

# City of Marion Streetscapes

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## DESIGN GUIDELINES

### **City of Marion**

November 2016

DRAFT



## OXIGEN

LANDSCAPE ARCHITECTURE | URBAN DESIGN | URBAN PLANNING

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# Introduction



# Introduction

## Overview

**The City of Marion Streetscapes Design Guidelines provide direction for the development of high quality, recognisable and sustainable streets that balance the needs of people and vehicles, and contribute to the City of Marion's 'sense of place'.**

Council's vision is to improve the amenity and functionality of streetscapes within the City of Marion to contribute to neighbourhood identity, and support active communities and healthy environments.

The guidelines reinforce the vision established in Council's Streetscape Policy describing, a framework for the development of high quality streetscapes in Marion. It describes the City of Marion's physical structure, defined by rail, roads, urban form, water catchments and topography, and the importance this structure has in characterising its streets, parks and public spaces.

The guidelines then describe the desired character of streets, including the physical composition, quality and feel, and activation. The elements which comprise the public realm are described, including: street trees and planting, paving, furniture, lighting, signage, wayfinding, public art and verges.

**The design intent of the guidelines are to:**

- 1.** Reinforce a vision for streetscapes that balances the needs of pedestrians, cyclists and the environment, and the functional requirements of vehicles.
- 2.** Develop standards for streetscape environments that reinforce the unique character and 'sense of place' of the City of Marion.
- 3.** Develop a consistent language of streetscapes within the City of Marion.
- 4.** Provide a consistent and recognisable aesthetic that is high quality, robust, and easy and economic to maintain.

**The guidelines are multifaceted and are intended to be used by Council as both a functional 'reference manual' that provides a palette to develop and maintain great streetscapes and as a strategic tool to guide works programs and allocate capital works funding.**



## Objectives

**Key objectives of the City of Marion Streetscapes Design Guidelines are to:**

- 1. Provide a consistent framework for development and management of streetscapes within the City of Marion's Streetscape Policy.*
- 2. Develop a framework that enables the implementation of streetscapes in the City of Marion that are consistent, robust, easy to maintain, and provide strategic visual impact.*
- 3. Deliver an improved public realm that demonstrates best practice by focusing on the needs of pedestrians and the community.*
- 4. Identify key enablers for implementation.*



# Introduction

## Framework

**The City of Marion Streetscapes Design Guidelines are organised into seven sections as described below.**

**Part A - Defining the Character of Marion** describes and analyses the physical form of the City of Marion, in particular its historic and cultural context, and the urban structure and landscape that makes it unique and recognisable: waterways, rail and tram corridors, roads, and topography.

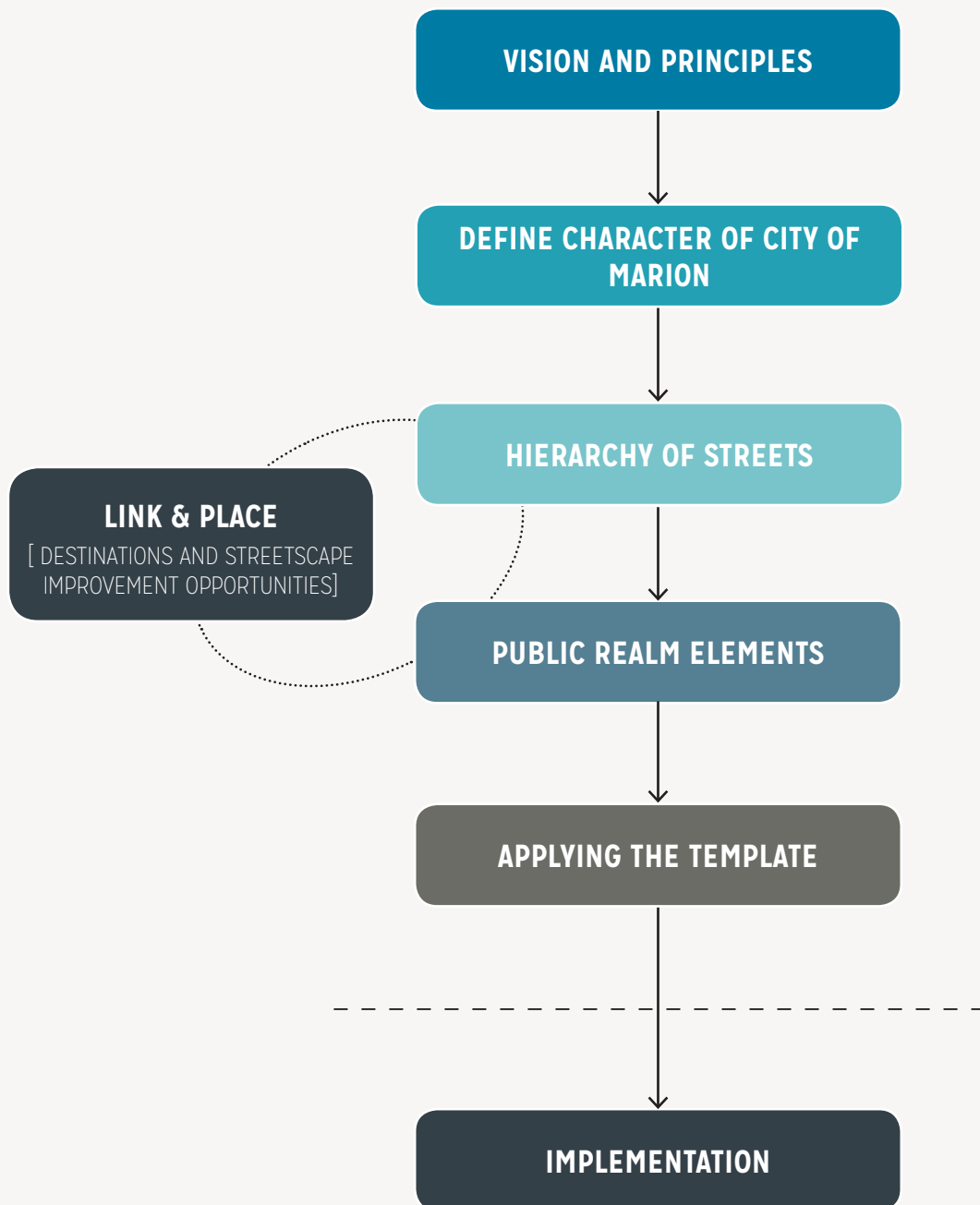
**Part B - Vision & Principles For a Preferred Future** reinforces a vision and principles (aligned with the City of Marion 'Community Vision' and Streetscape Policy) to guide the desired character of streetscape development in Marion.

**Part C - Hierarchy of Streets** describes the existing hierarchy of streets (movement and character) and illustrates, using text and diagrams, a preferred character for streets in the City of Marion.

**Part D - Public Realm elements** that describe a palette ('design guide') of appropriate public realm materials and elements for each street classification, reinforcing the positive qualities and character of the City of Marion. The 'design guide' includes the elements that comprise streetscapes: footpaths, street trees, lighting, furniture, public art, signage and wayfinding, and verges (street gardens and water sensitive urban design)

**Part E - Applying the template** illustrates how the elements that comprise a street can be applied to the hierarchy of streets.

**Part F - Implementation** provides a high level overview of key enablers for delivering improved streetscapes in the City of Marion.





# Introduction

## The importance of attractive streets

Attractive streets foster vibrant communities, contribute to robust economies and healthy environments, and reinforce walking and cycling and social activity. Well designed and used streets are important in defining 'Sense of Place' and local character.


The design of streets is often centred on vehicle transport, comprising multiple lanes of through traffic, with secondary allowance for pedestrian footpaths and bicycle corridors, and places to meet and occupy for pedestrians.

The City of Marion's approach to streetscape design focuses on a balanced view embracing people, environment and place. We no longer consider vehicle movement as the only function of streets and understand their multitude of functions, providing civic and community destinations, facilitating activity, enhancing local walking and cycling movement, and contributing to the local environment.

## Future streetscape opportunities

### Streetscape opportunities include:

- 1. Identifying street tree renewal priorities.** Replacing declining or under performing street trees with medium-large shade trees enhances amenity and the pedestrian environment.
- 2. Utilising water sensitive urban design (WSUD) techniques.** Installing rain gardens and bioretention tree pits reduces flood risk, improves water quality and enhances streetscape amenity.
- 3. Supporting streets as destinations.** Providing amenity, shade, visual appeal and places for social interaction as key ingredients of active streets.
- 4. Shifting the focus towards walking and cycling.** Promoting wide footpaths and enhancing amenity contribute towards improving the streetscape environment.
- 5. Organising service infrastructure.** Consolidating and under-grounding service infrastructure maximises space for street trees.
- 6. Integrating the built form edge.** Promoting active frontages and outdoor activation, minimising driveways and prioritising walking and cycling enhances the quality and feel of streets.
- 7. Valuing Karna culture.** Exploring opportunities for expression of a rich culture past and present.
- 8. Valuing all spaces.** Utilising verges and medians as valuable spaces that provide opportunities for food production, WSUD, habitat creation and community space.
- 9. Prioritising maintenance and whole of life costs.** Ensuring long term sustainability and asset management by contributing to a longer lasting and more robust public realm.
- 10. Establishing 'pocket parks'.** Exploring opportunities for streets to contribute toward community open space through the integration of wider-verges, and providing places for rest and social interaction.
- 11. Reducing effects of urban heat island.** Integrating Green Infrastructure



***Think of a city and what comes to mind? Its streets. If a city's streets look interesting, the city looks interesting; if they look dull, the city looks dull.***

**Jane Jacobs, *The Death and Life of Great American Cities***







# Part A

## **Character of Marion**



# City of Marion

## Marion's cultural heritage

**The City of Marion has a rich indigenous and later settlement and development history. The land on which Marion is located has been, throughout time, inhabited by the Kaurna people of the Adelaide Plains who call it 'Warriparinga', a windy place by the creek. Warriparinga is a special ceremonial place of significance to Aboriginal people, and has particular significance for the Kaurna people as it forms part of the Tjilbruke Dreaming.**

Colonial settlement in the 1830's established 'The Marion Village', surveyed by Colonel William Light's company, Light, Finniss & Co. Early Industries included farming, vineyards, almond orchards and market gardens, which earned Marion the title 'The Garden of Adelaide'.

After the Second World War, Marion experienced a period of significant growth, largely driven by the development of low-cost housing, and the local manufacturing and industry sector.

The City of Marion continued to grow in the 1960's and 70's with the development of the suburbs of Hallett Cove, Trott Park and Sheidow Park forming the southern extent of the Council area.

### CITY OF MARION CULTURAL HERITAGE



PHOTOS COURTESY OF THE STATE LIBRARY OF SOUTH AUSTRALIA

# HISTORY





# City of Marion

## The city now

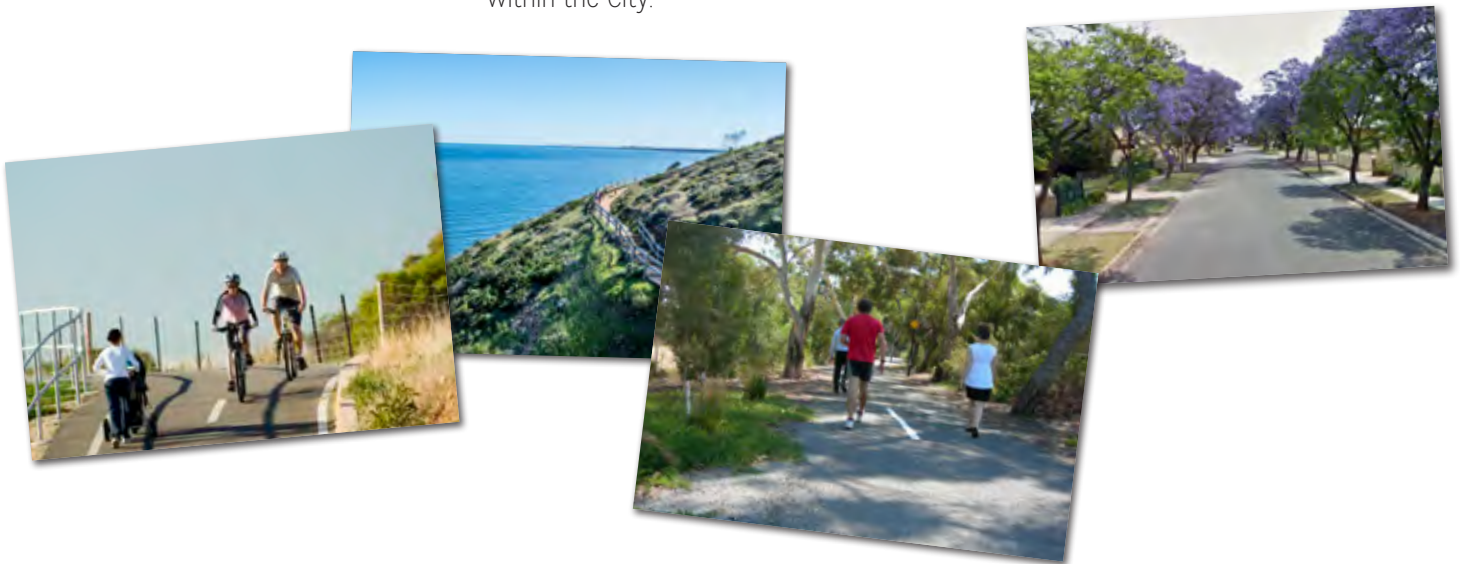
**The City of Marion's location in Adelaide's southern suburbs, stretches from the Glenelg to Adelaide tramline in the north to Field River in the south. The City is bounded by the City of West Torrens to the north, the Cities of Unley and Mitcham to the east, the City of Onkaparinga to the south, and Gulf St Vincent and the City of Holdfast Bay to the west.**

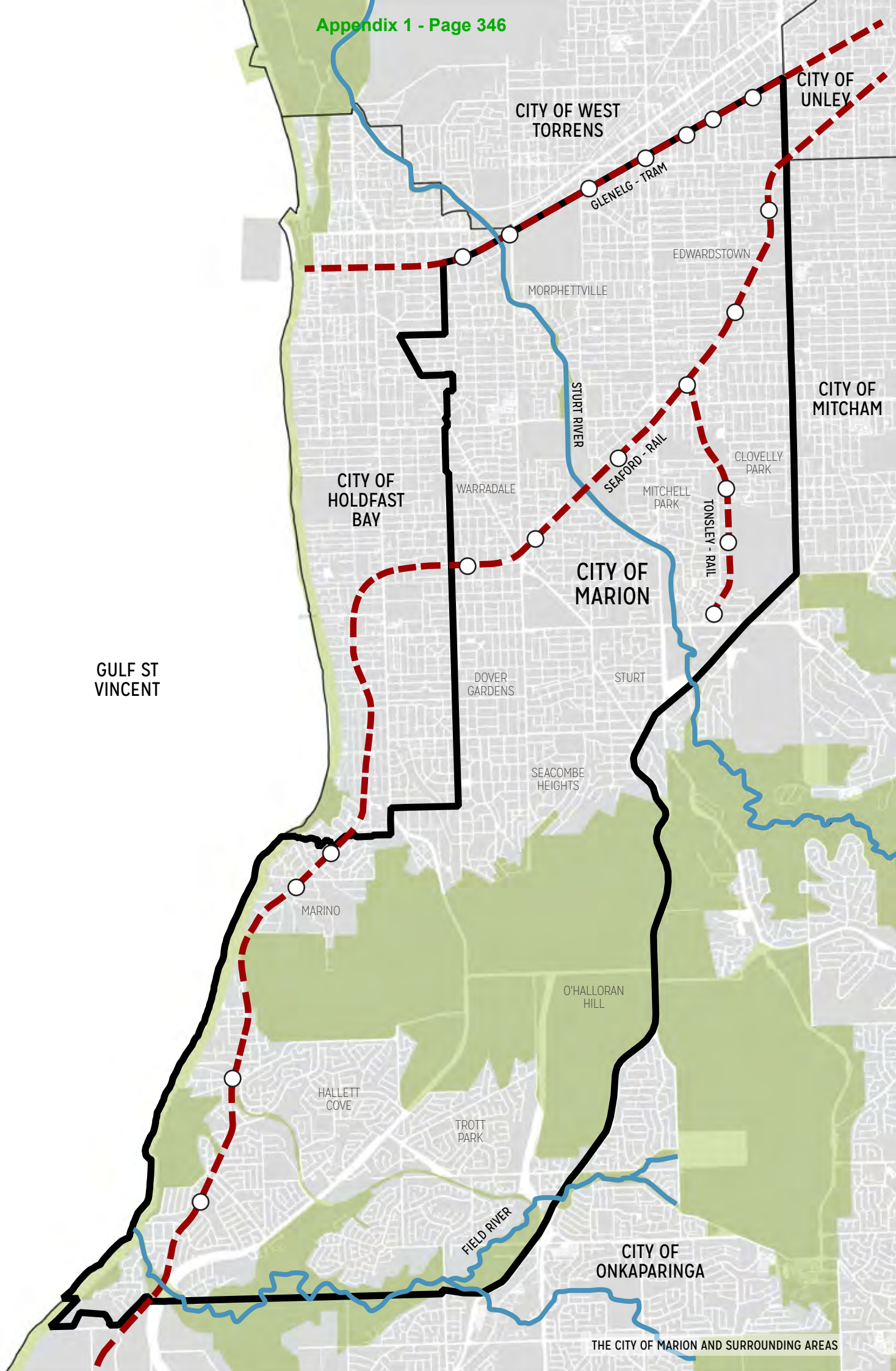
The City of Marion is predominantly residential in land use, with significant other commercial, industrial and open space uses distributed throughout the City area.

The Sturt River traverses the northern part of the City and the Field River meanders along the southern boundary. The Noarlunga rail line, Tonsley line and Adelaide to Glenelg tramline pass through the Local Government Area. The southern part of the City adjoins the coastline and includes part of the Hills Face Zone. The O'Halloran Hill Recreation Park, Marino and Hallett Cove Conservation Parks are also within the City.

Following the Second World War, the City of Marion experienced significant growth of low-density development structured on car-based transport. Most 'greenfield' land in the city have now been developed. Future growth is focused on infill,

The City of Marion comprises the suburbs of Ascot Park, Bedford Park (part), Clovelly Park, Darlington (part), Dover Gardens, Edwardstown, Glandore (part), Glengowrie, Hallett Cove, Marino, Marion, Mitchell Park, Morphettville, O'Halloran Hill (part), Oaklands Park, Park Holme, Plympton Park, Seacliff Park (part), Seacombe Gardens, Seacombe Heights, Seaview Downs, Sheidow Park, South Plympton, Sturt, Trott Park and Warradale.







# Urban structure

The urban structure of the City Marion is formed by the Sturt River, rail and tram corridors, major roads, and the distinct topography of the area. This urban structure defines the character and identity of the City Marion and contributes to the network of movement, open space and streetscapes.

