Hamlet Design Guidelines by adequately reflecting the following;

Land Use and Density	Achieved
Encourage a variety of household types, groups, ages and ethnicities within communities by allowing for a variety of densities, lot sizes and housing typologies;	$\checkmark$
Creation of a compact community that avoids unnecessary urban sprawl;	

## 4.5.2 Residential Lot Layout

The road network has been designed to facilitate the creation of regular shaped lots, capable of accommodating standard residential dwellings, with direct access to a public street. A suitable mix of lot types is able to be accommodated by the structure plan, with a range of depths from 25-50m being achieved. To demonstrate the potential subdivision pattern, refer to the preliminary Subdivision Concept in **Appendix 6**.



#### Figure 33: Concept Subdivision Layout

Orientation towards all areas of open space has been maximised, allowing for passive surveillance of these areas. All POS areas within the Structure Plan area shall be provided with passive surveillance from surrounding lots, and in turn aims to promote the use of these areas by residents.

The majority of the street block layout has been oriented north-south, to maximise solar penetration into the rear areas of lots. The roads have also been configured to be sympathetic to the topography of the site, minimise excessive earth working of the site, and minimise required drainage infrastructure throughout the site. This has also been undertaken to follow the natural contouring of the site, and seek to minimise the need for retaining throughout development.

Wide frontages have been utilised in formulating the concept layout plan, to ensure solar penetration down side boundaries, and to take advantage of passive solar orientation where possible. This will be further iterated through design guidelines that will be prepared and implemented for the development of the structure plan.



Figure 34: Lot Methodology

The proposed urban layout addresses the objectives and principles of the Hamlet Design Guidelines by adequately reflecting the following;

Block Pattern	Achieved
Lot sizes and density are appropriate scale for the site/area, and character of Margaret River;	$\checkmark$
Encourage pedestrian activity and parks based around street layout – passive surveillance is a high priority;	$\checkmark$
Blocks are artfully created with views and vistas, public spaces and a sense of identity;	
Block layout respects aspect, view and topography	$\checkmark$
Block design encourages active and overlooked public spaces	$\checkmark$
Permeability	Achieved
Provide a clear circulation network that allows for ease of movement and reduces the impact of the car;	$\checkmark$
Allows a variety of street types, that help define public and private spaces, and assists in creating distinctive and legible places;	$\checkmark$
Provides for a community that fits legibly into the surrounding recreational and pedestrian networks;	$\checkmark$
Provides gateways that make the connections more legible and memorable.	
Legibility	Achieved
Material and colours drawn from the local environment;	$\checkmark$
Responsive design that promotes a sense of place;	$\checkmark$
Designs that encourage and facilitate the personalisation of building and spaces;	$\checkmark$

## 4.5.3 Residential Lot Size

The Structure Plan proposes a road network that results in the creation of standard street blocks that are robust and adaptable to accommodate a variety of lot sizes. Density coding of R10 - R40 is proposed, which can accommodate standard lot depths ranging from 20m – 50m.

Lot sizing for conventional residential lots will range between 180-240m<sup>2</sup> for R40-coded areas, with lots up to 1,500-2,500m<sup>2</sup> in areas coded R10. The majority of the site is zoned R25, with standard lot sizing being 550+m<sup>2</sup>. The concept subdivision plan for a yield of 411 lots, provides an average lot size of 614m<sup>2</sup> for the whole structure plan.

The range of lot sizing to be proposed by the structure plan will facilitate house and land packages for varying price points. The strategy for the structure plan is to facilitate the development of lots with larger frontages and shallower lot depths than conventional development, which will contribute to a perceived lower-density streetscape and non-domination of garages to the street.

The wider frontage will also contribute to reduced building costs (affordability), with a squarer build construction to be implored, reducing perimeter wall lengths and by virtue construction costs (i.e. square compared to a rectangular dwelling)

# 4.5.4 Village Centre - Private Recreation / Child Care (Community Club House -Common Property)

#### 4.5.4.1 Land Use

The Structure Plan proposes a central 'clubhouse' facility, that will be to the benefit of the structure plan lots. This area is approximately 1.5ha in area and is envisaged to provide a communal meeting node for residents, which will also contain other complementary land uses.

The 'Village Centre' zoning for the site will enable the development of the private recreation facility (1.3ha), and also a childcare site (0.2ha).

It is the intent for the Structure Plan to be developed under the Community Title Act 2018, with the clubhouse being deemed 'Private Recreation' and created as 'Common Property', being 1.3ha in size. If this is not achieved, the facility will still be progressed as a 'Private Recreation' development under the Village Centre zoning.

The balance 2000m<sup>2</sup> is to be developed for Child Care. The location and context with the primary school catchment and surrounding residential catchment make the proposed land use suitable for integration with the district oval and proposed private recreation land uses.

The site is to be developed to address the surrounding street network and retain remnant vegetation within the site. Land uses to be contained within the Private Recreation lot include (but are not limited to) the following;

- Meeting room(s)
- Gym

- Pool / Lap Pool
- Playground
- **BBQ** facilities

- Tennis courts
- Public Café
- Child Care site



Figure 35: Example of Melbourne Residential Clubhouse (Villawood Mt Duneed & Rathdown – Villawood)

The clubhouse facility is to be operated in a similar manner to those on the east coast (Victoria) and provides a central node in which to foster a greater sense of community in the locality. The facility will be operated for the benefit of the structure plan community (dwellings and land lease), with all dwellings being provided access as part of the land purchase.

