Hay Structure Plan

March 2022

NSW GOVERNMENT Planning, Industry & Environment

Hay Shire COUNCIL

Prepared for

Hay Shire Council

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The Hay Structure Plan has been prepared following both technical and financial support received from the NSW Department of Planning, Industry and Environment.

The **Hay Structure Plan** implements the recommendations of the Hay Local Strategic Planning Statement (LSPS), which will guide land use planning decisions for residential, rural residential and industrial development within Hay for the next 20 years.

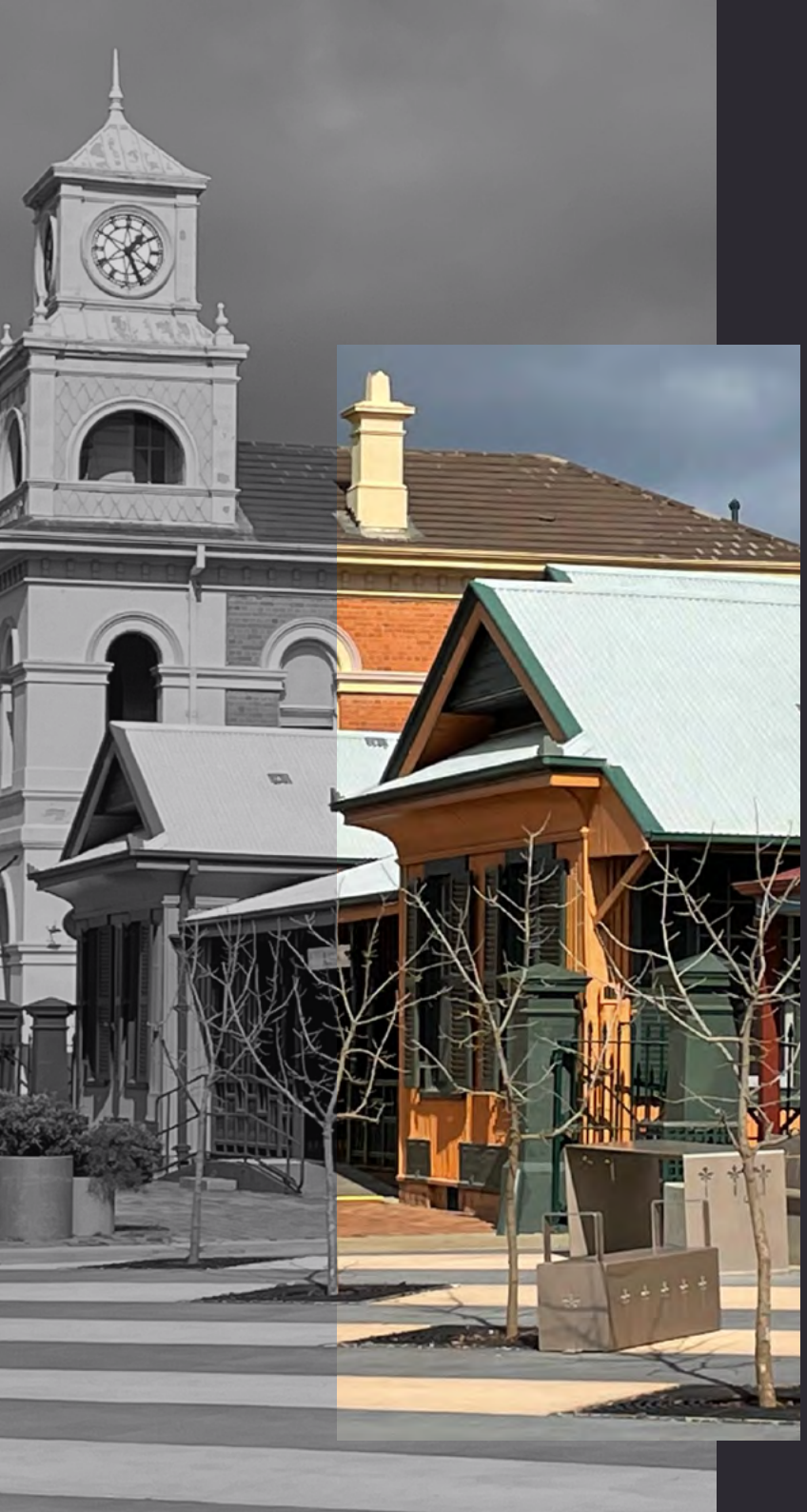
It will, in conjunction with other planning strategies, inform future changes to Council's planning controls including the zoning of land to ensure that there is an adequate supply to cater for the local needs of the community for the next 20 years.

The Plan reinforces Hay's unique local character and what makes it a great place to live, work and visit. It provides a strategic assessment of existing conditions and trends, as well as balancing residential and economic activities, whilst looking after and enhancing local character, the natural environment, heritage, public spaces and places.

David Webb General Manager

Acknowledgement of Country

Hay Shire Council acknowledges the traditional custodians of the land being the Wiradjuri and Nari Nari people and pays respect to their Elders past, present and future.



Contents

1. Introduction

Hay Railway Station (Source: Habitat Planning)

1.1 Overview

Hay Shire Council recently completed its Local Strategic Planning Statement ("the LSPS") to guide future economic, social and land use planning decisions for Council over the next 20 years. As part of this process, the LSPS identified a number of areas on the fringe of the main township that could be rezoned for residential, rural residential and industrial purposes to help accommodate and stimulate growth.

The purpose of the Hay Structure Plan is to further investigate these areas to confirm the suitability of the land for future development, as well as to provide an understanding of demand and supply for all urban land, potential development opportunities, constraints and infrastructure and servicing capacities.

Upon completion, the Structure Plan will guide land use planning decisions for residential, rural residential and industrial development within the main township of Hay to ensure that there is an adequate supply to cater for the local needs of the community for the next 20 years.

1.2 Objectives

The overall objective of the Hay Structure Plan is to guide the future development and use of land within the main township of Hay for the next 20 years and beyond.

Specifically, the Structure Plan seeks to achieve the following:

- Completion of a demographic and social profile including consideration of previous strategic planning investigations.
- Analysis of residential and industrial land supply and demand including consideration of both residential and industrial development types, trends and other opportunities.
- Investigation of development constraints and opportunities including natural hazards and biodiversity considerations.
- Assessment of infrastructure and servicing capacity and any required upgrade works needed to accommodate future development.
- Details regarding development staging to guide future residential and industrial land releases.
- Identification of suitable locations for community and social facilities including a health care precinct, aged care, open spaces and riverfront recreation.
- Completion of an implementation plan to outline how the recommendations of the Structure Plan will be achieved.

Hay Main Street

1.3 Regional Context

The Hay Shire Council area is located within the western Riverina Murray Region of New South Wales alongside the Murrumbidgee River (Figure 1).

Hay Shire is bounded by Carrathool Shire to the north and east, Murrumbidgee Council to the east, Edward River and Murray River to the south and Balranald Council to the west.

The main township of Hay is located on the junction of the Cobb, Sturt and Mid-Western Highways approximately 720km west of Sydney, 420km north of Melbourne and 650km east of Adelaide.

Hay Shire also has strong connections to its two nearest regional cities of Griffith (130km east) and Wagga Wagga (270km east) where residents can access higher-order health, education, retail, commercial and transport services.

Figure 1: Regional Context Map (Source: Riverina Murray Destination Management Plan 2018)

1.4 Study Area

The area investigated by the Structure Plan comprises the main urban area of the township of Hay and the surrounding outlying areas as shown in Figure 2.

The Study Area is generally defined by Kangaroo Lane to the north, Barman State Forest to the east, the southern boundary of the Hay airport to the south and Soapworks Beach reserve to the west.

The Murrumbidgee River bisects the study area in half with the main township located on the northern side of this river, whilst the suburb of South Hay is located to the south of this waterway.

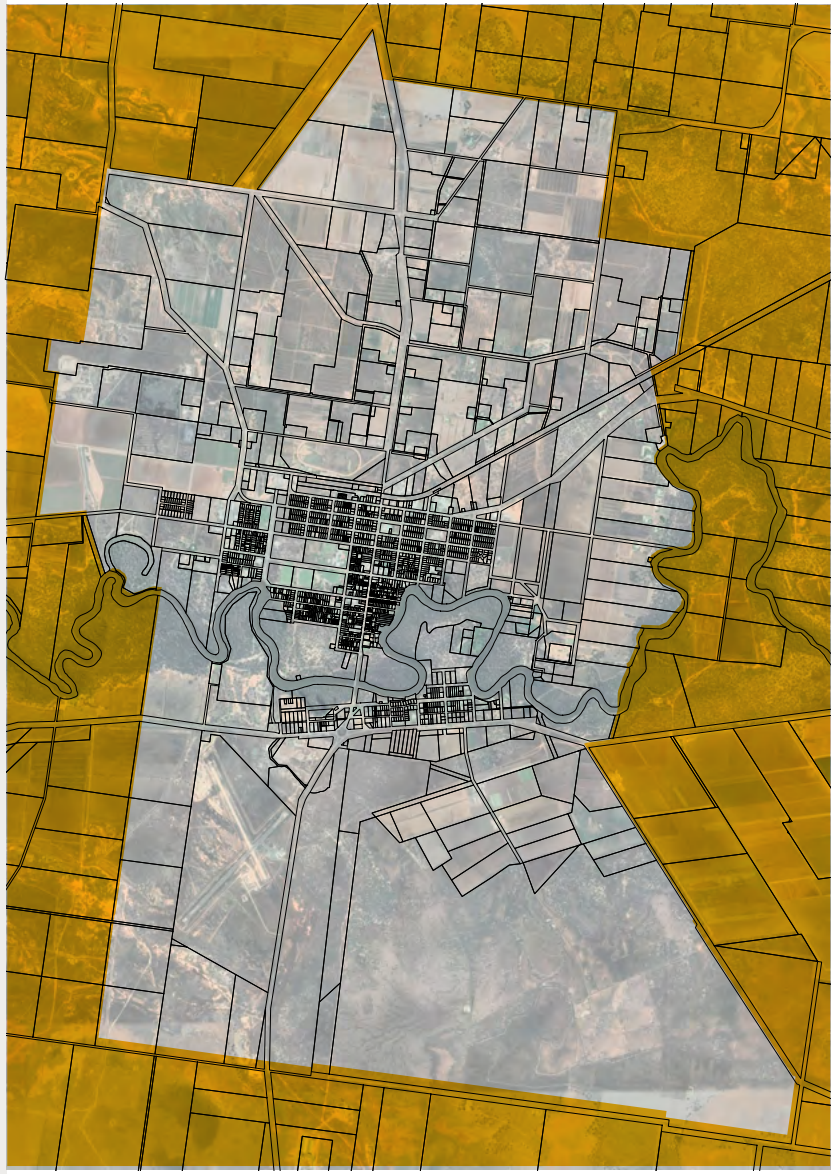


Figure 2: Study Area Map

2. Demographic and Land Use Context

Shear Outback (Source: Habitat Planning)

2.1 Population

In 2016, Hay Shire was estimated to have a population of 2,946 people.

The main township of Hay (2,316) and its immediate surrounds accounted for approximately 79% of the total population with the remaining population located within the rural areas (453) and small villages that make up the Hay Shire including Maude (82) and Booligal (95).

The median age of the population in 2016 was 47 years old.

This is comparatively high when compared against the NSW and national average of 38 years of age. This relatively high median population is reflective of the large number of persons aged over 50, which comprises approximately 45.5% of the total population.

Consistent with NSW and national trends the number of persons aged over 65 is predicted to increase by 200 persons from 600 in 2016 to 800 by 2041.

Population projections predict that the population of Hay Shire is due to decrease by approximately 600 people between 2016 and 2036 from approximately 3,000 people to 2,400 people.

This decline is consistent with population trends since 1981 and is attributable to a number of factors such as drought, water availability and productivity/technological advancements in agriculture.

The population decline is also reflective of lower birth rates and a smaller number of females at reproduction age (16-40).

Whilst it is acknowledged that as a whole, Hay Shire is predicted to decline, it is expected that the population of the main township of Hay will remain steady or in fact may slightly increase (see Section 2.3).

This will be the result of in migration from retired farmers and the elderly from outlying rural areas and small villages into the main township in recognition of the wider range of services and housing types available to this age group.

Anecdotal evidence also suggests that there may be in migration to rural areas post COVID, which has already begun in the township of Hay.

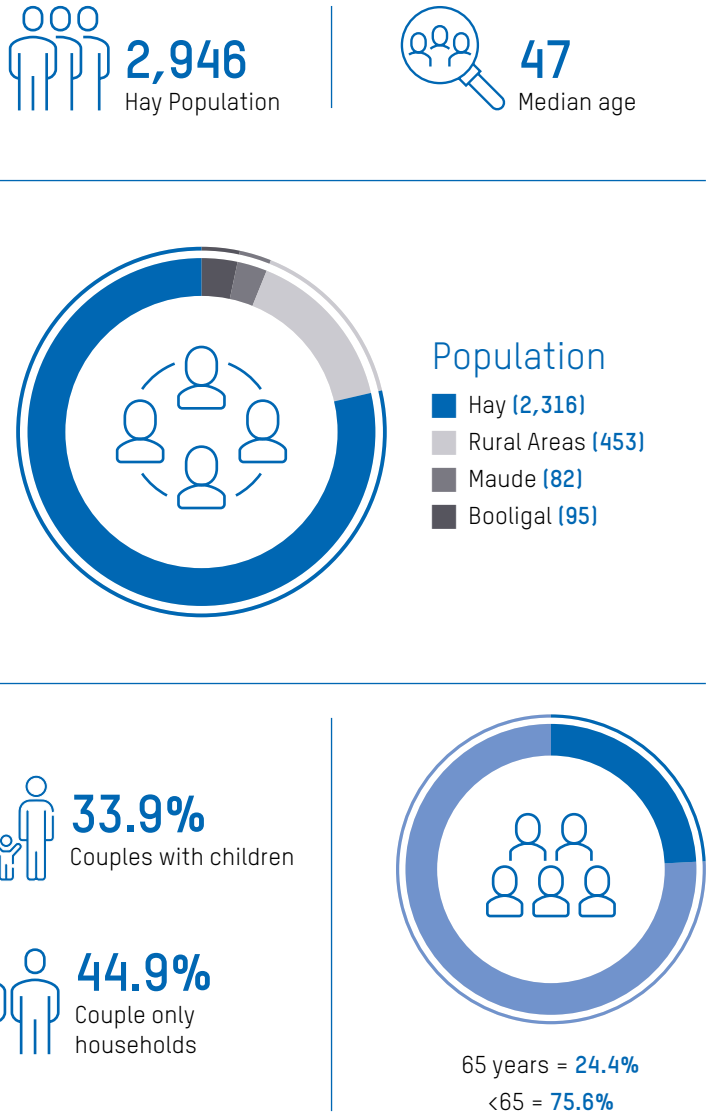


Figure 3: Hay Community Profile

2.2 Housing

Demand for new housing is available within the main township of Hay, although anecdotal advice is that some of the housing stock within town is nearing the end of its useable life and will require replacement.

The demand for housing in Hay is driven by a range of demographic trends such as decreasing household sizes and changing needs and preferences for different housing types.

A snapshot of the local housing profile and key housing market trends, based on 2016 ABS Census Data, is shown in Figure 4.

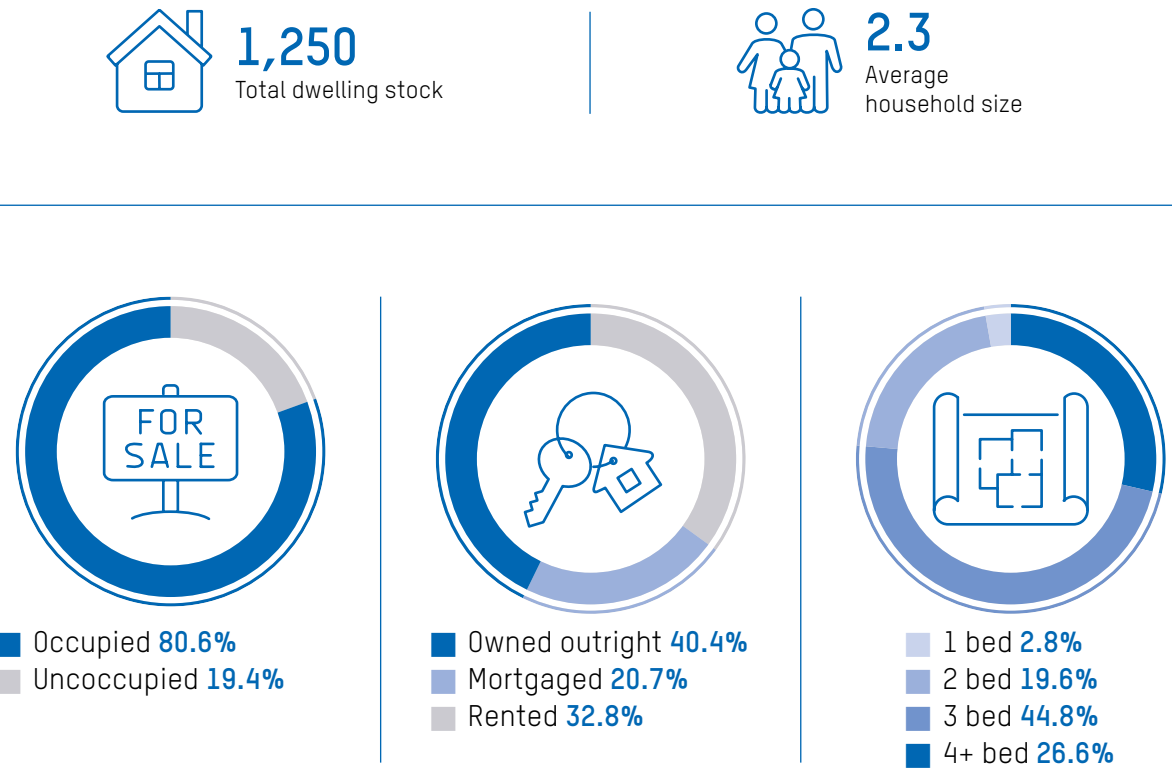


Figure 4: Hay Housing Profile

Dwelling Structure

Separate house

Hay	New South Wales	Australia
801	1,729,820	6,041,788
90.5%	66.4%	72.9%

Semi-detached, row or terrace house, townhouse etc.

Hay	New South Wales	Australia
24	317,453	1,055,016
2.7%	12.2%	12.7%

Flat or apartment

Hay	New South Wales	Australia
51	519,390	1,087,434
5.8%	19.9%	13.1%

Other Dwelling

Hay	New South Wales	Australia
3	23,580	64,425
0.3%	0.9%	0.8%

Of occupied private dwellings in Hay (Urban Centres and Localities), 90.5% were weparate houses, 2.7% were semi-detached, row or terrace houses, townhouses etc, 5.8% were flat or apartments and 0.3% were other dwellings.

Figure 5: Housing Type

Housing Types

In 2016, there were approximately 1,250 private dwellings within Hay. Of these, the predominant housing type was separate houses. These made up approximately 90.5% of the total housing stock, when compared with other forms of housing (semi-detached, row or terrace house, townhouse, flat or apartment).

This figure is much higher when compared against the NSW and National average of 66.4% and 72.9% respectively.

Of note, Hay has a significantly higher proportion of unoccupied private dwellings when compared to elsewhere. Unoccupied dwellings make up approximately 19.4% of the total housing stock.

It is understood that the majority of these vacant dwellings comprise unoccupied former farm dwellings, as well as derelict or delipidated houses.

Anecdotally, approximately 9 dwellings per annum are subject to a Development Application for demolition or a Council Order to demolish a derelict building.

Household and Family Composition

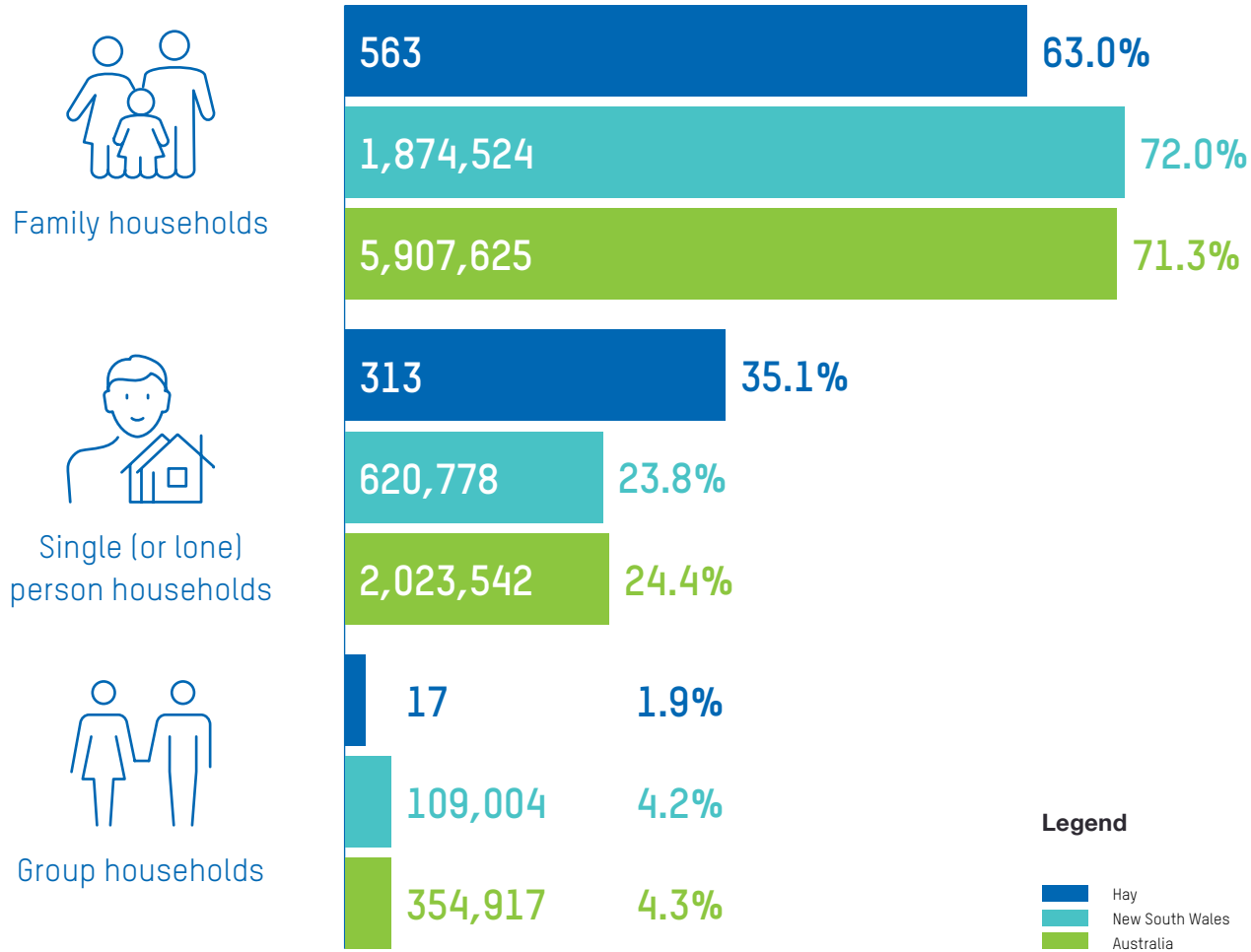
The household composition within Hay Shire varies from the state and national average as there is a comparatively higher number of single or lone persons households. This type of household represents approximately one third of all household types.

As a result, the number of family households also vary from state and national averages and represent a comparatively smaller percentage of total household types. Of these household types, couple only households form the largest proportion (44.9%) as compared to NSW and Australia as a whole.

Reasons for this include the large number of retired couples, 'empty nesters', lone elderly persons (widowers), as well as rural workers, which are typical of single person and couple only households.

The average household size within Hay Shire as a whole in 2016 was 2.3 persons per household. This figure has declined from 2.5 in 2006 and reflects a nationwide trend of smaller household sizes, which is expected to further decline to 2.03 by 2041.

Household Composition



In Hay (Urban Centres and Localities), of all households 63.0% were family households, 35.1% were single person households and 1.9% were group households

Figure 6: Household Composition

Dwelling Sizes

The size of dwellings within Hay Shire also varies from state and national averages with households generally comprising 3 or more bedrooms with comparatively fewer 1 and 2 bedroom dwellings (Figure 7).

Specifically, the number of one bedroom dwellings comprises only 2.8% of the total housing stock. This figure is not reflective of the fact that approximately 35% of the household types comprise single (or lone) persons households.

Number of Bedrooms

	Hay	%	New South Wales	%	Australia	%
None (includes bedsitters)	8	0.9	17,157	0.7	39,769	0.5
1 Bedroom	25	2.8	157,194	6.0	411,252	5.0
2 Bedrooms	178	19.6	577,675	22.2	1,562,759	18.9
3 Bedrooms	406	44.8	970,001	37.2	3,403,190	41.1
4 Or more bedrooms	241	26.6	816,405	31.3	2,670,758	32.2
Number of bedrooms not stated	48	5.3	65,888	2.5	198,351	2.4
Average number of bedrooms per dwelling	3	—	3	—	3.1	—
Average number of people per household	2.2	—	2.6	—	2.6	—

In Hay (Urban Centres and Localities), of occupied private dwellings 2.8% had 1 bedroom, 19.6% had 2 bedrooms and 44.8% had 3 bedrooms. The average number of bedrooms per occupied private dwelling was 3. The average household size was 2.2 people.

Figure 7: Size of dwellings

Hay Silo Art (Source: Habitat Planning)

Figure 8: Residential Housing Approvals

2.3 Residential Supply and Demand Analysis

Residential Demand

Demand for vacant residential land is directly related to the number of new dwellings that are constructed.

35 new residential dwellings were constructed in the township of Hay between 1 July 2015 and 30 June 2020 according to Council's Development Application and Complying Development Certificate register (Figure 8).

On average, this equates to a demand for 7 new residential dwellings per annum.

These dwellings have been constructed across a number of different land use zones including conventional urban lots (RU5 Village), residential lifestyle/ small scale hobby farms (RU4 Primary Production Small Lots), as well as agricultural properties (RU1 Primary Production) as summarised in Table 1.

The most popular residential lot type in Hay is within the RU5 Village, which equates for approximately 60% of all total new dwelling constructions. Demand has also been strong for large lot residential lots (23%), which have a minimum lot size of 2 hectares.

Whilst it is acknowledged that dwelling projections for the Hay Shire LGA are forecast to decline between 2016 and 2041, given the projected reduction in household sizes and expectant in-migration from outlying areas, the level of housing demand is expected to remain stable or in fact slightly increase to 10 dwellings per annum.