## Waterways



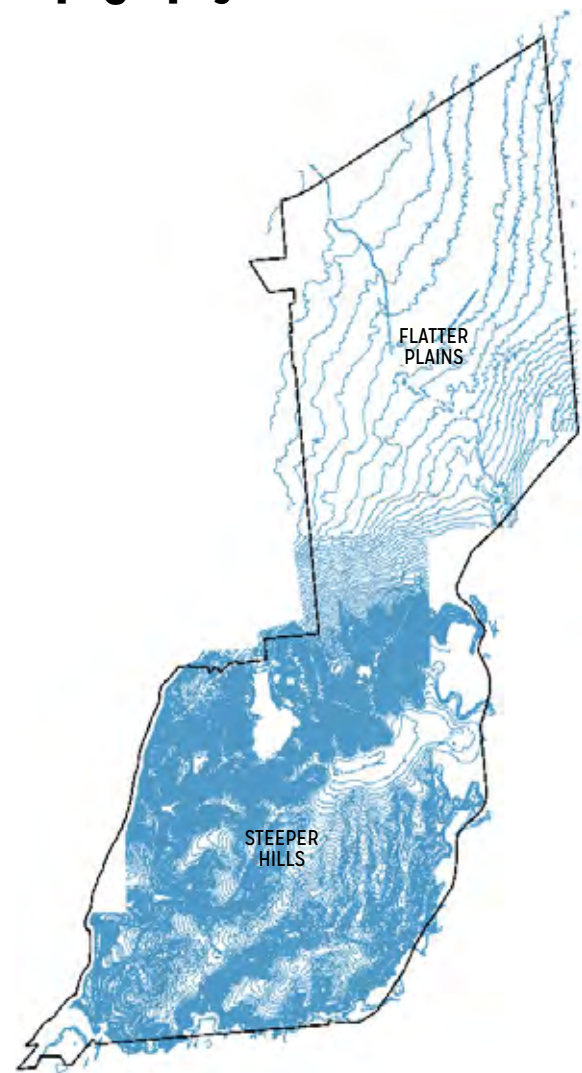
## Rail & Tram



## Roads



## Topography

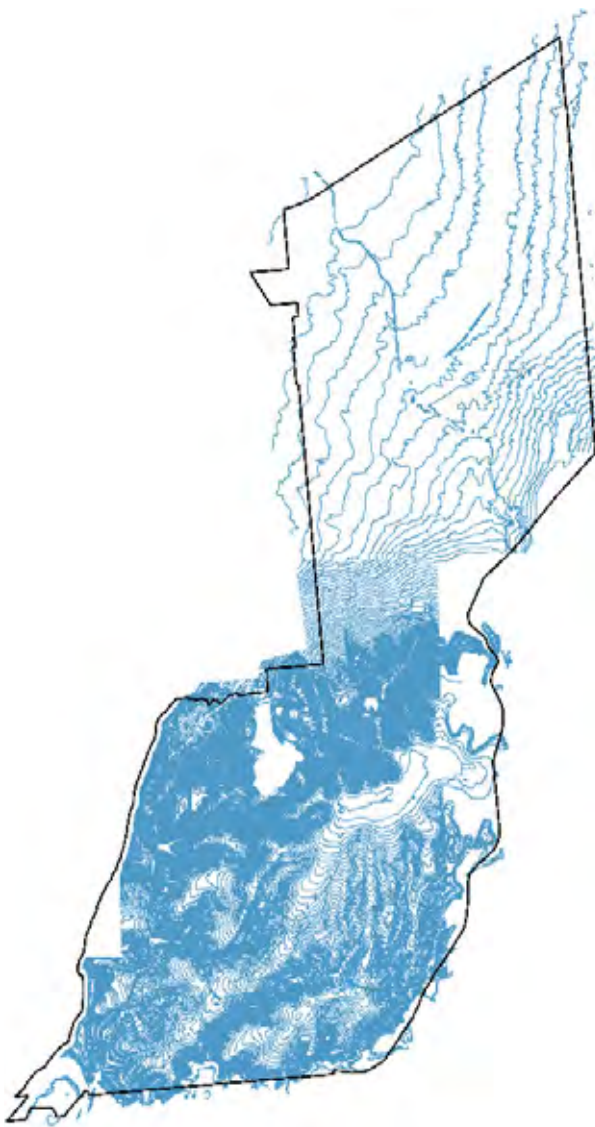




# North & South

The City of Marion's geographical area has two distinct characters (north and south) as a result of varied topography and form of development. The northern suburbs were primarily developed prior to World War 2 and follow a grid plan. The southern suburbs, such as Sheidow Park and Trott Park, have been largely developed in the last 20 years on hillier topography with a more 'organic' urban layout. These two areas are separated by the O'Halloran Hill Recreation Park, Marion Conservation Parks and Glenthorne Farm.

Approximately three-quarters of City of Marion's population lives in the northern sector.



## North

- Older suburbs
- Grid-pattern
- Flatter topography
- Set-back from coast
- Some mixed use development
- Less open space and reserves
- Few large street trees, some in reserves
- Integration of industry (South Road)

## South

- Newer suburbs
- Curved layout with cul-de-sacs
- Hillier topography
- Adjacent to coast
- Views to coast
- Nearly all residential land use
- More open space reserves
- Few large street trees, some large copses in reserves
- Views

# CHARACTER



TYPICAL STRUCTURE OF STREETS IN NORTH MARION



TYPICAL STREETScape CHARACTER OF STREETS IN NORTH MARION



TYPICAL STRUCTURE OF STREETS IN SOUTH MARION



TYPICAL STREETScape CHARACTER OF STREETS IN SOUTH MARION





# Destinations

## Destinations

**Key destinations within the City of Marion include:**

- 1 Castle Plaza Shopping Centre
- 2 Marion Aquatic Centre and Marion Culture Centre (MCC);
- 3 Westfield Marion and Civic Centre;
- 4 Warriparinga Living Kaurna Cultural Centre and Wetland. Marion Holiday Park;

- 5 Tonsley Park Redevelopment;

- 6 Hallett Cove Shopping Centre and Civic Centre;

● Neighbourhood destinations;

● Local centres;

A Adelaide CBD

B Flinders University and Flinders Medical Centre;

C Glenelg Beach + Jetty Road Shopping Precinct;

D Brighton Beach and Jetty;

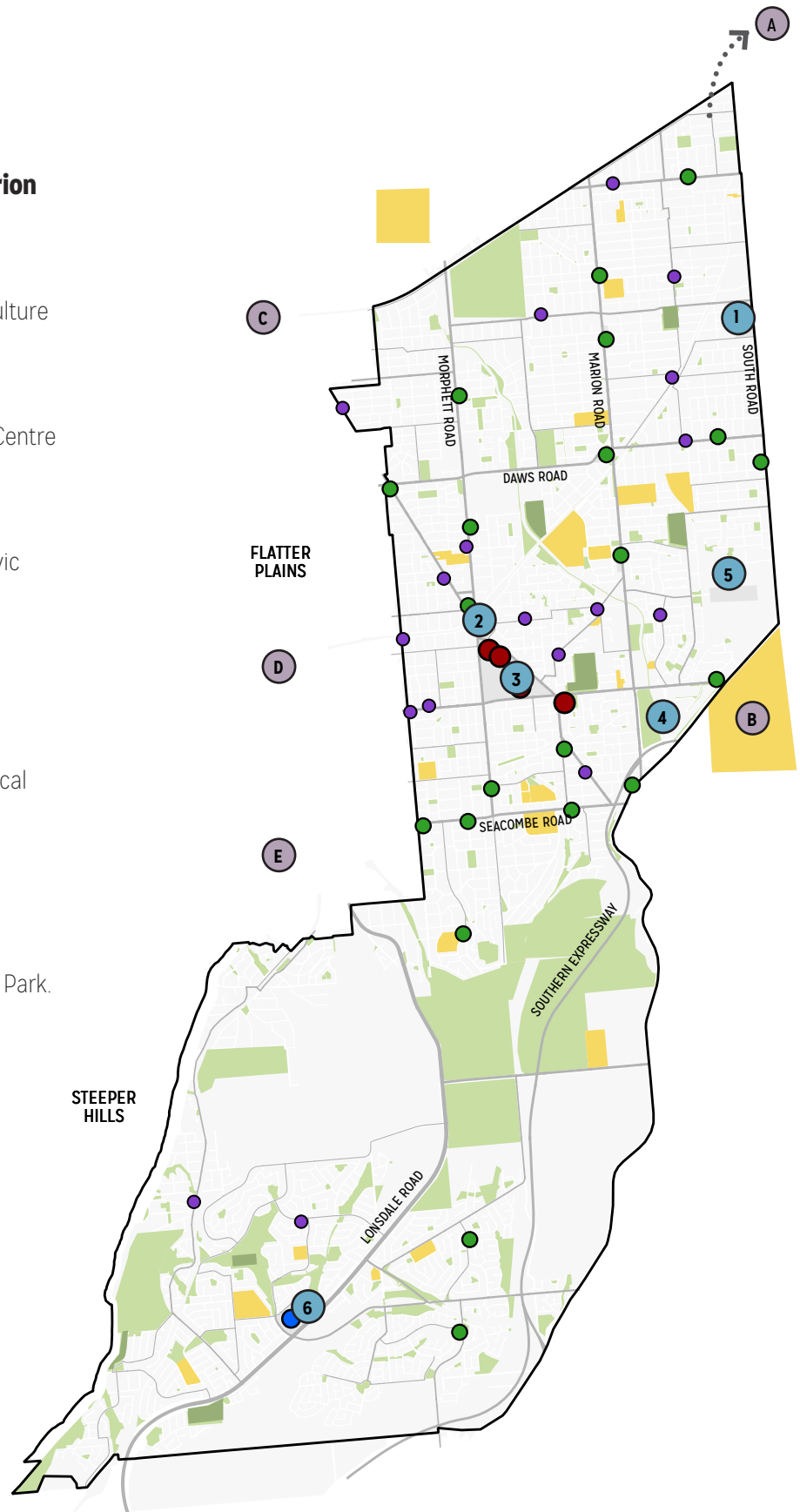
E Seacliff Beach and Brighton Caravan Park.

■ Major centres;

■ Schools and child care facilities;

■ Key reserves / open spaces;

■ Key sport and recreation; and





# Major routes

## Vehicle and public transport

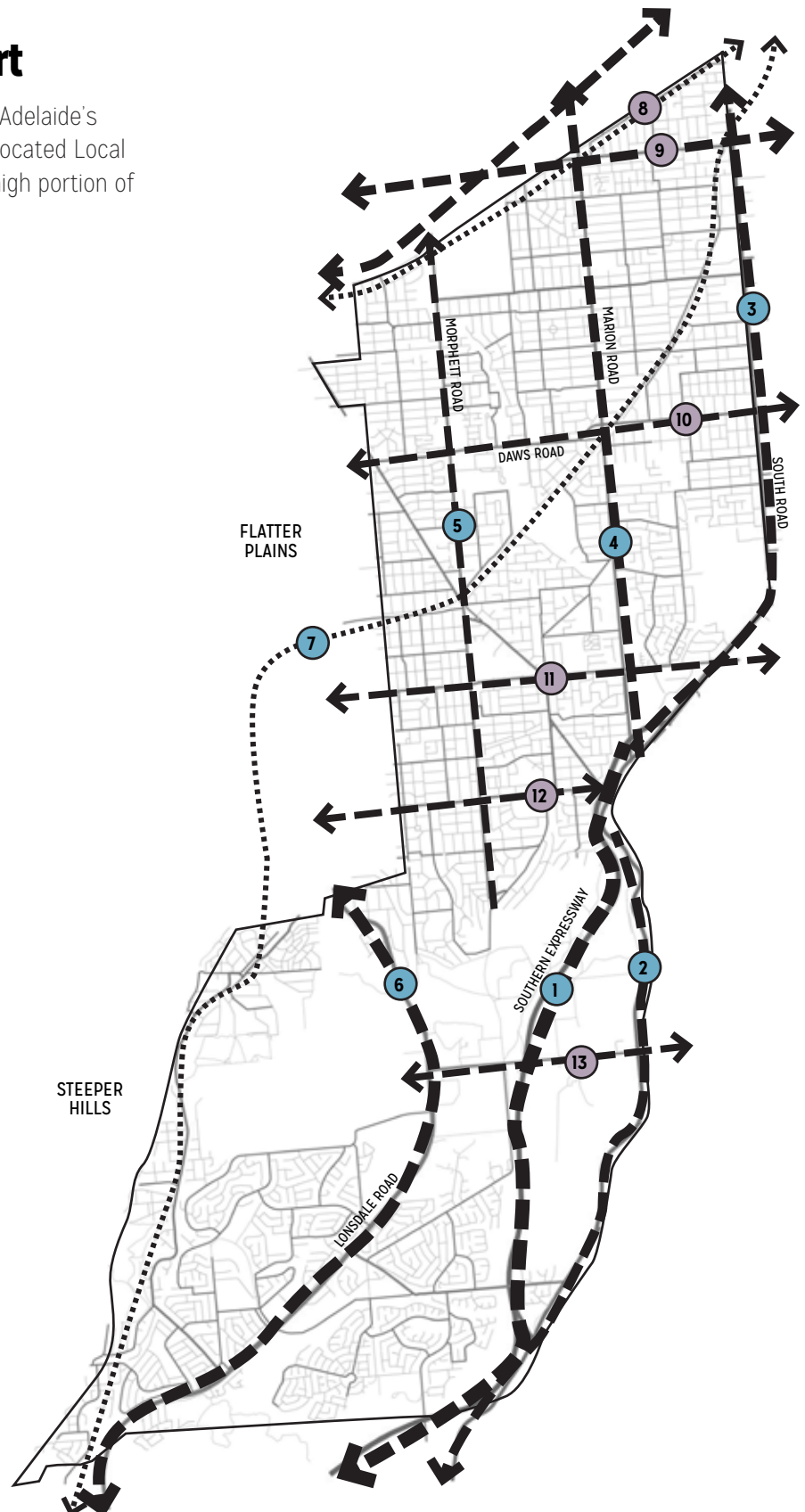
The City of Marion is located in the middle of Adelaide's southern suburbs. Like many other centrally located Local Government Areas, the City of Marion has a high portion of through traffic.

### Key north/south routes include:

- ① Southern Expressway;
- ② Main South Road;
- ③ South Road;
- ④ Marion Road;
- ⑤ Morphett Road;
- ⑥ Ocean Boulevard / Lonsdale Road; and
- ⑦ Seaford Rail line.

### Key east/west routes include:

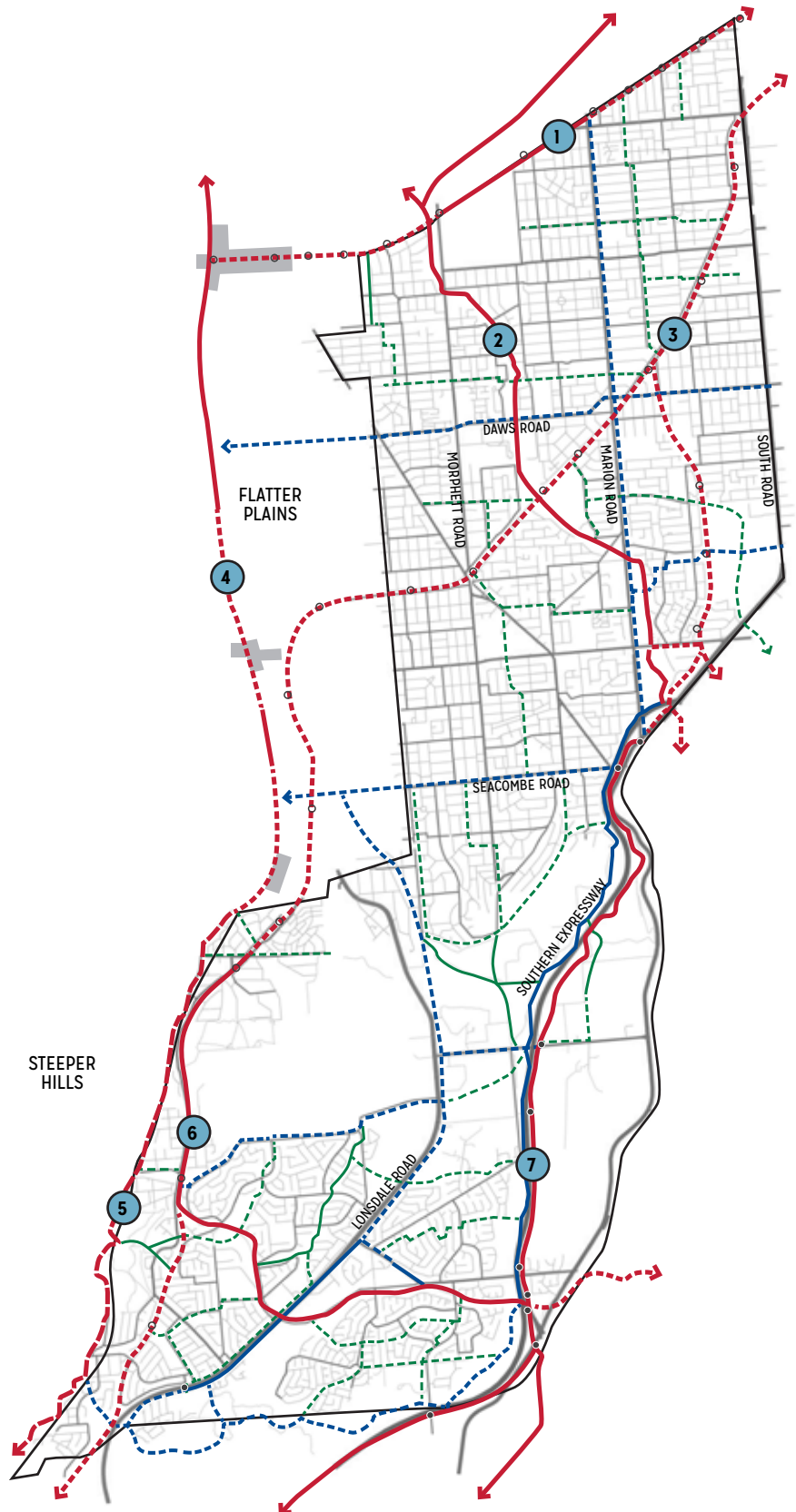
- ⑧ Adelaide to Glenelg Tramway;
- ⑨ Cross Road
- ⑩ Oaklands + Daws Roads;
- ⑪ Sturt Road; and
- ⑫ Seacombe Road.



## Walking and cycling

### Key routes include:

- ① Mike Turtur bikeway;
  - ② Sturt River Linear Trail;
  - ③ Adelaide - Marino Rocks;
  - ④ Coast Park;
  - ⑤ Marion Coastal Walk;
  - ⑥ Coast to Vines; and
  - ⑦ Patrick Jonka Veloway.
- Greenways (existing)
  - - Greenways (proposed)
  - Regional (existing)
  - - Regional (proposed)
  - Local (existing)
  - - Local (proposed)
  - Bike lane/shoulder (bikedirect)
  - Train / Tram stop (existing)
  - Veloway access point (existing)



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# Roads

## City of Marion road hierarchy

### Key routes include:

#### Arterial

Arterial roads provide important regional transport corridors that carry through traffic as well as distribute traffic locally.

#### Sub-arterial

Sub-arterial roads connect arterial roads to areas of development, and carry traffic directly from one local area to another.

#### Distributor

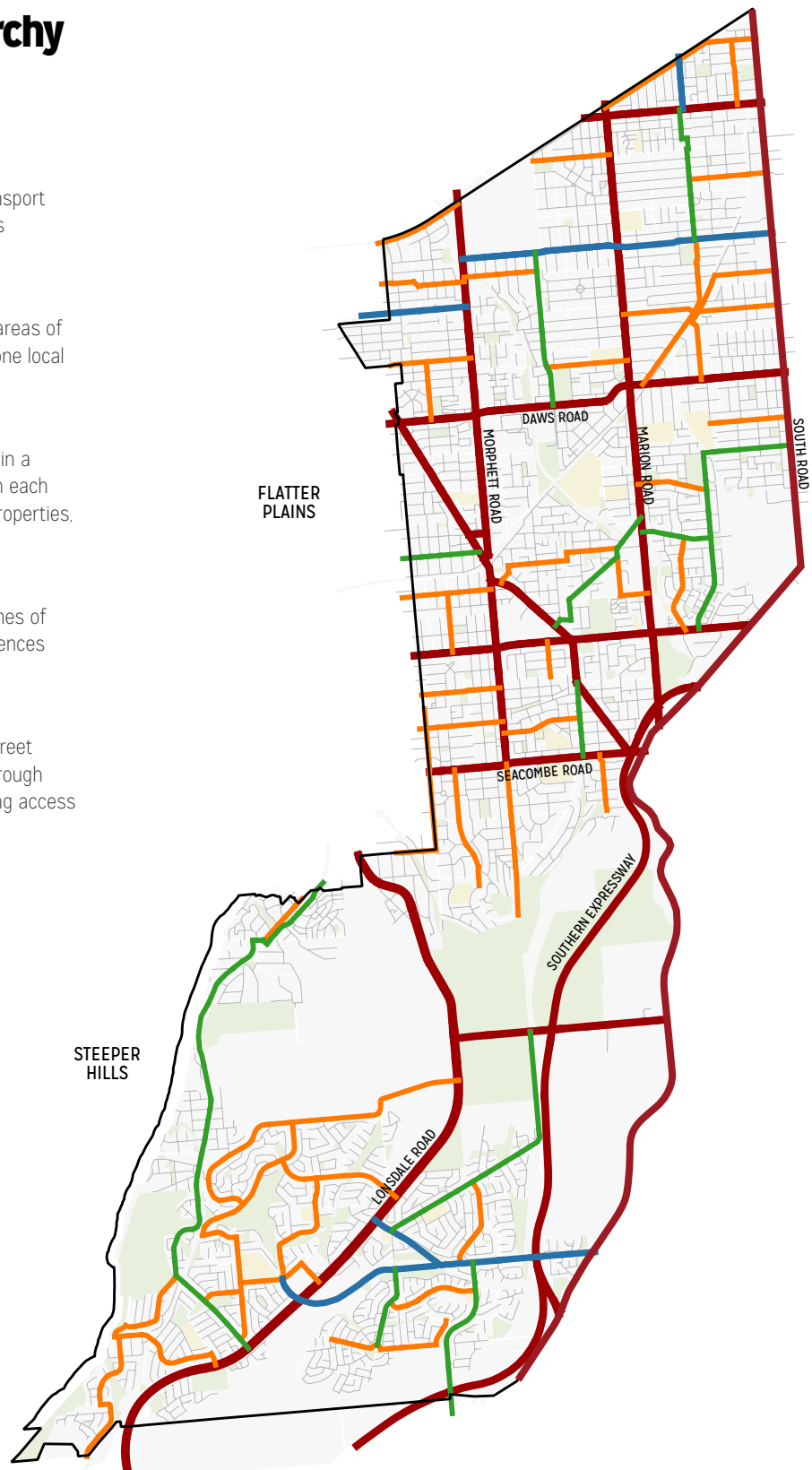
Distributor roads disperse traffic into or within a local area. These roads consist of one lane in each direction and provide access to residential properties, local centres, schools and open space.