The facility will be operated privately and paid for by the residents of the structure plan, withal dwellings having 100% access to the facilities (based on access per dwelling, not persons). With the operation of the facility being tied directly to the residents of the subject site and based on fees of approximately \$800 per annum (dwelling) as reflective of Victorian examples) the proposed yield of 411 dwellings and 250 land lease (retirement) has been established to ensure the ongoing financial viability of the facility. This is based on the completion of the structure plan in its entirety and will be delivered on a staged basis throughout development as the local population grows.

The structure plan further provides for the delivery of a Tiny Home initiative (Section 4.5.6), which will contribute to lessening the financial fees to residents within the structure plan toward the clubhouse facility. This is detailed further in section 4.5.6 of the report and can be implemented under the residential coding of those sites.

## 4.5.4.2 Local Development Plan

This Structure Plan proposes to introduce the preparation and implementation of an approved Local Development Plan that aims to set out specific and detailed guidance for the future development of the Private Recreation / Child Care site and associated structures and facilities.

Such an approach would be consistent with *Schedule 2, Part 6 of the Planning and Development (Local Planning Schemes) Regulations 2015* wherein it outlines the Local Development Plan aims to include the following –

- a) site and development standards that are to apply to the development;
- *b) specifying exemptions from the requirement to obtain development approval for development in the area to which the plan relates.*

The Local Development Plan will address the development standards listed below. The listed development standards have been included under Part One of the Structure Plan.

- Development to address street frontage
- Integration with land lease lifestyle site
- Land use and floor area allocation

Importantly, the proposed facilities (that will include the clubhouse) will cater for long structure plan residents only (ie will cater for private use, with restricted public access without invitation). The child care and café are envisaged to be accessible to the wider public.

The final configuration of land uses will be the subject of a Development Application with the Shire, though it is noted the facility is primarily for the use of residents within the structure plan area. (**Appendix 10**)



Figure 36: Village Centre Land Use Configuration

# 4.5.5 Land Lease (Retirement / Lifestyle Estate)

#### 4.5.5.1 Land Use

A site of 10.6ha within the structure plan has been identified for a land lease development. A retirement living assessment was undertaken by Location IQ (**Appendix** 11) and identified the need for such land use, and the integration of this with the Community Title Scheme development is envisaged to provide an integrational integrated development.

The co-location and integration of land lease (retirement) with residential (co-sharing of some facilities) is based on leading research/examples from Europe and will be the first undertaken nationally.

This Structure Plan provides for the future development of a land lease community or modular home estate (MHE) comprising grouped dwellings and associated community and recreation facilities that cater for the needs of prospective residents in the over-50's age bracket.

Whilst it will incorporate ageing in place requirements, within the relaxed ambience of a secure community setting that will incorporate retained remnant vegetation onsite, the main aspect which will be a first is an integration with the 'Clubhouse' facility that is open to all residents within the structure plan area, providing a true intergenerational meeting hub. The land lease development will have its own smaller clubhouse and facilities (for sole use) but will utilise the facilities (such as café, lap pool, gym and tennis courts) in the residential clubhouse precinct.

The land lease will be subject to a Development Application with the Shire and is envisaged to be submitted as a "Park Home Park' (Retirement/Lifestyle Village) land use. The lifestyle estate is to yield circa 250 dwellings, with associated central community facilities. An underlying residential coding of R60 applies to the site.

This structure plan aims to achieve the following Land Use and Design objectives with regard to this site;

- 1. Guide future development in accordance with the Residential Design Codes as a grouped dwelling development for aged persons (older Australians aged 50 years and over) and operated according to the *Residential Parks (Long-stay Tenants) Amendment Act 2020* and supporting regulations.
- 2. To accommodate the following land uses -
  - Grouped Dwellings located on allotments ranging between 165m2 to 330<sup>m</sup>2 at a Residential Density of 40;
  - Central Community Building providing facilities for the exclusive use of residents in the Lifestyle Community. Community facilities will include central management, foyer, cinema, indoor heated pool, bowling green, library, ten-pin bowling, outside meeting and barbeque areas;
  - Smaller nodes to accommodate men's shed and garden areas,
  - Private Open Space within the Lifestyle Community that will incorporate visual buffers to Bussell Highway, retention of existing endemic trees and passive recreation opportunities for residents.
- 3. Development to incorporate ageing-in-place requirements, within the relaxed ambience of a secure community setting that will be integrated with modern integrated community development.
- 4. Include a requirement for a Local Development Plan to be prepared and implemented that sets out specific and detailed guidance for the future development of the Grouped Dwellings and associated Structures and facilities and outlines exemptions from the requirement to obtain development approval for development where it is consistent with the approved Local Development Plan.

The land use and internal private road layout will generally reflect the urban layouts and open space configuration reflected in the Concept Masterplan provided in **Appendix 12** in this report.