Zone	2015 -2016	2016 -2017	2017 -2018	2018 -2019	2019 -2020	Total	Percentage
RU5 Village	6	4	5	0	6	21	60%
RU4 Primary Production Small Lots	0	2	2	3	1	8	23%
RU1 Primary Production	0	1	0	5	0	6	17%
Total	**6**	**7**	**7**	**8**	**7**	**35**	**100%**

Table 1: Residential Housing Approvals by Zone

Residential Land Supply

An analysis of residential land supply has been undertaken of all undeveloped vacant residential rural lifestyle zoned land to determine how much additional residential zoned land is available for development.

For the purposes of this assessment, a lot is considered to be 'vacant' where it does not contain a dwelling as at 1 July 2021, does not have a valid planning approval for a dwelling or has not been sold where part of a new greenfield residential subdivision.

Table 2 provides an analysis of the current supply of residential zoned land available within the township of Hay and surrounds based on current take-up rates.

A map showing this residual land supply is also provided in Figure 9.

Based on this analysis, Hay has an approximate 57 year supply of village zoned residential land based on an average take-up rate of 4.2 dwellings per annum as outlined in Table 2.

Similarly, Hay also has an approximate 114 years supply of RU4 zoned land based on an average take up rate of 2.8 dwellings per annum.

When considering future population and dwelling projections and using an average take-up rate of 10 dwellings per annum, the level of total residential land supply is reduced from 80 years to 56 years as outlined in Table 3.

Whilst it acknowledged that this still represents a large level of residential land supply, a number of the existing zoned parcels of land are constrained, which would limit their development potential. For example, the former railway land (3ha) zoned RU5 is contaminated and owned by Transport for NSW and therefore is not available for development.

Similarly, a number of the RU4 zoned parcels of land are unlikely to be further developed as they will continue to be used for small-scale agricultural (irrigation) purposes.

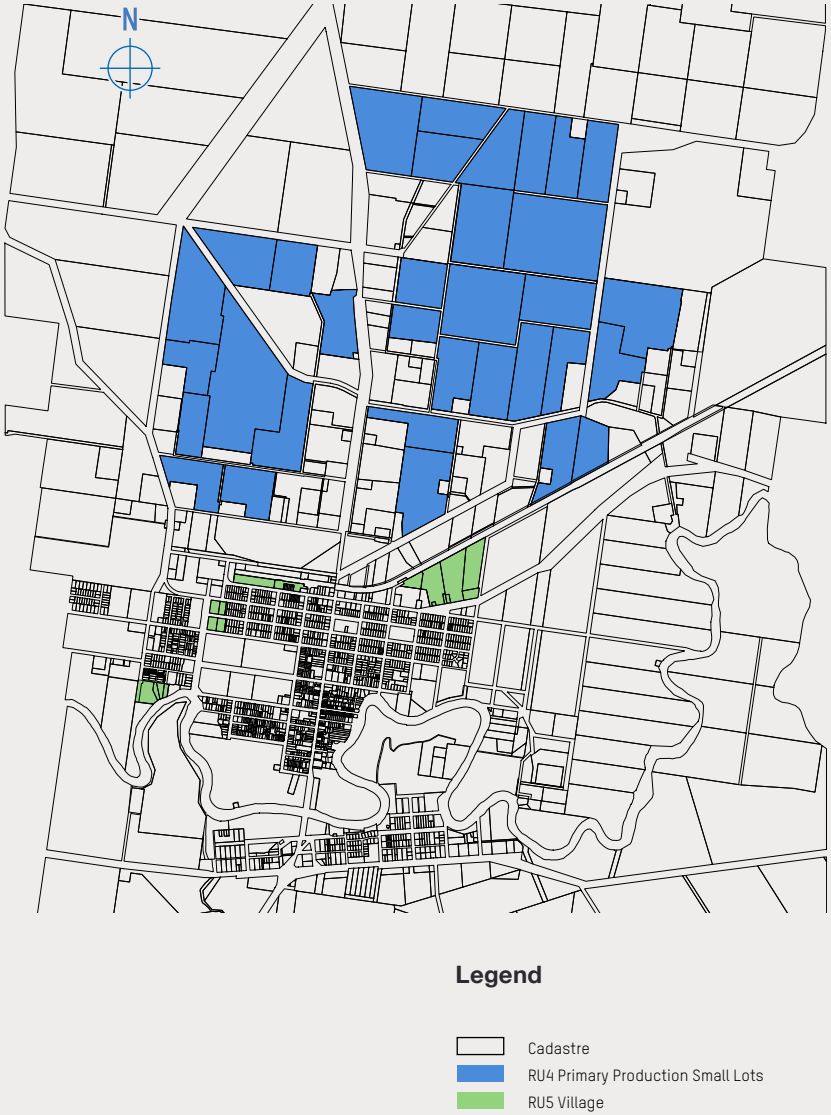


Figure 9: Undeveloped Residential Zoned Land

Hay Shire Council Offices (Source: Habitat Planning)

Table 2: Residential Land Supply Summary (current)

	Land Supply (ha)	Land Supply (lots)*	Demand (new homes p.a.)	Years Supply
RU5 Village (1,000m2)	30	240	4.2	57
RU1 Primary Production & RU4 Primary Production Small Lots (2ha+)	800	320	2.8	114
Total	**830**	**560**	**7**	**80**

***Note:** the land supply calculation has been calculated assuming 20% of the total development site area is required for roads, drainage and open space. At present in Hay, this number is 40% of the total area.

Table 3: Residential Land Supply Summary (projected)

	Land Supply (ha)	Land Supply (lots)*	Demand (new homes p.a.)	Years Supply
RU5 Village (1,000m2)	30	240	6.2	39
RU1 Primary Production & RU4 Primary Production Small Lots (2ha+)	800	320	3.8	84
Total	**830**	**560**	**10**	**56**

***Note:** the land supply calculation has been calculated assuming 20% of the total development site area is required for roads, drainage and open space. At present in Hay, this number is 40% of the total area.

Population and Dwelling Projections

To plan for the future growth in Hay, three possible growth scenarios have been considered:

- Low Growth Scenario
- Moderate Growth Scenario
- High Growth Scenario

The infographic to the right of page summarises the three different growth scenarios. For the purposes of this Structure Plan, a high growth scenario has been adopted.

This scenario has been used due to the predicted in migration from retired farmers and the elderly from outlying rural areas and small villages due to the wider range of services and housing types available to this age group.

In addition, Council is also currently in discussions with several medium and large employers looking to establish within the township, which will cater for up to 100 workers plus their families.

Hay Shire has also been identified within the NSW Government's South West Renewable Energy Zone (REZ). Although only in the early stages, the REZ will unlock a significant pipeline of large -scale renewable energy and storage projects around Hay creating new local opportunities including jobs and population growth.

This predicted growth has been supported by enquiries for 3 to 4 large scale solar farms, which will each provide 10-15 jobs during operation and many more during construction.

Anecdotal evidence has also suggested that there may be in migration to rural areas post COVID, which has already begun in the township of Hay.

Under this high growth scenario, the population of the Hay township will grow by 400 persons by 2041 at an average growth rate of 0.69%.

To service this projected population growth, on average 7.88 (8) new dwellings will need to be constructed per annum based on a projected household size of 2.03 persons per household.

This figure is in addition to the approximate 2 dwellings that Council approve each year for demolition and replacement ('knock down rebuild').

In total, this equates for a need for **10 new dwellings per annum.**

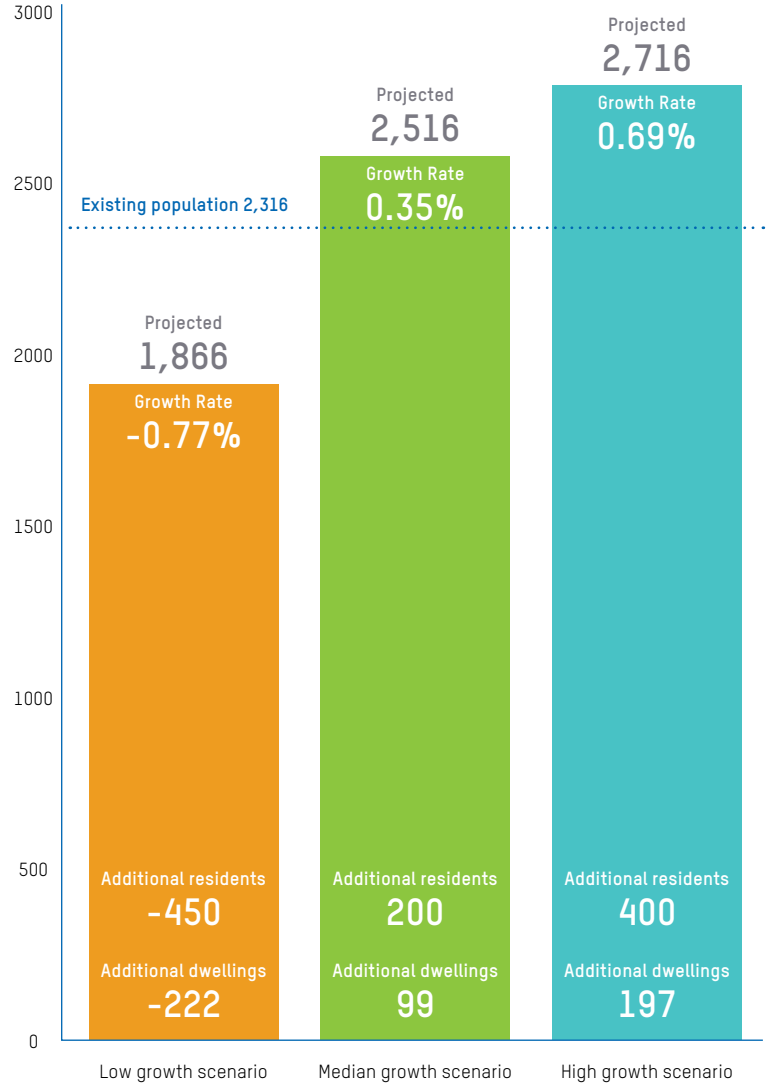


Figure 10: Hay Population and Dwelling Projections

2.4 Employment

The main employment sector across the Hay Shire Council area is agriculture and primary production followed by construction services.

As the township of Hay forms the main commercial centre for residents living within the Local Government Area, the town is serviced by a range of retail and commercial outlets, as well as a number of food and drink and hospitality outlets centred around the main street, being Lachlan Street. The Hay Shire Council is also one of the largest employers within town and is located within the centre of town.

Currently, there are no dedicated commercial zones within Hay, with the entirety of the main urban area zoned RU5 Village. The purpose of this zone is to allow for greater flexibility in land use planning to cater for the widest range of commercial and residential uses.

Advice received from Hay Shire Council staff is that the town has an ample supply of RU5 zoned land to cater for the future and ongoing demands for commercial land.

The main township of Hay has two dedicated zoned industrial precincts in both the main township and South Hay that cater for a range of small-scale and light industrial operations. There is currently no industrial land supply available within South Hay, whist a large proportion of the industrial zoned land within the main township is held in public ownership by Transport for NSW.

A snapshot of the local employment profile, based on 2016 ABS Census Data, is shown in Figure 11.

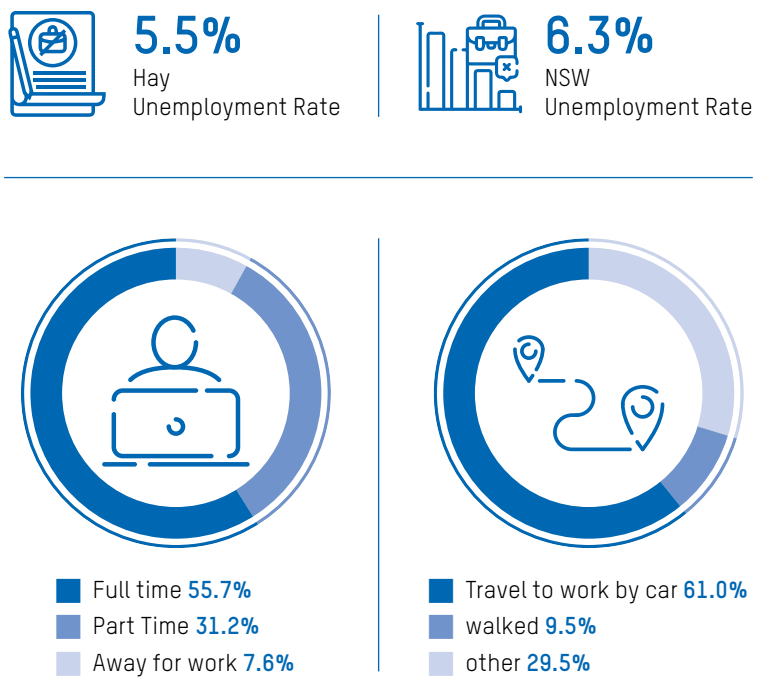


Figure 11: Hay Employment Profile

2.5 Industrial Supply and Demand Analysis

Industrial Demand

Demand for industrial development has been sporadic since 2015-16 and unlike residential demand has fluctuated given the often speculative nature of this type of development and influences from external factors and market conditions.

12 new industrial developments were constructed in Hay between 1 July 2015 and 30 June 2020 according to Council's Development Application and Complying Development Certificate register (Figure 12).

On average, this equates to a demand for 2.4 new industrial developments per annum.

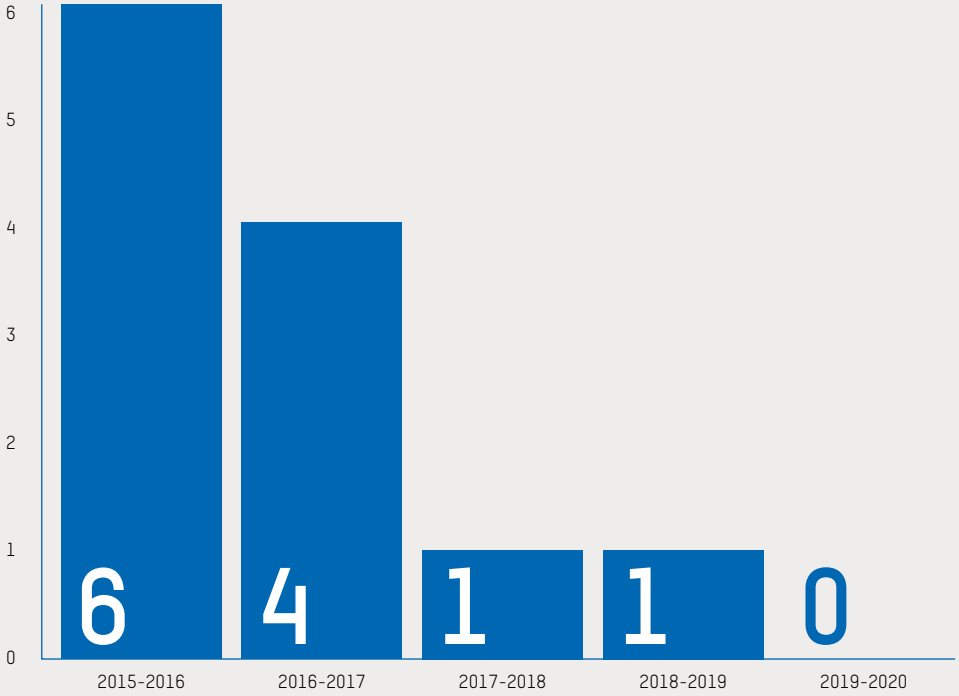


Figure 12: Industrial Development Approvals

Shear Outback (Source: Habitat Planning)

Australian train freight
Photo credit: Eddie Bugajewski

Industrial Land Supply

The main township of Hay has two dedicated zoned industrial precincts in both the main township and South Hay.

Specifically, the industrial precinct within the main township is approximately 45 hectares in size and largely comprises the former railway corridor generally bordered by Murray Street and Showgrounds and Sidonia Roads.

Approximately half of this land has already been developed whilst the other half remains largely undeveloped with the exception of former railway buildings and infrastructure including the State-listed Hay Railway Station and yard group including the Station Master's House, Water Tower and Railway Porters' Cottages.

Of the undeveloped land (25 hectares), approximately half (10 hectares) of it is held in public ownership by Transport for NSW (TfNSW). Council is currently in negotiations with TfNSW to acquire this land, but it is expected that there may be a lag time before this land becomes available (if at all) for development. This land is also contaminated given its historical use, so any further development of this land is likely to require remediation.

Industrial activities to occur within this precinct include TfNSW's Hay Service Centre on Sidonia Road, a large grain handling and storage facility fronting Thelangarin Road, livestock saleyard fronting Lindsay Street and a large works depot on the southern side of Dunera Way.

The industrial precinct in South Hay is much smaller and only has a total area of approximately 8 hectares in size. Land within the southern half of this precinct comprises a number of detached single storey dwellings and associated light industrial businesses such as truck and trailer parking, whilst the northern half of this precinct has been recently developed for a light industrial business. There is no industrial land supply remaining in South Hay.

It is also noted that a number of other ad-hoc small scale industrial operations have been established over time across the township including land to the west of Hursley Street, as well as other outlying rural areas. These activities are primarily limited to transport and truck parking depots and material storage facilities.

An analysis of industrial land supply has been used to determine how much industrial land is currently available for consumption.

This process has involved an assessment of all undeveloped vacant industrial zoned land. For the purposes of this assessment, a lot is considered to be 'vacant' where it does not contain a building or works as at 1 July 2021 or does not have a valid planning approval for an industry or a business.

Table 4 provides an analysis of the current supply of industrial zoned land available within the township of Hay and surrounds. This analysis has assumed an average industrial lot size of 5,000m2, which is the smallest industrial lot size established within Hay. The figures used in this analysis will therefore vary depending on the size of the industrial lot.

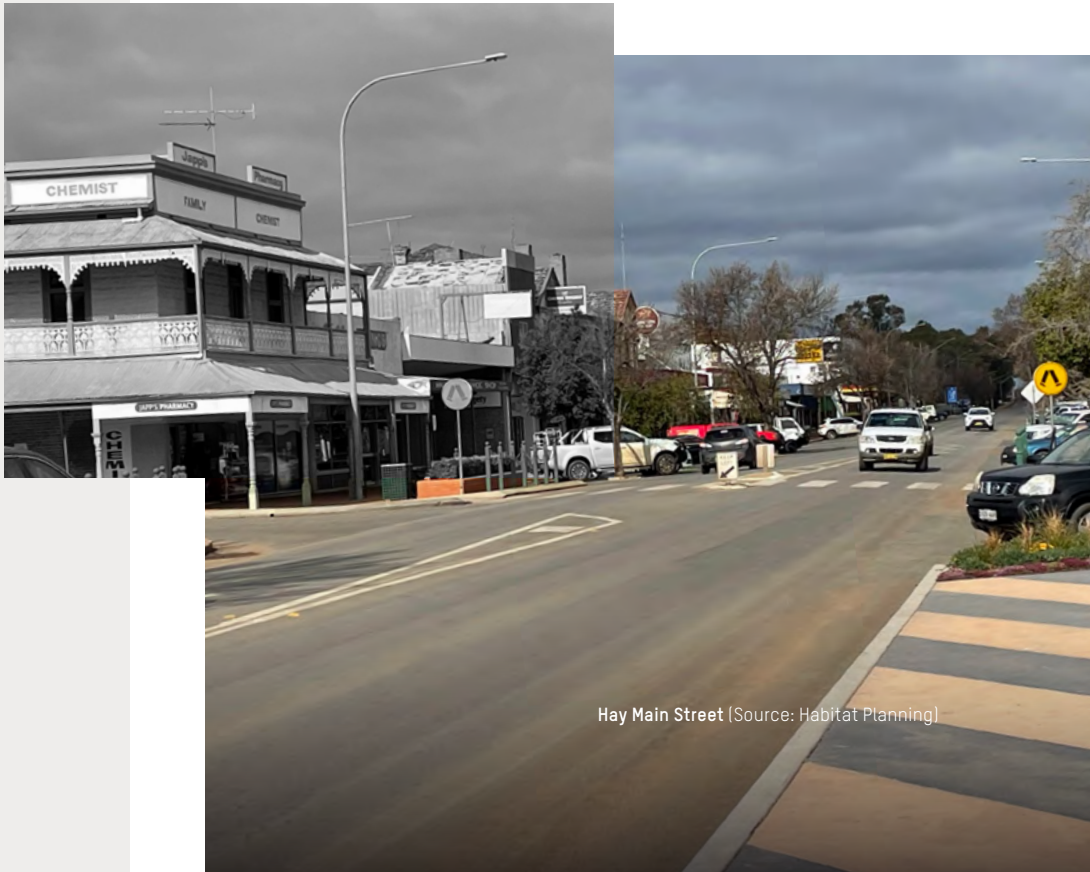
Based on this analysis, Hay has an approximate 20 year supply of industrial zoned land based on an average take-up rate of 2.4 lots per annum. Notwithstanding, as outlined above half of this land supply is owned by TfNSW and is therefore not available to be developed. As a result, the actual real industrial land supply is reduced to 10 years.

There is currently no supply of industrial zoned land in South Hay.

Table 4: Industrial Land Supply Summary

	Land Supply (ha)	Land Supply (lots)*	Demand (buildings p.a.)	Years Supply
Main Township	15	24	2.4	10
South Hay	N/A	0	2.4	0
Total	**15**	**24**	**2.4**	**10**

***Note:** The land supply calculation used above has been calculated assuming that 20% of the total development site area is required for roads, drainage and other services.



Hay Main Street (Source: Habitat Planning)

3. Planning Context

Hay Railway Station (Source: Habitat Planning)

3.1 Strategic Planning

Riverina Murray Regional Plan

The Riverina Murray Regional Plan is a 20 year blueprint for the future of the region.

The vision for the Riverina Murray region is outlined as follows:

To create a diversified economy founded on Australia's food bowl, iconic waterways and a strong network of vibrant and connected communities.

To achieve this vision, the Regional Plan has set four goals for the region:

Goal 1
A growing and diverse economy.

Goal 2
A healthy environment with pristine waterways.

Goal 3
Efficient transport and infrastructure networks.

Goal 4
Strong, connected and healthy communities.

The Structure Plan is consistent with the following Directions.

Goal 1 A growing and diverse economy.	
Direction 4	Promote business activities in industrial and commercial areas.
Goal 2 A healthy environment with pristine waterways.	
Direction 15	Protect and manage the region's many environmental assets.
Goal 3 Efficient transport and infrastructure networks.	
Direction 21	Align and protect utility infrastructure investment.
Goal 4 Strong, connected and healthy communities.	
Direction 22	Promote the growth of regional cities and local centres.
Direction 25	Building housing capacity to meet demand.
Direction 27	Manage rural residential development.
Direction 28	Deliver healthy built environments and improved urban design.
Direction 29	Protect the region's Aboriginal and historic heritage.

Table 5: Riverina Murray Regional Plan

Source: NSW Department of Planning, Industry and Environment, 2021

Community and Settlement Sustainability Strategy 2012

Council in conjunction with Booth Associates prepared the Community and Settlement Sustainability Strategy 2012, which comprised the preparation of Urban and Rural Land Use Studies and a Rural Settlement Strategy for Hay.

The primary objective of this Strategy was to: **"communicate the social, economic and environment contexts for planning relevant to the Hay LGA and provide a comprehensive rural and urban land use strategy to guide the preparation of the Hay Standard Instrument LEP" (now gazetted).**

The Strategy involved a background literature review, consideration of the planning and legislative framework, as well as an infrastructure and constraints analysis, which was also informed by consultation with the general public and relevant government agencies.

Upon completion, the Strategy recommended the following:

- Rural lifestyle land – rezone land within 15km east of Hay for the purposes of rural lifestyle development.
- Residential land – rezone approximately 20ha of land east of Bourke Street for residential purposes. It was also recommended that higher residential densities be facilitated adjacent to the main commercial core.
- Industrial land – rezone two dedicated areas in both South and North Hay. Specifically, this included approximately 6ha of surplus railway land owned by ARTC at the eastern corner of Dunera Way, as well as 8ha of land between Witcombe and Archer Street and north of Moama Street.
- Heritage – establishment of a Heritage Conservation Area for land bounded by Pine, Brunker, Lachlan and Leonard Street, plus properties abutting Lachlan Street to the east between Leonard and Randall Street.
- Tourism – rezone four primary tourist facilities including Shear Outback, the Dunera Museum, Bishops Lodge and Hay Gaol for tourism purposes.
- Open Space – rezone land for public open purposes including Hay Park and Sandy Point.
- Environmental protection – rezone land for environment protection purposes where it has high biodiversity value.

A copy of the recommended 'Future Land Use' Plan is reproduced in Figures 13 and 14.