#### Collector

Collector roads cater for low-moderate volumes of local traffic providing access to private residences and local centres.

#### Local

Local roads are largely the neighbourhood street system. These roads are relatively free of through traffic and mostly handle local traffic providing access to residential allotments.



## Road ownership

### Road ownership includes:

- State Government;
- City of Marion;









Part B

# **Vision & Principles**



# Vision & Principles

## Vision

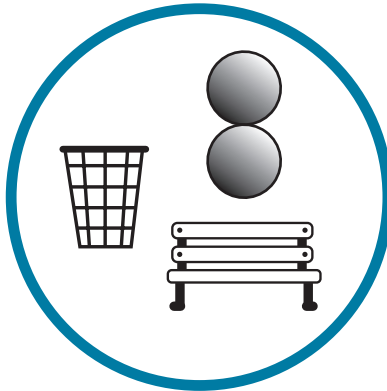
*To improve the amenity and functionality of streetscapes within the City of Marion to contribute to neighbourhood identity, and support active communities and healthy environments.*

## Principles



### Functional & Balanced

A strategic approach will define the street network through balancing the multiple roles of streets as safe thoroughfares for movement of pedestrians, cyclists and vehicles, and as destinations for people in addition to stormwater drainage requirements.



### Amenity

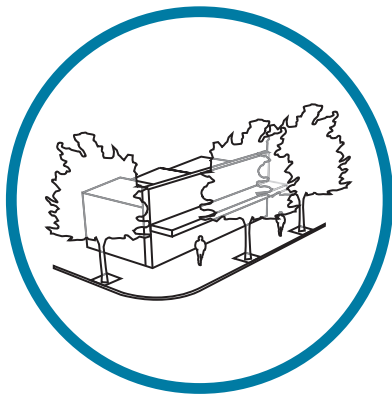
Streetscape design will be attractive, enable accessibility, and be of high amenity value in key locations so they are places where people of all ages, cultures and abilities want to spend time at different times of the day and year.



### Sustainability

Landscaping will be environmentally sustainable incorporating the use of water sensitive urban design and the use of indigenous plantings where possible to support the role of streets as connectors, enhance habitat corridors, cool the urban environment, and enhance road safety. Locally sourced materials will be used where possible.

## VISION &amp; PRINCIPLES

**Urban Environment**

Streetscapes will be enhanced by visual connections with their surrounding environments creating a strong sense of place.

**Attractiveness & Comfort**

Residential, commercial, business and education precincts will be enhanced by streetscapes that contribute to the attractiveness and identity of these areas and provide comfort to human senses.

**Management & Maintenance**

The level of service for streetscapes will be maintained by the timely application of proactive maintenance and auditing programs. Material selection and whole of life costs will be considered to ensure financially sustainable solutions are adopted.

REFERENCED FROM MARION STREETSCAPE POLICY - JUNE 2016





Part C

# Hierarchy of Streets

ARTERIAL

SUB-ARTERIAL

DISTRIBUTOR

COLLECTOR

LOCAL



# Arterial

## Overview

**Arterial roads provide important regional transport corridors that carry through traffic as well as distribute traffic locally. Arterial roads carry high volumes of traffic as well as cyclists and pedestrians. Arterial roads:**

- › Carry through traffic that is then distributed to secondary roads and local streets.
- › Carry high volumes of traffic at higher speeds.
- › Usually have wider traffic lanes to accommodate buses and heavy vehicles.
- › Often provide the route for high voltage power and other service infrastructure.

## Existing character

**Arterial roads within the City of Marion carry considerable amounts of traffic servicing regional and local centres as well as through-traffic. These roads are an important component of the metropolitan road network as well as playing an important role in the identity of and place recognition of the city.**



SOUTH ROAD - EDWARDSTOWN



LONSDALE ROAD - HALLETT COVE



DAWS ROAD - MARION



SOUTHERN EXPRESSWAY - STURT

## HIERARCHY OF STREETS

**Key arterial roads include:**

- ① Cross Road;
- ② South / Main South Road;
- ③ Marion Road;
- ④ Morphett Road;
- ⑤ Daws / Oaklands Road;
- ⑥ Diagonal Road;
- ⑦ Sturt Road;
- ⑧ Seacombe Road;
- ⑨ Lonsdale Road / Ocean Boulevard;
- ⑩ Majors Road; and
- ⑪ Southern Expressway

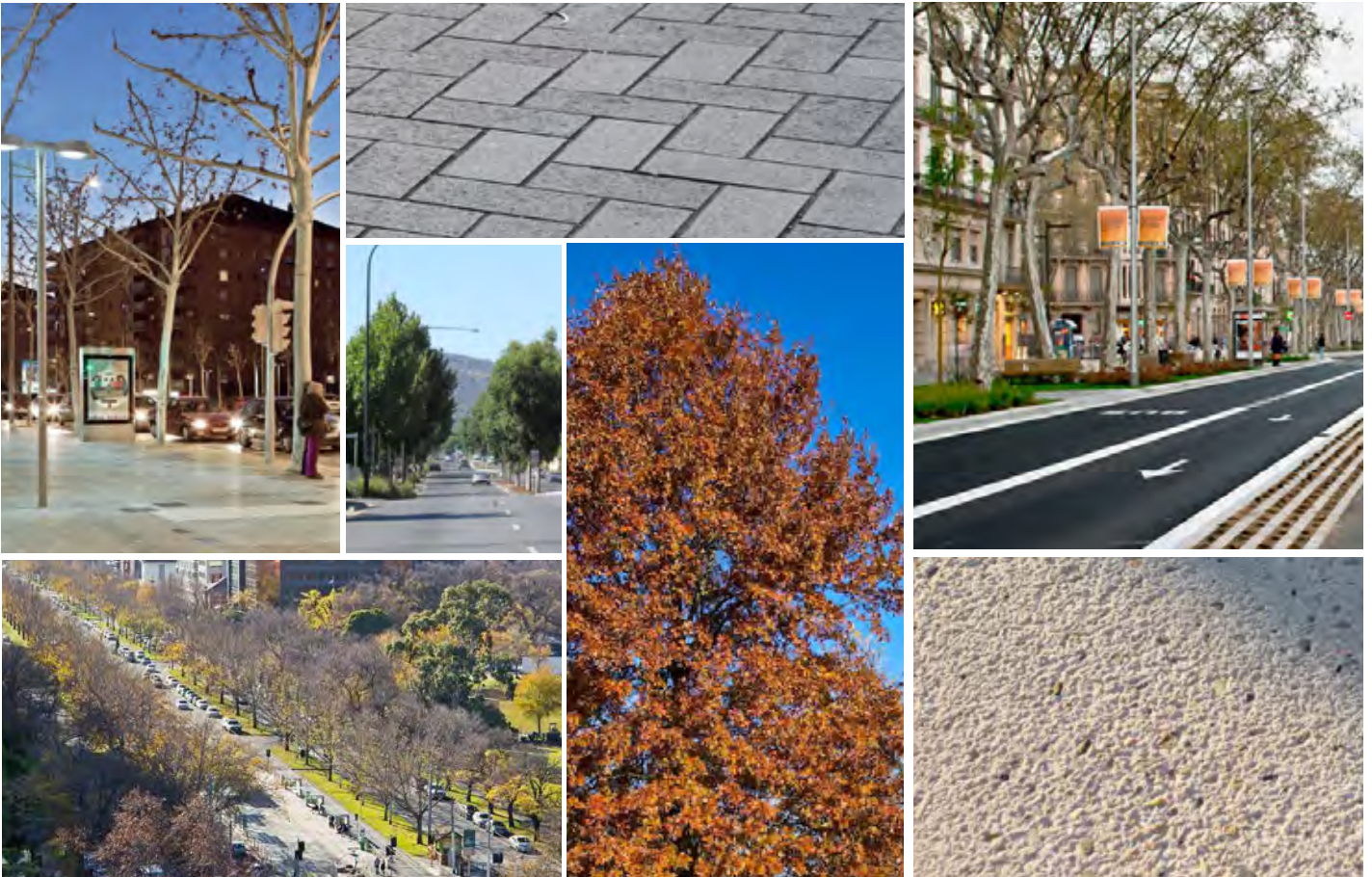


# Arterial

## Desired character

**Arterial roads function as district and regional connectors, playing an important role in providing places for civic activity and enhancing the local environment. Well designed and supported arterial roads contribute to urban uplift and enhance city character. Arterial roads:**

- › Incorporate tree planting to provide amenity, visual scale, and a sense of arrival.
- › Function as transit corridors for vehicles, pedestrians and cyclists.
- › Provide a vibrant and comfortable public realm, supported with furniture, lighting, and wayfinding.
- › Support destinations along streets by providing access to car parking and services.
- › Provide places for social interaction and activity.
- › Encourage active frontages that engage with the streetscape.
- › Reinforce district character, and sense of place.
- › Consider power undergrounding and common service trenching.
- › Integrate public art.

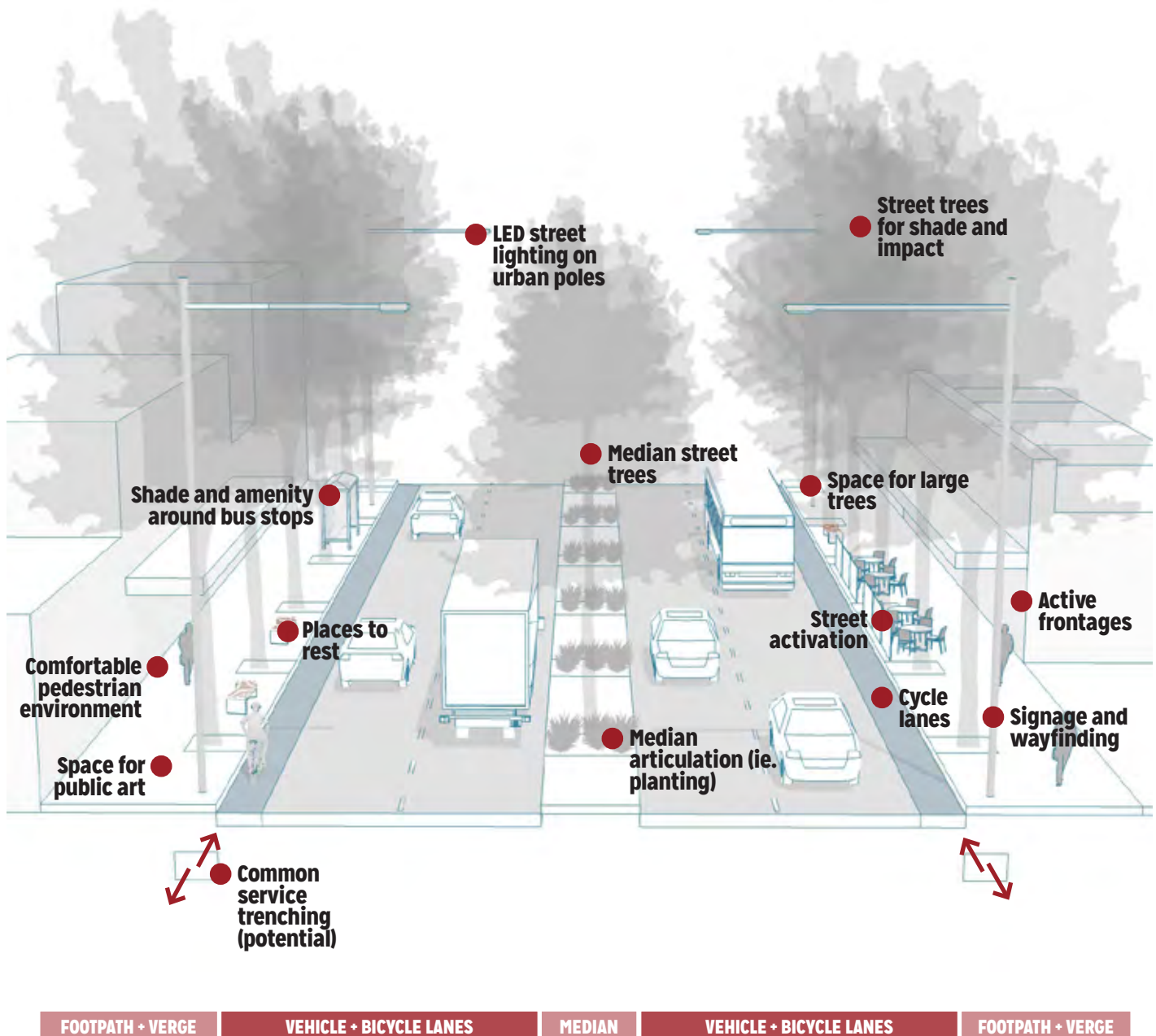


DESIRED ARTERIAL ROAD CHARACTER



## HIERARCHY OF STREETS

## Example of arterial road



# Sub-arterial

## Overview

**Sub-arterial roads connect arterial roads to areas of development, and carry traffic directly from one local area to another. They primarily function as vehicle distributors, but also service facilities such as commercial centres, schools and open space. Sub-arterial roads:**

- › Function as transit routes for heavy and other vehicles, public transport and cyclists.
- › Carry high-moderate volumes of fast moving traffic.
- › Facilitate through movement and provide access to public transport.
- › Contribute to local and regional cycle connections.
- › Provide access to regional and local centres.

## Existing character

**There are few sub-arterial roads within the City of Marion. These roads are generally wide and open in character. They typically comprise of vehicle lanes, designated bicycle lanes, and on street car parking.**

### North

- › Semi-mature street trees.
- › Footpaths on both sides.
- › Designated bicycle lanes.
- › Overhead infrastructure.
- › Access to local and neighbourhood centres.

### South

- › Open character.
- › Wide vehicle lanes.
- › No on-street parking.
- › No bicycle lanes.
- › Footpaths on one side.
- › Underground service infrastructure.



WINIFRED AVENUE - GLANDORE



RAGLAN AVENUE - SOUTH PLYMPTON



CLIFF STREET - MORPHETTVILLE

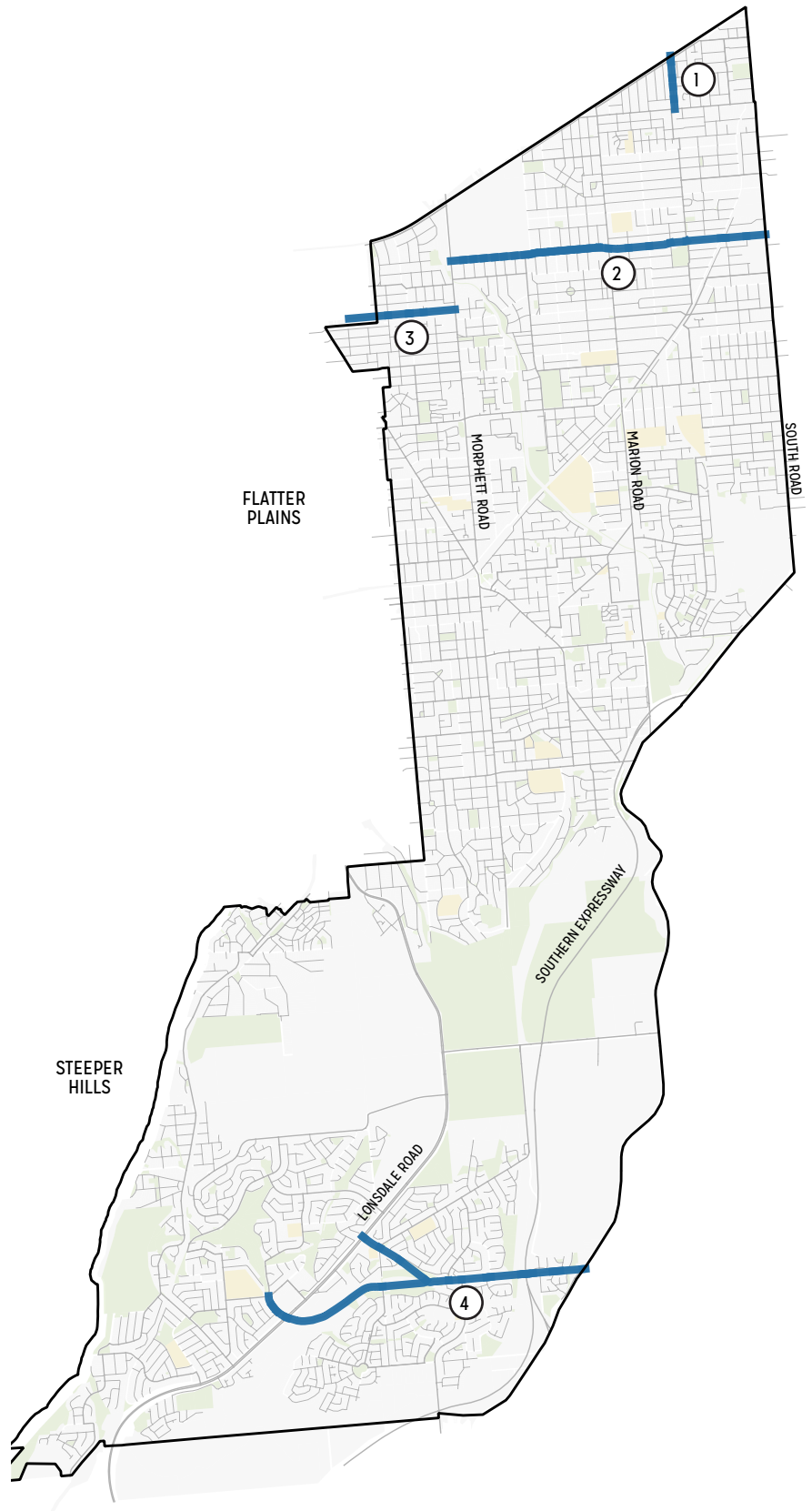


PATPA DRIVE - SHEIDOW PARK

## HIERARCHY OF STREETS

**Sub-arterial roads include:**

- ① Winifred Avenue;
- ② Raglan Avenue / Bray Street;
- ③ Cliff Street; and
- ④ Lander Road / Patpa Drive / Quailo Avenue.