Figure 37: Land Lease Concept layout - 250 Yield



Figure 38: Retirement Dwelling Construction and Facilities.

Within the lifestyle village, there is also remnant vegetation that is proposed to be retained and will be accommodated through low-order private roads that can meander around tree centres, and also small open space break-out areas that will accommodate seating areas and natural vegetation.

## 4.5.5.2 Open Space

Within the Masterplan there are also substantial areas set aside for open space, being 8843m2 in area, in addition to substantial open space areas within the communal facility site of 6000m<sup>2</sup>. Open space within the site will be in the order of 10% self-allocation of the gross site area, noting this is above the 29% open space allocation of the structure plan.

Open space within the land lease site will be private and managed by the operator.

The vision for the public open space consists of passive recreation links utilising the east-west pedestrian corridors which provide permeability throughout the site. The open space network internally whilst providing access within the land lease estate, also links with the broader public c open space network of the structure plan and access to the central 'club house' via integrated site development (common boundary).

The public open space areas have considered:

- 1. Retention of remnant vegetation;
- 2. Pedestrian access throughout the lifestyle village;
- 3. Breakout/rest areas for residents

### 4.5.5.3 Local Development Plan

This Structure Plan proposes to introduce the preparation and implementation of an approved Local Development Plan that aims to set out specific and detailed guidance for the future development of the Grouped Dwellings and associated structures and facilities. A concept layout for the Land Lease is included in **Appendix 12** and will form the basis for an LDP.



Figure 39: Retirement Dwelling Construction and Facilities.

Such an approach would be consistent with *Schedule 2, Part 6 of the Planning and Development (Local Planning Schemes) Regulations 2015* wherein it outlines the Local Development Plan aims to include the following –

- c) site and development standards that are to apply to the development;
- *d)* specifying exemptions from the requirement to obtain development approval for development in the area to which the plan relates.

This approach reflects could exempt the need for lodgement of future Development Applications. Such a process would ensure that the Local Development Plan would set out the approved development standards to be applied to the development and enable the proponent to seek building licenses for each respective stage of construction.

The Local Development Plan will address the development standards listed below. The listed development standards have been included under Part One of the Structure Plan.

- Residential Design Code
- Building design elements
- Streetscape/dwelling orientation
- Setback requirements
- Fencing controls between dwellings. and also between the lifestyle community and surrounding Public Open Space
- Bushfire Management Plan requirements
- Private lot open space/site coverage
- Incidental development (storage/clothes drying/outbuildings/controls on caravan/ trailer/boat locations)

- Internal road and grouped dwelling layout, and housing typologies
- Prepare and Implement and approved Urban Water Management Plan
- Visitor car parking allocation and provision of landscaping
- Servicing details for all land uses
- Retention of existing mature trees within private open space, landscape buffer to Bussell Highway and within the front of proposed grouped dwelling allotments addressing private roads and lots.
- A comprehensive risk management plan for the ongoing management of all phases of the planning, construction and operation of the community
- A detailed landscaping plan to address Visual amenity and landscaping

## 4.5.5.4 Land Tenure

The lifestyle development will remain under the single ownership of the proponent, with each grouped dwelling site provided under a lease arrangement with the homeowner. Each resident will own their home while leasing the land and are protected by the *Residential Parks (Long-stay Tenants) Amendment Act 2020*. The landowner will retain full ownership and management control of the community facilities and maintenance of the lifestyle community communal grounds.

The lease arrangement will see payments covering all outgoings including rates and taxes, maintenance of communal grounds, rubbish removal and access to all facility offerings in the lifestyle community. This model provides for a highly equitable arrangement that has received wide market acceptance. The lease arrangement is approved by the WAPC for a period of 60 years and is renewable upon request by the overarching landowner/operator.

Importantly, the community facilities (that will include the clubhouse) will cater for long-term residents only (ie will cater for private use, with no public access without invitation).

Land Lease Lifestyle Village will incorporate communal facilities, that will include pool(S), cinema, library etc – and be controlled via a Local Development Plan for the site. Prepared as detail in section 4.5.5.3













Steel frame dwellings constructed onsite on concrete slabs. Dwelling product is deemed transportable, and compliant with Residential Parks Act with regard to removable.





## 4.5.6 Tiny Home (Grouped Dwellings)

The Structure Plan endeavours to build upon the 'tiny home' concept that is being investigated throughout various Councils/Shires. The delivery of several grouped dwellings on a single title, which will not be subdivided and retained under single ownership is to be pursued.

The concept seeks to deliver four (4) small residential dwellings on a single lot, which may require exemptions to the R Codes or Scheme provisions. This is being pursued as a means to address affordable rental properties within the context of an established urban area, and ultimately could be utilised to further expand to more affordable housing (though not initially intended).

It is essential that the streetscape is not detrimentally impacted by the final built form, and the best way to ensure all the Shires' objectives are met is to pursue this through a Local Development Plan in pre-defined locations. The main principles of the concept are;

- 4 dwellings on a single residential lot.
- Home design with loft (no bedroom).
- Lots would not be titled and held under project ownership/single ownership.
- Provide affordable rental (dwelling product is not individually sold).
- Would fit with the streetscape of the estate.
- May require exemptions from 'standard' planning regulations (where applicable).