Figure 13: Future Land Use – Hay Township

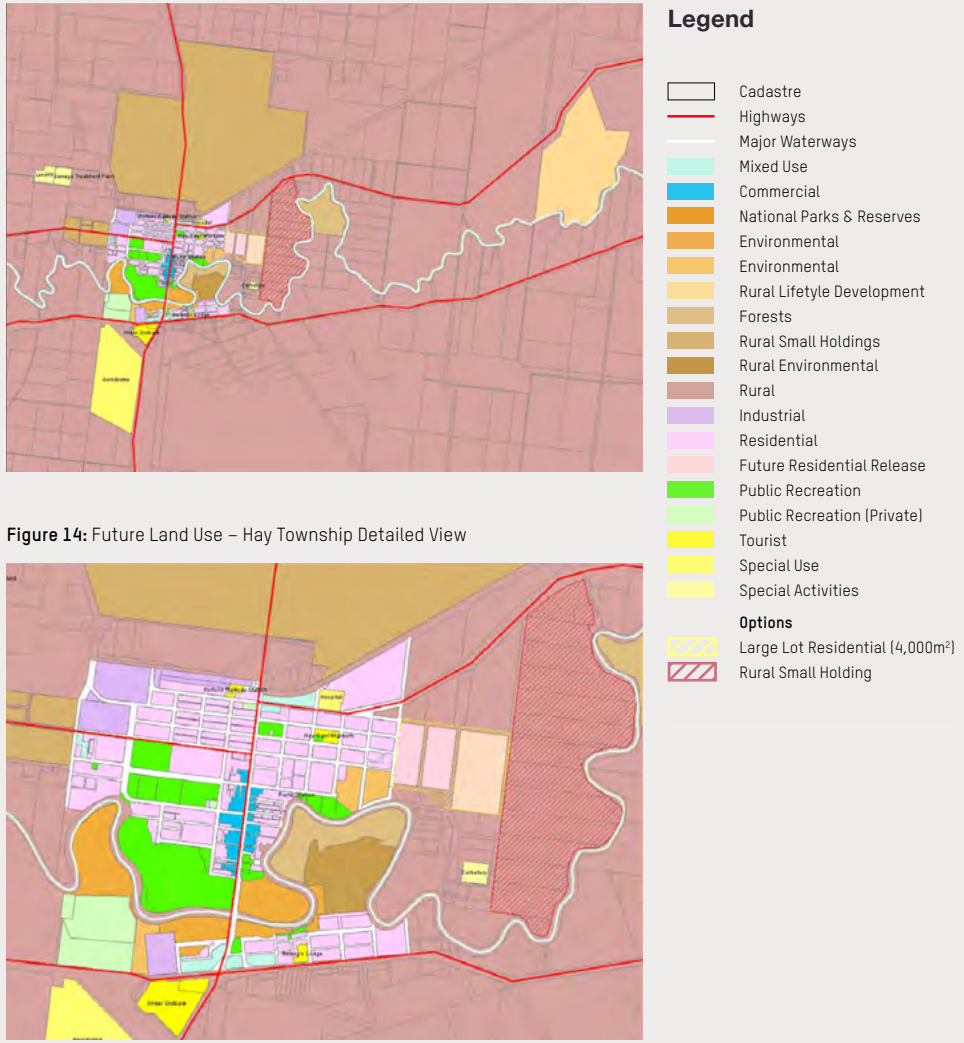


Figure 14: Future Land Use – Hay Township Detailed View

Source: Community and Settlement Sustainability Strategy, Booth Associates 2012

Planning Priority	Actions
Planning Priority 1: Housing Choice	– Review planning controls to provide a wider housing choice. (Short Term) – Draft Structure Plans for the areas with a potential change of zoning. (Short Term) (Figures 15-17)
Planning Priority 2: Health & Aged Care	– Review planning controls to provide for an aged care precinct. (Short Term) – Draft Structure Plans for the Medical Precinct. (Short Term) – Ensure active transport infrastructure is provided to support connectivity to the facilities around the aged care facilities. (Ongoing)
Planning Priority 5: Commerce	– Review planning controls to provide flexibility and accommodate the changing nature of retail (Short term) – Review the Hay Shire Local Environmental Plan 2011 to enable the development of the Highway interfaces of Hay (Short Term) (Figures 15-18) – Draft a Structure Plan for the areas earmarked for rezoning (Short Term) (Figures 15-18) – Preserve and reuse heritage buildings in the CBD. (Ongoing)
Planning Priority 7: Freight & Transport	– Investigate the possibility of a freight interchange to the South of Hay in conjunction with Transport for NSW (Medium Term) (Figures 17-18) – Investigate the possibility to expand the aerodrome site to include warehouses and airfreight. (Medium Term) (Figure 18) – Draft a Structure Plan for the areas that can potentially be rezoned (Short and Medium Term) (Figure 18)
Planning Priority 8: Industry	– Investigate opportunities for the expansion of existing and new industrial precincts to the north and south of the Hay township.(Medium Term) (Figures 16-18) – Protect and recognise existing industrial precincts as well as freight and logistics facilities and uses to avoid any land use conflicts from future residential development (Medium Term) – Draft a Structure Plan for the areas that can potentially be rezoned (Short/Medium Term) (Figures 15-18)

Table 6: Hay Shire Council Local Strategic Planning Statement

Hay Shire Council Local Strategic Planning Statement

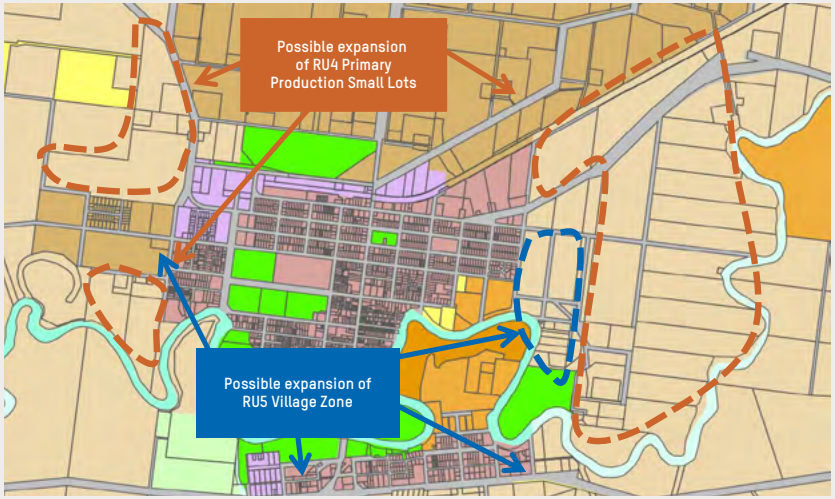
The Hay Council Local Strategic Planning Statement (LSPS) sets the framework for Hay Shire's economic, social and environmental land use needs over the next 20 years.

The LSPS outlines clear planning priorities describing what will be needed, where these are located and when they will be delivered. The LSPS sets short, medium and long-term actions to deliver the priorities for the community's vision.

To achieve the 20 year vision, the LSPS is underpinned by 10 planning priorities, which align with the directions contained within the Riverina Murray Regional Plan.

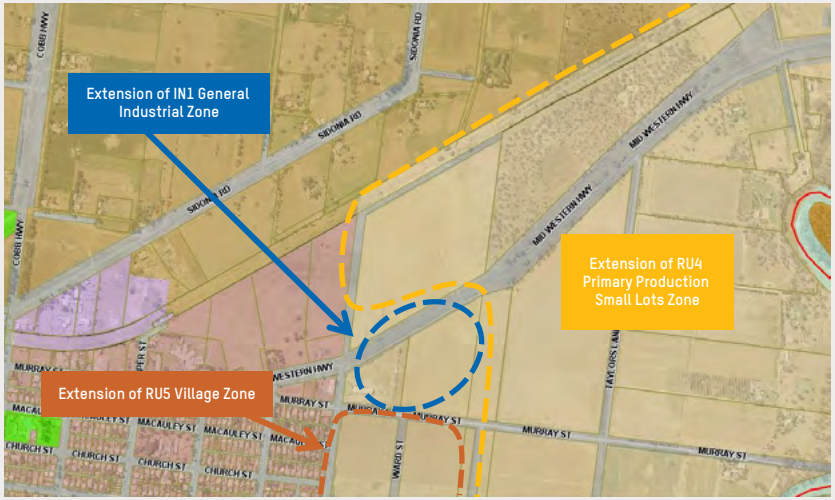
The Structure Plan is consistent with the following Planning Priorities, however further work will be required to satisfy the Actions in Table 6.

Figure 15: Potential Expansion of Village Primary Production Small Lots



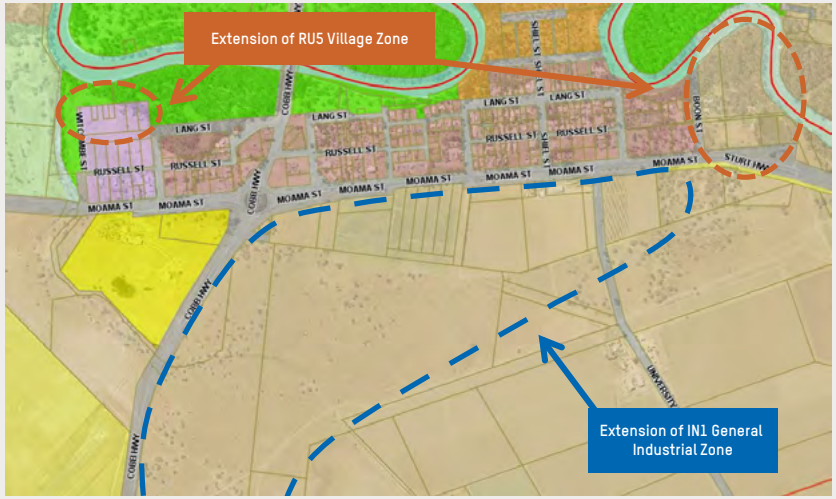
Source: Hay Local Strategic Planning Statement, 2020

Figure 16: Mid-Western Highway Interface



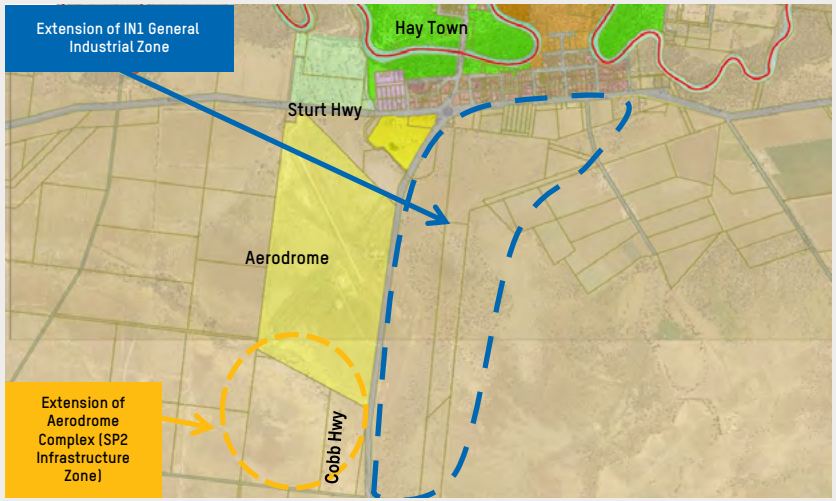
Source: Hay Local Strategic Planning Statement, 2020

Figure 17: Cobb and Sturt Highway Interface



Source: Hay Local Strategic Planning Statement, 2020

Figure 18: Potential Industrial Development to the south of Hay



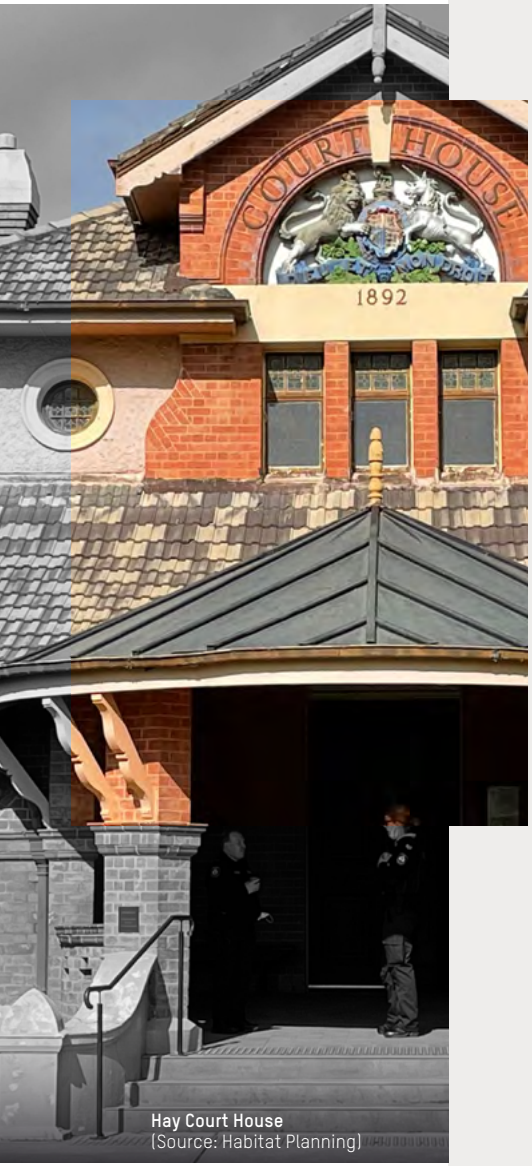
Source: Hay Local Strategic Planning Statement, 2020

Other Strategic Plans and Policies

A number of other strategic plans and policies have informed the preparation of the Structure Plan including:

- Hay Shire Community Strategic Plan 2017-2027
- Draft Hay Shire Council Plan of Management 2021
- Draft Integrated Water Cycle Management Strategy 2021
- Murrumbidgee River Master Plan 2021
- Hay Open Space Strategy 2017
- Bike Plan 2016
- Lachlan Street Upgrade Master Plan Project 2020

Emu Crossing Public Art , Artists Impression, Courtesy of Yonder



Hay Court House
(Source: Habitat Planning)

3.2 Statutory Planning

This section of the Structure Plan addresses the relevant local and state statutory planning framework within which the future development of Hay will occur.

State Environmental Planning Policies (SEPP's)

'State Environmental Planning Policy (Transport and Infrastructure) 2021' provides a consistent planning regime for infrastructure and the provision of services across the state. It also sets out a framework for consultation with relevant public authorities regarding infrastructure development and proposals affecting state infrastructure. Subdivision 2 of Division 17 of SEPP Infrastructure refers to development in or adjacent to road corridors and road reservations.

The Cobb, Sturt and Mid-Western Highways are identified as classified roads pursuant to the Roads Act 1993, and therefore future development alongside these roads will be required to consider SEPP Infrastructure including those that must be referred to TfNSW

'State Environmental Planning Policy (Resilience and Hazards) 2021' sets out considerations relating to land contamination across the state. The intention of the SEPP is to establish 'best practice' guidelines for managing land contamination through the planning and development control process.

In the context of future development applications consideration must be given to whether or not land proposed for development is contaminated and fit for use for its intended purpose.

Section 9.1 Ministerial Direction 4.4 also requires Council to consider whether land is contaminated and whether it is fit for its intended purposes, whether in its current contaminated state or after remediation.

'State Environmental Planning Policy (Biodiversity and Conservation) 2021' aims to protect the biodiversity and amenity values of trees and other vegetation in non-rural areas of the State.

The SEPP applies to vegetation in any non-rural area of the State that is declared by a Development Control Plan to be vegetation to which this SEPP applies. Therefore, future development involving tree removal will be required to consider the SEPP.

'State Environmental Planning Policy (Primary Production) 2021' aims amongst other things to facilitate the orderly economic use and development of land for primary production purposes, reduce land use conflict and the sterilisation of rural land by balancing primary production, residential development and the protection of native vegetation, biodiversity and water resources. The SEPP also aims to identify and protect State Significant Agricultural Land.

At the time of preparing this Structure Plan, the SEPP did not identify any State Significant Agricultural Land.

The Structure Plan has been prepared having regard to these state environmental planning policies.

Ministerial Directions (Section 9.1 Directions)

When Council prepares a new LEP, it must have regard to the local planning Directions issued by the Minister for Planning (Ministerial Directions).

These Ministerial Directions cover the following broad categories:

- Planning systems
- Design and place
- Biodiversity and conservation
- Resilience and hazards
- Transport and infrastructure
- Housing
- Industry and employment
- Resources and energy
- Primary production

This Structure Plan seeks to achieve these directions in forming its recommendations for the future growth of Hay.

Local Environmental Plan

The Local Environmental Plan (LEP) contains the key planning provisions relating to development at the local level.

The main residential and commercial areas of Hay are zoned RU5 Village, which provides for a range of land uses, services and facilities associated with a rural village.

Land surrounding the main township is zoned RU1 Primary Production and RU4 Primary Production Small Lots, which provides a transition from urban to rural areas.

Key infrastructure and facilities are zoned SP2 Infrastructure, whilst existing industrial operations are zoned IN1 General Industrial (now E4 General Industrial). Similarly, parks and open space areas are zoned RE1 Public Recreation and areas of environmental significance are zoned either E2 (Now C2) Environmental Conservation or E3 (Now C3) Environmental Management. The Murrumbidgee River is zoned W1 Natural Waterways and W2 Recreational Waterways (Figure 19).

The LEP also sets out prescribed Minimum Lot Sizes (MLS) across the Hay Shire area. MLS within the study area range from 500m2 in the central urban area up to 90ha in the peripheral areas (Figure 20). These lot sizes correspond to the zoning of the land and also reflect the environmental and servicing constraints of the land.

In addition, the township of Hay is subject to a number of overlays and protection measures, including flood planning, terrestrial biodiversity, bushfire and heritage, which are further discussed in Section 4 of this report.

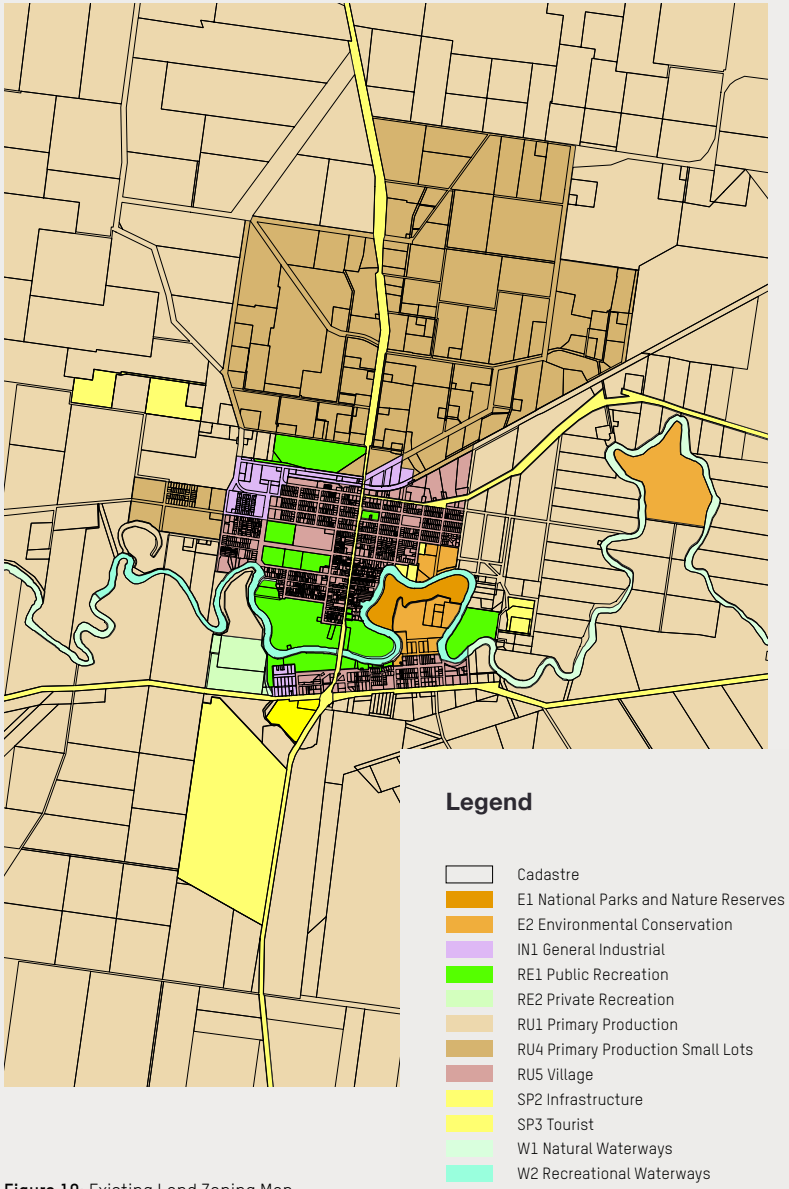


Figure 19: Existing Land Zoning Map

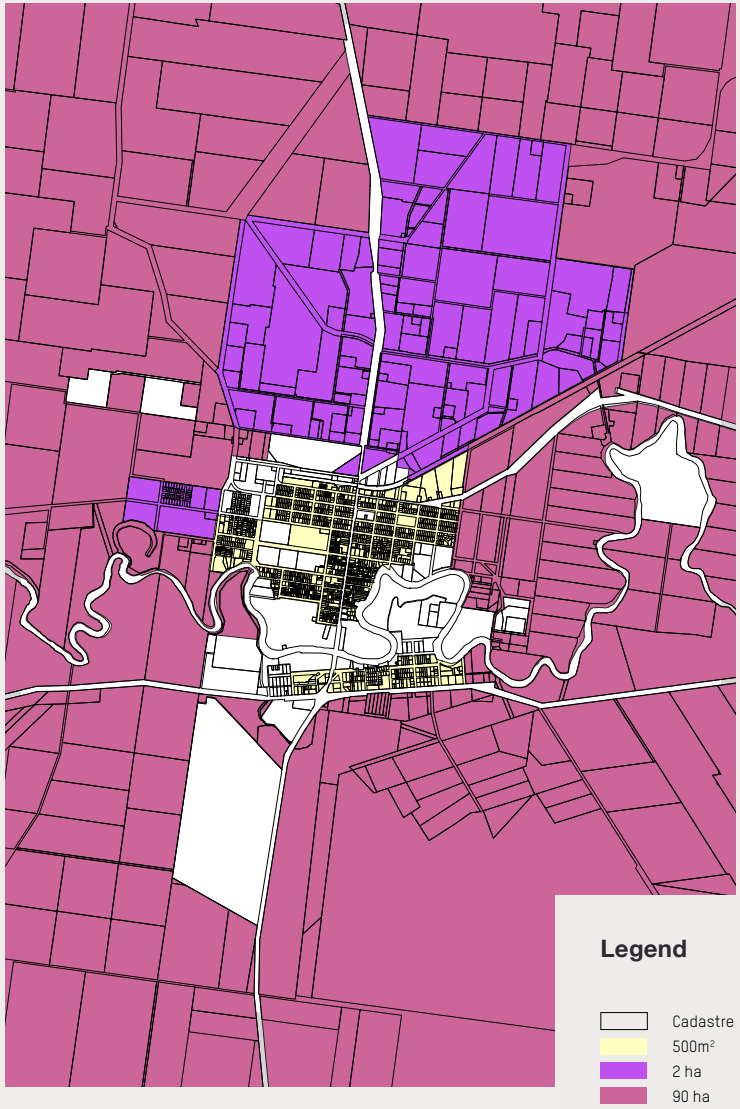


Figure 20: Existing Minimum Lot Size Map

4. Constraints and Opportunities Analysis

Hay Council Offices & Post Office (Source: Habitat Planning)

4.1 Biodiversity

The township of Hay is located within the NSW Riverina Bioregion and Murray Darling Depression Bioregion.

Vegetation within the study area comprises Plant Community Type 2 (PCT 2) River Red Gum Sedge, PCT 7 River Red Gum and PCT 13 Black Box Lignum woodland wetland of the inner floodplains of the Riverina Bioregion and Murray Darling Depression Bioregion.

The area south of the Sturt Highway is generally comprised of PCT 13 Black Box Lignum woodland wetland, PCT 15 Black Box Open Woodland and PCT 164 Cotton Bush open shrubland (Chenopod formation).

Other vegetation within the study area comprises exotic vegetation over non-native pasture grasses. This land is either developed for urban purposes or used for extensive agriculture and predominantly cleared for the grazing of animals or planting of crops.

The LEP maps areas of "terrestrial biodiversity" within which Clause 6.10 requires Council to consider the impact of development on flora and fauna as well as "any appropriate measures proposed to avoid, minimise or mitigate" those impacts.

Figure 21 shows the areas mapped in the LEP for terrestrial biodiversity within the study area. This figure also shows land identified on the NSW Biodiversity Values Map as being land with high biodiversity value that is particularly sensitive to impacts from development and clearing.

Upon inspection, these areas generally reflect stands of remnant vegetation, particularly along the Murrumbidgee River falling within the category of Plant Community Types 2 and 7.

Land to the south of Hay, whilst containing no trees does contain native shrublands (Chenopod Shrublands), which are regionally well retained and have a low conservation value.

Notwithstanding the above, it is recommended that the extent of the terrestrial biodiversity map be reviewed as it currently applies to several areas that have been developed for urban purposes including the Hay Showground. This process should be undertaken as part of a larger review of environmental values.

The Hay Shire LGA contains a number of threatened species listed at both the state level under the NSW Biodiversity Conservation Act 2016 (BC Act) and the Commonwealth Environment Protection and Biodiversity Conservation Act 1999 (EPBC Act).

Any works that exceed the Biodiversity Offset Scheme (BOS) threshold under the BC Act requires the preparation of a Biodiversity Development Assessment Report (BDAR) and the provision of and/or payment of biodiversity credits for the loss of vegetation.

It is generally recommended that future urban development should avoid areas of high environmental significance and dense vegetation cover due to the high cost of offsetting its removal, which may make development financially unviable.

For this reason, it is generally recommended that areas of high environmental significance be retained not only from a biodiversity perspective, but to also avoid time delays and financial costs associated with preparing relevant environmental studies and securing biodiversity offset credits.

Fauna within the study area includes avian and woodland bird species including the parrot family (Psittacidae family), Thick-Billed Grasswren, Honeyeater, Plains-wanderer, Painted Snipe and Eastern Long-Eared Bat. The presence of these species is in recognition of the existing overstorey vegetation.

Endangered aquatic and amphibian species are also present within the study area in recognition of the Murrumbidgee River including the Murray Cod and Southern Bell Frog.