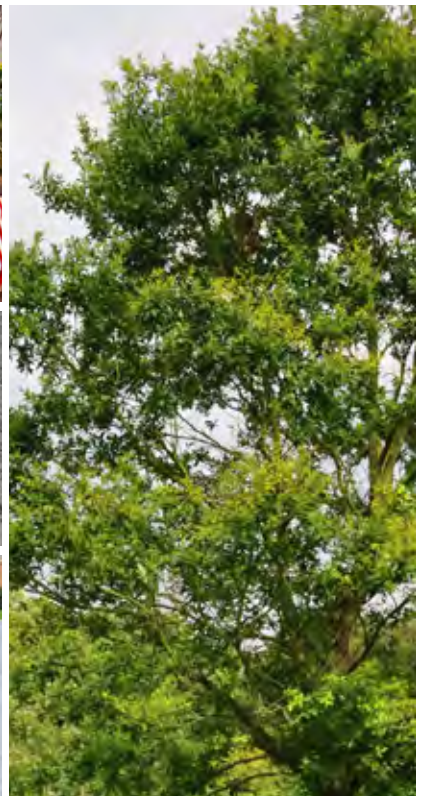


# Sub-arterial

## Desired character

**Sub-arterial roads cater for high volumes of through traffic, providing access from arterial roads to neighbourhood and local centres, and supporting local and regional bicycle connections. Sub-arterial roads:**

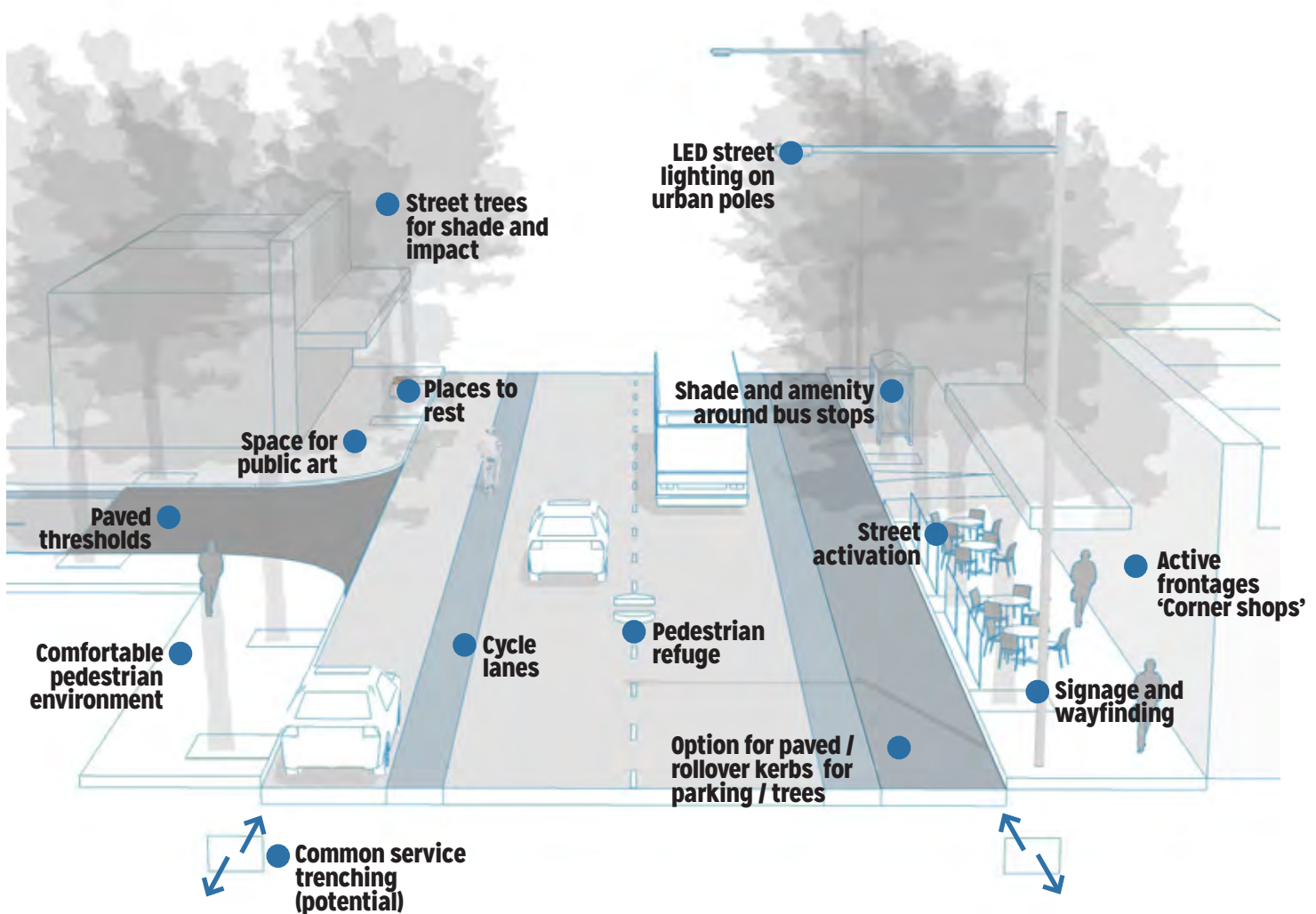
- › Accommodate large trees to provide visual scale, and amenity and shade for pedestrians and cyclists.
- › Provide places for rest.
- › Support walking and cycling through the provision of continuous and high quality footpaths and dedicated on-street bicycle lanes.
- › Encourage Water Sensitive Urban Design through the provision of bioretention tree pits and rain gardens.
- › Support protuberances adjacent local centres and 'corner shops' to provide opportunities for street activity.
- › Balance the requirements of heavy vehicle traffic, and pedestrians and cyclists.
- › Integrate signage and wayfinding.
- › Should aim to reduce the impact of infrastructure through the consolidation of services in common service trenches (where practicable).
- › Integrate public art.
- › Consider protuberances to add character and provide greater space for tree planting and water sensitive landscaping.
- › Incorporate pedestrian refuges.



DESIRED SUB-ARTERIAL ROAD CHARACTER

## HIERARCHY OF STREETS

## Example of sub-arterial road



FOOTPATH + VERGE

PARKING

VEHICLE + BICYCLE LANES

PARKING

FOOTPATH + VERGE

# Distributor

## Overview

**Distributor roads disperse traffic into or within a local area. These roads consist of one lane in each direction and provide access to residential properties, local centres, schools and open space. Distributor roads:**

- > Function as access routes for private vehicles and cyclists.
- > Carry moderate volumes of slower moving traffic.
- > May carry public transport vehicles.
- > Provide safe thoroughfare for pedestrians.
- > Offer on-street parking.

## Existing character

**Distributor roads in the city are typically wide and open in character, comprising one lane traffic, dedicated bicycle lanes, semi-mature street trees, footpaths on both sides and verges.**

### North

- > Urban character.
- > Street trees of varying maturity and species. Not all residences have a street tree.
- > Footpaths on both sides.
- > Designated on-street parking.
- > Prominent overhead services.
- > Designated bicycle lanes.

### South

- > Open character.
- > Minimal street tree planting.
- > Footpath on one or both sides.
- > Designated on-street parking.
- > Narrow verges or no verge.
- > Underground services.
- > Designated bicycle lanes.



ALAWOONA AVENUE - MITCHELL PARK



TOWERS TERRACE - SOUTH PLYMPTON



HENDRIE STREET - MORPHETTVILLE



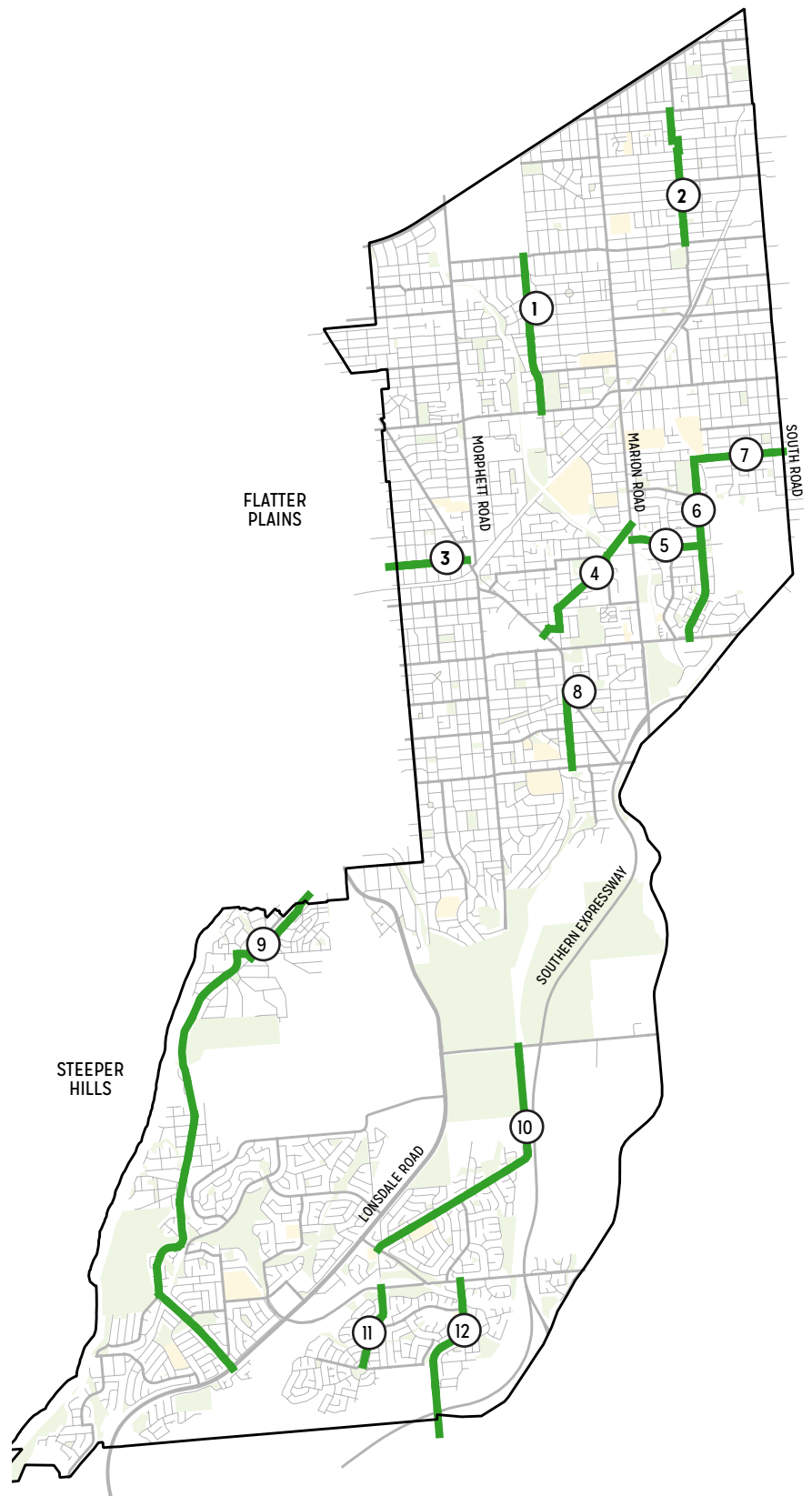
THE COVE ROAD - MARINO



## HIERARCHY OF STREETS

**Distributor roads include:**

- ① Hendrie Street;
- ② Towers Terrace;
- ③ Dunrobin Road;
- ④ Finnis Street;
- ⑤ Alawoona Avenue;
- ⑥ Bradley Grove;
- ⑦ Celtic Avenue;
- ⑧ Miller Street;
- ⑨ The Cove Road;
- ⑩ Adams Road;
- ⑪ Berrima Road and;
- ⑫ Young Street.



# Distributor

## Desired character

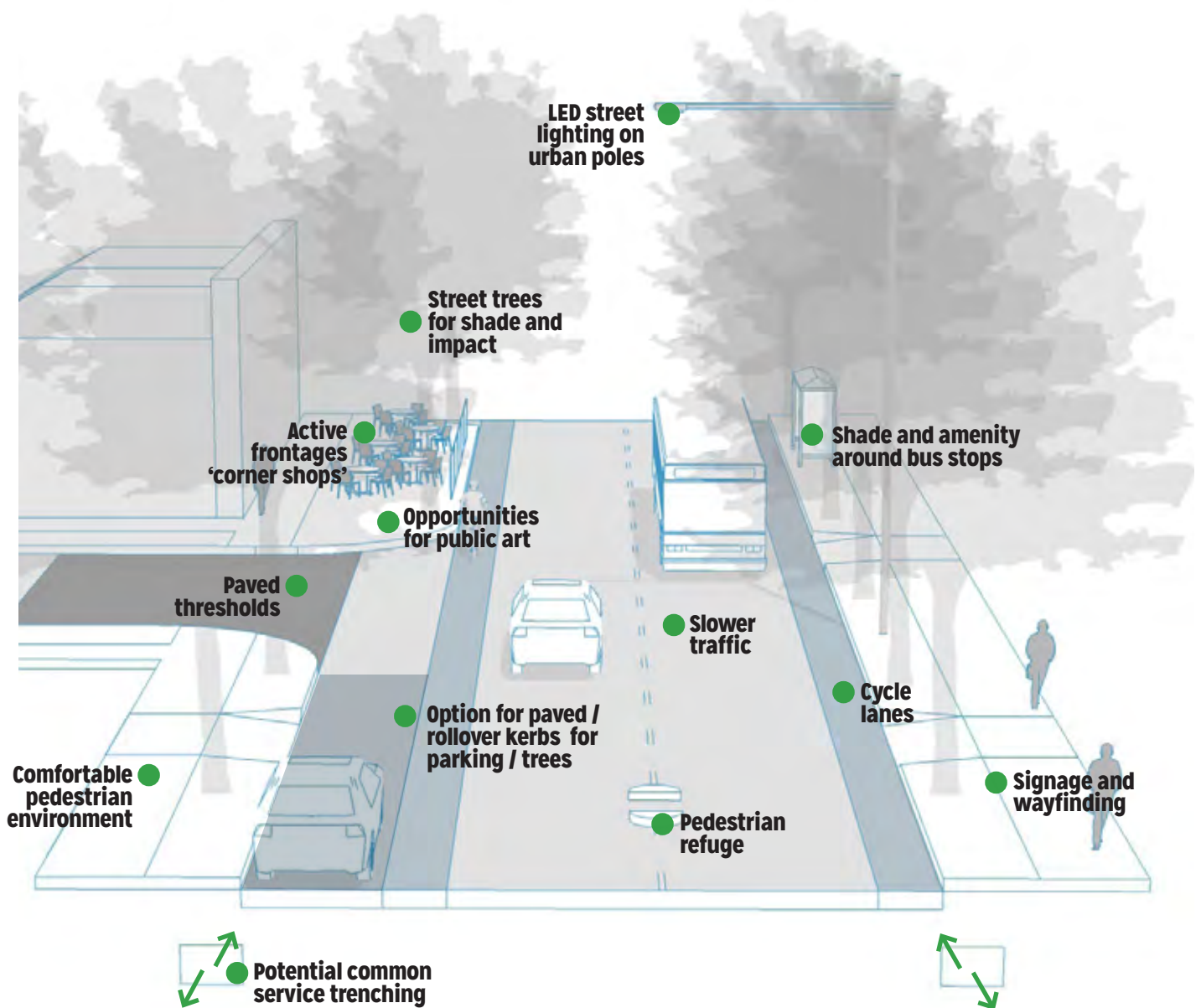
**Distributor roads provide access to local residences and local centres (shops and schools). Lower vehicle speed and volume allows for a more comfortable pedestrian and cycling environment. Distributor roads:**

- › Accommodate large trees that reinforce local character and provide amenity and shade for pedestrians and cyclists.
- › Support Water Sensitive Urban Design through the provision of bioretention tree pits and rain gardens.
- › Support local 'corner shop' development including protuberances and outdoor activity.
- › Support local bicycle movement through the provision of dedicated bicycle lanes.
- › Incorporate on street parking facilities.
- › Should aim to reduce the impact of infrastructure through the consolidation of services in common service trenches (where practicable).
- › Incorporate pedestrian refuges.
- › Integrate signage and wayfinding.
- › Integrate public art.
- › Consider protuberances to add character and provide greater space for tree planting and water sensitive landscaping.



DESIRED DISTRIBUTOR ROAD CHARACTER

## Example of distributor road



FOOTPATH + VERGE	PARKING	VEHICLE + BICYCLE LANES	FOOTPATH + VERGE
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# Collector

## Overview

**Collector roads cater for low-moderate volumes of local traffic providing access to private residences and local centres. These roads are relatively free of through traffic. Collector roads:**

- > Comprise low to moderate volumes of traffic - primarily cars, pedestrians and cyclists.
- > Are mixed use environments with pedestrian priority.
- > May incorporate public transport routes.
- > Incorporate roundabouts and right-of-way signs rather than traffic lights.
- > Provide direct property access.

## Existing character

**Collector roads are typically narrow in character, comprising of one vehicle lane in each direction, no dedicated bicycle lanes, minimal footpath and verge width and prominent overhead infrastructure.**

### North

- > Narrow urban character.
- > Street trees of varying maturity and species.
- > Footpaths and narrow verges on both sides.
- > No dedicated bicycle lanes.
- > On-street parking with no linemarking.
- > Overhead services.

### South

- > Open character.
- > Minimal and mixed street tree planting.
- > Footpath on one or both sides.
- > On-street parking, sometimes in marked bays.
- > Narrow verges or no verge.
- > Underground services.



GEORGE STREET - MARION



MORPHETT STREET - SEAVIEW DOWNS



TARRANNA STREET - PARK HOLME



PERRY BARR ROAD - HALLETT COVE

## HIERARCHY OF STREETS

**Collector roads include:**

- ① Pleasant Avenue;
- ② Austral Terrace / Beadnall Terrace / Tarranna Avenue
- ③ Railway Terrace;
- ④ George Street / Dwyer Road;
- ⑤ Morphett Road (southern section);
- ⑥ Perry Barr Road;
- ⑦ Barramundi Drive;
- ⑧ Sandison Road;
- ⑨ Ramrod Avenue;
- ⑩ Heysen Drive and;
- ⑪ Meyer Road;



# Collector

## Desired character

**Collector roads provide access to dwellings and other roads in the street hierarchy. Local roads contribute to local walking and cycling movement and provide opportunities for social interaction. Local roads:**

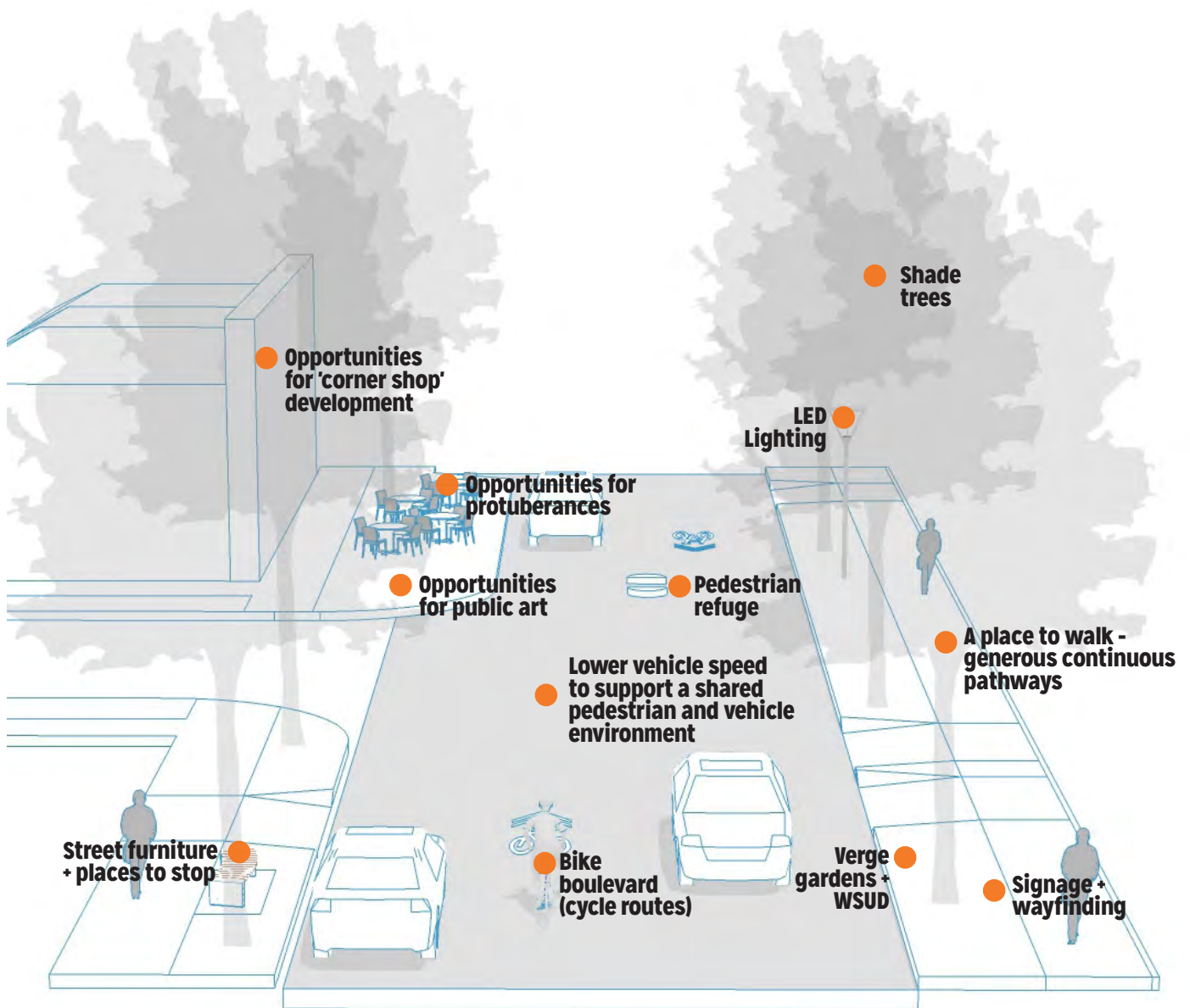
- › Support walking and cycling through the provision of continuous footpaths (on both sides of the street where possible).
- › Accommodate large street trees that contribute to character and provide shade for pedestrians and parked cars.
- › Support Water Sensitive Urban Design through the installation of rain gardens and bioretention tree pits.
- › Support provisions for verge gardening.
- › Should aim to reduce the impact of infrastructure through the consolidation of services in common service trenches.
- › Support reduced traffic speeds and volumes through traffic calming.
- › Accommodate pedestrian crossings.
- › Provide places for rest.
- › Integrate signage and wayfinding.
- › Integrate public art.
- › Incorporate pedestrian refuges.
- › Support local 'corner shop' development including protuberances and outdoor activity.
- › Consider protuberances to add character and provide greater space for tree planting and water sensitive landscaping.