Another initiative to address affordability within the wider Margaret River area can also be explored through the delivery of the tiny home concept, with Council assistance via reduced rates and taxes on these lots (developments), with all savings passed through to the tenant.

This concept/pilot provides an opportunity to explore a unique initiative with Council, that would demonstrate nationally how to integrate such an affordable offering within a conventional street scape and urban environment. The pilot is envisaged to be delivered one (1) site at a time, enabling the evolution of the concept through lessons learnt, and enabling an ongoing review with Council. The structure plan originally identified four (4) potential sites for these to be delivered on, though confirm that this could be delivered on a larger scale if deemed to be beneficial.

Integration of affordable housing into the proposed structure plan contributed to the integration of such housing, whilst not deeming it social housing, and the associated stigma with this. The affordable rental tiny home concept is also being explored as a means to assist in people achieving home ownership. Rents would be able to be capped (to be investigated with Council) to an affordable level, whilst allowing financial planning for home ownership.

Concerning the population being generated by the tiny home concept, this is not considered to provide an increase in population that would detrimentally impact the area. The four (4) dwellings are envisaged to house 1-2 people, which would see the 4-pack development account for 4-6 residents, being the same as a large family home. Noting that only 4 sites are identified by the structure plan, this increase is population and associated traffic etc is deemed negligible.

#### 4.5.6.1 Local Development Plan

This Structure Plan proposes to introduce the preparation and implementation of an approved Local Development Plan that aims to set out specific and detailed guidance for the future development of the Grouped Dwellings (Tiny Homes).

Such an approach would be consistent with *Schedule 2, Part 6 of the Planning and Development (Local Planning Schemes) Regulations 2015* wherein it outlines the Local Development Plan aims to include the following –

- e) site and development standards that are to apply to the development;
- *f)* specifying exemptions from the requirement to obtain development approval for development in the area to which the plan relates.

This approach reflects could exempt the need for lodgement of future Development Applications. Such a process would ensure that the Local Development Plan would set out the approved development standards to be applied to the development and enable the proponent to seek building licenses for each respective stage of construction.

The Local Development Plan will address the development standards listed below. The listed development standards have been included under Part One of the Structure Plan.

- Residential Design Code provisions (variations)
- Visitor car parking allocation and provision of landscaping
- Building design elements
- Streetscape/dwelling orientation
- Setback requirements
- Fencing controls between dwellings

- Private lot open space/site coverage
- Incidental development (storage/clothes drying/outbuildings/controls on caravan/ trailer/boat locations)
- A detailed landscaping plan to address Visual amenity and landscaping



Figure 40: Location of Tiny Home – 4 Pack









24

















11

### 4.5.6.2 Land Tenure

The grouped dwellings would remain under the single ownership of the proponent, with no subdivision of the properties to occur.

The concept seeks to deliver four (4) small residential dwellings on a single lot, which may require exemptions to the R Codes or Scheme provisions. This is being pursued as a means to address affordable rental properties within the context of an established urban area, and ultimately could be utilised to further expand to more affordable housing (though not initially intended).

### 4.5.7 Primary School Site

The Structure Plan provides for a 3.5ha Public Primary School site, in accordance with the requirement of the East Margaret River District Structure Plan.

The site has been positioned on the northern area of the subject site, providing a central location for the residential development on the site as well as that to the north (Spindrift and Brookfield Estates) which account for 2/3 of the catchment.

The primary school site of 3.5ha has been located abutting a district open space, which can accommodate a senior playing field. The co-share arrangement of the oval (POS) with the primary school site, provides for a central node, which works in collaboration with the nearby childcare site and residential clubhouse facility, to further strengthen the local sense of place to future residents.

The site adheres to the requirements of DPLH/WAPC Operational Policy 2.4 – Planning for school sites.

## 4.6 **MOVEMENT NETWORKS**

#### 4.6.1 Existing Movement Network

A Transport Impact Assessment (TIA) prepared by transport professionals Transcore in **Appendix 9** has investigated movement networks around the subject land and has forecast future transport impacts from the development and occupancy of the Structure Plan area.

#### 4.6.1.1 Local Road Network

The subject site is located within an established area comprising a network of Local Roads, Highways and Main Roads.

The Margaret River Perimeter Road provides access to the wider region, intersecting with Bussell Highway at the southwestern corner of the subject site. This road was recently completed, and no further upgrades are anticipated at this stage. The proportion of the Perimeter Road reserve that abuts the southern boundary of the subject site is currently zoned General Agriculture, though it is acknowledged that this will be zoned Highways and Main Roads under TPS 1 to reflect the balance of the reserve.

Access to the subject site can be gained from Bussell Highway to the west and Andrews Way to the north. Andrews Way is a sealed and uncurbed rural-style road, with no direct access being granted for residential dwellings on the northern side (Brookfield Estate). No direct access to residential dwellings (crossovers) is anticipated on the south side (subject site).

Road assessment of the existing road pavements will be undertaken in the next planning phase (Structure Plan), where road networks and residential urban layouts are proposed.