Australian bottlebrush
Photo credit: Lynda Hinton

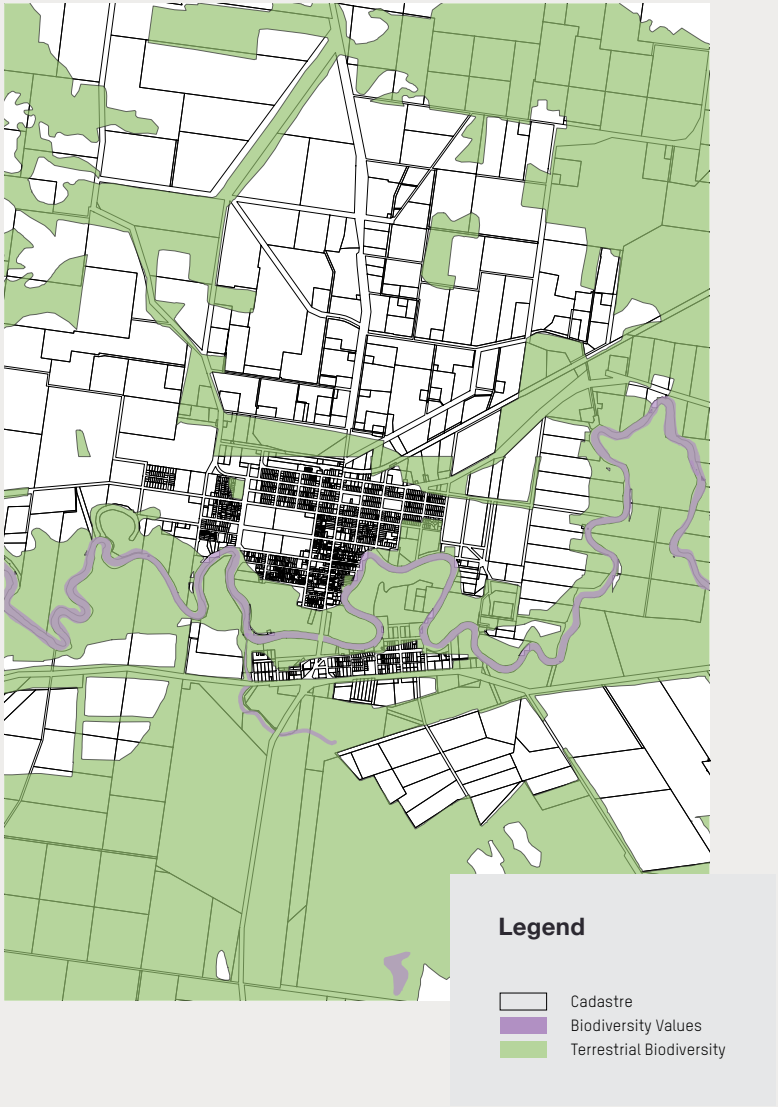


Figure 21: Terrestrial Biodiversity Map

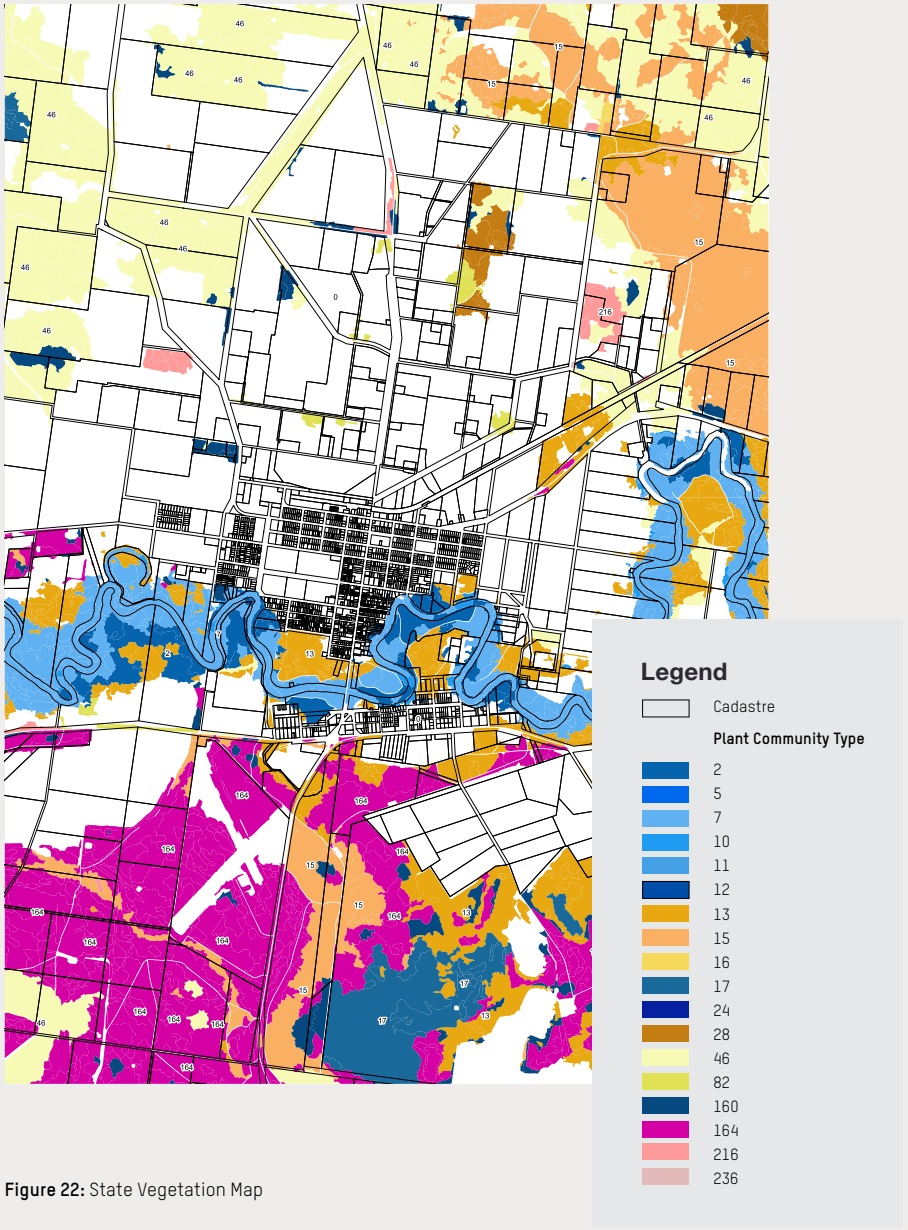


Figure 22: State Vegetation Map

4.2 Flooding

Parts of Hay, namely adjoining the Murrumbidgee River have been the subject of inundation from flooding and overland flow as identified within the *Murrumbidgee River Hay to Maude Rural Floodplain Risk Management Study* (Figure 23).

The main township of Hay is currently protected by existing flood levees and Council is also in the process of preparing a flood risk management strategy and plan to further investigate matters regarding flooding.

The NSW Government has recently undertaken a reform of flood planning controls to balance community protection and resilience and minimise the danger to life and property during floods.

Specifically, development of flood prone land shall be consistent with the requirements of the NSW Floodplain Development Manual, the NSW Guideline titled: Considering flooding in land use planning, as well as relevant Section 9.1 Ministerial Directions and Clause 6.8 of the LEP.

Hay 1974 Flood Event. (**Source:** WMA Water, 2012)

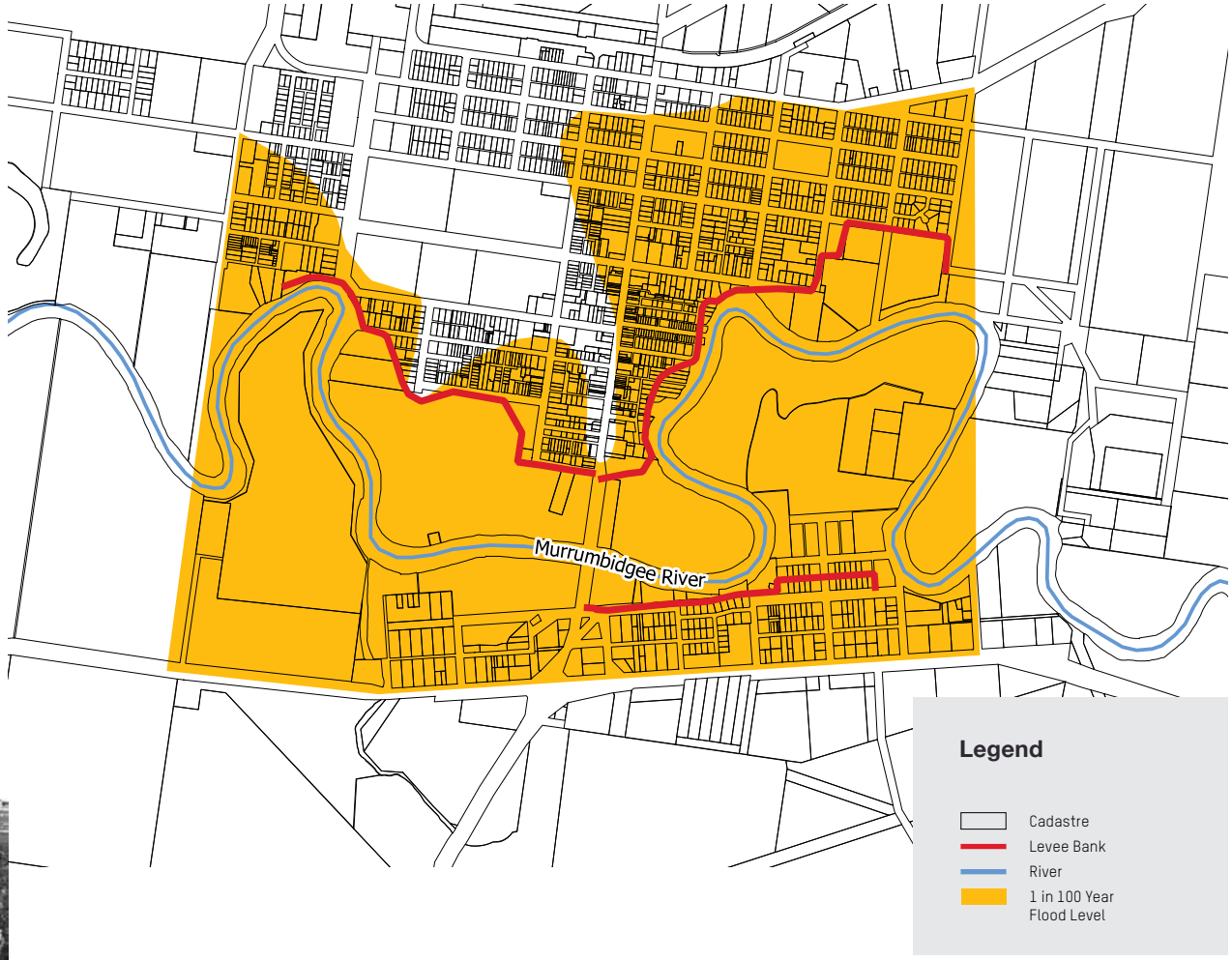


Figure 23: Flood Prone Land Map

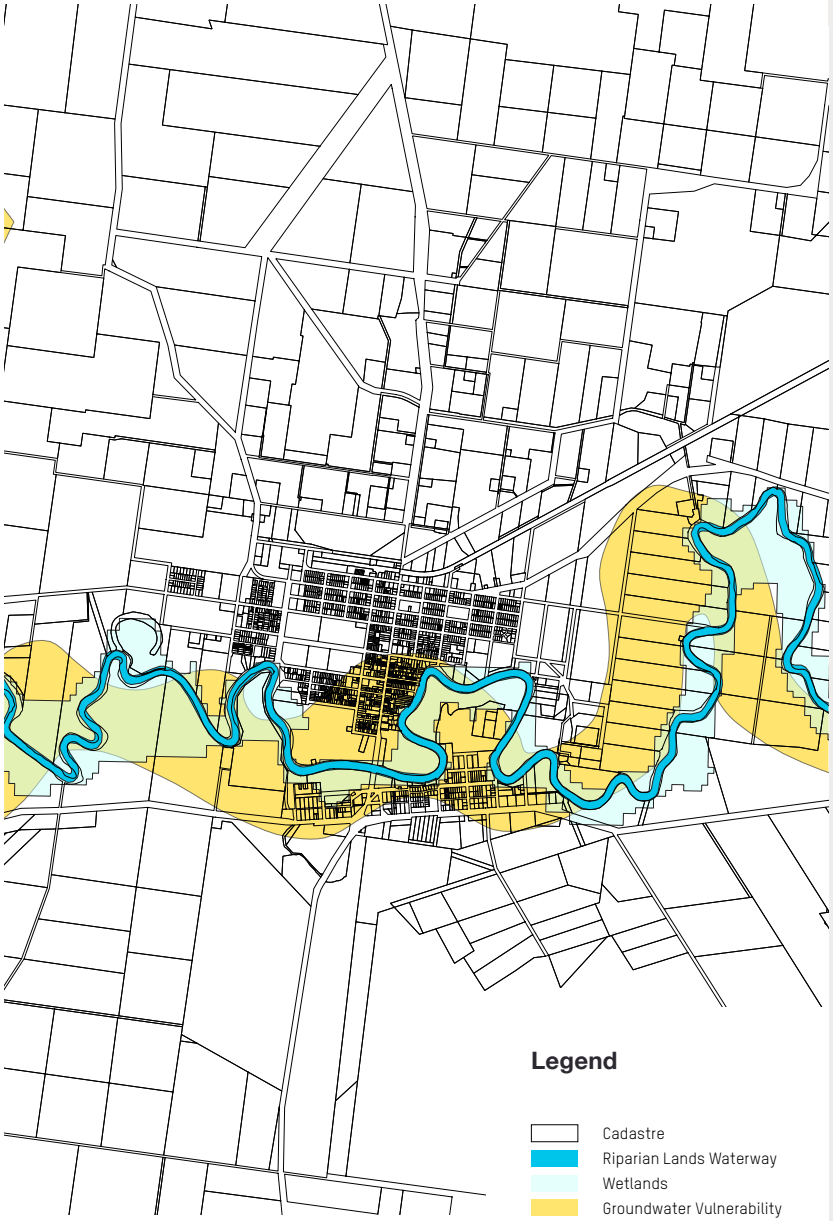


Figure 24: Waterways Map

4.3 Waterways

The iconic Murrumbidgee River winds its way through Hay Shire and provides one of the key tourist, recreational and natural asset for the community. The interface with the river is varied in character and includes many areas of superb natural environmental lands as well as highly used recreational areas.

Protection of the waterway from inappropriate development and/ or pollution is critical for the ongoing development of the township and the environmental health of this waterway.

Development near waterways is regulated by a number of state and local government policies including the Water Management Act 2000. Development within the bed or banks of the river or within 40 metres of a watercourse also requires separate approval from relevant NSW state government agencies to ensure the ongoing protection of these waterbodies.

The LEP contains specific controls regarding riparian land, wetlands and areas of groundwater vulnerability as identified within Figure 24. In addition, Clauses 6.4-6.6 of the LEP contains specific matters that Council must consider when assessing an application in proximity to the Murrumbidgee River.

Consideration of these areas will be required in the future rezoning of any land, particularly areas of groundwater vulnerability to the east of the township identified as ‘moderately high’ where effluent is proposed to be disposed of on-site.

4.4 Bushfire

A bushfire prone area is any land that can support a bushfire or is likely to be subject to bushfire attack.

In general, a bushfire prone area is mapped and identifies the vegetation types and associated buffer zones. These are generally areas located close to bushfire hazards such as forests, woodlands or grasslands.

Bushfire mapping is classified into four different categories:

- Vegetation Category 1 is considered to be highest risk for bushfire (red);
- Vegetation Category 2 is considered to be the lowest bushfire risk (light orange); and
- Vegetation Category 3 is considered to be a medium bushfire risk (dark orange).
- Vegetation Buffers, which apply around a bushfire hazard (yellow).

Bushfire prone land within the main township of Hay is classified as Category 1 due to the dense vegetation present on-site. Other portions of the town are classified as Category 2, whilst areas surrounding these hazards are classified as vegetation buffers (Figure 25).

In addition, Planning for Bushfire Protection Guideline 2019 (PBP) now provides a broader definition of grassland than previous versions with any undeveloped land now considered to be 'grassland vegetation'.

Consequently, further development of land shall have regard to the Hay bushfire prone land map, as well as the broader grassland bushfire hazard. Where necessary, any future subdivisions shall incorporate relevant bushfire provision measures such as Asset Protection Zones in accordance with the requirements of PBP.

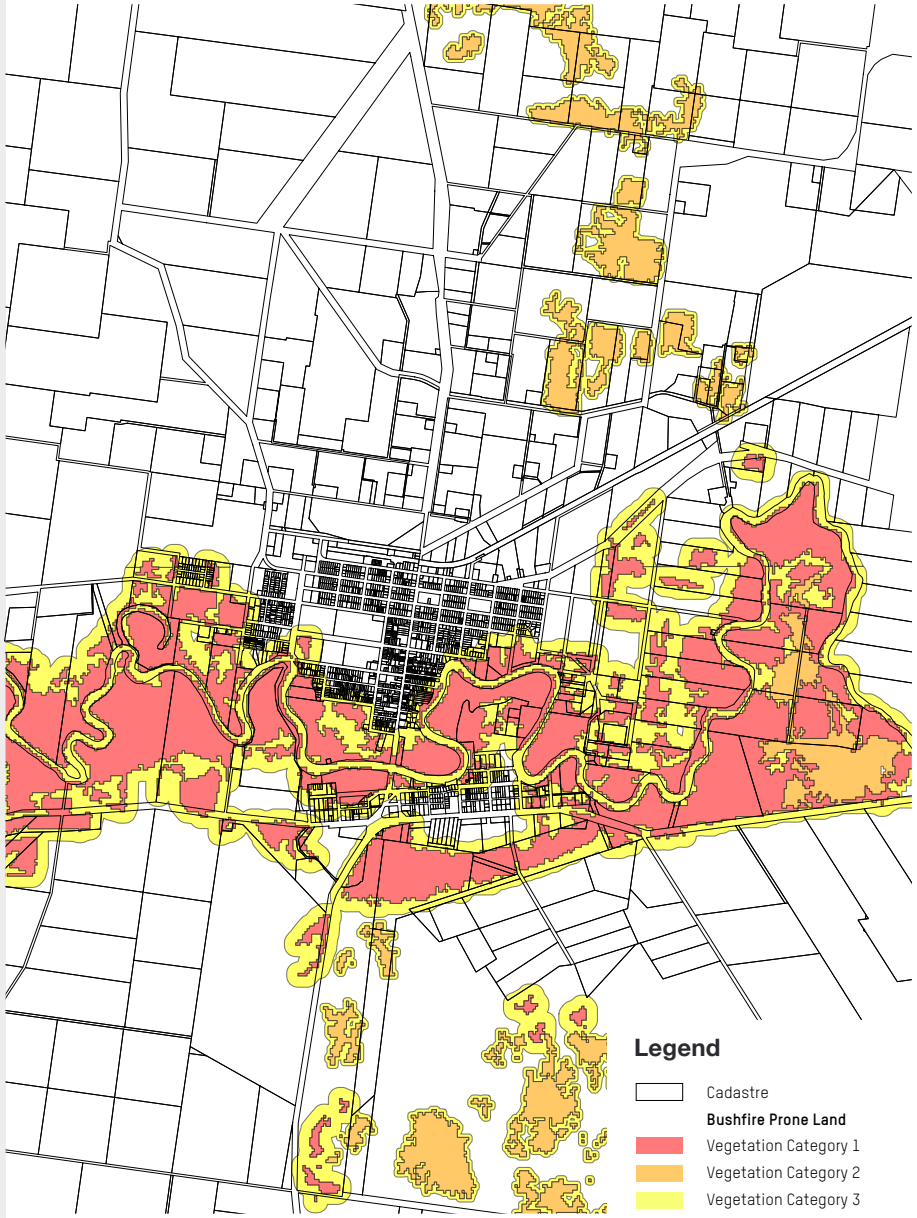


Figure 25: Bushfire Prone Land Map

4.5 Heritage

Non-Aboriginal Heritage

The main township of Hay contains a number of non-Aboriginal heritage items of both local and state significance as identified within Schedule 5 of the LEP (Figure 26).

Items of state significance include the former Hay Gaol, Post Office, Bishop's lodge and outbuildings, as well as the Hay Railway Station and yard group including Hay Railway station, Station Master's House, Water Tower and Railway Porters' Cottages. There are currently no heritage conservation areas identified within the main township of Hay.

Aboriginal Heritage

The original inhabitants of the Hay Shire Council area are the Wiradjuri and Nari Nari people.

Areas of significance to Aboriginal people can generally be expected to occur across the Council area. This includes both traditional and contemporary associations of Aboriginal people with the environment as well as physical sites (i.e. that contain archaeological evidence).

Aboriginal heritage exists as tangible and intangible evidence. The former mainly comprises archaeological sites and physical objects or artefacts, whose locations can be broadly predicted by a combination of landform variables e.g. shell middens and earth mounds tend to occur along rivers, artefact scatters representing ancient campsites tend to occur on flat, well drained ground near permanent water sources, whilst burials and cemeteries tend to occur in sand hills near watercourses. Examples of intangible heritage includes memories or stories and 'ways of doing', which include language and ceremonies.

A predictive model has been established for the study area based on other known Aboriginal items listed in the NSW Aboriginal Heritage Information Management System (AHIMS), as well as previous archaeological assessments prepared for the area. Using this model, a general area of possible Aboriginal sensitivity has been nominated 100 metres either side of the Murrumbidgee River.

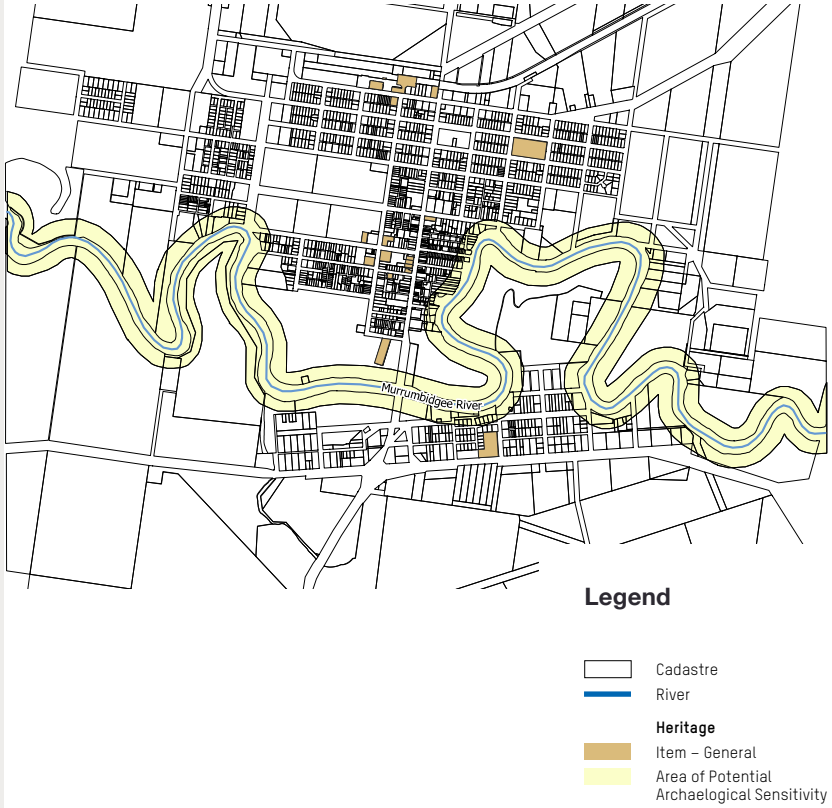


Figure 26: Heritage Map

Figure 27: Potentially Contaminated Land Map

4.6 Land Contamination

Potential land contamination presents a significant constraint to redevelopment opportunities. State Environmental Planning Policy (Resilience and Hazards 2021) requires Council to assess potential contamination and remediation requirements prior to rezoning land and determining development applications.

Council's potential contaminated lands register has identified a number of land parcels potentially impacted by contamination within the Hay LGA. Common sources of contamination include:

- Chemical storage.
- Buried putrescible waste.
- Former service station and motor mechanic sites.
- Sewerage effluent.
- Animal carcasses; and
- Fuel and oil storage.

A plan showing contaminated and potentially contaminated land is provided in Figure 27.

In addition to Council's potentially contaminated land register, the NSW Environment Protection Authority (EPA) holds a register of contaminated sites. Following a review of this register there is only one identified item within the Hay LGA, being "State Rail Authority (SRA) Land" located at 443 Murray Street, Hay. This site was subject to Agreed Voluntary Remediation Proposal No. 26058 issued on 14 January 2004 and the works were completed on 24 June 2004.

Further consideration of land contamination should be undertaken via the preparation of a Preliminary Site Investigation and/or a Detailed Site Investigation prior to rezoning land for residential purposes and/or other sensitive land uses such as child care centres. Development for the purposes of industrial, commercial or agricultural development shall also have regard for matters regarding land contamination, however further investigation is only required where a site is known to be significantly contaminated or the development proposes a more sensitive land use.

4.7 Open Space and Community Facilities

Significant areas of public open space exist within the Hay Township including recreation reserves and Crown Lands reserves, which are available for public use. This includes land located either side of the Murrumbidgee River, as well as public open space reserves interspaced throughout the township.

The town contains 14 reserves used for public open space and recreation purposes. Key public open space areas include Hay Park, the John Houston Memorial Pool, Sandy Point, Bushy Bend, Lions Park, South Hay Reserve and the Hay Showground. Private recreation zoned land within the township consists of the Hay Golf Club.

These open space areas cater for a range of sporting activities including tennis, squash, lawn bowls, golf, football, netball, cricket, equestrian, horse racing, fishing, clay target shooting, touch football and hockey.

Given the towns location alongside the Murrumbidgee River, residents and visitors have access to outdoor and water-based recreational facilities including boating, fishing, swimming, bushwalking, camping and picnicking.

The town is also well serviced by a range of community facilities including council administration offices, community halls, medical/health facilities, as well as a range of education facilities including:

- Hay Public School
- Hay War Memorial High School
- St Mary's Parish School
- Hay Preschool Kindergarten
- Hay Plains Childcare

It is noted that student enrolment numbers within the town have steadily declined between 2008 and 2018 from 630 students down to 420 students. This is a reduction of approximately 33%.

This trend is likely to continue or remain static.

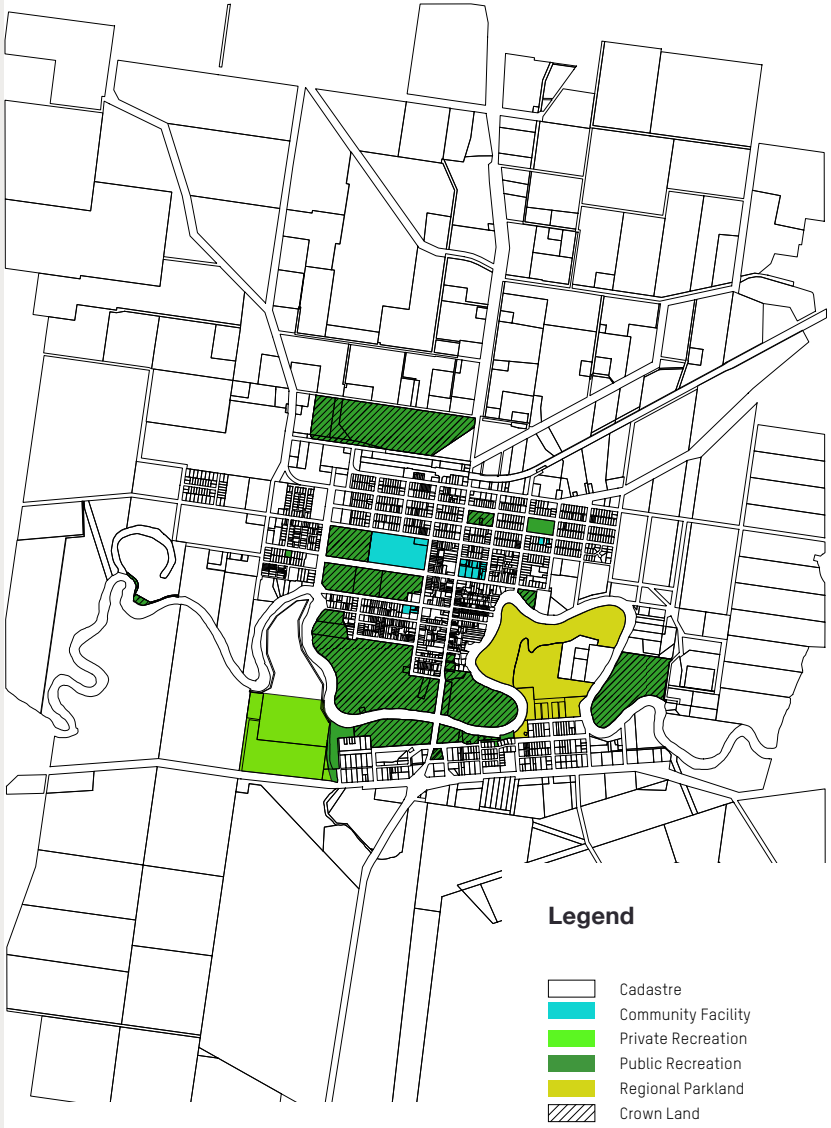


Figure 28: Open Space and Community Facilities Map

4.8 Land Capability and Agricultural Value

The majority of the Hay Shire Council area is zoned for rural purposes with 1,097,547ha being zoned RU1 Primary Production, and 1,230ha being zoned RU4 Primary Production Small Lots. These two zonings account for 97% of the total land area in the Hay Shire.

The agricultural industry in the Hay Shire contributes over $83 million to the region's gross regional product per year. The main areas of production in Hay are cotton ($27m per year), wool ($13m per year), sheep ($11m per year) and cattle ($10m per year).