DESIRED COLLECTOR ROAD CHARACTER



## Example of collector road



FOOTPATH + VERGE

VEHICLE + BICYCLE LANES

FOOTPATH + VERGE

# Local

## Overview

**Local roads are largely the neighbourhood street system. These roads are relatively free of through traffic and mostly handle local traffic providing access to residential allotments. Local roads are characterised by:**

- › Lower traffic speed.
- › Lower traffic volumes.
- › Safer and more accessible pedestrians and cycling connections.
- › Lower service standards (footpaths, lighting, furniture, signage).

## Existing character

**Local roads can be generally classified by their geographical location in the north or south section of the city.**

### North

- › Street trees of varying species and maturity.
- › Footpaths on both sides.
- › Verges comprising mix of lawn, planting, and gravel.
- › Fences to residential interface.
- › Overhead services.
- › On-street parking.
- › Overhead services.

### South

- › Minimal street tree planting.
- › Footpath on one or both sides.
- › No verge or verge only on one side.
- › No fences to residential interface.
- › Generally underground services.
- › On-street parking.



ST LAWRENCE AVE - EDWARDSTOWN



NALIMBA STREET - HALLETT COVE

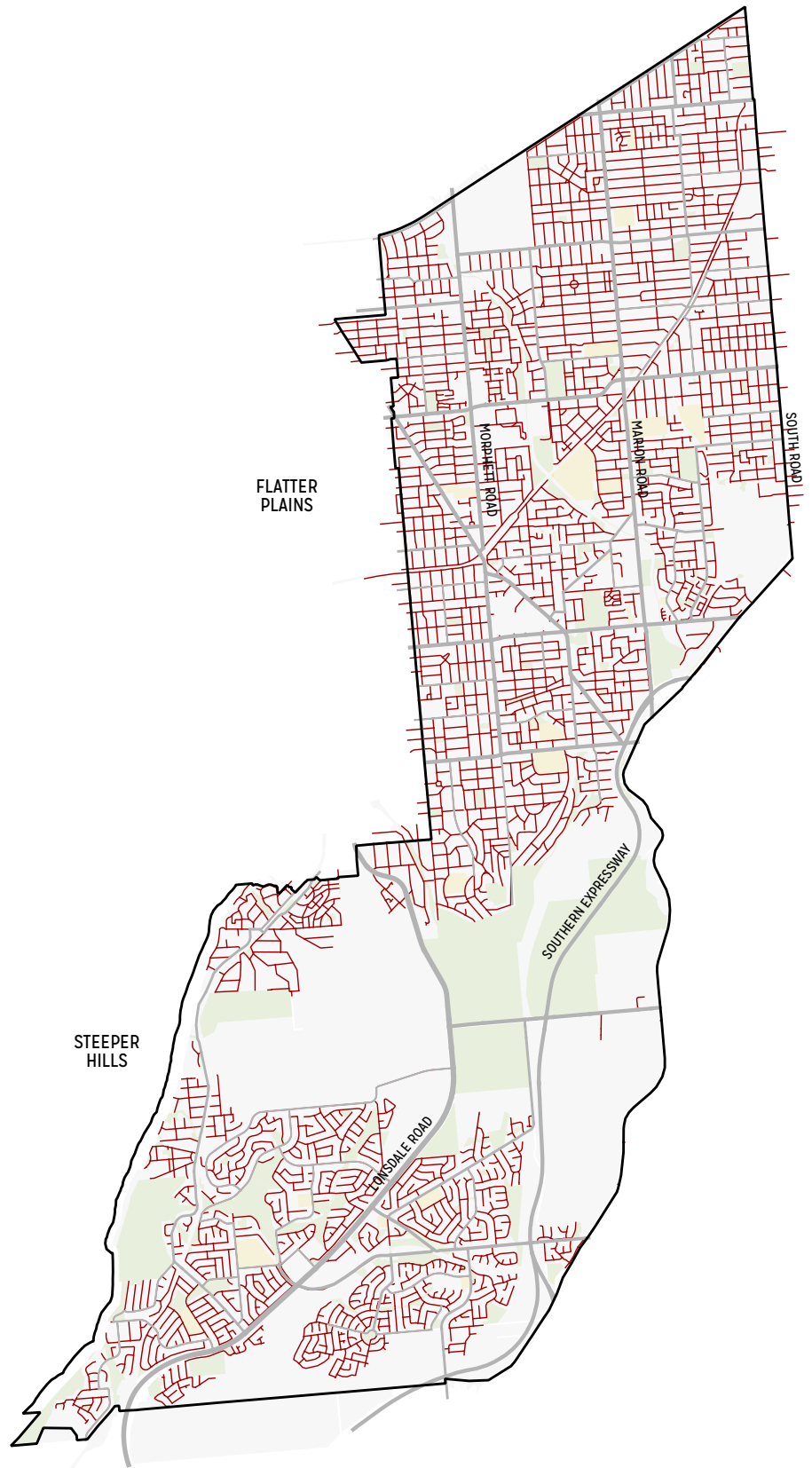


CASTLE STREET - PLYMPTON



EDWARD BECK DRIVE - SHEIDOW PARK

# HIERARCHY OF STREETS





# Local

## Desired character

**Local roads provide access to dwellings as vehicle speeds are lower than on other roads. Local roads can become important places for communities to meet and interact on a daily basis. Local roads:**

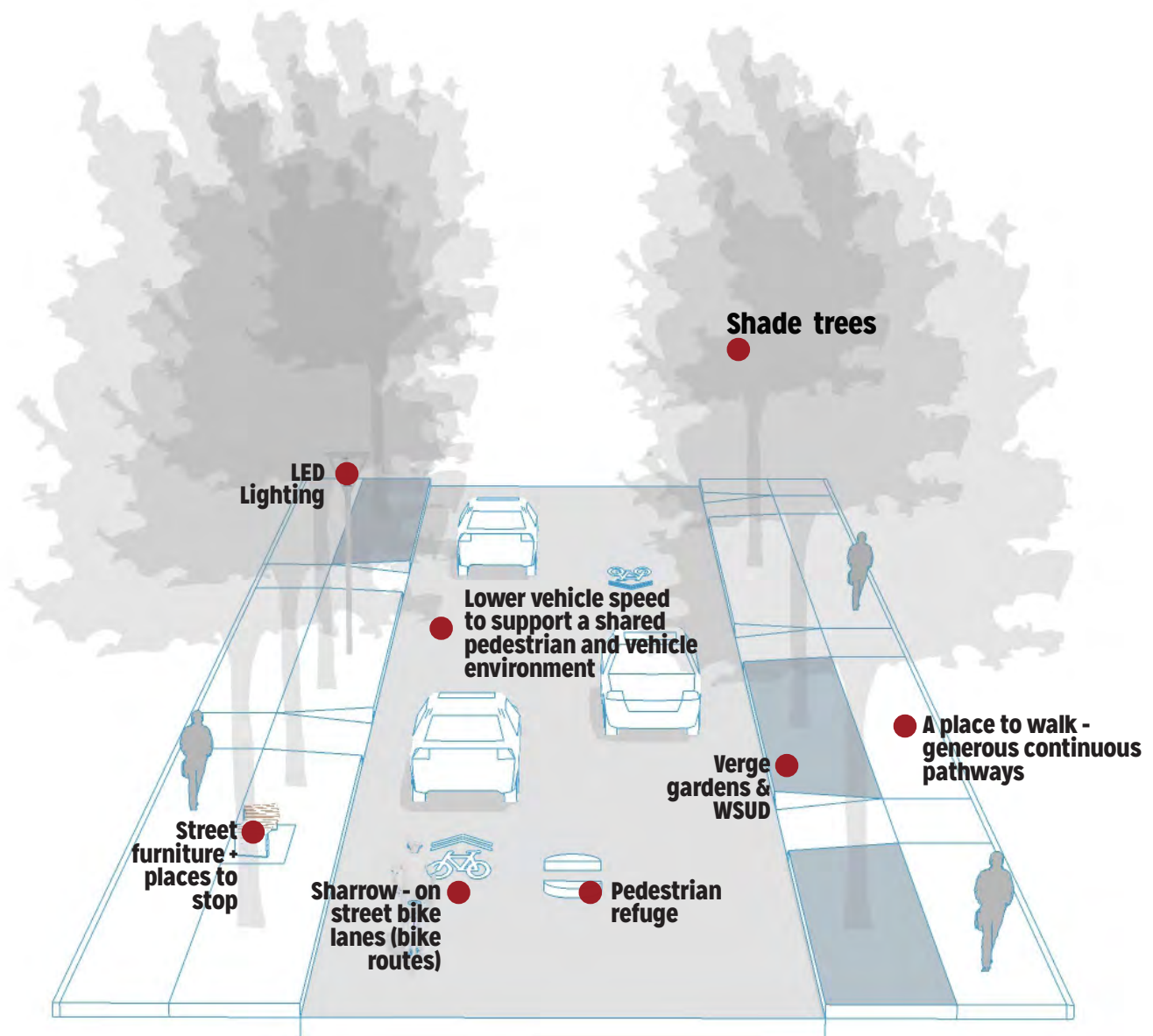
- › Support walking and cycling through the provision of continuous and high quality footpaths (on both sides of the street where possible).
- › Accommodate street trees that contribute to character and provide shade for pedestrians and parked cars.
- › Support Water Sensitive Urban Design through the installation of rain gardens and bioretention tree pits.
- › Accommodate provisions for Green Infrastructure, for example, verge gardening.
- › Should aim to reduce the impact of infrastructure through the consolidation of services in common service trenches.
- › Support reduced traffic speeds and volumes through traffic calming.
- › Support a variety of housing types.
- › Consider protuberances to add character and provide greater space for tree planting and water sensitive landscaping. Incorporate pedestrian refuges.
- › Support local 'corner shop' development including protuberances and outdoor activity.



LOCAL ROAD CHARACTER

## HIERARCHY OF STREETS

## Example of local road



FOOTPATH + VERGE

VEHICLE + BICYCLE LANES

FOOTPATH + VERGE







Part D

# Public Realm Elements

STREET TREES & PLANTING

PAVING

FURNITURE

LIGHTING

SIGNAGE & WAYFINDING

PUBLIC ART

VERGES

DRAFT

# Public realm elements

## Overview

The following section identifies the design intent for elements and materials used within streetscapes in the city. The elements identified in this section maximise amenity, accessibility, and user experience.

Local materials are suggested wherever possible and all materials and elements are considered in relation to relevant standards. Materials and elements selected provide a guide whilst allowing individual precinct development.

The materials and elements are grouped under the following categories:

- i. Street trees & Planting**
- ii. Paving**
- iii. Furniture**
- iv. Lighting**
- v. Signage & Wayfinding**
- vi. Public art**
- vii. Verges**

## Summary of elements

### i. Street trees & Planting

Trees  
Planting

### ii. Paving

Lightly washed concrete paving  
Broom finished concrete paving  
Asphaltic concrete  
Pre-cast unit pavers 01  
Pre-cast unit pavers 02  
Tactile indicators  
Grates  
Covers

### iii. Furniture

Seat 01  
Seat 02  
Seat 03  
Bespoke seating  
Cycle racks  
Drinking fountain  
Bollard 01  
Bollard 02  
Bin surrounds 01  
Bin surrounds 02

### iv. Lighting

Feature lighting  
Feature flood light  
Pedestrian pole-top light  
Street pole-top light  
Street light

### v. Signage & Wayfinding

Street signs  
Wayfinding  
Compacted granolithic

### vi. Public art

### vii. Verges

Lawn  
Verge gardens  
Verge planters  
Rain gardens  
Kerb & watertable







# Street trees & Planting

## Principles

### Reinforcing the urban structure and legibility of the city

- › The overall structure and legibility of the city is enhanced through avenue planting and defining primary connections and routes.
- › Larger trees are used to define major roads and routes.
- › Continuity and consistency is provided along the length of streets.

### Amenity

- › Tree planting is utilised to provide comfort and protection from the sun and wind reducing urban heat island effect.
- › A mix of deciduous, native and indigenous trees and plants are used.
- › Overhead wires are consolidated underground (with the Power Line Environment Committee [PLEC]) for key streetscapes to improve street appearance and allow for the planting of larger tree species where feasible.
- › Streets that offer special connections between reserves and areas of biodiversity are enhanced with indigenous or native planting (where possible) to provide wildlife corridors.
- › Scale of space is considered to accommodate tree species at maturity.

### Maintenance

- › Species are selected for their low maintenance requirements, non-invasive growth habits, life span and suitability to the local microclimate.
- › Good tree form and health is promoted through:
  - suitable tree pit preparation;
  - selecting quality advanced tree stock exhibiting good growth and form;
  - suitable planting technique and using stakes and ties (rather than tree guards);
  - providing adequate irrigation, particularly during establishment (WSUD integrated where possible);
  - suitable placement to avoid vehicle damage;
  - avoiding compaction around the base of the trees where possible;
  - not affixing structures or lights to trees; and
  - consideration of root control barriers where possible.

## TREES 01

## Trees

NATIVE	EXOTIC
<b>LARGE TREES</b>	
<i>Angophora</i> sp.	<i>Acer x freemanii</i> 'Jeffersred'
<i>Brachychiton</i> sp.	<i>Cedrus libani</i>
<i>Corymbia maculata</i>	<i>Platanus × acerifolia</i>
<i>Eucalyptus leucoxylon</i> subsp. <i>Megalocarpa</i>	<i>Quercus canariensis</i>
<i>Eucalyptus scoparia</i>	<i>Quercus cerris</i>
	<i>Quercus robur</i>
	<i>Quercus rubra</i>
	<i>Quercus palustris</i>
<b>MEDIUM TREES</b>	
<i>Banksia integrifolia</i>	<i>Celtis australis</i>
<i>Corymbia eximia</i>	<i>Celtis occidentalis</i>
<i>Eucalyptus porosa</i>	<i>Celtis laevigata</i>
<i>Eucalyptus torquata</i>	<i>Ginkgo biloba</i>
<i>Lophostemon confertus</i> (supplementary only)	<i>Gleditsia triacanthos</i> 'Shademaster'
<i>Melia azedarach</i> 'Elite' (sterile)	<i>Jacaranda mimosifolia</i>
	<i>Koelreuteria bipinnata</i>
	<i>Koelreuteria paniculata</i>
	<i>Sophora japonica</i>
	<i>Ulmus parvifolia</i> 'Todd'
	<i>Zelkova serrata</i> 'Green Vase'
<b>SMALL TREES</b>	
<i>Eucalyptus leptophylla</i>	<i>Cercis siliquastrum</i>
<i>Eucalyptus socialis</i>	<i>Cercis canadensis</i>
<i>Geijera parviflora</i>	<i>Lagerstroemia</i> sp.
<i>Pyrus</i> sp. (supplementary only)	<i>Pistacia chinensis</i>
	<i>Sapium sebiferum</i>



JACARANDA MIMOSIFOLIA



GINKGO BILOBA



LAGERSTROEMIA INDICA 'NATCHEZ'



## PLANTING 01

## Planting

INDIGENOUS	NATIVE	EXOTIC
<b>MEDIUM SHRUBS (max 900mm high within verge)</b>		
<i>Acacia acinacea</i>	<i>Correa sp.</i>	<i>Raphiolepis X delacourii</i>
<i>Allocasuarina muelleriana</i>	<i>Eremophila sp.</i>	<i>Viburnum X burkwoodii</i>
<i>Bursaria spinosa</i>	<i>Grevillea varieties</i>	
<i>Dodonaea viscosa subsp. spathulata</i>	<i>Hakea varieties</i>	
<i>Eutaxia diffusa</i>	<i>Westringia sp.</i>	
<i>Pittosporum angustifolium</i>		
<i>Rhagodia candolleana</i>		
<b>SMALL SHRUBS &amp; GRASSES</b>		
<i>Acacia cupularis</i>	<i>Anigozanthos flavidus</i>	<i>Convolvulus cneorum</i>
<i>Atriplex plaudosa subsp cordata</i>	<i>Atriplex sp.</i>	<i>Convolvulus erubescens</i>
<i>Billardierii cyamosa</i>	<i>Dianella sp.</i>	<i>Convolvulus mauritanicus</i>
<i>Dianella brevicaulis</i>	<i>Dianella cultivars</i>	<i>Convolvulus remotus</i>
<i>Dianella longifolia</i>	<i>Eremophila cultivars</i>	<i>Hebe 'Blue Gem'</i>
<i>Dianella revoluta</i>	<i>Eutaxia microphylla</i>	<i>Juniperus conferta</i>
<i>Dicanthium sericeum</i>	<i>Poa labillardieri</i>	<i>Raphiolepis indica</i>
<i>Goodenia amplexans</i>	<i>Hardenbergia sp.</i>	<i>Rosmarinus lavandulaceus</i>
<i>Hakea rugosa</i>	<i>Lomandra cultivars</i>	<i>Rosmarinus officinalis 'Prostratus'</i>
<i>Hardenbergia violacea</i>	<i>Westringia cultivars</i>	<i>Scaevola sp.</i>
<i>Olearia ramulosa</i>	<i>Vittadinia blackii</i>	<i>Trachelospermum jasminoides</i>
<i>Themeda triandra</i>		<i>Viburnum varieties</i>
<b>GROUNDCOVERS</b>		
<i>Disphyma crassifolium</i>	<i>Carpobrotus rossii</i>	
<i>Goodenia albiflora</i>	<i>Goodenia sp.</i>	
<i>Scaevola albida</i>	<i>Pandorea jasminoides</i>	
<i>Wahlenbergia luteola</i>	<i>Myoporum parvifolium</i>	
<i>Wahlenbergia stricta</i>	<i>Viola hederacea</i>	
<b>WSUD</b>		
	<i>Cyperus vaginatus</i>	
	<i>Ficinia nodosa</i>	
	<i>Juncus subsecundus</i>	
	<i>Themeda sp.</i>	

Species list for reference only. Final selection to be determined on an individual street basis.

## LOCAL INDIGENOUS SPECIES

Local indigenous plant material is to be collected from remnant vegetation within the City of Marion or remnant native vegetation within 10km of the Council boundary. Material sourced from revegetation projects should not be used unless the original source material adheres to the provenance locations defined.







# Paving

## Principles

### General

- › Paving is high quality, enables safe movement, is robust and low maintenance.
- › Footpaths are provided on both sides of the street where the street cross-section allows sufficient width.
- › Footpaths are wide enough to allow for comfortable movement.
- › Public and privately owned outdoor spaces are integrated through consistent materials and detailing.
- › Footpaths are wider around activity areas, schools and local hubs without jeopardising space for street trees and greening.
- › Locally sourced materials are used where possible.

### Consistency of use

- › A consistent palette of paving is provided within the City of Marion.
- › Key activity nodes are distinguished by paving treatments.
- › Paving is selected to suit different areas within the city, considering level of use, character and cost (whole-of-life).

### Comfort & Safety

- › Surface treatments are selected to suit pedestrian use and frequency or, if shared by vehicles, the type and speed of traffic. Paving is designed to accommodate either:
  - pedestrians only;
  - pedestrians and cyclists;
  - pedestrians and occasional service or maintenance vehicles;
  - pedestrians and vehicles; or
  - where pedestrians and vehicles share a paved surface, their use is clearly differentiated by paving type and colour.