There is no further road widening of the surrounding reserves identified within the subject site by current zoning boundaries.

# 4.6.1.2 Paths & Cycle Network

There is an existing path network within the locality, providing access from the subject site to the Margaret River Townsite.

The Wadandi Track is located west of the subject site, on the western side of Bussell Highway. Darch Road which traverses the eastern boundary of the subject site is identified as a primary path network by East Margaret River DSP.

Footpaths or shared paths are currently provided further north along Bussell Highway and in parts of the surrounding residential areas and existing Brookfield Estate.;



Figure 42 – East Margaret River DSP Path Network

It is expected the subdivision roads will include paths that link the development to these exterior path networks.

## 4.6.2 Proposed Movement Network

A Traffic Impact Analysis for the structure plan has been undertaken by Transcore and forms **Appendix 9**. The subject site does not currently have any existing roads located within it. The site abuts Andrews Retreat to the north, Bussell Highway to the West, Perimeter Road to the south and Darch Road to the east.

Four new road network connections from the Structure Plan are proposed as follows:

- Andrews Way (west) new T-junction, full movement;
- Andrews Way (central) new T-junction, full movement;
- Andrews Way (east) new T-junction, full movement;
- Bussell Highway new T-junction, full movement.

All roads within the new internal road network would be designated as local access roads (i.e. <3,000 vehicles per day). The main east-west spine road connecting Bussell Highway with Andrews Way will provide access to the future primary school site within the structure plan area, and also provides a staggered 'T' intersection arrangement with the future extension of Brookfield Avenue.

The main road through the centre of the structure plan is proposed within a 20m reserve, acknowledging low traffic volumes, and reduced verge widths that will be achieved adjacent to open space areas. The section below is taken from Liveable Neighbourhoods and provides a generic dimension.



#### Neighbourhood connector B -

Lower volume neighbourhood connector, bus route, no cycle lanes, parking. Typically a residential environment with low parking turnover. Detailing of design to visually narrow street (eg including trees in parking lane, painted parking line), together with other speed control mechanisms to limit typical operating speeds to less than 50 km/hr. Bus stops in travel lane against kerb extension in parking lane. A2-2.3 m shared path provided on at least one verge in lieu of on-street cycle lane.

Note: \* Verge width (including parking) can often be reduced from 6.2 m to 5.5 m with indented parking, to reduce overall reserve width to 18.0 m.

This main east-west spine road will carry the highest volume of traffic (2,600 vehicles per day at western entry) with each internal access road progressively carrying less as traffic is distributed along the internal network.

The key entry roads will adopt high landscaping standards and will take on a typical southwest landscape character by adopting indigenous vegetation types to improve upon the site's existing environmental qualities. Street trees will be planted and will serve to provide character, shade, and interest and improve the visual amenity of the structure plan area.

The road reserve widths for the new internal access road network are proposed at 15m (Access Road D) as shown in the TIA. The widths adhere to those documented within the Liveable Neighbourhoods (WAPC, 2009) which outline a

range of acceptable road reserve widths for various categories of access roads. The sections below is taken from Liveable Neighbourhoods and provides a generic dimensions.



Figure 43: Road Hierarchy



#### Access Street Access street B – wider access street

Target speed 40 km/hr (< 3000 vehicles per day). Wider access street suited to higher density residential areas (typically R30–R40+, or where dwelling density is greater than around 1 per 250 m2) with higher parking demand. Extensive parking, no bike lane, no buses, trees in verge, with additional trees in parking lane if required.

Note: 1. May reduce verge adjacent to park to 1.0 m when fronting public parkland. 2. Trees may be in verge and/or in parking lane. 3. \* Verge and parking lane as shown (6.2 m) can often be reduced to 5.5 m if parking is indented, and total street width reduced to 16.5 m



#### Access Street D –

Narrower access street for shorter lengths, low parking demand, serving larger lots. No buses, no bike lanes, no indented parking. Staggered parking on both sides of street as part of speed control, low speed. Not through route, low traffic volume.

Note: 1. May reduce verge adjacent to park to 1.0 m when fronting public parkland. 2. Where the street is short and vehicle volume is less than 150 vehicles per day, pavement may be reconfigured as a slow speed, comprehensively designed street, with a 3.4 m travel lane and 2.1 m embayed parking spaces. Passing bays are to be provided every 70-80 m, and maximum length 150 m. If a street is comprehensively designed and designated as a shared space for pedestrians and vehicles and target speed is comprehensively designed and designated as a shared space for pedestrians and vehicles and target speed is

All new internal roads are considered to be defined as "access roads". Road cross-sectional elements that need to be provided on this category of road include:

- 5.5-7.2m wide pavement with respect to the category of access road i.e. the lower the traffic volumes the narrower the pavement width may be;
- path provided on at least one side of the road; and
- sufficient verge width for the provision of utility services and infrastructure.

The private road network within the land lease site is shown at a width of 12m, reflecting the requirements of the R-Codes as applicable to survey strata development in excess of 20 lots. This road network will be further detailed in the Local Development Plan referenced in Part One of this Structure Plan and may be subject to reduction noting the land lease nature of the proposed development. This will be further detailed in the LDP for the land lease site.