Identifying and protecting important agricultural land in the Hay Shire is fundamental to the future of agricultural production within the LGA and Region.

The NSW Department of Planning, Industry and Environment have prepared Land and Soil Capability Mapping for NSW to help determine agricultural productivity across the state.

The mapping is based on an eight class system with values ranging between 1 and 8 which represent a decreasing capability of the land to sustain land use. Class 1 represents land capable of sustaining most land uses including those that have a high impact on the soil (e.g., regular cultivation), whilst class 8 represents land that can only sustain very low impact land uses (e.g., nature conservation).

The main township of Hay and its surrounds have been classified as Class 5 – Severe Limitations and Class 6 – Very Severe Limitations (Figure 29), which generally represents lower quality agricultural lands.

All land located outside of the main urban area of Hay is zoned RU1 Primary Production or RU4 Primary Production Small Lots with a corresponding minimum lot size for subdivision purposes of 2 hectares and 90 hectares respectively. This land is generally used for small-scale agricultural activities and is largely fragmented and/or contains rural dwellings.

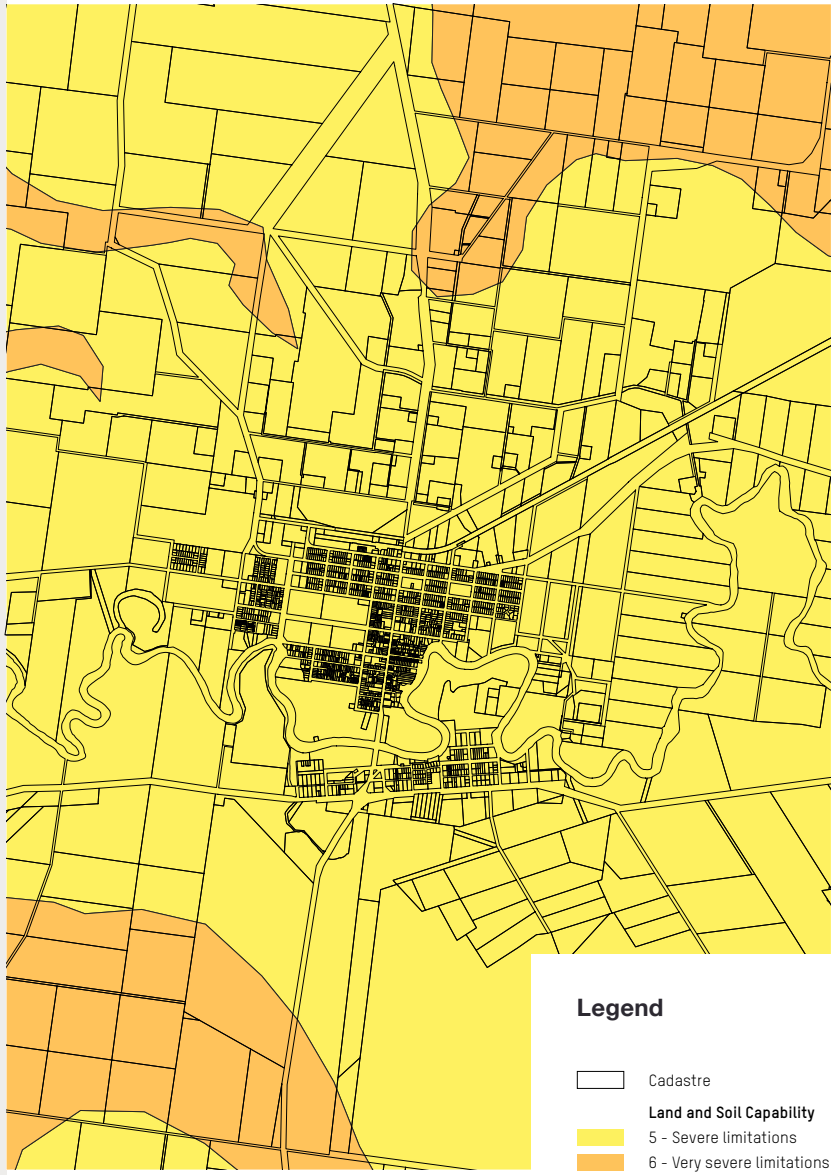


Figure 29: Agricultural Land Capability Map

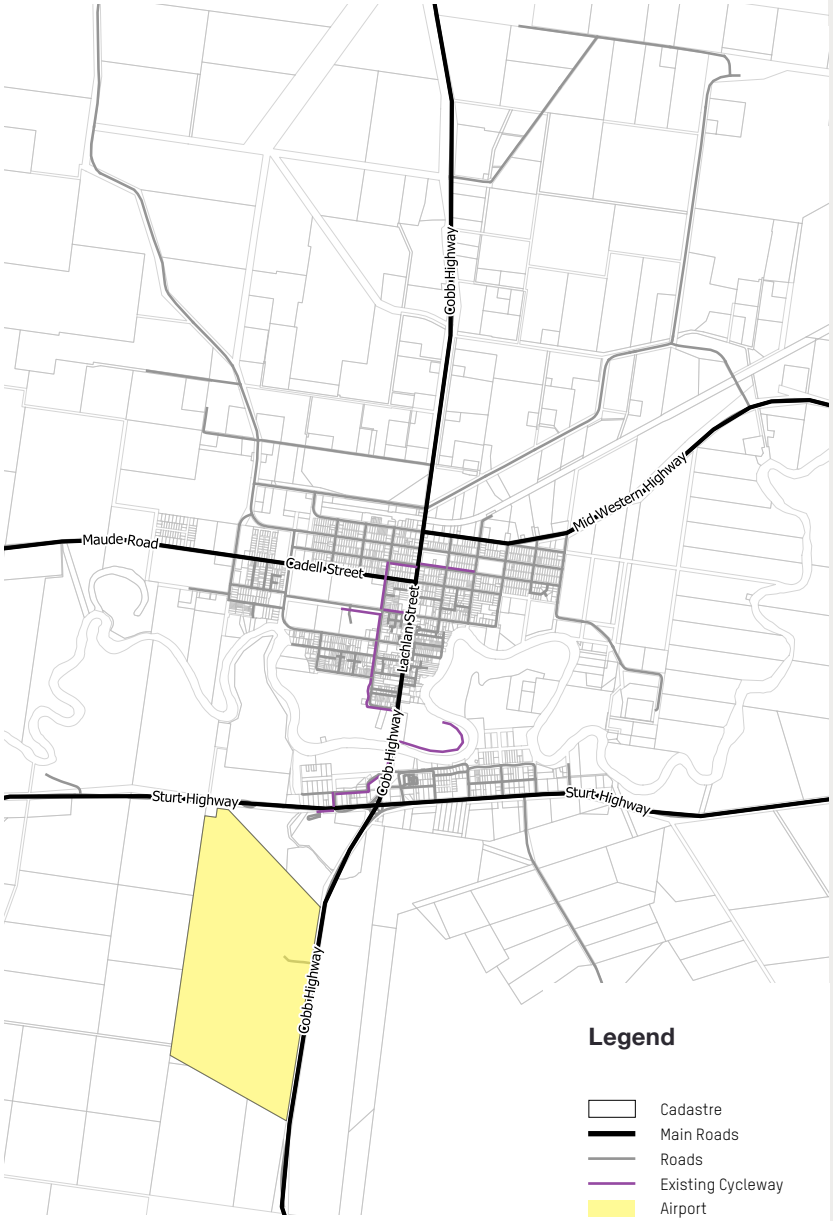


Figure 30: Traffic, Access and Transport Map

4.9 Traffic, Access and Transport

The township of Hay is located at the intersection of three major highways including the Cobb, Sturt and Mid-Western Highways. Of these, the Cobb Highway (Lachlan Street) forms the main street of Hay and provides the main north-south access route through town. These roads are Classified Roads and are managed by TfNSW. Other major roads in the town include Cadell Street, Murray Street, Moppett Street, Church Street, Leonard Street and Pine Street.

Traffic data counts indicate that Lachlan Street (Cobb Highway) has 5,000 vehicles per day with a high percentage of these being heavy vehicles. In response and as a way of ameliorating heavy vehicle impacts, Council prepared the Lachlan Street Upgrade Master Plan, which sought to undertake a number of street beautification and traffic calming devices.

Public transport in Hay is consistent with most other regional and rural towns and is generally limited to a daily school bus and coach service. The township does contain an airport, however this facility does not provide commercial air services, but rather charter and freight flights.

Accessibility within the township is generally good with a number of constructed on and off road shared pedestrian and bicycle paths. Council has prepared a number of strategic plans and policies that seek to expand this footpath and bicycle network (see Section 5).

It is noted however that access to South Hay is restricted to a single span bridge and associated pedestrian footpath, which reduces the level of connectivity between North and South Hay.

All roads within the central township are sealed, whilst a number of unsealed roads remain on the fringe including RU4 zoned land located to the north of the town. Consideration of upgrades to these roads may be required into the future depending on the future development outcomes and traffic volumes.

Key traffic intersections within the study area comprise of formalised give way and stop sign intersections, as the township does not have any traffic lights.

Council does not currently have any standard engineering guidelines to outline relevant road widths, kerb and gutter and footpath requirements.

4.10 Infrastructure and Services

The township of Hay has access to a range of infrastructure and services as outlined below.

Council in association with the NSW Public Works Advisory is also in the process of preparing a Supplementary Paper to the Integrated Water Cycle Management Strategy (IWCMS), which will identify current and future capacity issues and upgrade requirements.

The outcomes of this Paper will inform further recommendations to the IWCMS.

Other key infrastructure and services within the township include the sewerage treatment works, water filtration plant, waste management centre, airport and cemetery. The majority of these facilities are zoned special use.

These facilities by their nature require separation/buffering from other sensitive land uses in terms of noise, odour or other emissions. Careful consideration should be given to any development within proximity to these facilities to ensure they are not encroached upon by sensitive land uses.

Water

The township of Hay has a dual water supply system, supplying both treated (potable) and raw water (non-potable) to the town. Hay also has a third water supply system known as the Hay Private Irrigation District (privately run). This system provides irrigation and stock and domestic water to a farming area north of the township.

Treated water is extracted from a weir pool on the Murrumbidgee River and then treated in Council's water treatment plant located adjacent to the river in north east Hay. The treatment plant is 30 years old, is in good condition (subject to recommended upgrades) and currently operates at approximately 60-70% capacity.

Council owns and maintains a considerable underground water main network. This network consists of pipes varying from 50mm to 300mm in diameter. The condition of the network is fair with a sustainable mains replacement program currently in place.

Hay has a reasonably well-defined service boundary, whereby it can service all areas within that boundary generally with adequate pressure via one floating reservoir in Pine Street. Given the extra capacity of the water treatment plant, to expand the water main network beyond the boundary would only require the upsizing of several feeder mains and booster pumps.

Lachlan Street, Hay
(Source: Habitat Planning)

Drainage pipe
Photo credit: Kevin Andre

Similar to the treated water system, raw water is extracted from the Murrumbidgee River via a pump station. The water is chlorinated and pumped through a network of underground water mains. The raw water system covers a similar area to that of the treated water system but extends further into the outlying areas. It is acknowledged however that there are instances of pressure issues at the fringe of the network. Again, this will require the upsizing of mains and booster pumps to expand the network.

Lastly, the Hay Private Irrigation District is located approximately 2km north of the Hay township and supplies irrigation and stock and domestic water to an area of approximately 36km2 consisting of 80 small farms. This system replaced a former open channel system that was experiencing considerable evaporation and seepage losses.

Council holds a Water Access Licence (WAL6457) to extract from the Murrumbidgee River and has an annual entitlement of 2,805ML per year. Current usage rates are well below this entitlement (650ML/year for raw water and 201ML/year for potable water), however the IWCMS Supplementary Paper has identified that Council is averaging an annual water loss (via leakages and other losses) of approximately 30% and 35% for both the raw water and potable water systems.

The IWCMS Supplementary Paper has however identified that the capacity of the existing water treatment plant will be exceeded at 67% of the ultimate development recommended in the LSPS (Figures 15-18).

Sewerage

The main urban Hay township is serviced via a gravity mains sewerage system, which covers the urban boundary as shown in Figure 31.

The reticulated sewerage scheme consists of approximately 30km of mostly vitreous clay sewer gravity mains and 4km of rising mains, some sections of which date back to 1905 and eight Sewerage Pump Stations (SPS1-8).

The Hay Sewerage Treatment Plant (STP) located off Rye Lane was newly built in 2018. It replaced an old trickling filter type treatment plant that was designed in the 1940s. The newly constructed plant consists of an Intermittent Decanted Extended Aeration (IDEA) tank with a design capacity of 3,000 Equivalent Persons based on a hydraulic allowance of 240 L/EP/d.

The Hay STP operates under Environment Protection Licence (EPL) No. 3520. Under this licence there are no load or concentration limits required as effluent is discharged to evaporation ponds on site and not to any receiving waters, however monitoring for groundwater contamination is required.

Council's intention is to extend the reticulated sewerage network to the new urban residential release areas identified within this Plan, as well as new industrial lands located within South Hay. The IWCMS Supplementary Paper has however identified that the capacity of the existing STP will be exceeded at 15% of the ultimate development recommended in the LSPS (Figures 15-18).

For those areas outside of the reticulated sewerage network, properties are required to operate on-site septic tank sewerage systems in accordance with Council's On Site Sewer Management Plan for Septic Tank & Grey Water Effluent Policy.

Anecdotally, all registered on-site effluent disposal systems within the Shire are operating effectively as Council has not become aware of any issues of system failures or environmental pollution incidents, particularly groundwater contamination.

Drainage

The drainage system within the main township of Hay consists of overland flow and a traditional ‘pit and pipe’ stormwater network. Council staff anecdotally report that the system is adequate for smaller rainfall events to the 1:5 ARI size. Bigger events beyond this have resulted in minor short-term localised flooding.

Electricity

Essential Energy supplies electricity to the Hay LGA.

The township is surrounded by a grid of suitable high voltage feeders that are capable of supplying either industrial or housing subdivisions. Additional costs would be involved to extend these lines and install suitably sized transformers for any new developments.

The current system has ample capacity of meeting any growth needs in the main township of Hay and the surrounding areas.

Gas

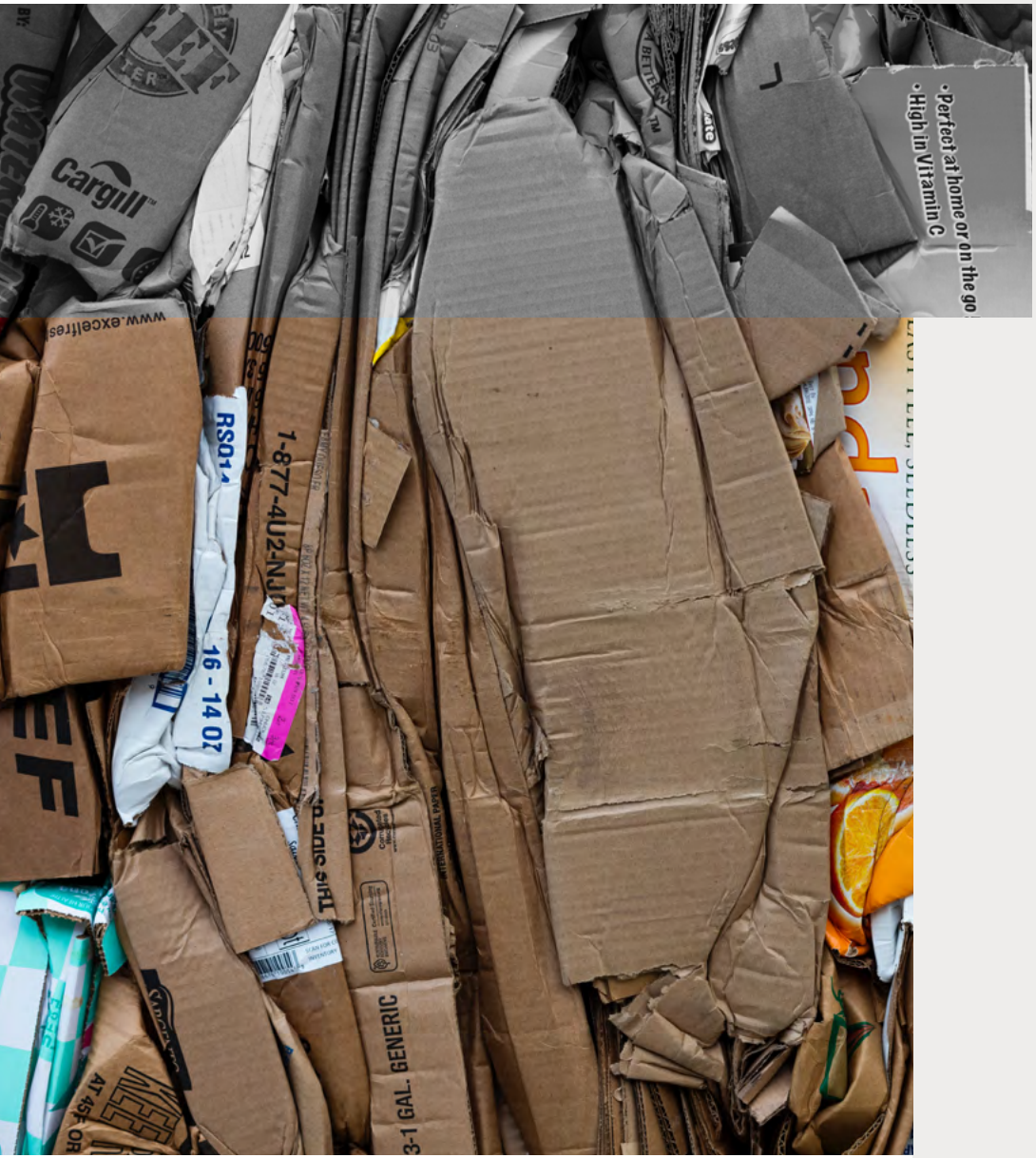
The main township of Hay and its surrounds does not have access to reticulated gas and is therefore reliant upon a bottled gas supply.

Telecommunications

Telecommunications are readily available, although mobile phone

reception and internet access have been issues in the past, particularly on the fringe and outskirts of town.

Gas stove
Photo credit: Kwon Junho



Cardboard recycling
Photo credit: Jon Moore

Waste Management

The township of Hay has a weekly 240 litre bin collection service operated by Council.

The Hay Waste Disposal depot is located via Thelangerin Road (Tip Road) adjacent to Council's Sewerage Treatment Plant to the northwest of the main township. This facility is a manned landfill and also operates as a waste transfer station. The facility is not required to be licensed by the EPA and Council charges a fee for the different types of waste received at this facility in some instances.

The depot consists of an above and underground dumping ground enclosed by earth embankments. The waste is covered on a regular basis with earth to prevent vermin and odour issues.

The Hay Community Recycling Centre also operates from the site and provides a range of free recycling options for residents with the aim of diverting waste away from landfill (reduce, reuse, recycle).

The landfill is estimated to have at least another 30 years of operational life at current waste intake rates and if the recommendations of Council's Waste Management Strategy is followed.

Council owns additional land to the north of the existing facility, which could be used to expand the facility into the future.

In addition, Council is investigating options to implement a Materials Recovery Facility (MRF) to process recyclable waste goods, as well as establish a Food Organics and Garden Organics (FOGO) disposal area. Council has recently received funding for some of these works.

Roads

The Council owns and maintains approximately 941km of local and regional roads across the entire LGA. Of these, approximately 347km are sealed with the remaining 594km remaining unsealed. Minor improvements such as sealing small quantities of unsealed roads may be possible however this will need to be on an 'as needs' basis depending on future land developments.

The majority of the roads within the main township of Hay are sealed with only those outlying fringe areas remaining unsealed.

A plan showing the key infrastructure network is provided in Figure 31 below.

Health Care

Residents living within the main township have access to a range of health care services. The largest of these includes the Hay Health Service located at 351 Murray Street, Hay. This facility is a 27 bed facility with nine hospital care beds and 16 residential aged care beds, as well as providing a 24 hour Accident and Emergency Department.

A range of primary health care services are also provided at Hay Hospital including community nursing, early childhood nursing, mental health services, palliative care, physiotherapy, speech therapy and nutrition. Other services within the township include the Hay Medical Centre and the Hay Aboriginal Medical Service, as well as a number of other private health care specialists.

Whilst health care provision is generally good there are issues with distance from specialised services.

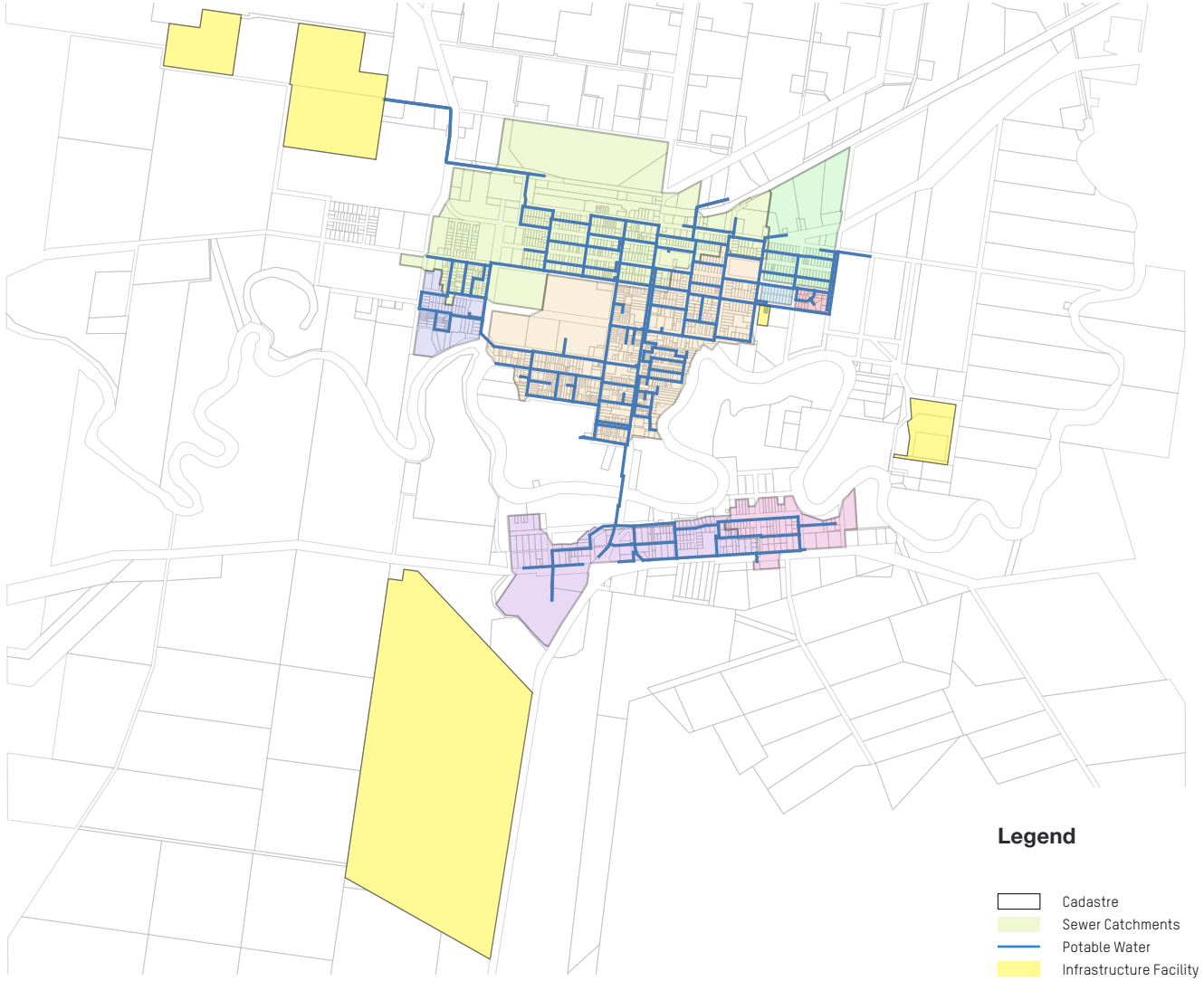


Figure 31: Infrastructure and Services Map

Former Hay Fire Brigade Station
(Source: Habitat Planning)

Child Care

Child care facilities within the town include the Hay Family Day Care Centre, Hay After School Care, Hay Children's Services Early Learning Centre and the Parkhill Family Day Care centre.

These facilities provide long day care, vacation care and before and after school options for children aged from 6 weeks up to 13 years.

Education

As outlined in Section 4.7, Hay is serviced by a number of educational facilities including both primary and high school, as well as public and private including Hay Public School, Hay War Memorial High School and St Mary's Parish School.

Emergency Services

The main township of Hay and its surrounds are serviced by a range of emergency services including:

- Ambulance
- Police
- Fire Brigade
- State Emergency Services

4.11 Land Use Conflicts

Land use conflicts may arise when incompatible land uses are located in close proximity to each other, which in turn may impact on the amenity of sensitive land uses, the efficient use of productive land or industries, or environmental and landscape values.

Specifically, the Council area includes areas of productive agricultural land that could be threatened by unplanned expansion of residential and rural living development. Similarly, the main township of Hay and surrounds contains a number of established industrial businesses (including saleyards) and key infrastructure facilities that have the potential to generate traffic, odour and noise. Therefore, consideration of land use conflicts is required.

An assessment of land use conflicts has been undertaken consistent with the NSW Department of Primary Industry's Land Use Conflict Risk Assessment (LUCRA) guidelines. There are four key steps involved in undertaking a LUCRA and these include:

1. Gather information about proposed land use changes and associated activities.
2. Evaluate the risk level of each activity.
3. Identify risk reduction management strategies
4. Record LUCRA results.

Key potential land use conflicts contained within the study area include:

1. Waste management centre
2. Sewerage treatment works
3. Existing industrial areas
4. Water filtration plant
5. Hay Airport
6. Saleyards

Consideration will therefore need to be given to the location of future residential and rural residential zoned land adjacent to productive agricultural activities.

Consideration of land use conflicts however will not need to be investigated where development involves complementary uses such as certain industries and primary production activities.

A plan showing these potential land use conflicts is provided in Figure 32.