## PAVEMENT TYPE 01

## Lightly washed concrete paving

## FEATURES

<b>Description</b>	Lightly washed exposed aggregate concrete
<b>Colour</b>	Hanson concrete - 'Barossa / Moonscape' or similar approved
<b>Finish</b>	Washed 1mm reveal
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Incorporates reinforcing, expansion and control joints, heavy vehicle load rated, slip rated</li> <li>&gt; 100mm depth for pedestrian traffic</li> <li>&gt; 150mm depth for vehicular traffic</li> <li>&gt; Footpath minimum width 1.2 m</li> </ul>
<b>Maintenance</b>	If required, repair by replacing damaged panel between cracking joints. General cleaning

<b>Uses</b>	Standard pavement to be used along: <ul style="list-style-type: none"> <li>&gt; Arterial roads</li> <li>&gt; Sub-arterial roads</li> <li>&gt; Character precincts</li> </ul>
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## COST

	Low	Med	High
<b>Initial cost</b>	○	○	●
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	●	○	○



## PAVEMENT TYPE 02

**Broom finish concrete paving****FEATURES**

<b>Description</b>	Broom finish concrete
<b>Colour</b>	Hanson concrete - Barossa or similar approved
<b>Finish</b>	Broom finish
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Incorporates reinforcing, expansion and control joints, heavy vehicle load rated, slip rated</li> <li>&gt; 100mm depth for pedestrian traffic</li> <li>&gt; 150mm depth for vehicular traffic</li> <li>&gt; Minimum width 1.2 metres</li> </ul>
<b>Maintenance</b>	If required, repair by replacing damaged panel between cracking joints. General cleaning

<b>Uses</b>	Standard pavement to be used along: <ul style="list-style-type: none"> <li>&gt; Distributor roads</li> <li>&gt; Collector roads</li> <li>&gt; Local streets</li> </ul>
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**COST**

	Low	Med	High
<b>Initial cost</b>	○	●	○ ○ ○
<b>Maintenance cost</b>	●	○	○ ○ ○
<b>Whole of life cost</b>	●	○	○ ○ ○



## PAVEMENT TYPE 03

## Asphaltic concrete

## FEATURES

<b>Description</b>	Asphaltic concrete containing selected aggregate
<b>Colour</b>	Standard asphaltic concrete (black)
<b>Finish</b>	Smooth rolled
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; AC7 pedestrian and cycle rated pavements</li> <li>&gt; AC10 vehicle rated pavements</li> <li>&gt; Minimum 98% MMDD</li> <li>&gt; Restrained edges all sides</li> </ul>
<b>Maintenance</b>	Patch any cracks. General cleaning
<b>Uses &amp; Applications</b>	<ul style="list-style-type: none"> <li>&gt; Shared use paths - timber edge</li> <li>&gt; Street surface - 100mm wide concrete edge</li> </ul>

## COST

	Low	Med	High
<b>Initial cost</b>	● ○ ○ ○ ○		
<b>Maintenance cost</b>	● ○ ○ ○ ○		
<b>Whole of life cost</b>	● ○ ○ ○ ○		





## PAVEMENT TYPE 04

## Pre-cast concrete unit pavers 01

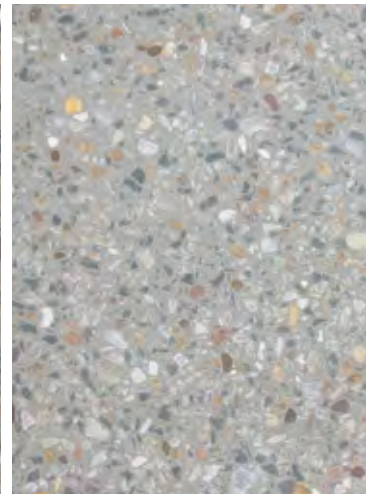
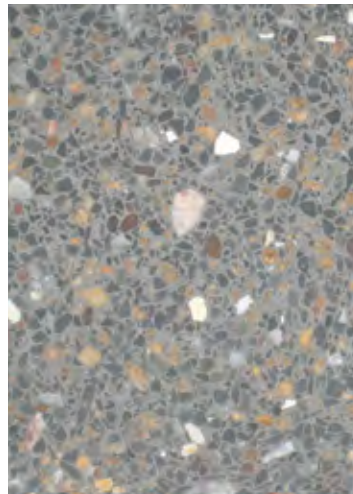
## FEATURES

<b>Description</b>	Pre-cast concrete unit paving
<b>Colour</b>	Varies
<b>Finish</b>	Milled or semi-honed
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Minimum 40MPa concrete, incorporate expansion joints, slip rated</li> <li>&gt; 40-60mm depth for pedestrian traffic</li> <li>&gt; 60-80mm depth where vehicle occurs</li> <li>&gt; Full pavers used (not cut to fit)</li> </ul>
<b>Maintenance</b>	Lift broken/chipped pavers and replace. General cleaning

<b>Uses &amp; Applications</b>	<ul style="list-style-type: none"> <li>&gt; Special designated areas and character areas</li> <li>&gt; Road thresholds at primary intersections</li> <li>&gt; Headers and paving bands</li> <li>&gt; Specific pedestrian gathering areas including main avenues and entries</li> </ul>
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## COST

	Low	Med	High
<b>Initial cost</b>	○	○	●
<b>Maintenance cost</b>	○	●	○
<b>Whole of life cost</b>	○	●	○



## PAVEMENT TYPE 05

## Pre-cast concrete unit pavers 02

## FEATURES

<b>Description</b>	Interlocking concrete unit paving (Trihex or Unipave)
<b>Colour</b>	Varies
<b>Finish</b>	Natural or semi-honed
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Slip rated for pedestrian and vehicle traffic</li> <li>&gt; Paving profile and finish designed to suit function and vehicle loadings</li> </ul>
<b>Maintenance</b>	Lift broken/chipped pavers and replace. General cleaning
<b>Uses &amp; Applications</b>	<ul style="list-style-type: none"> <li>&gt; Special designated areas and character areas</li> <li>&gt; Road thresholds at local, collector and distributor roads</li> <li>&gt; Where permeable pavement is required</li> </ul>

## COST

	Low	Med	High
<b>Initial cost</b>	○ ● ● ○ ○		
<b>Maintenance cost</b>	● ○ ○ ○ ○		
<b>Whole of life cost</b>	● ○ ○ ○ ○		



TRIHEx - OPTION FOR PERMEABLE PAVING



NATURAL FINISH



SEMI HONED FINISH

## TACTILE INDICATORS 01

## Tactile indicators

## FEATURES

<b>Description</b>	Stainless steel warning markers to Australian Standards / Precast concrete caution tactile unit paver to Australian Standards
<b>Material</b>	Stainless Steel / Precast concrete
<b>Finish</b>	Machined Finish / Standard finish
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Setout and colour contrast to Australian Standards</li> <li>&gt; Installed to Australian Standards</li> </ul>
<b>Maintenance</b>	General cleaning

<b>Uses &amp; Applications</b>	<b>Stainless steel</b> <ul style="list-style-type: none"> <li>&gt; Special designated areas</li> <li>&gt; High use areas and key activity nodes</li> </ul> <b>Precast concrete</b> <ul style="list-style-type: none"> <li>&gt; Standard within Council</li> <li>&gt; New pram ramps and cross overs</li> <li>&gt; Public transport stations and stops</li> </ul>
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## COST

	Low	Med	High
Initial cost	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
Maintenance cost	<input checked="" type="radio"/>	<input type="radio"/>	<input type="radio"/>
Whole of life cost	<input checked="" type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>

Stainless steel



Precast concrete





## GRATES 01

## Grates

## FEATURES

<b>Description</b>	Grate covers to drains
<b>Material</b>	Stainless Steel / Cast iron
<b>Finish</b>	Varies
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Installed to manufacturer's specifications</li> <li>&gt; Slip rated to Australian Standards</li> <li>&gt; Class rating fit for purpose</li> <li>&gt; Compliant for wheelchair and walking cane safety</li> <li>&gt; Where possible, compliant for bicycle tyre penetration resistance and surface openings in pedestrian areas</li> </ul>
<b>Maintenance</b>	General cleaning of grates

**Uses & Applications****Stainless steel**

- > Special designated areas
- > High use areas and key activity nodes

**Cast iron**

- > Standard within Council

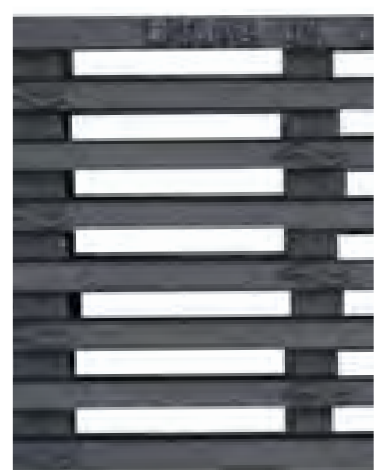
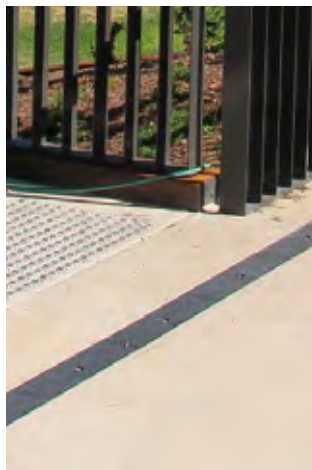
## COST

	Low	Med	High
<b>Initial cost</b>	○ ● ● ○ ○		
<b>Maintenance cost</b>	● ○ ○ ○ ○		
<b>Whole of life cost</b>	● ● ○ ○ ○		

Stainless steel



Cast iron



## COVERS 01

## Covers

## FEATURES

<b>Description</b>	Pit covers
<b>Material</b>	Match adjacent paving surface
<b>Finish</b>	Varies
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>› Covers suitable to accommodate infill of 60mm unit paving or concrete rated for vehicle traffic (where applicable)</li> <li>› Install to manufacturer's specifications</li> </ul>
<b>Maintenance</b>	General cleaning of pits and pit covers / replacement of chipped or cracked pavers
<b>Uses &amp; Applications</b>	<ul style="list-style-type: none"> <li>› Standard within Council</li> </ul>

## COST

	Low	Med	High
<b>Initial cost</b>	Varies		
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	●	○	○









# Furniture

## Principles

- › Furniture is provided in appropriate locations along streets and within the public realm.
- › Items are robust and durable, resistant to vandalism, and require little to no maintenance.
- › Items are cost-efficient and readily available for additional items or replacement.
- › High-quality materials and construction techniques are used to ensure items are robust and low maintenance.
- › Surface treatments surrounding furniture provide access for those with disabilities.
- › Locally sourced materials are used where possible.
- › Public art opportunities are explored and integrated with furniture where possible.
- › Furniture is placed to support;
  - nodes and gathering places;
  - comfort for individuals using a space; and
  - comfort and ease of use for all members of the community, including the aged and carers with young children.
- › Seats are located to:
  - take advantage of views, either in the distance or to the 'passing parade';
  - maximise shade in summer;
  - be out of the way of movement lines, particularly cyclists; and
  - be mindful of safety and passive surveillance consistent with best practice crime prevention through environmental design (CPTED) principles.

## SEAT 01

## Seat 01

## FEATURES

<b>Description</b>	Cast aluminium frame, timber batten bench seat (single seat 'cheeky', arm rest and bench seat options available)
<b>Model</b>	'Urbum'
<b>Material</b>	Frame: Cast aluminium Battens: Class 1 durability hardwood timber battens
<b>Finish</b>	Frame: Buffed finish Battens: Oiled
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Installed sub-surface to manufacturer's specifications</li> <li>&gt; Tamper proof fixings</li> </ul>
<b>Maintenance</b>	No direct maintenance required. Cleaning, possible repair of battens

<b>Uses &amp; Applications</b>	Standard bench seat for; <ul style="list-style-type: none"> <li>&gt; Arterial roads</li> <li>&gt; Sub-arterial roads</li> <li>&gt; Designated high use areas and activity nodes</li> </ul>
--------------------------------	--

## COST

	Low	Med	High
<b>Initial cost</b>	○	○	●
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	○	●	○



## SEAT 02

## Seat 02

## FEATURES

<b>Description</b>	Mild steel frame, timber batten bench seat (single seat option available)
<b>Model</b>	'PL'
<b>Material</b>	Frame: Mild steel Battens: Class 1 durability hardwood timber battens
<b>Finish</b>	Frame: Weathered Battens: Seasoned - dressed all round
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Installed sub-surface to manufacturer's specifications</li> <li>&gt; Tamper proof fixings</li> </ul>
<b>Maintenance</b>	No direct maintenance required. Cleaning, possible repair of battens

<b>Uses &amp; Applications</b>	Standard bench seat for: <ul style="list-style-type: none"> <li>&gt; Distributor roads</li> <li>&gt; Collector roads</li> <li>&gt; Local roads</li> <li>&gt; Green corridors and reserves</li> </ul>
--------------------------------	--

## COST

	Low	Med	High
<b>Initial cost</b>	○	●	○ ○ ○
<b>Maintenance cost</b>	●	○ ○ ○ ○	○
<b>Whole of life cost</b>	●	○ ○ ○ ○	○





## SEAT 03

## Seat 03

## FEATURES

<b>Description</b>	Cast aluminium frame, timber batten bench seat with arm rests (bench seat option available)
<b>Model</b>	'Quayside Seat'
<b>Material</b>	Frame: Cast aluminium powder coated Battens: Class I durability hardwood timber battens
<b>Finish</b>	Frame: Powder coated. Colour: RAL 7043 Battens: Oiled
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Concealed surface mount installed to manufacturer's specifications</li> <li>&gt; Tamper proof fixings</li> </ul>
<b>Maintenance</b>	Periodic oiling of timber. Cleaning, possible repair of battens
<b>Uses &amp; Applications</b>	Alternative bench seat for; <ul style="list-style-type: none"> <li>&gt; Local roads</li> <li>&gt; Green corridors and reserves</li> </ul>

## COST

	Low	Med	High
<b>Initial cost</b>	○	●	○ ○ ○
<b>Maintenance cost</b>	●	○	○ ○ ○ ○
<b>Whole of life cost</b>	○	●	○ ○ ○ ○



## SEAT 04

## Bespoke seating

## FEATURES

<b>Description</b>	Bespoke seating (diversity of form)
<b>Colour &amp; Finish</b>	Varies
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Shape, size and form to be in scale and fit for purpose</li> <li>&gt; Design and materials to provide comfort and ease of use</li> <li>&gt; Coordinated with other streetscape elements and public art</li> <li>&gt; Considerate of maintenance and management requirements, and whole of life costs</li> <li>&gt; Local fabricators used where possible</li> </ul>
<b>Uses &amp; Applications</b>	<ul style="list-style-type: none"> <li>&gt; Civic centres and special character areas</li> <li>&gt; Designated high use areas and activity nodes</li> </ul>

## COST

	Low	Med	High
<b>Initial cost</b>	Varies		
<b>Maintenance cost</b>	○	●	○ ○ ○
<b>Whole of life cost</b>	●	○ ○ ○ ○ ○	



EXAMPLES OF BESPOKE SEATING

## CYCLE RACK 01

## Cycle rack

## FEATURES

<b>Description</b>	Stainless steel bike racks
<b>Model</b>	Marion 'Round' & Marion 'Urban'
<b>Material</b>	50mm stainless steel circular hollow section (316 grade)
<b>Finish</b>	Brushed
<b>Performance requirements</b>	Sub-surface installation to manufacturer's specifications
<b>Maintenance</b>	No on-going maintenance required

**Uses & Applications** Located extensively at key nodes and adjacent cycling corridors

**Round**

- > Standard within Council

**'Urban'**

- > Special designated areas
- > High use areas and key activity nodes

## COST

	Low	Med	High
<b>Initial cost</b>	○	●	○ ○ ○
<b>Maintenance cost</b>	●	○	○ ○ ○
<b>Whole of life cost</b>	●	○	○ ○ ○



MARION 'ROUND'



MARION 'URBAN'



# DRINK FOUNTAIN 01

## Drinking fountain

### FEATURES

<b>Description</b>	Aluminium drinking fountain
<b>Model</b>	'Arqua Fountain - DF4'
<b>Material</b>	Body: Solid cast aluminium Button and spout: Marine grade stainless steel 316
<b>Finish</b>	Body: Powder coat with anti-graffiti coating - Colour: RAL 7043 - Texture: GL277A Button and spout: Polished
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Concrete footings and fixings to manufacturer's recommendation</li> <li>&gt; Refer to engineer's specifications for connections and drainage</li> <li>&gt; Subsurface polycrete pit with metal cover plate in hard anodised finish</li> </ul>
<b>Maintenance</b>	Removal of staining and general cleaning. Able to withstand continual cleaning with high pressure water apparatus.
<b>Uses &amp; Applications</b>	Key nodes along walking and cycling corridors, and activity areas

### COST

	Low	Med	High
<b>Initial cost</b>	○	○	○
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	○	○	○



BOTTLE STATION

DOG BUBBLER

## BOLLARD 01

## Bollard 01

## FEATURES

<b>Description</b>	'City of Marion' bollard suite
<b>Material &amp; Finish</b>	Painted steel with anti-graffiti coating. Colour: RAL 7043 Timber inlay option - Class 1 durability hardwood
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Fixed and removable options available</li> <li>&gt; Lighting option available</li> <li>&gt; Footings to manufacturer's specification</li> </ul>
<b>Maintenance</b>	Touch up painting as required. Replacement when damaged
<b>Uses &amp; Applications</b>	Council standard bollard for: <ul style="list-style-type: none"> <li>&gt; Vehicle separation</li> <li>&gt; Outdoor dining areas</li> <li>&gt; Equal access</li> <li>&gt; Carparking bays</li> </ul>

## COST

	Low	Med	High
<b>Initial cost</b>	○	○	●
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	○	●	○



TYPE 1  
STEEL  
TIMBER  
INLAY



TYPE 2  
STEEL WITH  
TIMBER  
FEATURE



TYPE 2  
STEEL  
LIGHTWEIGHT



## BOLLARD 02

## Bollard 02

## FEATURES

<b>Description</b>	Timber bollard / Recycled plastic bollard
<b>Material &amp; Finish</b>	<p>Timber: Class 1 seasoned hardwood dressed all round, species:</p> <ul style="list-style-type: none"> <li>&gt; Spotted Gum (<i>Eucalyptus maculata</i>)</li> <li>&gt; Grey Ironbark (<i>Eucalyptus paniculata</i>)</li> <li>&gt; Native Pine (<i>Callitris gracilis</i>)</li> </ul> <p>Plastic: Recycled plastic composite, charcoal</p>
<b>Dimensions</b>	<p>Timber: 145W x 1500H (900mm above surface)</p> <p>Plastic: 125W x 1500H (900mm above surface)</p>
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Installed sub-surface to manufacturer's specifications</li> <li>&gt; Stand-alone or linked with chain or rope</li> <li>&gt; Fixed options only</li> </ul>
<b>Maintenance</b>	No maintenance required. Replace damaged bollards
<b>Uses &amp; Applications</b>	<p>Council standard bollard for:</p> <ul style="list-style-type: none"> <li>&gt; Reserve edges</li> <li>&gt; Pathway nodes</li> </ul>

## COST

	Low	Med	High
<b>Initial cost</b>	○	●	○
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	●	○	○



TIMBER BOLLARD



'REPLAS' RECYCLED PLASTIC BOLLARD



## BIN 01

## Bin surrounds 01

## FEATURES

<b>Description</b>	'City of Marion' bin surround
<b>Material</b>	<p>Panels: Aluminium perforated venting side panels (2 coat epoxy painted)</p> <p>Splash tray and trim: Stainless steel (316 grade)</p> <p>Internal frame: Galvanised steel</p>
<b>Finish &amp; Colour</b>	<p>Panels: Industrial grade paint system with anti-graffiti coating. Colour: RAL 7043</p> <p>Splash tray and trim: Brushed</p>
<b>Dimensions</b>	Front 680W x Side 800W x Height 1320 mm
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; 240L Wheelie Bin compatible</li> <li>&gt; Fitted with continuous hinge. Keyed access</li> <li>&gt; Concealed tamper proof vandal resistant fixings</li> <li>&gt; Direct fix install on concrete pad footing</li> </ul>
<b>Maintenance</b>	Regular emptying of rubbish. Removal of staining and general cleaning. Able to withstand continual cleaning with high pressure water apparatus