The proposed urban layout addresses the objectives and principles of the Hamlet Design Guidelines by adequately reflecting the following;

The Street	Achieved
Sympathetic to local character and activity context, in design and detail;	
Visually simple, and free of clutter.	
Street designed to accommodate a range of functions, not dominated by any one function;	
Comfortable, slow speed and safe streets for pedestrians, cyclists and the disabled.	

## 4.6.3 Traffic Generation

Detailed traffic modelling and SIDRA analysis have been undertaken and are detailed within the TIA (Appendix 9).

Daily traffic generation rates used in this assessment have been derived from peak hour trip generation rates recommended in the Western Australian Planning Commission (WAPC) Transport Assessment Guidelines for Developments (2006). The trip rates used are 8 vehicle trips per day (vpd) per residential dwelling. Conservatively, 50% of residential trip rates were used for the proposed retirement dwellings within the SP area.

Accordingly, the proposed 411 residential dwellings would generate approximately 3,288vpd and the proposed 250 retirement dwellings would generate about 1000vpd trips.

For the proposed primary school, the trip rate used is 1.0 vph per student during before and after school peak periods (typically 8-9 am and 3-4 pm) and 2vpd per student overall. For this assessment, the Education Department's standard 540-student primary school design has been assumed, so this primary school is assumed to attract traffic flows of 1080vpd.



#### Figure 44: Daily Traffic Volumes

The subject site will connect to Andrews Way via three full movement priority-controlled T-intersections. No turn lanes are warranted at these intersections due to the low level of through traffic on Andrews Way in this vicinity and few turning movements at the intersections during peak hours.



Figure 45: Intersection Treatments

# 4.7 WATER MANAGEMENT

The WAPC's Better Urban Water Management (BUWM) document identifies the requirement to prepare a Local Water Management Plan (LWMS) to support Structure Plan proposals. The LWMS for this Structure Plan has been prepared by Emerge Associates in accordance with the requirements of the BUWM and reflects the District Urban Water Management Strategy (DWMS) that has been approved for the wider area.

The complete LWMS is included in Appendix 8.

The drainage areas identified in the LWMS reflect the open space areas and road network that are proposed by the Structure Plan.


# Figure 46: Water Strategy and Catchments (Stormwater Management Plan)

Implementation of the LWMS will be facilitated by an Urban Water Management Plan (UWMP), which will be required through a WAPC condition of subdivision.

# 4.8 EDUCATION FACILITIES

The subject site is located within an area of several residential developments with associated facilities. Whilst the subject site is identified to have a primary school located within it, in the interim, there are adequate schools and facilities in the immediate locality to service initial development.

Schools located within 3.0 km of the subject site include:

- Rapids Landing Primary School (1.2km)
- Margaret River Montessori School (2.6km)
- Margaret River Senior High School (2.6km)
- Margaret River Primary School (2.6km)
- St Thomas More Catholic Primary School (3.0km)

There are numerous areas of public open space, playing fields and reserved land within close proximity to the subject site. The established range of schools, public utilities and community facilities are considered to be adequate to support the population generated by the subject site.



#### Figure 47 - School Locations and Public Uses

The structure plan proposes the creation of a 3.5ha public primary school site, as per the requirements of the Shire of Augusta Margaret River strategic planning. The location and access to the proposed site are as per the East Margaret River District Structure Plan.

# 4.9 INFRASTRUCTURE COORDINATION, SERVICING AND STAGING

An Engineering Servicing Report prepared by Stantec (Engineering) is included in Appendix 13.

This report has been based on the civil engineering aspects of the primarily residential land uses. The report covers the engineering infrastructure requirements to service the proposed development. The engineering review has covered earthworks, roads, stormwater drainage and utility services with a particular emphasis on outlining how all major utility services will be available once the structure planning of the landholding has been completed.

The investigations and preparation of the report are largely based on preliminary advice from the various service authorities.

The following provides a summary of key findings.

#### 4.9.1 Topography

The vast majority of the Site is clear of significant vegetation except for a number of scattered trees in the southerncentral portion of the Site.

Ground levels across the site range from approximately 88mAHD to 95mAHD, with the Site, generally falling to the northwest and the east – split approximately 25%/75% by a ridge that runs north-south.



Figure 48: Site Topography

#### 4.9.2 Water, Drainage, Sewer, Power

The subject site is surrounded by established residential developments which have water, sewer, power, communications and gas services.

The site can ultimately be serviced with sewer reticulation, water reticulation, underground power, communications and gas services. Detailed investigations on infrastructure servicing shall be conducted during the Structure Plan stage

as part of an engineering servicing report for the subject site.

### 4.9.3 Sewerage

The Site is located within the Water Corporation's SD113 Margaret River Long Term Sewer Planning (SD113) scheme boundary, meaning that allowance has been made within Water Corporation's planning to service the Site with reticulated sewerage. Extension to existing infrastructure is able to be utilised to service the subject site. The detail of these extensions are detailed in Section 2 of **Appendix 13**.