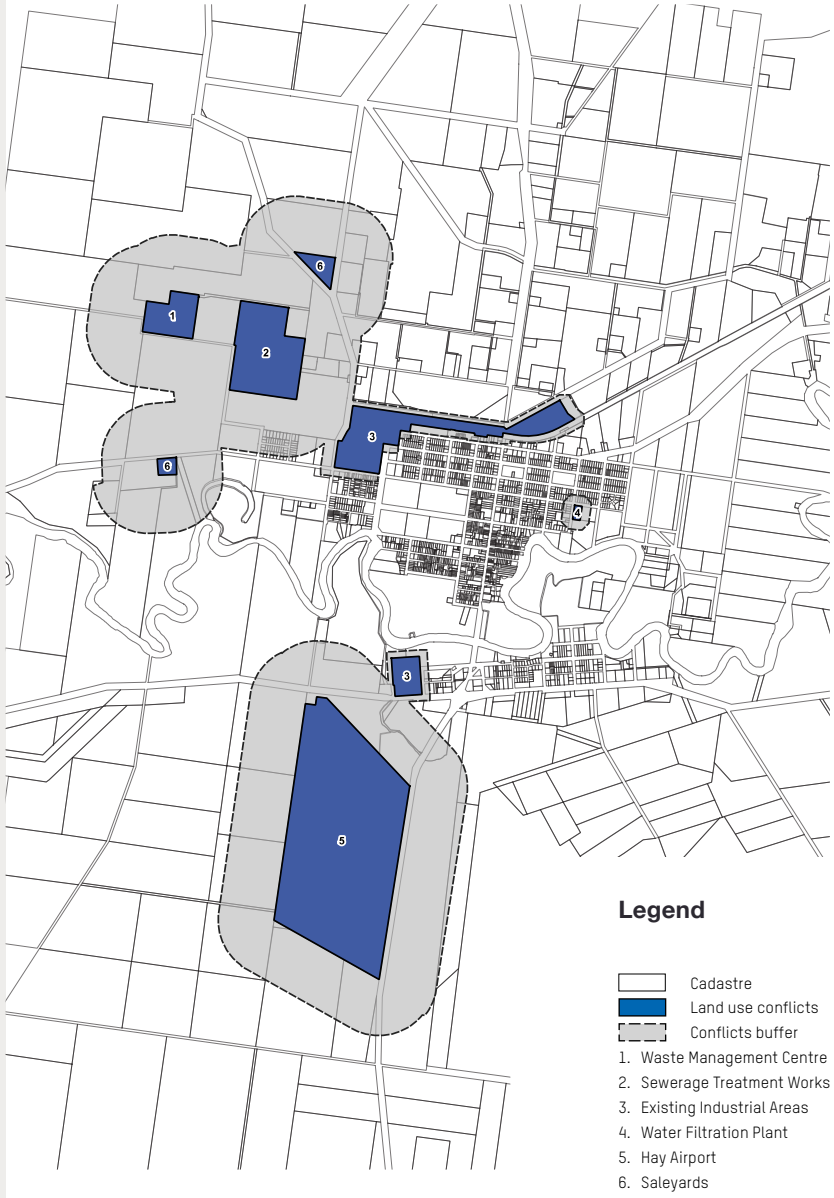


Figure 32: Land Use Conflict Map

4.12 Summary of Constraints and Opportunities

To help identify potential candidate sites for rezoning and development, consideration has been given to the environmental constraints and opportunities outlined in Section 4.1 to 4.11 of the Structure Plan.

A plan showing the combined constraints and opportunities for Hay is provided in Figure 33.

The features have informed the recommended zoning and minimum lot size changes outlined in Section 5 of this Structure Plan.

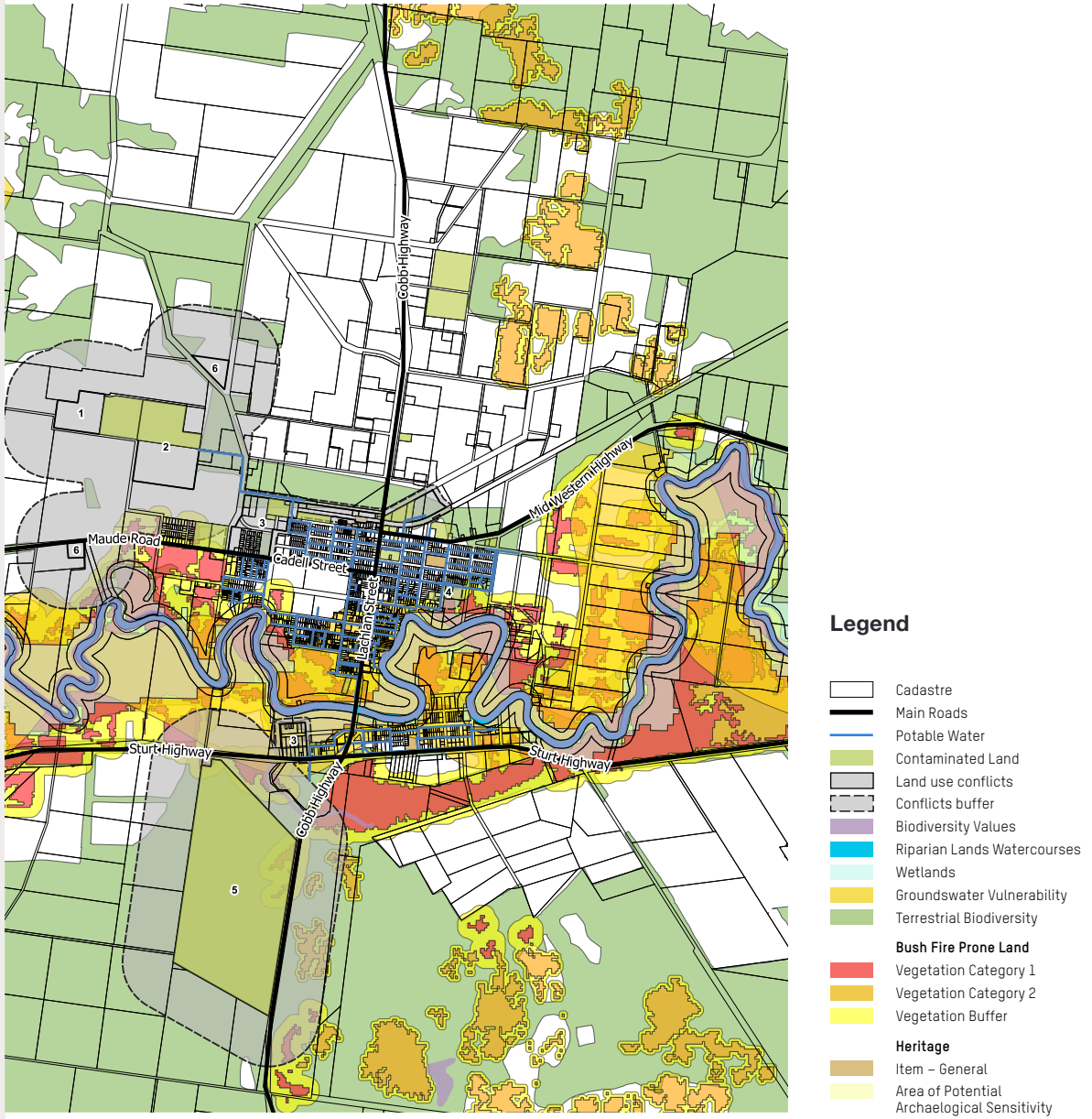


Figure 33: Combined Constraints and Opportunities Map

5. Structure Plan

Commercial Hotel (Source: Habitat Planning)

5.1 RU5 Village Zone

The Structure Plan does not propose to rezone any additional land for RU5 Village purposes based on the approximate 50 years of residential land supply that already exists within the township.

Notwithstanding the above, as a means of encouraging infill development and a range of housing types, particularly small lot housing within the main urban area, the Structure Plan has undertaken a review of the existing 550m2 minimum lot size controls that apply to the RU5 Village Zone.

Upon review, it is recommended that this minimum lot size be removed from the main urban area as identified in Figure 34.

This will ensure maximum flexibility and encourage infill development that will not only increase the range and type of housing, but also result in a more efficient and sustainable use of infrastructure.

This approach is also consistent with a number of other rural and regional Councils.

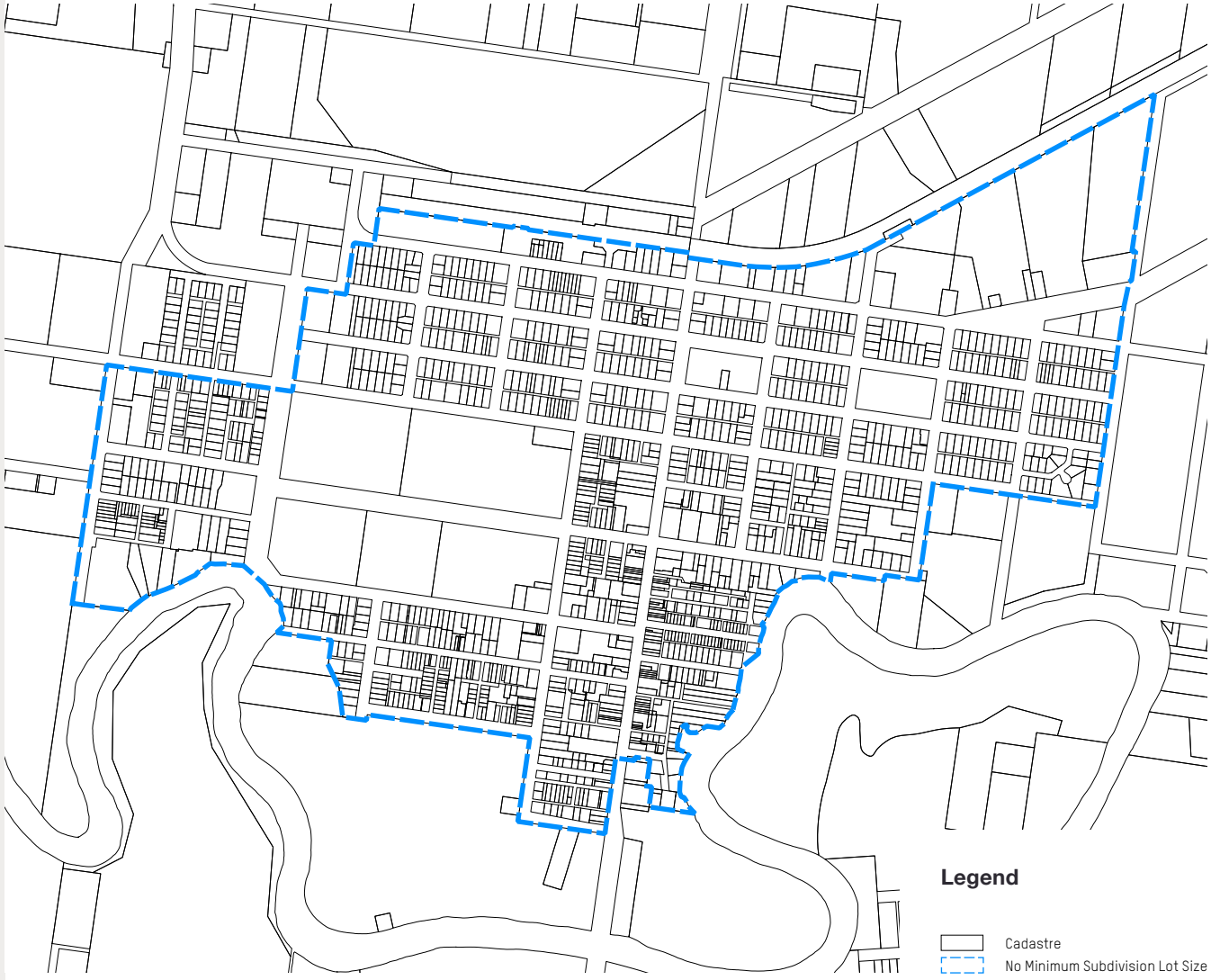


Figure 34: Removal of Minimum Lot Size for the RU5 Village Zone

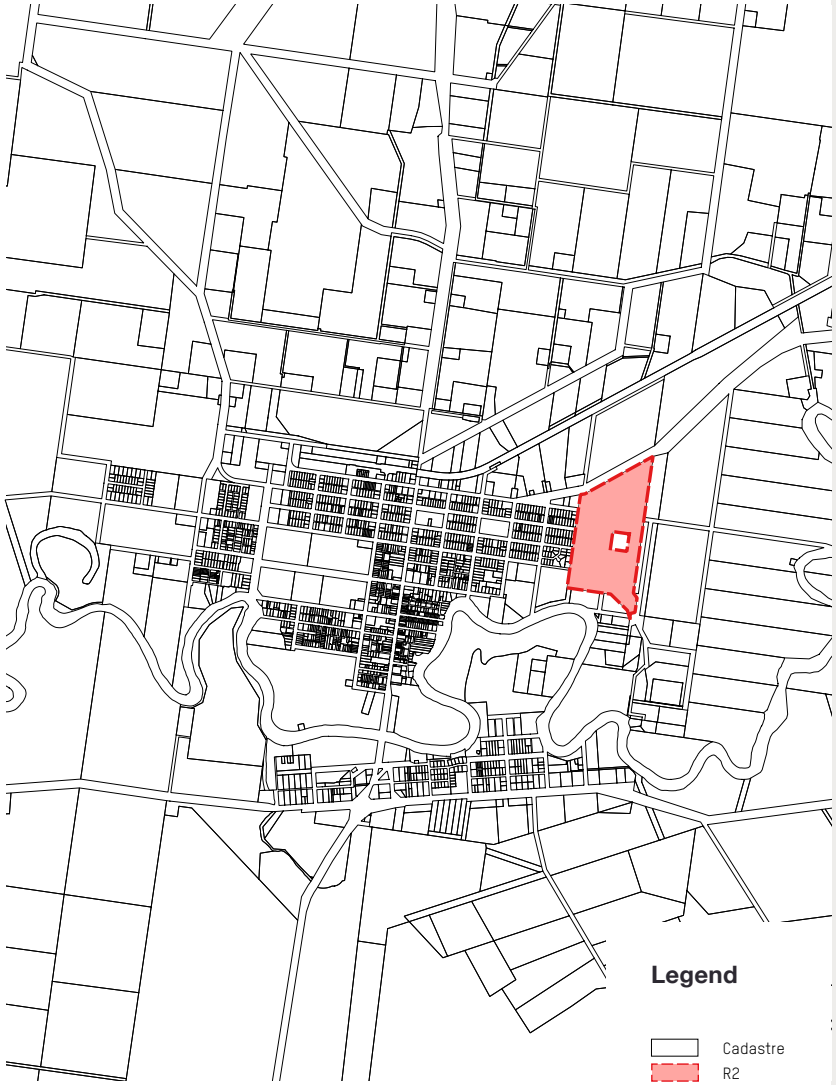


Figure 35: Proposed R2 Low Density Residential Zone

5.2 R2 Low Density Residential Zone

The Structure Plan recommends introducing a new R2 Low Density Residential zone on the north eastern side of town. In accordance with NSW Department of Planning Practice Note PN 11-002, the R2 zone is:

"intended to be applied to land where primarily low density housing is to be established or maintained... This is the lowest density urban residential zone and the most restrictive in terms of other permitted uses considered suitable".

Based on the existing development pattern and zoning of the area, environmental constraints and the logical extension of services, the Structure Plan recommends rezoning a number of parcels of land to the north east of the existing township to R2 Low Density Residential with a 1,500m2 minimum lot size as identified in Figure 35.

These parcels include the following:

- 229 Bourke Street (Lot 2, DP448476 and Lot 135, DP756755).
- 265 Bourke Street (Lot 10, DP823018).
- Mid-Western Highway (Lot 111, DP1187931).

The recommended rezoning of this land is consistent with previous strategic planning investigations and recommendations identified in Council's LSPS (Figure 5) and are consistent with the environmental constraints of the land.

The properties are currently zoned RU1 Primary Production with a minimum lot size of 90 hectares. Combined, the lots have a total area of approximately 33 hectares.

All properties are largely unconstrained and the topography of the land is generally flat. Vegetation on-site is largely non-native and comprises planted vegetation around an existing dwelling on Lot 2.

The land is not currently used for any large-scale productive farming land and is largely classified as Category 1 land under the provisions of the *Local Land Services Act 2013.*

Infrastructure and services including water and sewerage can be made available to the site via an extension from the main urban area. Road access is also available via Bourke Street and Murray Street with the latter recently upgraded and sealed.

Due to the size of these properties and the need to coordinate infrastructure and services, it is recommended that a site-specific masterplan be prepared for these properties.

Amongst key issues to be investigated include:

- Lot layout and urban design;
- Infrastructure provisions and upgrade requirements;
- Open space and landscaping;
- Development staging and sequencing;

Further details regarding design guidelines are discussed in Section 6.5 of this report.

In total, the future subdivision of this land based on the proposed zoning and minimum lot size recommendations of this Strategy could increase the supply of RU5 Village zoned lots within Hay by up to approximately 158 lots based on the established lot size pattern within the township (1,500m2).

This equates to approximately 38 years' worth of land supply based on current residential take-up rates (4.2 dwellings per annum). Therefore, the introduction of the proposed R2 zone provides greater housing options and diversity in the residential land market.

Given this large proposed level of land supply, it is recommended that this area be developed over a number of stages as outlined in Section 6.5.

Hay Court House (Source: Habitat Planning)

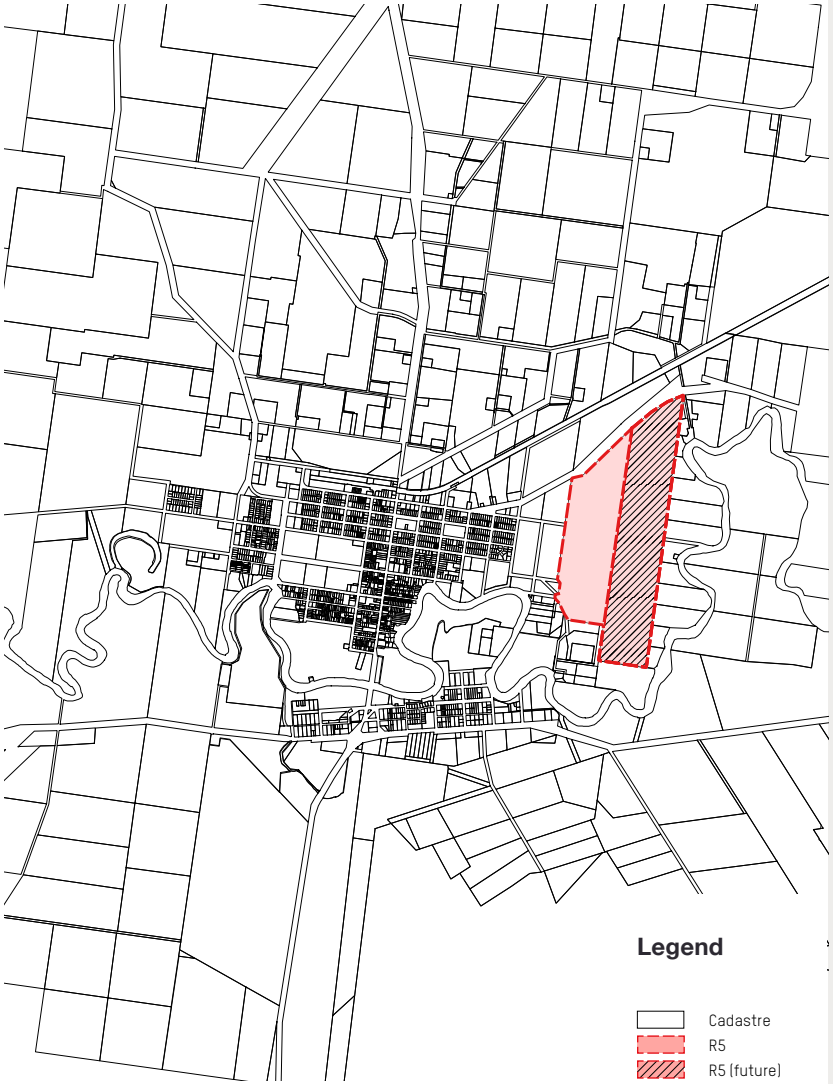


Figure 36: Proposed R5 Large Lot Residential Zone

5.3 R5 Large Lot Residential Zone

The Structure Plan recommends introducing a new R5 Large Lot Residential zone on the eastern side of town. In accordance with NSW Department of Planning Practice Note PN 11-002, the R5 zone is:

"intended to cater for development that provides for residential housing in a rural setting, often adjacent to towns or metropolitan areas".

Based on the existing development pattern and zoning of the area, environmental constraints and the logical extension of services, the Structure Plan recommends rezoning 6 parcels of land to the northeast of the existing township to R5 Large Lot Residential with a 4,000m2 minimum lot size as identified in Figure 36.

These parcels of land are described as follows:

- Murray Street (Lot 1, DP726528).
- 229 Bourke Street (Lots 4, 5 & 201, DP448476).
- Cemetery Road (Lot 170, DP756755).
- Underwood Road (Lot 171, DP756755).

The recommended rezoning of this land is generally consistent with previous strategic planning studies and recommendations identified in Council's LSPS (Figure 5) and are consistent with the environmental constraints of the land.

The properties are currently zoned RU1 Primary Production with a minimum lot size of 90 hectares. Combined, the lots have a total area of approximately 62 hectares.

The topography of the land is generally flat and vegetation on-site consists of largely non-native groundcovers with very few trees due to previous agricultural activities conducted on-site. The land is also not flood prone.

Whilst it is acknowledged that the land is identified as bushfire prone, the area is well setback from woodland and forested wetland vegetation hazards with only grasslands presenting a hazard. Similarly, although the land is identified on the groundwater vulnerability map, Council is unaware of any groundwater issues in this area and where necessary, will require the investigation of groundwater via the preparation of a Land Capability Assessment (LCA) at the time of subdivision.

The land is not currently used for any large scale productive farming land and is largely classified as Category 1 land under the provisions of the *Local Land Services Act 2013.*

Infrastructure and services including water can be made available to the site via an extension from the main urban area. Road access is available via Murray Street, however the eastern section of Murray Street will need to be upgraded to accommodate future development of this land.

Access to reticulated sewerage is not required as Council officers have confirmed that effluent can be appropriately disposed of on-site for properties down to a minimum lot size of 4,000m2 subject to an LCA.

In total, the future subdivision of this land based on the proposed zoning and minimum lot size recommendations of this Strategy could increase the supply of residential lifestyle lots by approximately 124 lots.

This equates to approximately 30 years' worth of residential land supply based on current residential take-up rates (4.2 dwellings per annum).

Provision is also available to expand this zoning further east along Murray Street into the future whilst still maintaining an appropriate setback from the Murrumbidgee River. In the interim it is recommended that this land be retained in a rural zone.

The introduction of this R5 zone is considered appropriate as it provides greater housing options and diversity in the residential land market. Furthermore, the introduction of this zone reduces pressure for residential development on land zoned RU4 Primary Production Small Lots to the north of the township, which is currently being used for productive irrigation purposes.

Given the size of the proposed lots, the development of this land will also not require the extension of Council's reticulated sewerage network.

Family at home
Photo credit: Alexander Dummer

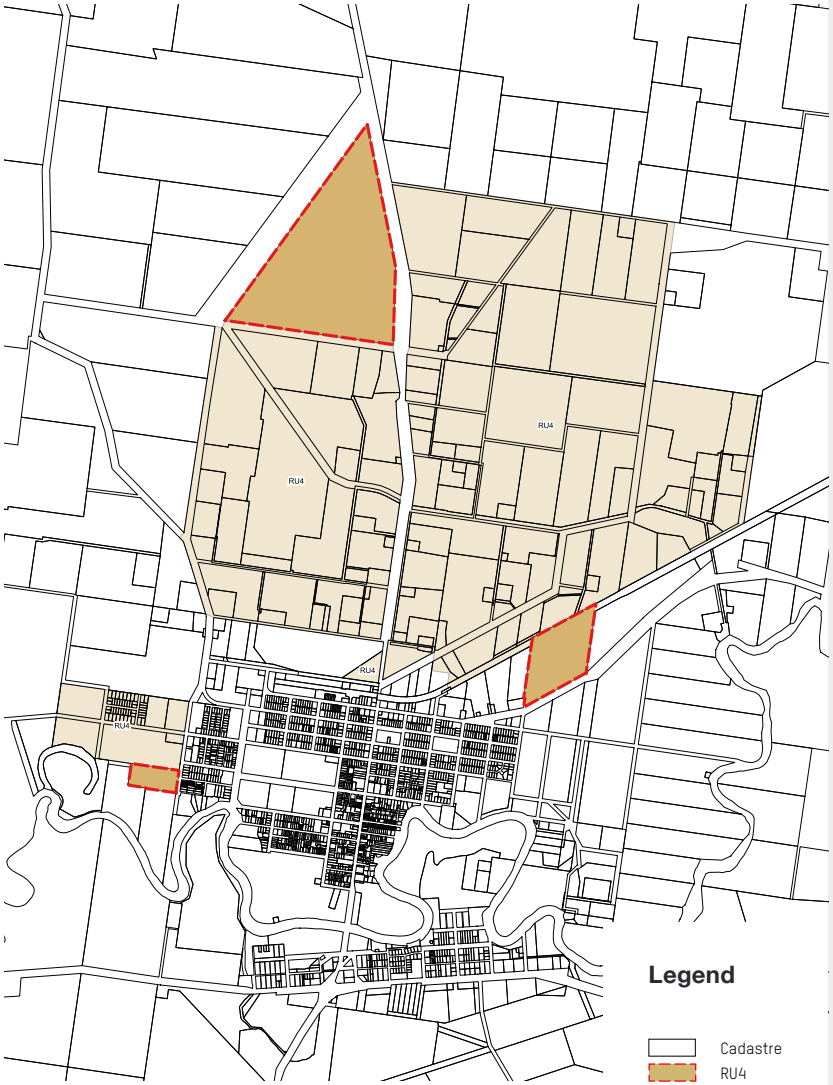


Figure 37: Proposed RU4 Primary Production Small Lots Zone

5.4 RU4 Primary Production Small Lots Zone

Based on the existing development pattern and zoning of the area, environmental constraints and the logical extension of services, the Structure Plan recommends rezoning a number of parcels of land surrounding the existing township to RU4 Primary Production Small Lots as identified in Figure 37.

These parcels of land are described as follows:

- 12531 and 12460 Cobb Highway (Lots 611 and 612, DP823005).
- 78 Jarrats Lane (Lot 62, DP448476).
- Mid-Western Highway (Lot 110, DP1187931).
- 532-546 Jackson Street (Lot 432, DP788293, Lot A, DP161725, Lot 1, DP163955, Lots 5-6, DP792551 and Lot 1, DP717704).

The recommended rezoning of this land is generally consistent with previous strategic planning investigations and recommendations identified in Council's LSPS (Figure 5) and are consistent with the environmental constraints of the land.

The properties are currently zoned RU1 Primary Production with a minimum lot size of 90 hectares. Combined, the lots have a total area of approximately 145 hectares.

All properties are largely unconstrained and the topography of the land is generally flat. Vegetation on-site consists largely of non-native groundcovers with very few trees due to previous agricultural activities conducted on-site.

It is noted however that the Mid-Western Highway property located to the east of the Hay Health Service has recently been approved for a solar farm. Therefore, it is unlikely that this land will be developed for the purposes of rural hobby farming/ rural lifestyle, which reduces the potential developable land area by 20 hectares.

Similarly, the approximate 6 hectares of land proposed to be rezoned RU4 to the west of the main township has already largely been developed for residential purposes. The largest of the remaining properties is only approximately 3 hectares in size and therefore cannot be further subdivided. Accordingly, the rezoning of this land only seeks to reflect its current use.