<b>Uses &amp; Applications</b>	<p>Located at key nodes along:</p> <ul style="list-style-type: none"> <li>&gt; Arterial roads</li> <li>&gt; Sub-arterial roads</li> <li>&gt; Distributor roads</li> <li>&gt; Civic centres and special character areas</li> </ul>
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## COST

	Low	Med	High
<b>Initial cost</b>	○	○	●
<b>Maintenance cost</b>	○	●	○
<b>Whole of life cost</b>	○	●	○



SINGLE BIN



DUAL WASTE/RECYCLE STATION

## BIN 02

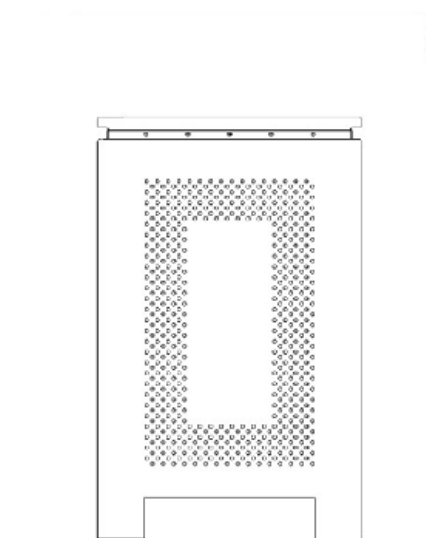
## Bin surrounds 02

## FEATURES

<b>Description</b>	Parade bin surrounds
<b>Model</b>	'Parade'
<b>Material</b>	Panels: Perforated (entire panel) powder coated zinc plated steel Splash tray and trim: Stainless steel (316 grade)
<b>Finish &amp; Colour</b>	Panels: Powder coated. Colour: RAL 7043 Splash tray and trim: Brushed
<b>Dimensions</b>	Front 715W x Side 780W x Height 1140 mm
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; 120 - 240L Wheelie Bin compatible</li> <li>&gt; Fitted with continuous hinge. Keyed access</li> <li>&gt; Concealed tamper proof vandal resistant fixings</li> <li>&gt; Direct fix install on concrete pad footing</li> </ul>
<b>Maintenance</b>	Regular emptying of rubbish. Removal of staining and general cleaning. Able to withstand continual cleaning with high pressure water apparatus
<b>Uses &amp; Applications</b>	Located at key nodes along: <ul style="list-style-type: none"> <li>&gt; Green corridors</li> <li>&gt; Reserves</li> </ul>

## COST

	Low	Med	High
<b>Initial cost</b>	○	○	●
<b>Maintenance cost</b>	○	●	○
<b>Whole of life cost</b>	○	●	○







# Lighting

## Principles

- > Lighting meets criteria in terms of quality, illumination levels, visual appearance of the luminaires, robustness (vandal resistance and low maintenance), and energy efficiency.
- > Lighting is used to bring life, clarity, colour and safety to the public realm.
- > Appearance of light poles and luminaires is considered during the day as well as night.
- > Energy efficient luminaires, such as light emitting diode (LED) are utilised.
- > Lighting is co-ordinated with other public realm elements such as the placement of trees and furniture.
- > Lighting is used to enhance the night time environment and contribute towards vibrancy.
- > Light pole and luminaire colours and finishes are consistent with other public realm elements.
- > Light spill is limited through use of appropriate fittings that direct light to where it is needed.
- > 'Warm white' lighting (as opposed to yellow or 'cool white') is used to increase usage of public space and improve safety and surveillance.
- > Key routes and public spaces are adequately lit.
- > Lighting is strategic and dramatic, highlighting focal points and not lighting everything. Items that can be highlighted include:
  - up-lighting large trees;
  - primary pedestrian paths,
  - public art;
  - heritage buildings; and
  - landmarks.

# FEATURE LIGHT 01

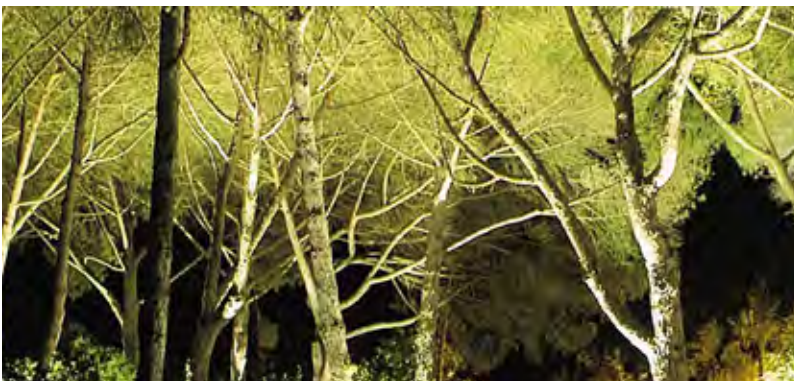
## Feature lighting

### Feature lighting is used to:

- › Highlight feature trees and buildings of special character
- › Enhance the legibility and safety of the public realm
- › Define places of interest
- › Highlight public art
- › Primary pedestrian and cycling pathways

### Feature lighting comprises the following:

- › Catenary lighting
- › Recessed lighting
- › Bollard lighting
- › Up-lighting and down-lighting
- › Surface lighting
- › Gobo lighting



COST VARIES\*

## FEATURE LIGHT 02

## Feature flood light

## FEATURES

<b>Description</b>	Feature flood lighting
<b>Model</b>	iGuzzini - 'Woody'
<b>Material</b>	Pole: 6.0 - 12.0m high aluminium 150mm Ø (bottom) 80 Ø (top) CHS (round) to suit location Body: Die-cast aluminium 80mm Ø pole attachment
<b>Colour</b>	Pole: Grey (15) Body: Grey (15)
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; 4000K</li> <li>&gt; 5 year warranty</li> <li>&gt; Compliant with relevant Australian Standards for pedestrian lighting</li> </ul>
<b>Maintenance</b>	No direct maintenance required. General cleaning
<b>Uses &amp; Applications</b>	<ul style="list-style-type: none"> <li>&gt; Illuminate large areas of open space such as plazas and parks</li> <li>&gt; Additional lighting during events</li> </ul>

## COST

	Low	Med	High
<b>Initial cost</b>	○	○	●
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	○	●	○





# PEDESTRIAN LIGHT 01

## Pedestrian pole-top light

### FEATURES

<b>Description</b>	Pedestrian Pole top light
<b>Model</b>	iGuzzini - 'Lavinia'
<b>Material</b>	Pole: 4.5 - 6.0 m high aluminium 120 mm Ø CHS (round) to suit location Body: Die-cast aluminium 120 mm Ø pole attachment
<b>Colour</b>	Pole: Grey (15) Body: Grey (15)
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; 4000K</li> <li>&gt; 5 year warranty</li> <li>&gt; Compliant with relevant Australian Standards for pedestrian lighting</li> </ul>
<b>Maintenance</b>	No direct maintenance required. General cleaning
<b>Uses &amp; Applications</b>	Standard pedestrian light for use along: <ul style="list-style-type: none"> <li>&gt; Primary walking and cycling corridors</li> <li>&gt; Activity nodes and special character areas</li> </ul>

### COST

	Low	Med	High
<b>Initial cost</b>	○	○	●
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	○	○	○



## PEDESTRIAN LIGHT 02

## Street pole-top light

## FEATURES

<b>Description</b>	Street pole top light
<b>Model</b>	Bega - 'Nail' (99 403)
<b>Material</b>	Pole: 4.0 - 5.0 m high aluminium 120 mm Ø (bottom) 76 Ø (top) CHS (round) to suit location Body: Die-cast aluminium 76 mm Ø pole attachment
<b>Colour</b>	Pole: RAL 9007 Body: RAL 9007
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; 4000K</li> <li>&gt; 3 year warranty</li> <li>&gt; Compliant with relevant Australian Standards for pedestrian lighting</li> </ul>
<b>Maintenance</b>	No direct maintenance required. General cleaning

<b>Uses &amp; Applications</b>	Standard pedestrian light for use along: <ul style="list-style-type: none"> <li>&gt; Distributor roads</li> <li>&gt; Connector roads</li> <li>&gt; Local roads</li> </ul>
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## COST

	Low	Med	High
<b>Initial cost</b>	○	○	●
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	○	●	○







## STREET LIGHT 01

## Street light

## FEATURES

<b>Description</b>	LED street light (Standard SAPN tariff approved)
<b>Material</b>	Pole: Galvanised steel Body: Die-cast aluminium
<b>Colour:</b>	Pole: RAL 9005 Fitting: RAL 9005
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Compliant with SA Power Networks Standards</li> <li>&gt; Compliant with relevant Australian Standards for vehicle traffic lighting</li> </ul>
<b>Maintenance</b>	No direct maintenance required. General cleaning
<b>Uses &amp; Applications</b>	> Standard street light in the City of Marion

## COST

	Low	Med	High
<b>Initial cost</b>	○	○	○
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	○	●	○









# Signage & Wayfinding

## Principles

- › A hierarchy of signage is used to lead people through the public realm.
- › Signage is obvious, functional and easily read.
- › Signage is used strategically and does not clutter the public realm.
- › Signage and wayfinding recognises the rich culture of the Kurna community through use of Kurna language.
- › Signage is integrated with public art elements.
- › Signage is consistent, whilst allowing for the unique requirements of specific uses and activities.
- › Placement of signs and information informs and contributes to the perception of personal safety.
- › Digital technologies such as online maps, the national broadband network (NBN) and mobile phone applications are incorporated.
- › Signage references City of Marion brand for identification.



## SIGNAGE 01

## Street signs

## FEATURES

<b>Description</b>	Council standard street sign / Custom street sign
<b>Material &amp; Finish</b>	Varies
<b>Performance requirements</b>	Refer City of Marion Signage Standard Preferred materials for custom signs include: <ul style="list-style-type: none"> <li>&gt; Oiled timber</li> <li>&gt; Corten steel</li> <li>&gt; Painted aluminium sheet (City of Marion colours)</li> </ul>
<b>Maintenance</b>	No direct maintenance require. Replace or repair damaged street signs

## Uses &amp; Applications

## Standard street sign

- > Standard street sign used in the city

## Custom street sign

- > Special character areas including heritage areas and civic centres

## COST

	Low	Med	High
<b>Initial cost</b>	○	●	○ ○ ○
<b>Maintenance cost</b>	●	○ ○ ○ ○	○
<b>Whole of life cost</b>	●	○ ○ ○ ○	○



STANDARD CITY OF MARION STREET SIGN



EXAMPLE CUSTOM STREET SIGN IN SPECIAL CHARACTER AREAS



CITY OF MARION SIGNAGE STANDARDS

## WAYFINDING 01

## Wayfinding

## FEATURES

**Description** Council standard wayfinding signage / Custom wayfinding signage

**Material & Finish** Varies

**Performance requirements** Refer City of Marion Signage Standard  
Preferred materials for custom wayfinding include:

- > Oiled timber
- > Corten steel
- > Painted aluminium sheet (City of Marion colours)

**Maintenance** No direct maintenance require. Replace or repair damaged street signs

**Uses & Applications**

**Standard wayfinding signage**

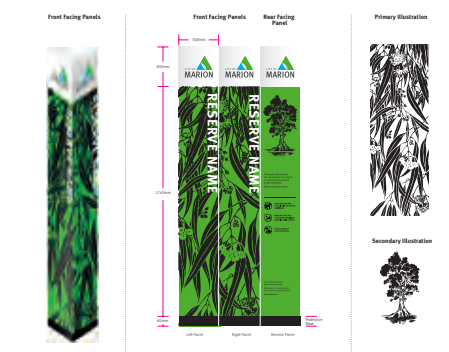
- > Standard wayfinding used in the city

**Custom wayfinding signage**

- > Special character areas including heritage areas and civic centres

## COST

	Low	Med	High
<b>Initial cost</b>	○	○	●
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	○	●	○



CITY OF MARION SIGNAGE STANDARDS



CITY OF MARION BENCHMARK STANDARDS



EXAMPLE WAYFINDING IN SPECIAL CHARACTER AREAS





'LITTLE MARION PEERING, LOOKING INTO THE WELL', GERRY MCMAHON. 2008 - PHOTOGRAPH BY SAM OSTER



# Public art

## Principles

- › Public art is part of the culture of the 'place', and a component of the integrated processes of design and renewal.
- › Public art is considered at the planning stage of streetscape development.
- › Public art is used to express the story of the city, its community and culture.
- › Public art is coordinated across the city to ensure consistency in approach and style.
- › Procurement of public art is managed by Council and complies with best practice procurement protocols.
- › Public art is designed by artists, the community, or others and is managed from conception to installation by a public art coordinator as required.
- › Public art is an integrated component of streetscapes and is considered in the design of public realm elements including furniture, lighting and wayfinding.
- › Siting and location of public art is considered and coordinated with other elements of the public realm.
- › Public art is used to enhance places of Kaurua cultural significance.
- › Public artworks are site specific and reflect their unique setting.
- › Public artwork is permanent or temporary, with materials reflecting durability and robustness levels required for the life of the work.
- › Public artwork must offer value for money.
- › Maintenance requirements and budgets are considered.
- › Local materials are used where possible.
- › Focus areas for public art include:
  - Arterial roads
  - Sub-arterial roads
  - Distributor roads
  - Collector roads
  - Special character areas and heritage precincts
  - Plazas, squares and civic centres.









# Verges

## Principles

- › Water Sensitive Urban Design (WSUD) techniques, including rain gardens and bioretention tree pits are considered and installed where practicable.
- › Consideration is given to utilisation of verges for productive purposes.
- › Soil condition / type is considered prior to selection of plant material.
- › Responsibility and budgets are established for maintenance and management.
- › Root barriers are considered where trees are planted within close proximity to footpaths and structures.
- › Preference is to use recycled water for irrigation where available.
- › Areas of special character or importance are distinguished through the treatment of verges that can include street trees.
- › Permeability of verge is considered to reduce water runoff and improve local infiltration.



## VERGE 01

## Compacted granulitic

### FEATURES

<b>Description</b>	Granulitic Sand or X6
<b>Material</b>	Quarry sand available from Fitzgerald Quarry or 'X6' available from Boral
<b>Finish</b>	Compacted and stabilised
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; Compact granulitic sand to minimum dry density ratio (standard compaction) to AS 1289.5.4.1: 95%.</li> <li>&gt; Soilbond additive required. Mixed and installed to manufacturer's specification</li> <li>&gt; Restrained edges all sides</li> </ul>
<b>Maintenance</b>	Infrequent topping up and re-compacting allows for tree expansion. Occasional spot weeding.

<b>Uses &amp; Applications</b>	Standard verge, median and tree pit treatment for: <ul style="list-style-type: none"> <li>&gt; Distributor roads</li> <li>&gt; Collector roads</li> <li>&gt; Local roads</li> <li>&gt; Minor paths and seating areas along streets, green corridors and reserves</li> </ul>
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### COST

	Low	Med	High
<b>Initial cost</b>	○	●	○ ○ ○
<b>Maintenance cost</b>	○	●	○ ○ ○
<b>Whole of life cost</b>	●	○ ○ ○ ○ ○	



## VERGE 02

## Lawn

## FEATURES

<b>Description</b>	Lawn verge
<b>Species</b>	Kikuyu, Buffalo, Couch or other rhizome grass suitable for low water use requirements
<b>Maintenance</b>	Mowing, watering and top dressing
<b>Uses &amp; Applications</b>	Verge and median treatment (generally by property owners) for: <ul style="list-style-type: none"> <li>&gt; Distributor roads</li> <li>&gt; Collector roads</li> <li>&gt; Local roads</li> </ul>

## COST

	Low	Med	High
<b>Initial cost</b>	●	○	○
<b>Maintenance cost</b>	○	○	●
<b>Whole of life cost</b>		●	○



## VERGE 03

## Verge gardens

### FEATURES

<b>Description</b>	Community/resident gardens within verges (non-edible and edible)
<b>Guidelines</b>	Procedures to allow the community to establish and maintain verge gardens
<b>Maintenance</b>	Maintained by property owner in collaboration with community
<b>Uses &amp; Applications</b>	Select verges along: <ul style="list-style-type: none"> <li>&gt; Collector roads</li> <li>&gt; Local roads</li> </ul>

### COST

	Low	Med	High
<b>Initial cost</b>	○	●	○ ○ ○
<b>Maintenance cost</b>	○	●	○ ○ ○
<b>Whole of life cost</b>	●	○ ○ ○ ○ ○	



EXAMPLES OF VERGE GARDENS



## VERGE 04

## Verge planters

## FEATURES

<b>Description</b>	Raised verge planters (diversity of form)
<b>Colour &amp; Finish</b>	Varies
<b>Performance requirements</b>	Shape, size and height to be in scale and fit for purpose
<b>Maintenance</b>	Maintained by property owner in collaboration with community
<b>Uses &amp; Applications</b>	<ul style="list-style-type: none"> <li>&gt; To provide barriers between vehicle traffic and activity areas</li> <li>&gt; To provide amenity in streets</li> <li>&gt; Are considered as part of public art strategy</li> </ul>

## COST

	Low	Med	High
<b>Initial cost</b>	Varies		
<b>Maintenance cost</b>	○	●	○ ○ ○
<b>Whole of life cost</b>	●	○ ○ ○ ○ ○	



EXAMPLES OF RAISED VERGE PLANTERS

## VERGE 05

## Rain gardens

### FEATURES

#### Description

Rain garden

#### Performance requirements

Rain garden profile to engineer's specification incorporating:

- > Kerb: Slotted kerb
- > Planting: Refer WSUD species list (10 plants / sqm)
- > Filter media: Sand based material (300-800mm depth)
- > Transition layer: Course sand (100-300mm depth)
- > Drainage layer: Gravel (200-300mm depth)
- > Drainage: 'Hynds' debris control screen to stormwater entry

#### Maintenance

General maintenance required. Supplementary planting as required.

#### Uses & Applications

Used where possible in all street in the city.