Sewer Gravity Pipe (WCORP-068) - Web Mapping Service (WMS)

Sewer Pressure Main (WCORP-069) - Web Mapping Service (WMS)

Figure 49 - Wastewater Planning – Water Corp

# 4.9.4 Water Supply

Water Corporation planning advice confirms the site can be serviced off the existing water infrastructure in the adjoining road network. Reticulation-size pipes will be installed in the proposed road reserves as per the staging to suit the developer's requirements.

Existing capacity can service at least half of the subject site without the need for upgrades or network reinforcements subject to Water Corporation's operations team "making some minor adjustments in how the scheme operates".

Once development of the site reaches halfway, Water Corporation's advice is that requirement to service the remaining half of the development may include:

- Connection of the Site to a future DN300 main that is proposed to be installed along Perimeter Road (Water Corporation Reference CW03930 understood to be scheduled for funding within the next 5 years), and
- Reinforcement of the existing network north of the Site by extending and connecting an approximately 380m long section of DN250 main between Rapid's Landing Estate and Brookfield Estate.



Figure 50 - Existing Potable Water Network and Potential Future Connections/Extensions

#### 4.9.5 Drainage

An LWMS (Emerge Associates 2021, **Appendix 8**) has been prepared for the subject site and outlines the proposed drainage approach. It has been prepared to establish the water management methods for development within the subject site based on site-specific investigations and are consistent with relevant state and Shire requirements. It is also intended to provide guidance to the general stormwater management principles for the area and to guide the development of future urban water management plan (UWMP) documents.

The principle behind the stormwater management strategy is to ensure that the pre-development hydrology of the site is maintained and; the post-development peak flow rates and discharge locations are consistent with the pre-development environment. This will be achieved by ensuring runoff is first treated as close to the source as possible and then up to the 1% annual exceedance probability (AEP) rainfall event is detained within the flood storage areas (FSAs)/detention basins, before discharging off-site at flow rates which mimic the existing hydrology.

The stormwater management approach that is proposed for the site is discussed in the following sections and includes a treatment train approach that uses:

- Pit and pipe network connected/adjacent to residential areas
- Vegetated swales
- Bio-retention areas (BRAs)
- FSAs.

Detailed hydrological and hydraulic modelling using XPSWMM has been completed to determine the required size of stormwater management infrastructure to manage up to the 1% AEP rainfall event. The assumptions/methodology for this is detailed in the Modelling Assumptions Report provided in Appendix D of **Appendix 8**.

Overall, it will be possible for future development within the site to appropriately manage stormwater, groundwater, and surface water to address the state and local policies and expectations and includes measures that are regularly applied as part of typical residential development processes. Public open space irrigation needs are proposed to be satisfied through the use of recycled water. Detail regarding the implementation of water management measures will be addressed in subsequent water management documents (UWMP).

# 4.9.6 Electricity and Gas Supply

Electricity services are located in the surrounding area and have been designed with the capacity to be extended into the subject area.

- High Voltage (HV) overhead service within the Southern Perimeter Rd road reserve.
- HV overhead service to the South of Perimeter Rd up to Darch Rd
- HV overhead and underground service to the East of Darch Rd (between Perimeter and Rosa Brook Roads)
- HV underground service within the Northern Rosa Brook road reserve (from Leschenaultia Ave to Sandalwood Drive

All electrical reticulation will be underground in accordance with accepted practice and State Government requirements.

Based on the proposed development (approx. 411 lots), it is likely that the site power demand will be in the vicinity of 1.9-2MVA. This is based on the standard Western Power load allocation of 4.7kVA per residential lot. The Western Power Network Capac ty Mapping Tool indicates that the forecasted remaining capacity for this area for 2021 is in the order of 20- -25MVA (07/07/2021). This figure indicates that sufficient capacity is available at the zone substation.

ATCO Gas does not operate a reticulated natural gas network in the Margaret River area and therefore it is not possible to service the Site with reticulated natural gas.

# 4.9.7 Telecommunications

Telstra has advised that existing services can be extended to provide for required telecommunications services within the subject area.

According to the NBN rollout map (07/07/2021), the land to be subdivided falls within the NBN fixed line footprint. The pit and conduit will be designed in accordance with NBN standards and will be installed in the telecommunications alignment within the internal road reserves. Once installed and inspected, ownership of the pit and conduit network will be transferred to NBN or Telstra.

# 4.9.8 Groundwater

Emerge has detailed the Groundwater and provided the associated management strategy for development. This is included in **Appendix 8.** 

The site experiences perched groundwater conditions with groundwater observed during the winter months at the natural surface level in almost all monitoring locations. The site does not demonstrate the presence of a superficial aquifer, and the consideration for groundwater is to manage locally perched groundwater conditions. These could be managed by a combination of localised structural fill and subsoil drains. The rationale behind this methodology is to aid drainage and prevent surface water ponding. Imported fill will comply with the material requirements stated in AS 3798-2007, Guidelines on Earthworks for Commercial and Residential Developments (Standards Australia 2007) and will be utilised in response to parental soils and localised conditions. Subsoil drainage will also be implemented beneath road pavement and as an additional measure to control groundwater levels. Subsoil drains will also be used beneath BRAs to ensure that these are able to effectively drain between storm events.