The three properties located to the north of the main township are currently used for small scale grazing and irrigation and the land is largely classified as Category 1 land under the provisions of the Local Land Services Act 2013.

Infrastructure and services including water can be made available to the site via an extension from the main urban area. Road access is available via the Mid-Western and Cobb Highways. Access to reticulated sewerage is not required due to the size of the 2 hectare minimum lot size, which allows for the disposal of effluent on-site.

In total, the future subdivision of this land based on the proposed zoning and minimum lot size recommendations of this Strategy could increase the supply of RU4 Primary Production Small Lots zoned land within Hay by up to approximately 24 lots.

This equates to approximately 10 years' worth of residential land supply based on current residential take-up rates (2.5 dwellings per annum).

In recognition of the existing large supply of RU4 zoned land and to better reflect the agricultural use of this land, the Structure Plan proposes to increase the minimum lot size of this zone as it applies to the northern portion of this area (Figure 38).

Specifically, the Structure Plan recommends introducing a 4 hectare minimum lot size for all land north of Old Bairds Lane to reflect the existing development pattern of this area.

In doing so, this will provide a better transition from the main urban area to the outlying rural areas with a 90 hectare minimum lot size. This approach will also have the added benefit of reducing the large supply (over 100 years) worth of RU4 zoned land.

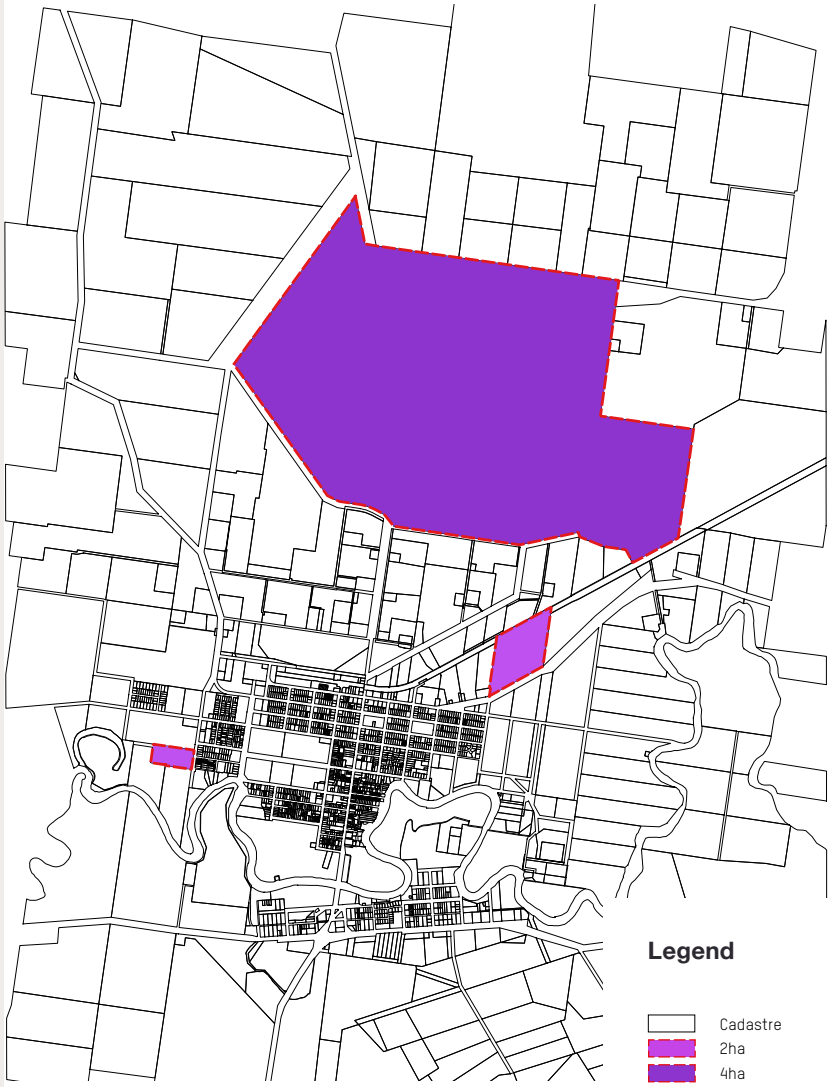


Figure 38: Proposed Amended Minimum Lot Size Map for the RU4 Primary Production Small Lots Zone

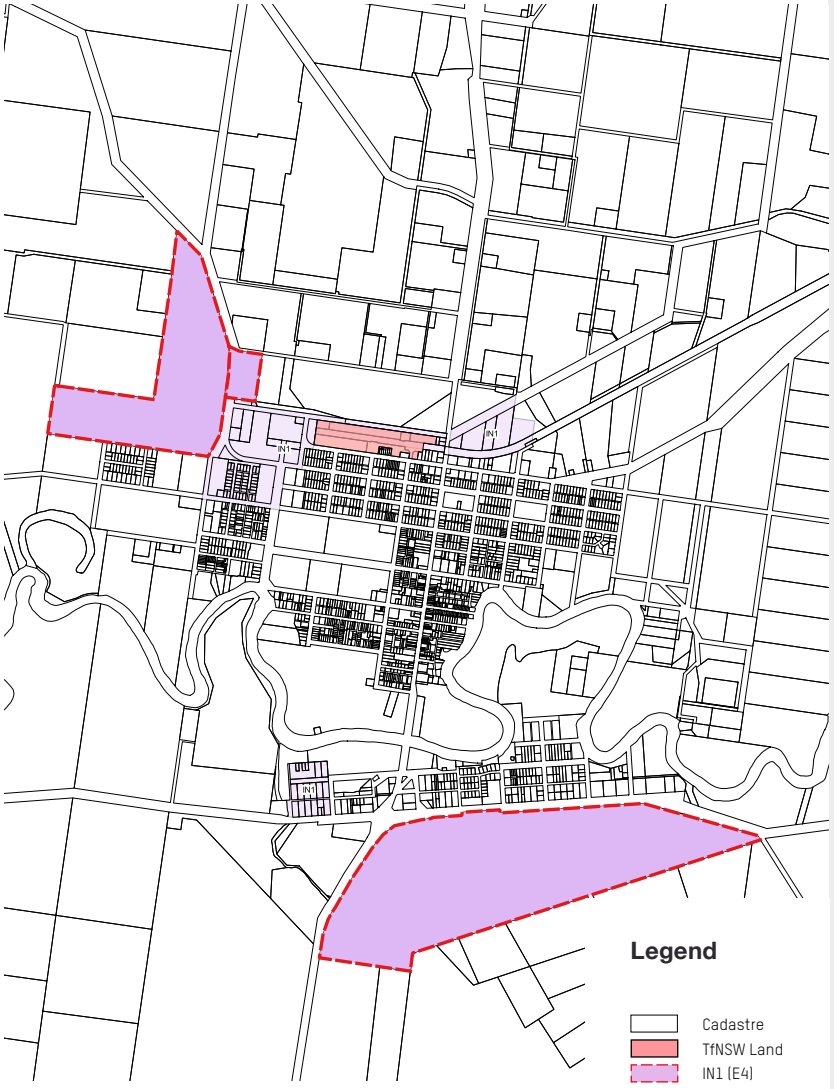


Figure 39: Proposed IN1 (E4) General Industrial Zone

5.5 IN1 (E4) General Industrial Zone

The Structure Plan has identified the need to rezone more land for industrial (employment) purposes. Whilst it is acknowledged that there is already a supply of land zoned for industrial purposes, much of this comprises former railway land that is owned by TfNSW and is therefore unlikely to be available for development in the short to medium term.

In rezoning additional land for industrial purposes, this will allow for the coordination of industrial development and will avoid land speculation and ad hoc development that is unplanned and uncoordinated that has the potential to create land use conflicts.

In response, the Structure Plan has identified two areas/precincts for additional industrial land supply. These are generally referred to as:

- Township Industrial Precinct.
- South Hay Industrial Precinct.

These areas are further described below and are identified in Figure 39.

As outlined within Section 2, the main township already has land zoned for general industrial purposes, which generally aligns with the former railway corridor. The Structure Plan recommends expanding this area further west and northwest to include land located to the west of Thelangerin Road surrounding Council's Waste Management Centre and sewerage treatment plant as this land is constrained for residential purposes.

The South Hay Industrial Precinct is located to the south of Moama Street/ Sturt Highway and east of the Cobb Highway within proximity to the Hay aerodrome.

The recommended rezoning of this land for industrial purposes is consistent with the environmental constraints of the land and surrounding land uses.

The properties are currently zoned RU1 Primary Production with a minimum lot size of 90 hectares. Combined, the lots have a total area of approximately 190 hectares (60 hectares for the Township Industrial Precinct and 130 hectares for the South Hay Industrial Precinct).

All the properties are largely unconstrained (with the exception of bushfire) and the topography of the land is generally flat. Vegetation on-site is largely non-native, PCT 13 Black Box Lignum woodland wetland and PCT 164 Cotton Bush open shrubland (Chenopod formation).

Infrastructure and services including water and sewerage can be made available to these precincts via extension from the main urban area. Road access to the township precinct is via Thelangerin Road, whilst road access to the South Hay precinct is available via the Sturt and Cobb Highways. It is recommended however that direct access to these Classified Roads be limited.

The purpose of the two industrial precincts is to provide for a variety of industrial lot types. Specifically, the Township Industrial Precinct is proposed to cater for smaller to medium sized operators (1,000m-5,000m2), whilst the South Hay Industrial Precinct will cater for large scale and heavy industrial developments (>1 hectare in size).

In total, the future subdivision of this land based on the proposed zoning and minimum lot size recommendations of this Strategy could increase the supply of IN1 (E4) General Industrial zoned lots within Hay by approximately 200 lots across the two precincts based on a 5,000m^2 and 1 hectare minimum lot size.

This equates to approximately 80 years' worth of industrial land supply based on current industrial land take-up rates (2.4 lots per annum). This number will be further reduced if large scale industrial operators establish within this precinct.

5.6 SP2 Special Use Zone

The Structure Plan has identified two additional sites for inclusion within the SP2 Special Use Zone (Figure 40). Both of these sites form an extension of existing Council owned facilities and include:

- Hay Aerodrome.
- Hay Waste Management Centre and Sewerage Treatment Works.

Further details regarding these sites are outlined below.

The Hay LSPS previously identified a proposed expansion to the Hay Aerodrome (see Figure 18) to allow for an extension of this facility. The land is located to the south of the main township and is surrounded by land zoned RU1 Primary Production with a 90 hectare minimum lot size.

The expansion of the SP2 zone to the south will extend over rural zoned land with an agricultural land capability of Class 6 – very severe limitations. The rezoning of this land is not expected to create any land use conflicts and will ensure the ongoing protection of this facility.

The land is currently privately owned, however Council is in the process of acquiring this land to expand the airport. Further investigation of this land will also be required as it contains Cotton Bushfire Shrubland.

The Structure Plan also recommends rezoning Council owned land to SP2 that immediately adjoins or currently forms part of Hay Waste Management Centre and Sewerage Treatment Works. The rezoning of this land will allow for the ongoing protection of this important infrastructure and will also allow for an expansion of these facilities into the future if required.

As a result of the proposed rezonings, it is also recommended that the current minimum lot size requirement that applies to this land be removed.

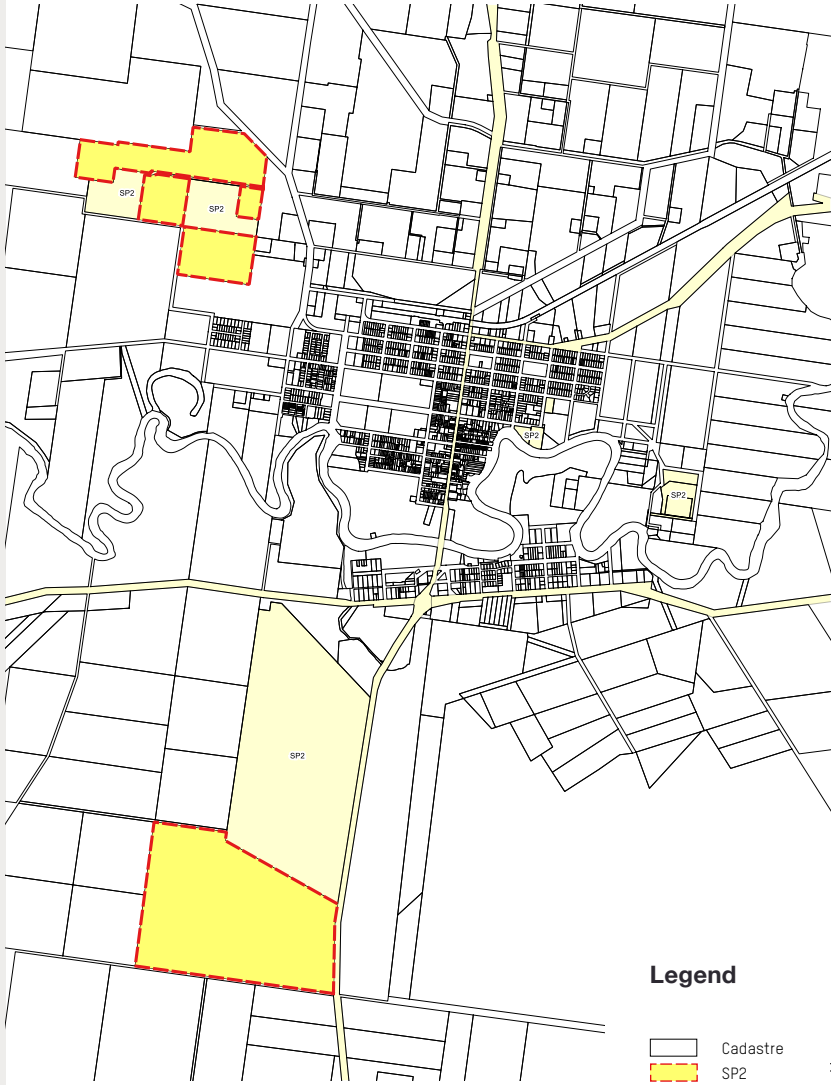


Figure 40: Proposed SP2 Special Use Zone

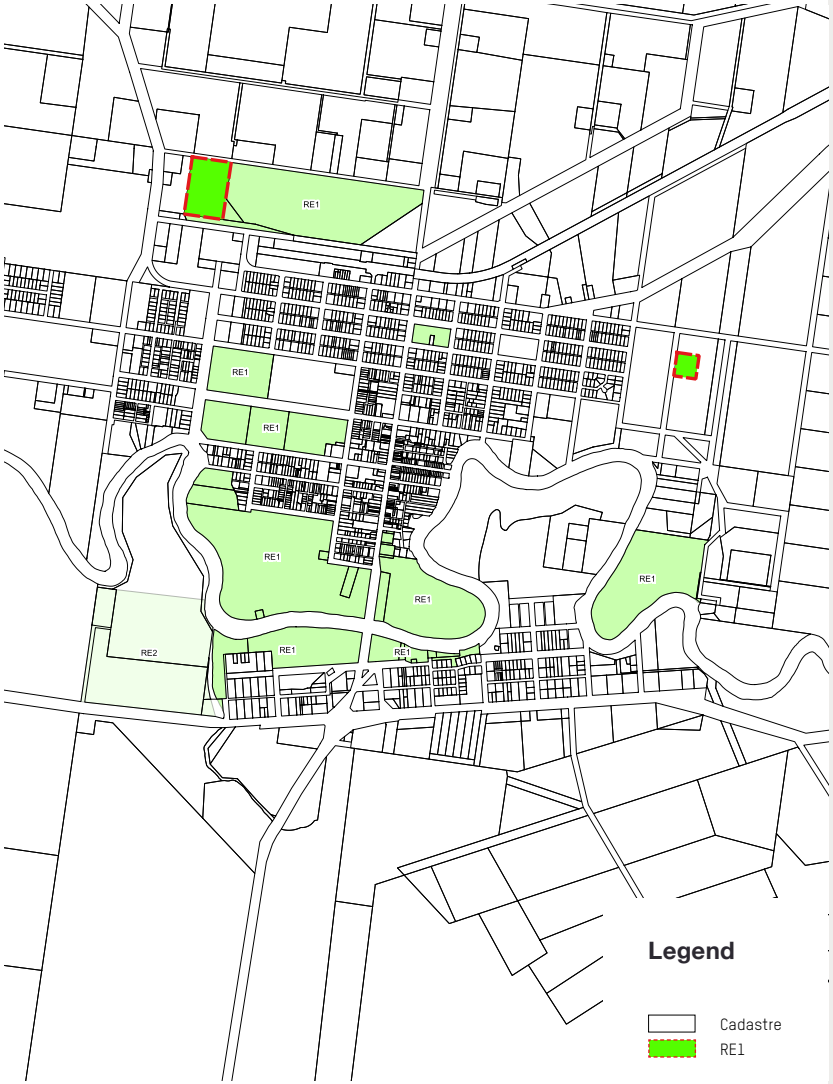


Figure 41: Proposed RE1 Public Recreation Zone

5.7 RE1 Public Recreation Zone

During the preparation of the Structure Plan, it was identified that the RE1 Public Recreation zoning that currently applies to the Hay Showground does not fully cover this land including facilities such as the Clay Target Club.

It is therefore recommended that the RE1 Public Recreation zone be extended further westwards to include the following properties:

- 73-75 Showgrounds Road (Lot 128, DP756755).
- Showgrounds Road (Lot 184, DP756755).

Consideration of the open space and recreational needs of future residents has also been considered during the preparation of this Structure Plan. Further details regarding these investigations are provided in Section 6.2.

In summary, the Structure Plan recommends that an additional open space area be established on the eastern side of town to service the future needs of residents living within this area.

As the subdivision and development outcomes of the future development of this land are currently unknown, it is not recommended that this area be formally rezoned RE1 Public Recreation in the interim.

This approach is also consistent with NSW Department of Planning, Industry and Environment advice that local level public open space areas not be provided with a designated public recreation zoning to ensure flexibility in planning requirements.

5.8 Hay Structure Plan

Residential

The proposed land zoning and minimum lot size recommendations contained within this Structure Plan and as outlined in Sections 5.1 to 5.7 are identified in Figures 42 and 43.

As a result of the land zoning and minimum lot size recommendations of the Structure Plan, the plan identifies approximately 306 additional residential lots as outlined in Table 7.

Based on a projected average take-up rate of 10 dwellings per annum, this equates to a residential land supply of approximately 31 years.

When combined with existing land supply, Hay will have a total residential land supply of approximately 73 years.

Table 7: Proposed Residential Land Supply

Zone	Area (ha)	Minimum Lot Size (ha)	Potential Lot Yield	Demand	Years Supply
R2 Low Density Residential	33	0.15	158	4	40
R5 Large Lot Residential	62	0.40	124	3	41
RU4 Primary Production Small Lots	140	2.0	24*	2.5	10
Total	**235**		**306**	**10**	**31**

***Note:** this figure excludes 20 hectares of land that has been approved for a solar farm.

Table 8: Existing and Proposed Residential Land Supply

Zone	Area (ha)	Minimum Lot Size (ha)	Potential Lot Yield	Demand	Years Supply
Existing					
R2 Low Density Residential	25	0.10	200	4	32
RU4 Primary Production Small Lots	300 500	2ha 4ha	120 100**	2	58
Proposed					
R2 Low Density Residential	33	0.15	158	2	38
R5 Large Lot Residential	62	0.40	124	2	29
RU4 Primary Production Small Lots	140	4.0	24*	2	6
Total	**1,060**		**726**	**10**	**72.6**

***Note:** this figure excludes 20 hectares of land that has been approved for a solar farm. The proposed lot yield of RU4 zoned land has also been significantly reduced from Tables 2 and 3 in recognition of a 4 hectare minimum lot size proposed for the northern portion of this area.

Table 9: Proposed Industrial Land Supply

Zone	Area (ha)	Minimum Lot Size (ha)	Potential Lot Yield	Demand	Years Supply
IN1 General Industrial (Township Industrial precinct)	60	0.5	96	2.4	40
IN1 General Industrial (South Hay Industrial Precinct)	130	1	104	2.4	43
Total	**190**		**200**	**2.4**	**83**

Table 10: Existing and Proposed Industrial Land Supply

Zone	Area (ha)	Minimum Lot Size (ha)	Potential Lot Yield	Demand	Years Supply
Existing					
IN1 General Industrial (Township Industrial precinct)	15	0.5	24	2.4	10
Proposed					
IN1 General Industrial (Township Industrial precinct)	60	0.5	96	2.4	
IN1 General Industrial (South Hay Industrial Precinct)	130	1	104	2.4	43
Total	**205**		**224**	**2.4**	**93**

Industrial

The Structure Plan identifies approximately 200 additional industrial lots as outlined in Table 9.

Based on the average take-up rate of industrial land for the last 5 years (2.4), this equates to an industrial land supply of approximately 83 years.

Combined with existing industrial land supply, this equates to a total industrial land supply of approximately 93 years.

This number will be reduced if large scale industrial operators establish within this precinct as predicted by the Renewable Energy Zone.

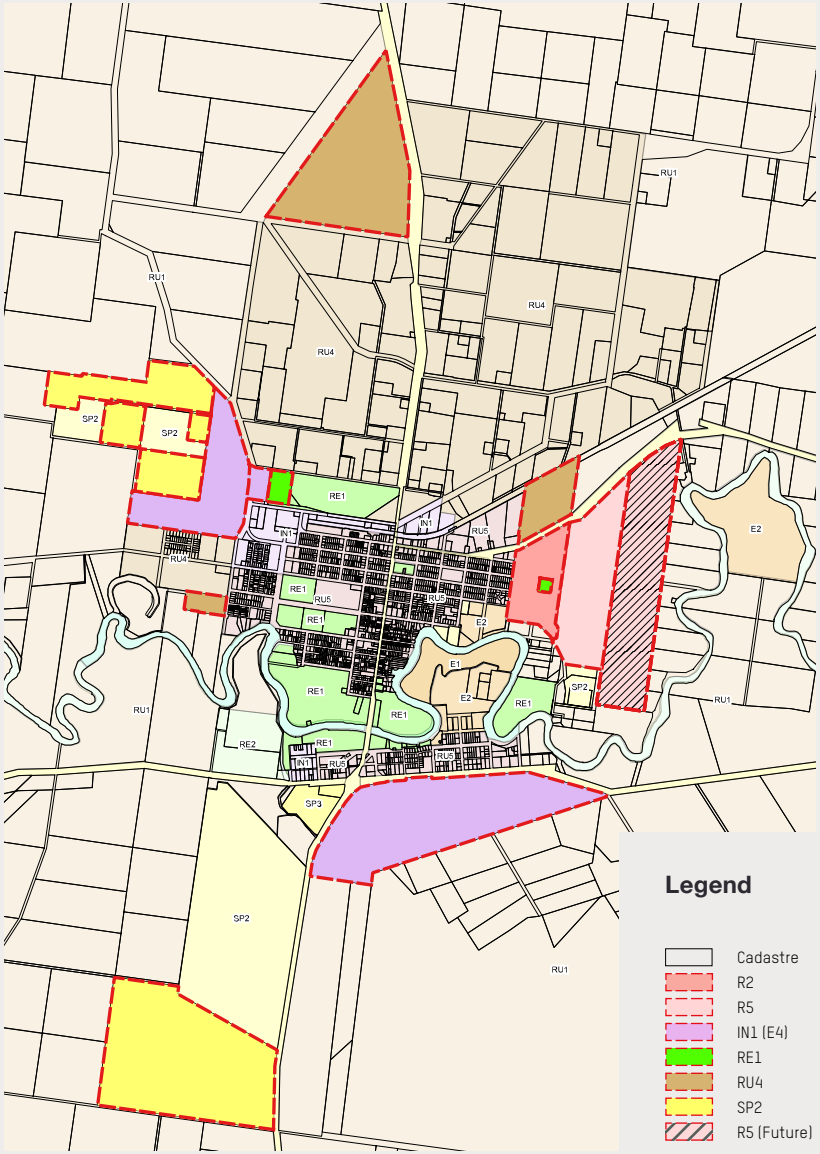


Figure 42: Proposed Minimum Lot Size Map

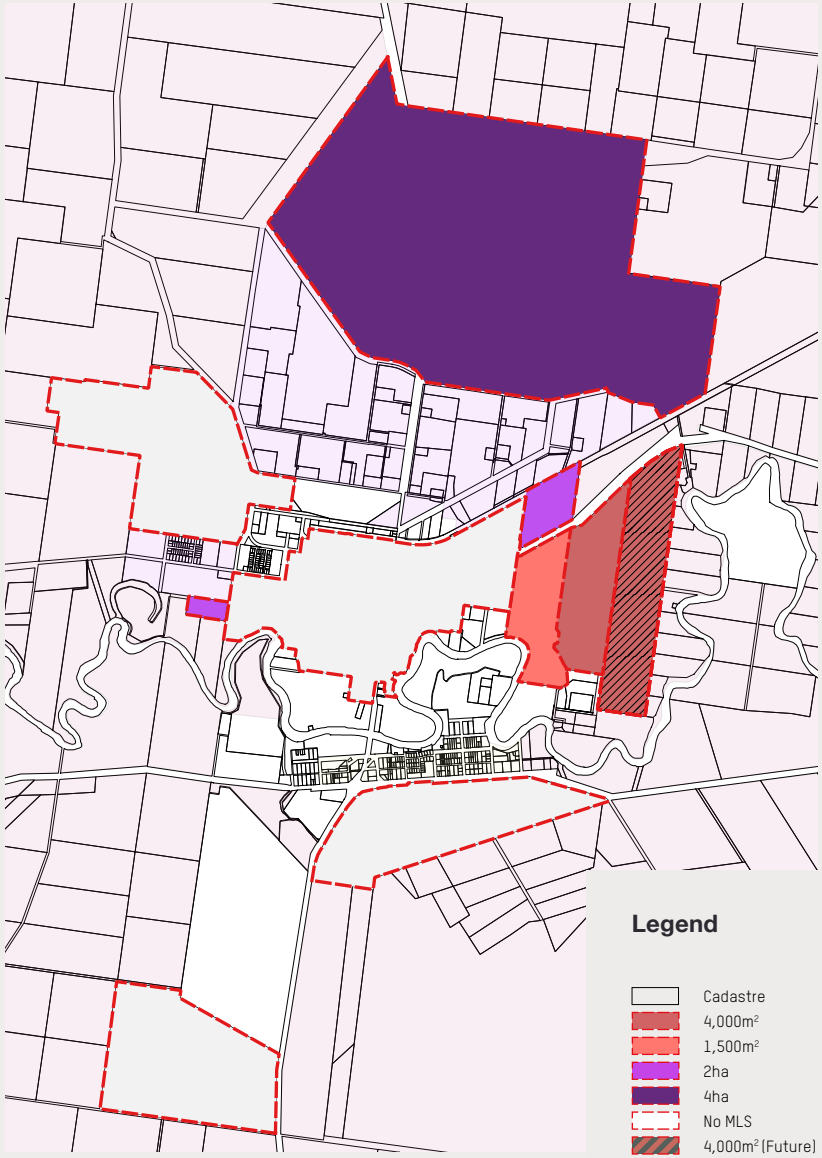


Figure 43: Proposed Land Zoning Map

5.9 Development Staging

Given the need to coordinate land development and the provision and extension of infrastructure and services, it is important that development occurs in a logical and sequential order.

Whilst this Structure Plan provides the land use zoning and minimum lot size recommendations for land within the main township of Hay for the next 30+ years, given the level of land supply proposed as part of this Structure Plan and current take-up rates, it is recommended that the rezoning and development of this land be staged.

A staging Plan has been prepared and is included in Figure 44.

The staging framework gives priority to areas that are closest to the existing urban fringe or in areas which would allow for the practical, efficient and cost effective augmentation of infrastructure, services and utilities necessary to service those areas.

The timings for the staging of works is outlined below:

- A = 0-10 years
- B = 10-20 years
- C = 20-30 years
- D = 30+ years

The staging framework is provided as a guide only. The release of new land may occur in a different manner provided adequate arrangements can be made to service the land.

Where development occurs out of sequence ('leap frogging'), this shall be suitably justified and supported by infrastructure servicing details. In addition, the costs of the development this land forward of Council's identified staging plan shall be the responsibility of the developer.

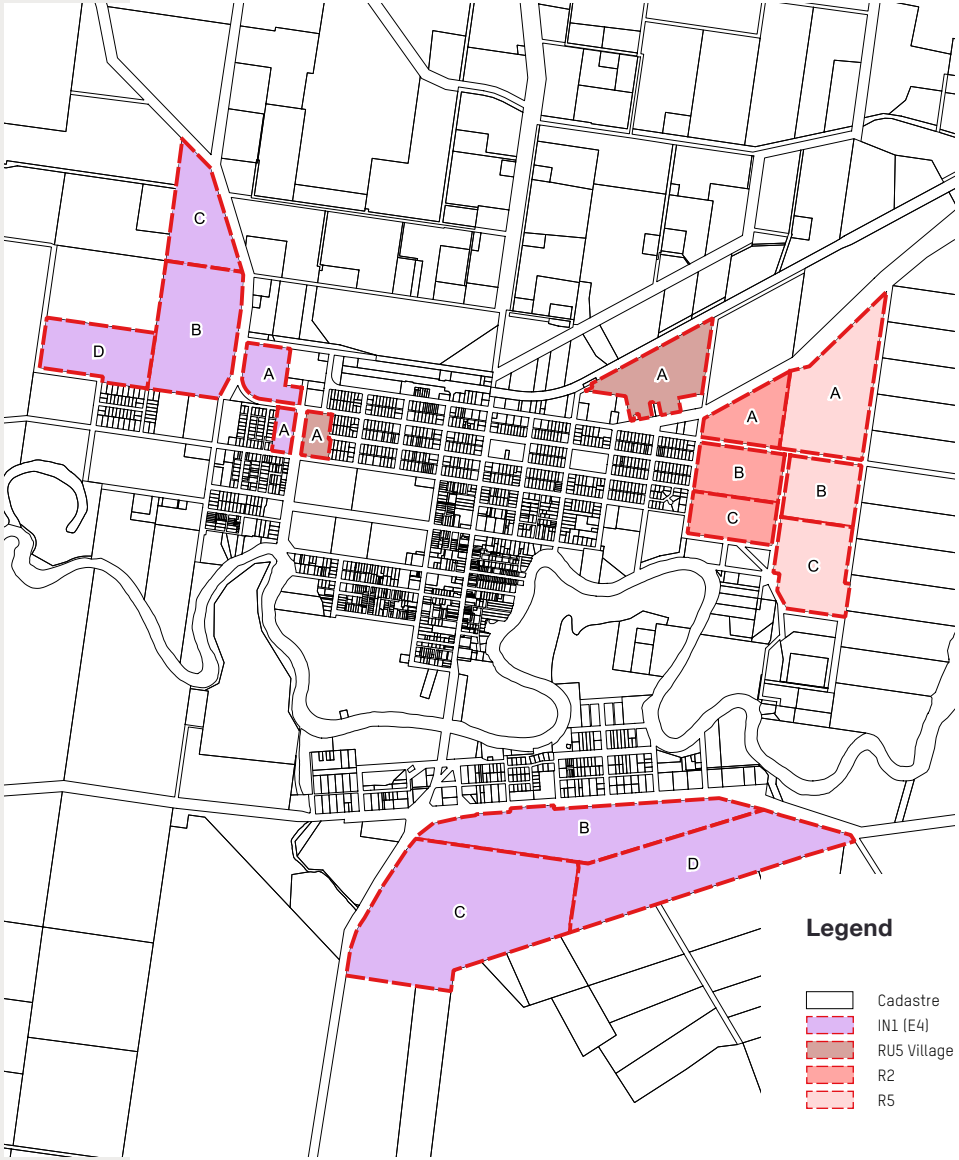


Figure 44: Staging Plan

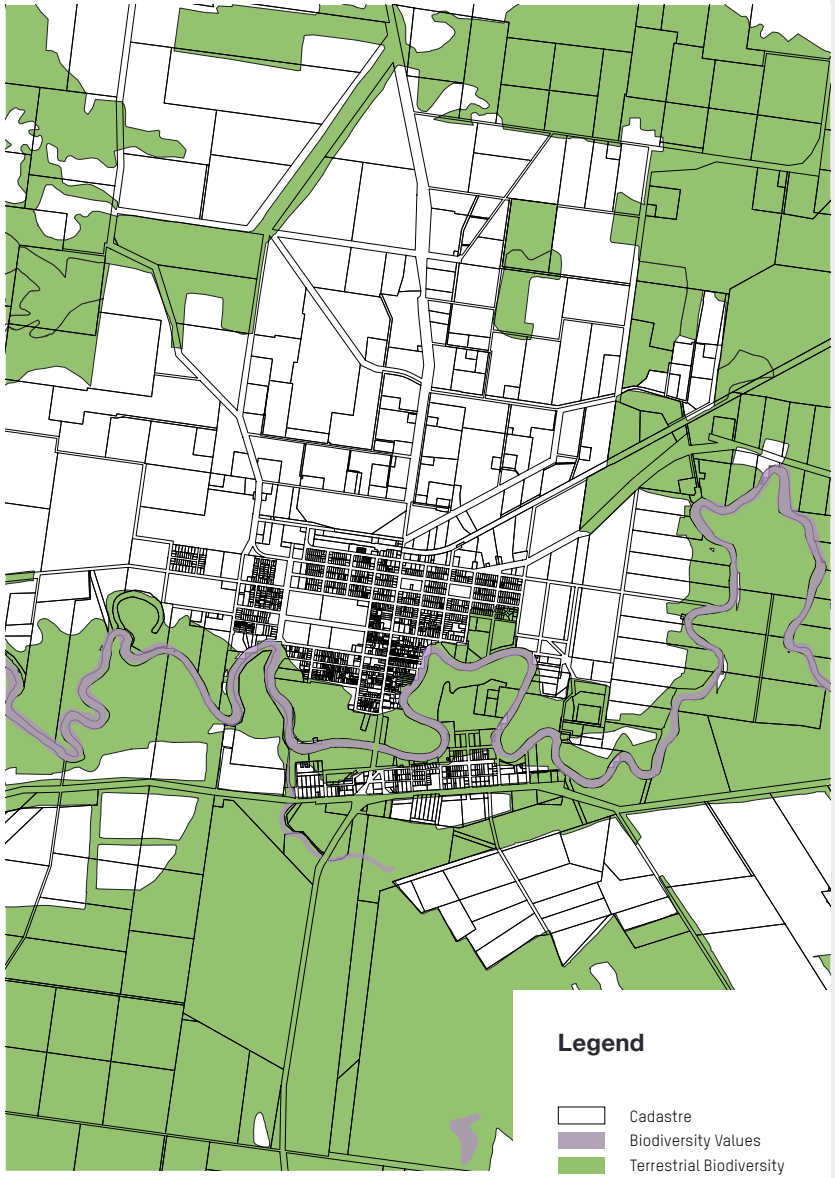


Figure 45: Amended Terrestrial Biodiversity Map

5.10 Other Land Use Planning Recommendations

In addition to the site-specific recommendations outlined above, it is also recommended that Council review a number of its existing planning controls and overlays including:

- Heritage Map.
- Terrestrial Biodiversity Map.

Further details regarding these are discussed below.

Hay Shire is fortunate enough to have a range of Aboriginal and Non-Aboriginal heritage items. These include items listed at both the local and state government level that warrant protection for the ongoing benefit of the community.

Traditionally the identification and preservation of heritage has been driven by community aspirations about preserving connections with history and ancestry.

The relatively intact collection of heritage buildings and sites around the main urban area presents an opportunity for the township with growing interest in recent years in heritage tourism. Council has already recognised the benefits of this and has established a Heritage and Arts Trail, which takes in most of the key heritage items within the township.

Consistent with the recommendations of previous strategic planning investigations undertaken for the township it is recommended that as part of the next schedule a review of the LEP, that the current heritage list be reviewed and updated where necessary. This may also include the addition of new items. This assessment should also include an update of the heritage inventory sheets for each individual item.

As outlined within Section 4.1 of this report, it is recommended that the extent of the terrestrial biodiversity map be reviewed to better reflect the biodiversity values of this land.

More specifically, the current map needs to be reviewed as it applies to land that has been developed for urban purposes and which contains no significant vegetation as identified on the State Vegetation Map (Figure 22) such as the Hay Showgrounds (Figure 45).

6. Implementation

Hay Post Office (Source: Habitat Planning)

6.1 Infrastructure and Services

The development outcomes sought by this Structure Plan will result in the need to augment and extend certain infrastructure and services.

As outlined earlier in this report, Council is currently in the process of preparing a Supplementary Paper to the Integrated Water Cycle Management Strategy (IWCMS), which will identify current and future capacity issues and upgrade requirements.

The outcomes of this Structure Plan will inform the recommendations of the IWCMS Supplementary Paper.

Table 11 summarises the relevant infrastructure upgrade requirements necessary to achieve the outcomes sought by this Structure Plan.

Infrastructure	Description
Water	The existing reticulated water supply network will need to service the future development outcomes identified by this Structure Plan as part of the existing Potable Water Supply System. Current investigations as part of the IWCMS Supplementary Paper have identified that the capacity of Council's Potable Water Supply System will be exceeded at approximately 67% of ultimate development. Any development beyond this will require an upgrade to the existing Water Supply System. Existing water mains will need to be extended as part of overall staging of development and where necessary trunk main infrastructure may need to be upgraded. In addition, Council have identified the need to construct a booster pump station within the central portions of town to address potential low water pressure issues at the fringe of the main township so as to achieve an appropriate Level of Service of 15m of head pressure. Furthermore, the IWCMS Supplementary Paper has identified a number of upgrade requirements to Council's Water Treatment Plant that will need to be incorporated into the schedule maintenance program of this facility.
Sewerage	All land proposed to be zoned RU5 Village and R2 Low Density Residential will need to be serviced with reticulated sewerage via an extension of the existing sewer network. Current investigations as part of the IWCMS Supplementary Paper have identified that the capacity of Council's Sewerage Treatment Plant will be exceeded at approximately 15% of ultimate development. Any development beyond this will require an upgrade to the existing Sewerage Treatment Plant. To help alleviate some of these capacity issues, for those properties proposed to be zoned R5 Large Lot Residential and RU4 Primary Production Small Lots, sewerage will be disposed of on-site in accordance with Council's On Site Sewer Management Plan for Septic Tank & Grey Water Effluent Policy. It is also recommended that where possible large scale industrial developments also discharge effluent on-site, unless the industrial processes generate large volumes of waste water. These systems will need to be periodically inspected to ensure they are working properly and will not result in environmental harm.

Table 11: Summary of Infrastructure and Services – Proposed Development

Infrastructure	Description
Drainage	Future development of land in the RU5 Village, R2 Low Density Residential and IN1 General Industrial zones will require the formal construction of urban stormwater drainage (pit and pipe). Development outside of these areas in the R5 Large Lot Residential and RU4 Primary Production Small Lots zones can be serviced via table drains/vegetated swales.
Gas	There are no servicing or capacity constraints associated with the provision of gas, which is reliant upon a bottle supply.
Electricity	There are no servicing or capacity issues associated with the provision of electricity.
Telecommunications	There are no servicing or capacity issues associated with the provision of telecommunications, however current mobile phone reception and internet access issues, particularly on the fringe and outskirts of town will need to be addressed.
Waste Management	There are no servicing or capacity issues associated with the provision of waste management. It is recommended however that an appropriate buffer be established between sensitive land uses such as residential or educational facilities and Council's Waste Management Centre to ensure the ongoing protection of this facility.
Roads	New residential subdivisions will be required to construct all new roadways in accordance with Council's engineering design guidelines (to be introduced via an amendment to the DCP). Furthermore, the eastern portion of Murray Street will need to be sealed as part of the future development of this land, as well as May and Albert Streets.

Hay Court House (Source: Habitat Planning)

Hay Silo Art (Source: Habitat Planning)

Infrastructure	Description
Health Care	The township is well serviced with health care facilities, however there is expected to be a greater need for additional health care facilities into the future, particularly aged care (including aged care housing). It is recommended that consultation be undertaken with relevant service providers to ensure that they can cater for the future needs of the township and the wider surrounds.
Child Care	There are no capacity issues associated with the provision of child care facilities as there is capacity within the existing facilities following previous declines in younger and school aged children.
Education	There are no capacity issues associated with the provision of education facilities as there is ample capacity within the existing facilities following previous declines in the student population.
Emergency Services	There are no servicing or capacity issues associated with the provision of emergency services, which can cater for the expectant future population and housing growth identified in this Structure Plan.

6.2 Open Space and Access Plan

The township of Hay is well serviced with a large number of passive and active public open space areas that serve the recreational needs of the community. Given the township's location alongside the Murrumbidgee River, residents and visitors alike also have access to a wide variety of natural areas and riverside reserves, which also serve the recreational needs of this community.

Combined, these public open space and natural areas have a total area of approximately 141 hectares.

Notwithstanding the above, it is still necessary to consider the open space and recreational needs of future residents as recommended by this Structure Plan. Consequently, consideration has been given to previous strategic planning work undertaken by Council including the Hay Shire Council *Open Spaces Strategy 2017 and Murrumbidgee River Master Plan 2021.*

Consideration has also been given to the NSW Government's *Draft Greener Places Design Guide*. The *Draft Greener Places Design Guide*line outlines that there are six core criteria that drive the planning of open space for recreation. These include:

- Accessibility and connectivity.
- Distribution.
- Size and shape.
- Quantity.
- Quality.
- Diversity.

Of these core criteria, the distribution of open space is one of the key principles that need to be considered when planning open space. Distribution refers to the ability of residents to gain access to public open space within an easy walk from home, workplaces, and schools, which is an important factor in the quality of life. The geographic distribution of open space is a key access and equity issue for the community, which is typically measured by walking or travel distance.

The Guidelines outline that at the local or neighbourhood-level scale, residents should have access to a public open space area within 400m/5 minutes safe walking distance as per Table 12.

The provision and size of open space areas is also critical when planning new greenfield residential areas. According to the Guideline, the public open space network will include a range of parks serving different catchment sizes – a hierarchy of service. Typically, the further up the hierarchy, the larger the park is and the more diverse the range of opportunities within that park.

A summary of the open space hierarchy contained within the Guideline is reproduced in Table 13.

Table 12: Key Performance Indicators for Open Space

Local access

2-3 minutes walk | 200m

High-density area (>60 dwellings/ha)

2-3 minutes walk / 200m walking distance to a local park (barrier free).

5 minutes walk | 400m

Medium to low density areas (<60 dwellings/ ha)

5 minutes walk / 400m walking distance to a local park (barrier fee).

District access

25 minutes walk | 2km

25 minutes walk / 2km proximity to a district park.

District parks also provide local access.

Regional access

30 minutes travel

Up to 30 minutes travel time on public transport or by vehicle to regional open space.

Regional parks also provide local and district access.

Source: Draft Greener Places Design Guide, 2021

As outlined above, the main township of Hay is well serviced with open space and recreation areas of all types outlined in Table 13. The Guideline outlines that local parks are deemed to be at capacity if the ratio of residential population to area of open space land exceeds a rate of 1,000 people/ha.

There are no capacity issues associated with existing open space facilities, however the Structure Plan has identified the need to construct a new local park (min. area 5,000m2) on the eastern side of town to service this new residential growth area (Figure 46). This will ensure that future residents living in this area will have access to open space facilities within 400 metres walking distance.

There is no need to provide for additional open space areas outside of this area given the minimum lot sizes and densities proposed by the Structure Plan and the ability to provide for individual recreational needs on-site.

Matters regarding access and connectivity have also been investigated with accessibility within the township generally good with a number of constructed on and off road shared pedestrian and bicycle paths that connect to key facilities and services. Council has prepared a number of strategic plans and policies, namely the *Hay Bike Plan 2016* and *Murrumbidgee River Master Plan 2021* that seeks to expand this footpath/bicycle network (Figure 46).

It is noted however that these plans identified that access to South Hay is restricted to a single span bridge and associated pedestrian footpath, which reduces the level of connectivity between North and South Hay. For this reason, the *Murrumbidgee River Master Plan 2021* proposes to construction of two new pedestrian bridges over the Murrumbidgee River, which will connect north and south Hay.

To ensure that the existing pedestrian and cyclist network is continued and expanded, it is recommended that Council introduce new engineering design guidelines within the DCP, outlining those circumstances where footpaths and cycle ways are required.

Table 13: Hierarchy of parkland provision

Park Type	Typical Opportunities	Example Design Solutions
Local Park	Local play and recreation opportunities	Local park of 5,000m2 with 50% road frontage and functional space for informal activities
Linear Park/ Open Space corridor	Recreation and active transport pathways, linkages to formal parks, minor recreation features such as seats, active opportunities such as fitness equipment.	Large creekside linear park with a minimum of 20m from top of bank and not steeply sloping.
District Park	Local and destination play, picnic and gathering spaces for groups, large active spaces for youth and recreation spaces.	District park of a minimum 2ha with 50% road frontage and large usable area for active recreation
District Sports Precinct	Provision of formal, developed playing areas for field and court sports and built sporting facilities.	10+ha site with multiple fields and courts and building facilities supporting formal use such as clubhouses, amenities and parking.
Regional/ Metropolitan/ Citywide Parks	Large group spaces, picnic and barbecue facilities, large destination play, key landscape features, path and trail based recreation, long stay facilities	Large destination parklands of more than 5ha focussed around a key landscape feature such as a riverside or central reserve.

Source: Draft Greener Places Design Guide, 2021

Figure 46: Open Space and Access Plan

6.3 Community and Social Services

The township of Hay is well serviced with a range of community and social facilities including schools and child care centres as outlined within Section 4.10. These facilities and services are expected to be able to accommodate future population projections for the townships, which will grow by approximately 800 persons.

Similarly, the town has access to both private and public health care facilities including the Hay Health Service located to the north east of town.

The background analysis has however identified a future demand for improved aged care health services in response to an aging population. It is therefore recommended that consultation be undertaken with this service provider to ensure that these facilities will cater for user demands in the future.

The background analysis has also identified that the majority of the housing stock (91.5%) within Hay comprises freestanding single dwellings. In addition, a review of ABS data has revealed that approximately 35% of the household types comprise singe/lone persons. This is despite the fact that the number of one bedroom dwellings only comprises 2.5% of the total housing stock.

These findings indicate that there is a disconnect between household composition (lone persons) and the availability of smaller housing types (1-2 bedrooms) within Hay. The projected ageing of the population is expected to further exacerbate this issue into the future.

To address this shortfall, the Structure Plan recommends removing the 550m2 minimum lot size that currently applies to the main urban area, so as to encourage infill and small lot housing.

It is further recommended that land be set aside/designated immediately adjacent to the Hay Health Service for the purposes of an aged care facility. This could include a standalone aged care facility with a range of housing types (independent through to high care), or alternatively could comprise the creation of small lot housing located directly opposite this facility with more traditional forms of residential development located behind (Figure 47).

Hay War Memorial High School

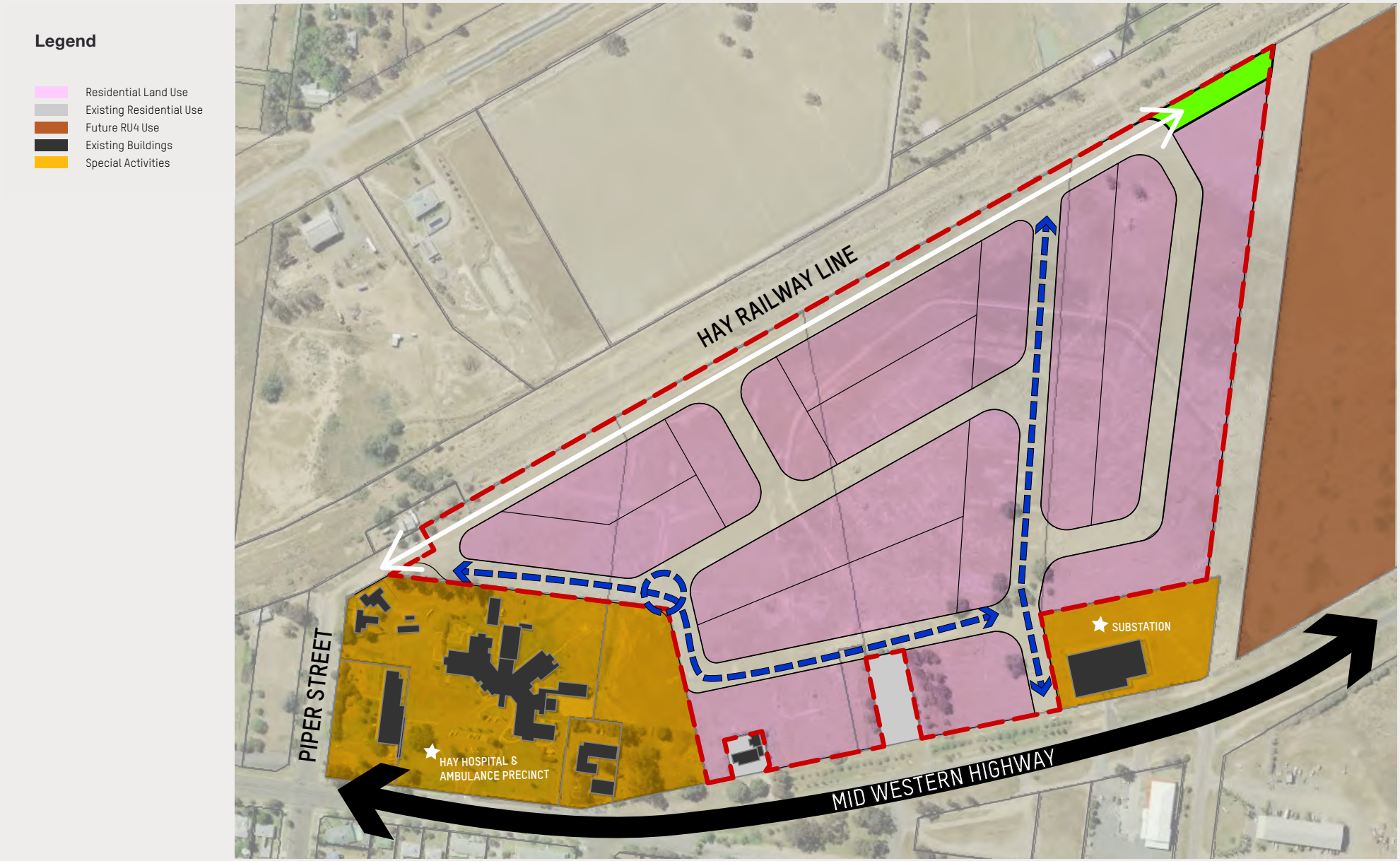


Figure 47: Community and Social Services Plan

6.4 Local Environmental Plan Amendments

As a result of the Structure Plan, it is recommended that a number of amendments be made to the *Hay Local Environmental Plan 2011* to implement the recommendations of this Plan.

A summary of these amendments is provided opposite:

Table 14: Summary of Proposed LEP Amendments

LEP Provision	Details
Land Zoning Map	Amend the land zoning and staging maps as per Figures 42 and 43 including the introduction of the following new zones: – R2 Low Density Residential Zone. – R5 Large Lot Residential Zone. – RU4 Primary Production Small Lots Zone. – RU5 Village. Note: land zoning to be staged in accordance with Figure 44 and commensurate with demand.
Minimum Lot Size Map	Amend the minimum lot size map as per Figure 43 including the introduction of the following new minimum lot sizes: – 1,500m2 (as it applies to the R2 zone). – 4,000m2 (as it applies to the R5 zone).
Terrestrial Biodiversity Map	Amend the Terrestrial Biodiversity Map as per Figure 45 to resolve current anomalies.

Hay Railway Station (Source: Habitat Planning)

6.5 Development Control Plan Amendments

It is recommended that Council prepare a new Development Control Plan (DCP). An indicative DCP structure is provided below.

- Introduction
- Residential development
- Commercial development
- Industrial development
- Rural development
- Riverfront development
- Natural hazards
- Vegetation removal
- Heritage
- Signage
- Engineering design guidelines.

Specifically, it is recommended that the DCP include residential and industrial design controls so as to achieve a high standard of visual appearance of new developments.

Particular attention should be paid to the key gateways and entrances into town and should include as a minimum; lot layout and design, open space and landscaping, building setbacks and heights, car parking and signage.

The DCP should also address matters regarding housing diversity and affordability to address current gaps in the housing market and to encourage greater supply.

In addition, the DCP should also include engineering design guidelines. These guidelines should include minimum design standards in relation to key items such as road pavement widths, kerb and guttering, provision/location of services, footpaths, street lighting and drainage.

6.6 Further Technical Investigations

The purpose of the Structure Plan is to identify largely unconstrained land that could be developed in the future, thereby avoiding the need to undertake further technical investigations. Notwithstanding, there may still be instances where further, more detailed investigations are required.

Due to the need to coordinate development and avoid issues of over-supply of zoned land, a staging plan has been prepared, which will guide future rezonings.

The Structure Plan seeks to rezone land in the interim that is unconstrained from an environmental and servicing perspective without the need for further investigation, which also aligns with the recommendations of the staging plan.

The rezoning of land outside of these areas will require the preparation of relevant technical investigations where required.

The staging plan has generally been based on three main criteria:

1

Stage 1
Housekeeping and infill development on the fringe of the main urban area that is unconstrained.

2

Stage 2
Redevelopment of agricultural land that is not subject to major environmental constraints; and

3

Stage 3
Rezoning and investigation of land that may require further assessment of bushfire, ecological, groundwater and cultural heritage matters as part of the rezoning of this land.

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