The groundwater management measures proposed across the site include:

- Use of permeable sand fill above the low permeability soil layer to achieve desired finished lot levels.
- Grading of underlying clay layers towards road drainage infrastructure which will reduce localised ponding.
- Use of subsoil drains beneath road reserves to control locally perched groundwater levels and ensure the longevity of the pavement.
- Subsoil drains may need to be considered on both sides of the road reserve and/or at rear lot boundaries in order to provide a minimum clearance indicated by IPWEA guidance regarding controlled groundwater levels. Final lot levels should nominally be set approximately 1.2 m above the controlled groundwater level (CGL) set by subsoil drain inverts, however, this can be revised at future design stages if it can be demonstrated that appropriate clearance above the 50% AEP phreatic surface at the back of lot can be achieved.
- Subsoil drains will be used at the base of, or adjacently to, some stormwater management assets
- to ensure sufficient clearance is provided and that they dry out in an acceptable timeframe and between storm events.
- Subsoil drains will have a minimum slope of 1:500.

Implementation of the above strategies will facilitate adequate infiltration as well as provide appropriate clearances between lots, WSUD infrastructure and the CGL. Future UWMPs will indicate how the earthwork designs and detailed civil designs achieve the groundwater level management criteria across the development.

# 4.10 OTHER REQUIREMENTS

#### 4.10.1 Bushfire Management

The Structure Plan has been informed by the Bushfire Management Plan in **Appendix 5**.

The Structure Plan will accommodate the majority of bushland hazards within the site, which will remove the classified vegetation and therefore hazard across the site due to the construction of lots and the road network. Hazards will remain however within the three areas of POS associated with the retention of native vegetation and significant environmental values within these areas.

As shown in the landscaping masterplan, revegetation will be possible within the open space network. Bushfire hazards, therefore, are assumed to increase within POS areas, and the risks associated with this and mitigation measures required to respond to them, have been outlined within the Margaret River South Bushfire Management Plan, which has been prepared to support the Structure Plan.

The subject land has been identified as suitable for development, provided that risk management strategies and designs are incorporated into the development as detailed in the Bushfire Management Plan.

# 4.11 IMPLEMENTATION

The proposed Structure Plan has been prepared in accordance with the requirements of the Planning and Development (Local Planning Schemes) Regulations 2015. Further, the Structure Plan complies with the applicable State and Local Planning Policy Framework as set out in **Section 2** of this Report.

The Planning and Development (Local Planning Schemes) Regulations 2015 stipulate the manner by which the Structure Plan will be processed by the Shire of Augusta Margaret River and thereafter, the Western Australian Planning Commission to enable final approval.

The proposed Structure Plan is consistent with the Shire's strategic planning framework where it forms part of the shortterm priority urban development areas in the Shire. The structure plan aims to deliver a development outcome that adopts 'best practice' urban design methods and innovative design ideas to achieve a liveable neighbourhood for the future residents of the structure plan area.

The structure plan recognises the importance and responsibility of ensuring the most efficient use of land for urban purposes, whilst respecting the ecological, environmental and conservation values of the site.

Furthermore, it responds appropriately to the site's key constraints and opportunities to promote an urban structure based on walkable neighbourhoods with a strong connection to the surrounding and future development areas in the proximity of the site.

Based on the information presented in this report, it is considered that the proposed structure plan warrants favourable consideration by the relevant authorities given the opportunities presented. It is further acknowledged that the proposed urban form and land use address the requirements of the Shire of Augusta Margaret River Hamlet Design Guidelines, and importantly reflect the Character Area requirements which will further be encouraged via Design Guidelines for the structure plan area.

Character Areas	Achieved
To create a distinct identity	<
To create an identity that allows people to form an attachment to places and take ownership of this unique community;	<b>\</b>
Build upon a local architectural vernacular;	$\sim$
Street and public spaces that encourage people to wander, explore and spend time in;	
To integrate nature with the townscape.	

# **5 TECHNICAL APPENDICES INDEX**

Appendix			
1	Certificate of Title	N/A	N/A
2	Structure Plan	LA/WAPC	For Assessment
3	Environmental Assessment & Management Strategy	LA/DWER	For Assessment
4	Acoustic Report	LA/WAPC	For Assessment
5	Bushfire Management Plan	LA/DFES	For Assessment
6	Open Space Plan & Subdivision Concept	LA/WAPC	For Information
7	Landscape Concept	LA	For Information
8	Local Water Management Strategy	DoW	For Information
9	Transport Impact Assessment	LA	For Information
10	Village Centre Concept (LDP)	LA/WAPC	For Information
11	Economic Report (Land Lease Research)	LA	For Information
12	Land Lease Concept (LDP)	LA/WAPC	For Information
13	Engineering Servicing Report	LA/ WP/ WC	For Information

#### Abbreviations:

LA: Local Authority

DWER: Department of Water and Environmental Regulation

DFES: Department of Fire and Emergency Services

WAPC: Western Australian Planning Commission

DBCA: Department of Biodiversity, Conservation and Attractions

DoW: Department of Water

WP: Western Power

WC: Water Corp

WAPC: Western Australian Planning Commission