### COST

#### Initial cost

Low Med High

○ ○ ● ○ ○

#### Maintenance cost

● ○ ○ ○ ○

#### Whole of life cost

○ ● ○ ○ ○



EXAMPLES OF WATER SENSITIVE URBAN DESIGN RAIN GARDENS

## KERB 01

## Kerb &amp; watertable

## FEATURES

<b>Description</b>	In situ concrete kerb and water table
<b>Material</b>	Standard concrete to Council specifications
<b>Finish</b>	Smooth steel trowel
<b>Performance requirements</b>	<ul style="list-style-type: none"> <li>&gt; To Council standard</li> <li>&gt; Restrained edges all sides</li> </ul>
<b>Maintenance</b>	No direct maintenance required

**Uses & Applications**
**Typical 140mm wide kerb**

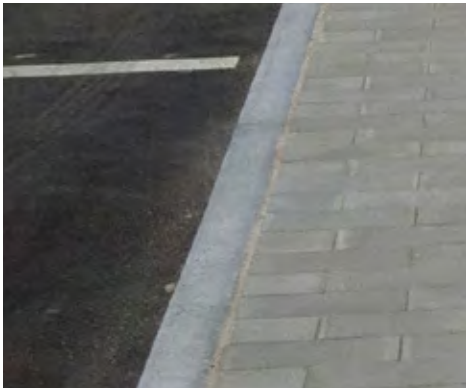
- > Distributor roads
- > Collector roads
- > Local roads

**250mm wide kerb**

- > Arterial roads
- > Sub-arterial roads
- > Special character areas

## COST

	Low	Med	High
<b>Initial cost</b>	○	○	●
<b>Maintenance cost</b>	●	○	○
<b>Whole of life cost</b>	●	○	○

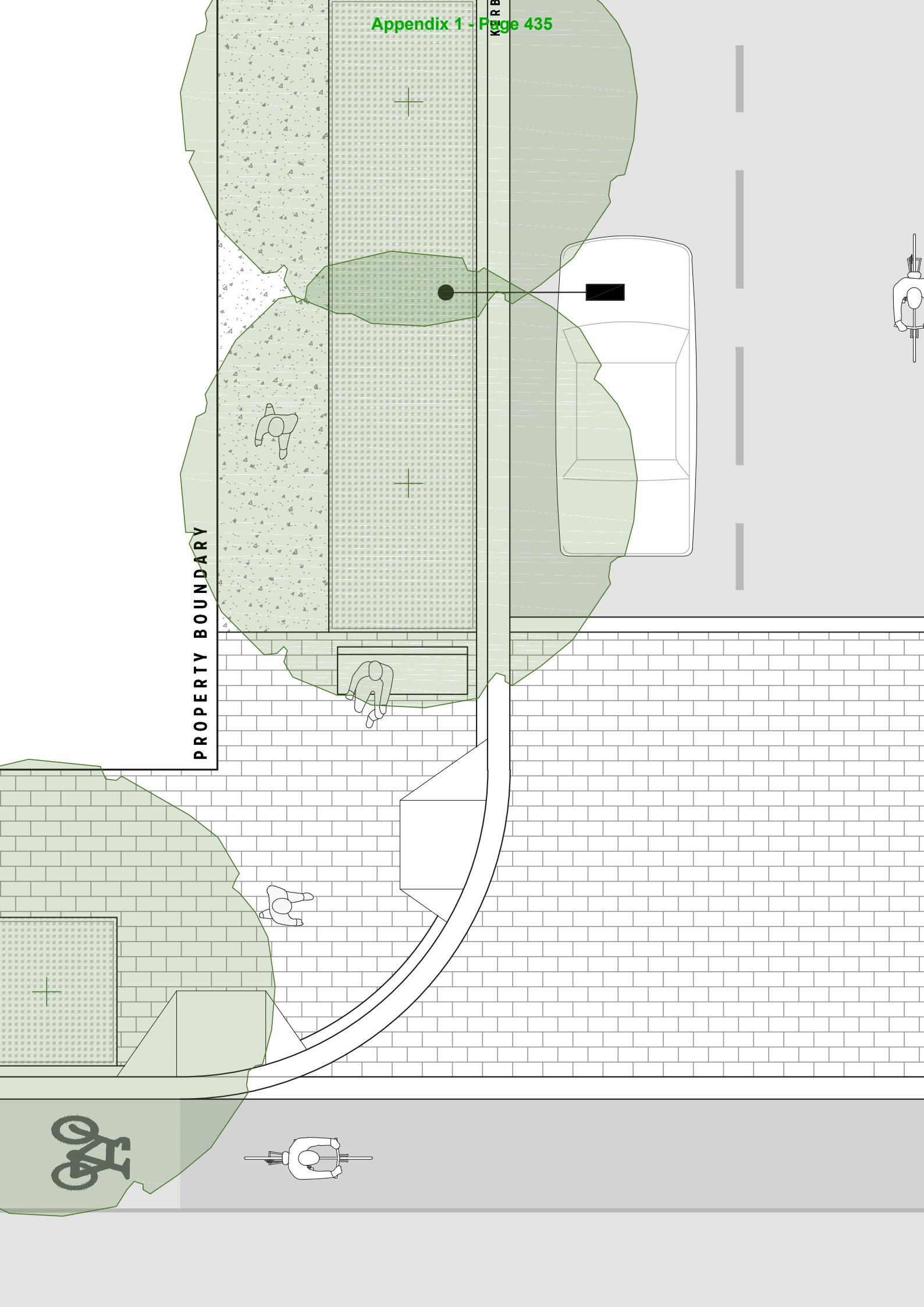


140MM WIDE KERB



250MM WIDE KERB





# Part E

# Applying the Template

# Templates

## Overview

The following sections illustrates a series of templates intended for use by Council staff as a guide to inform the design and installation of high quality, comfortable streets in the city that contribute to local walking and cycling networks and facilitate street activation.

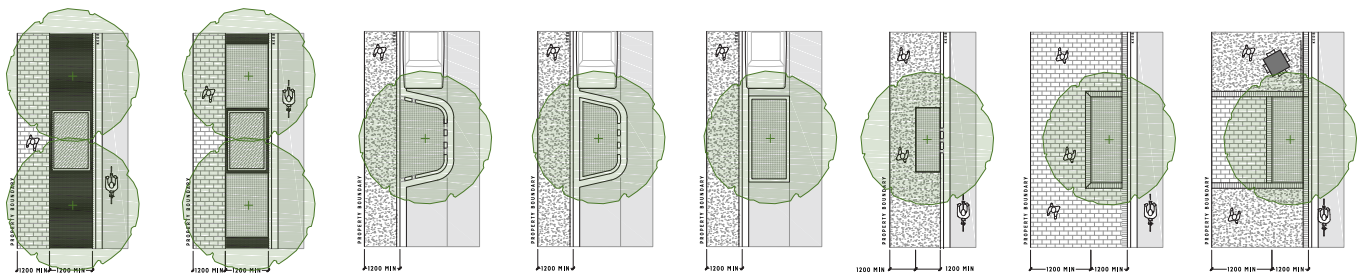
The templates are grouped under the following categories:

- i. Verges**
- ii. Intersections**
- iii. Bicycle lanes**



# Content

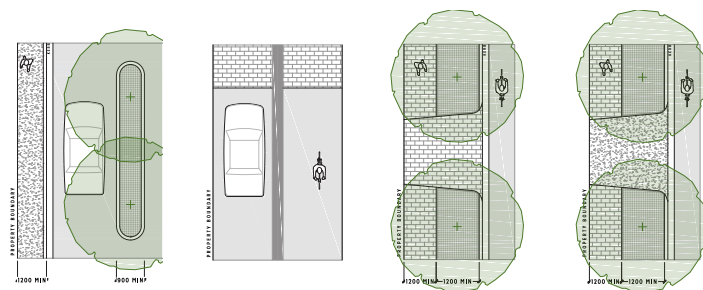
## i. Verges



Typical streets

High use streets

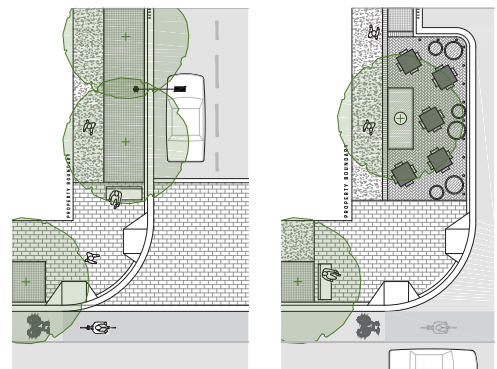
## i. Verges



Alternative streets & laneways

Crossovers

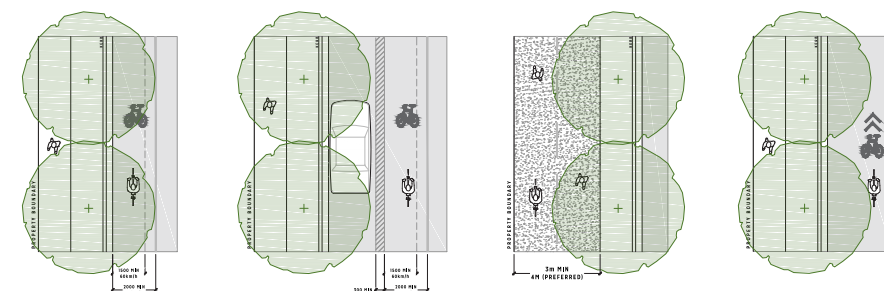
## ii. Intersections



Thresholds

Protuberances

## iii. Bicycle lanes



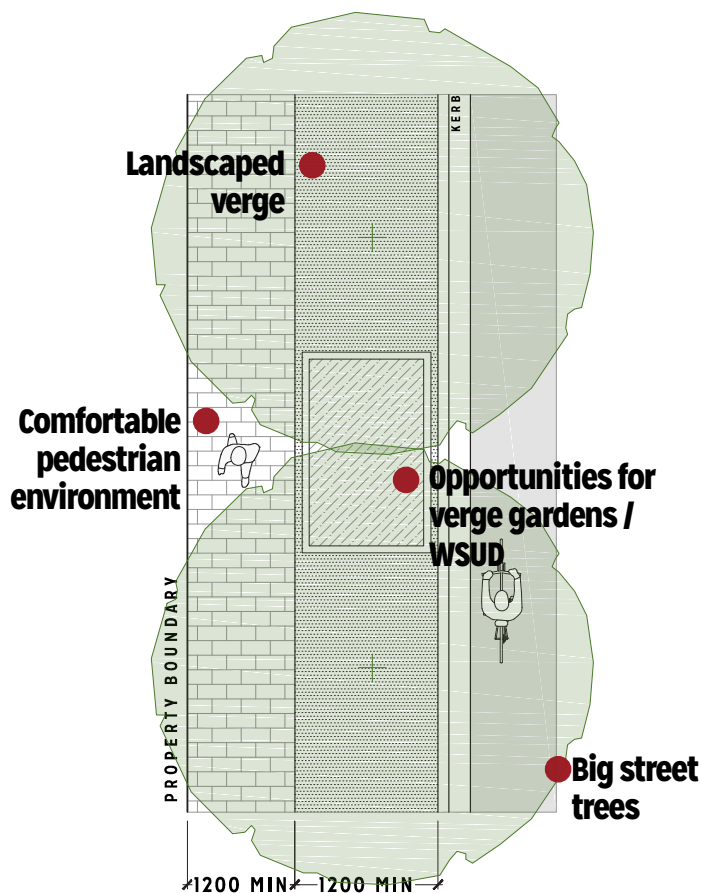
On-road bicycle lanes

Shared paths

Shared streets

# Verges

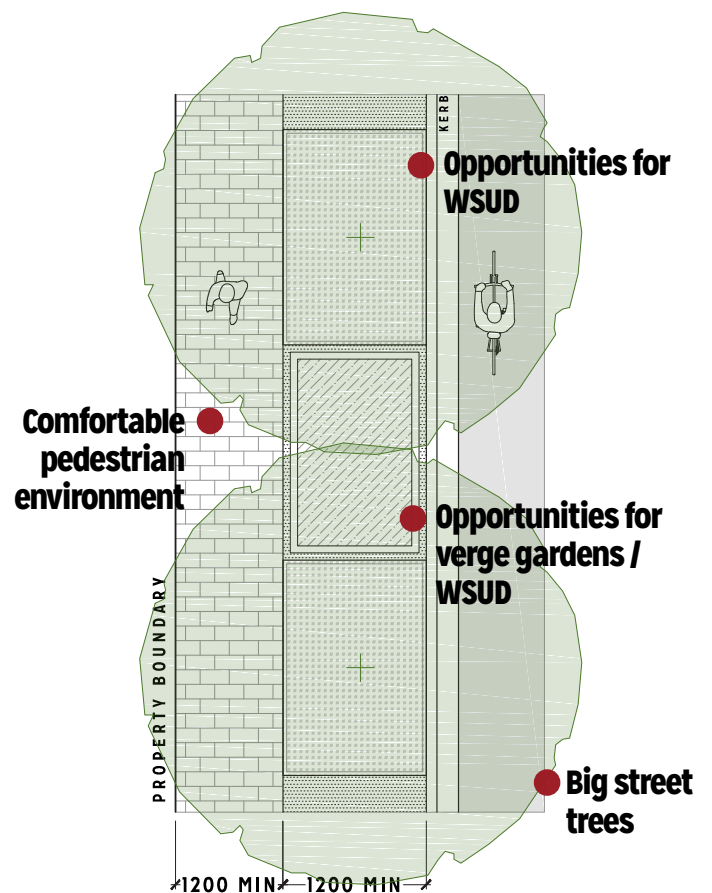
## Typical streets



### Where to apply

Typical verge treatment for;

- > Distributor roads
- > Collector roads
- > Local roads

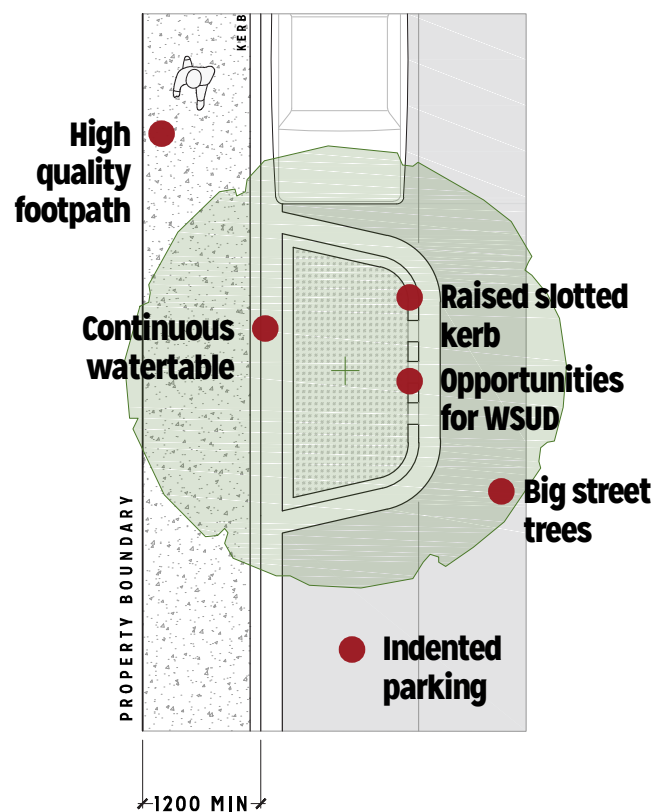
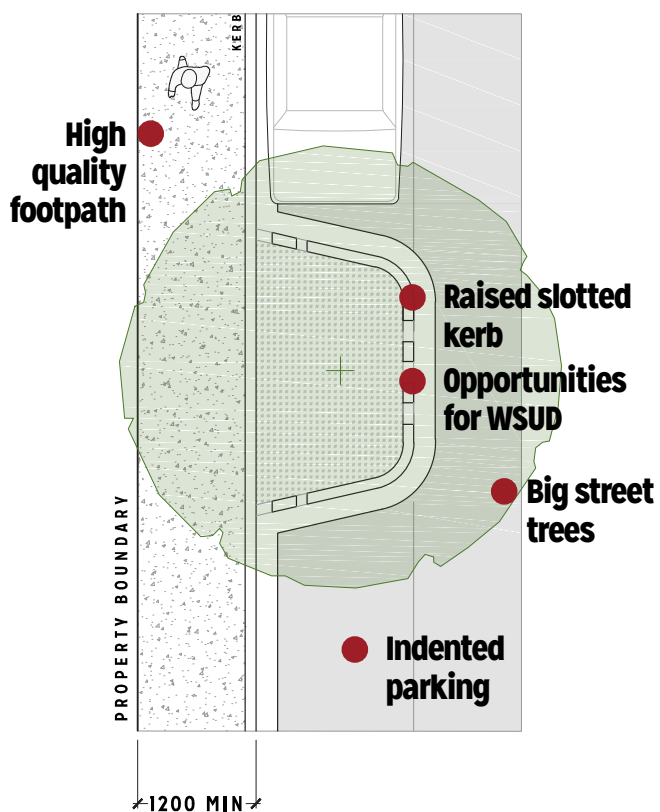


### Where to apply

Typical verge treatment where opportunities for WSUD exist, including:

- > Distributor roads
- > Collector roads
- > Local roads

## Typical streets



### Where to apply

- › Local and collector roads with indented parking and slower traffic speeds and volumes
- › Roads where rain gardens can be connected to stormwater

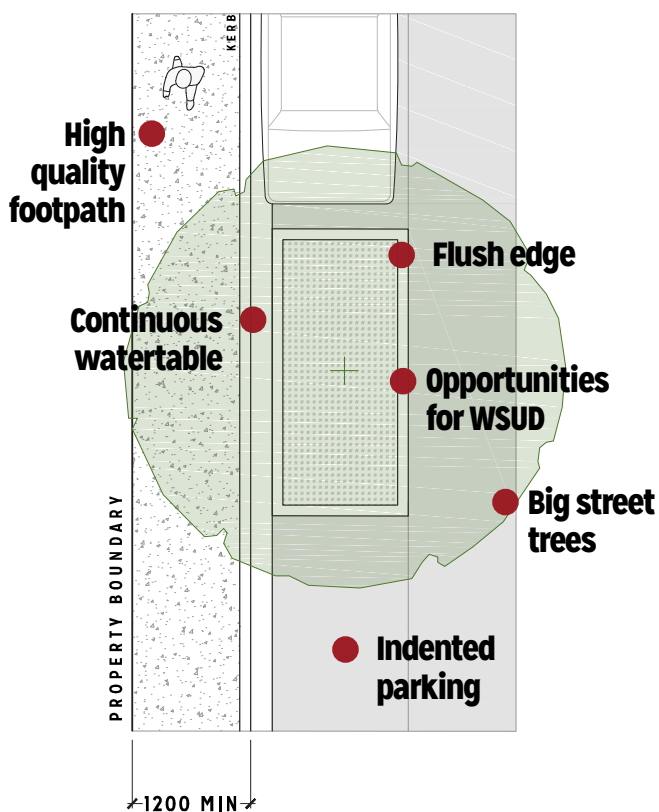
### Where to apply

- › Local and collector roads with indented parking and slower traffic speeds and volumes
- › Roads where rain gardens cannot be connected to stormwater



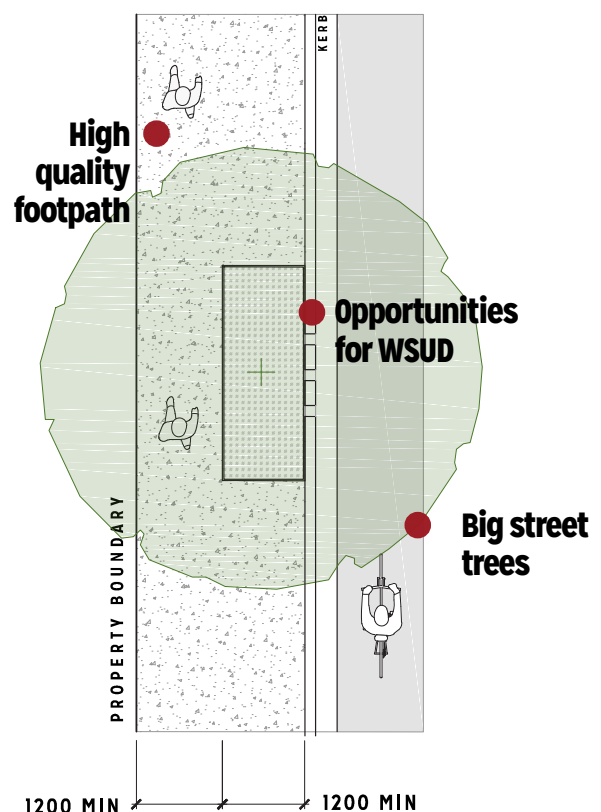
# Verges

## Typical streets



### Where to apply

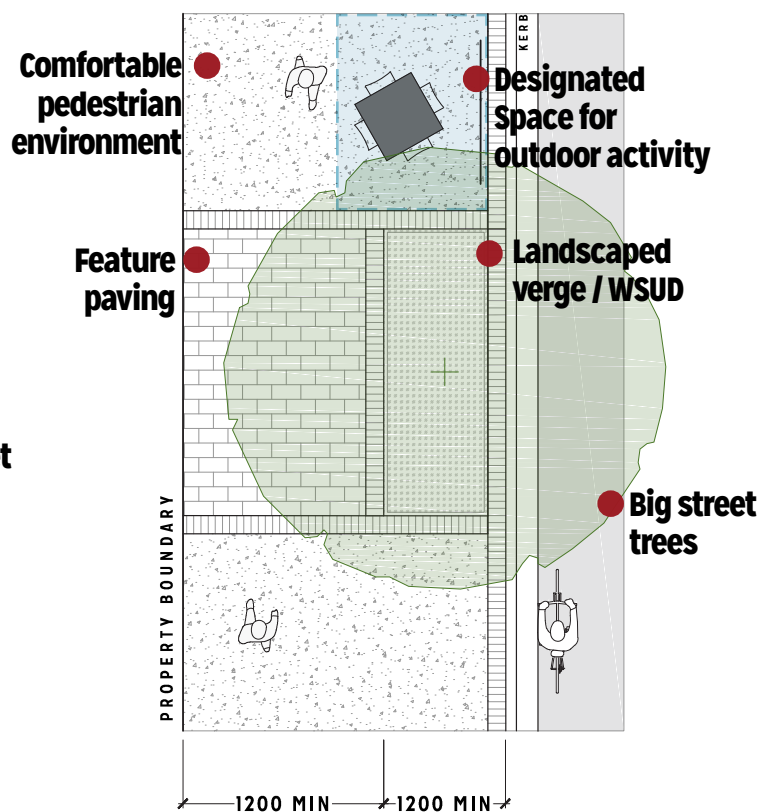
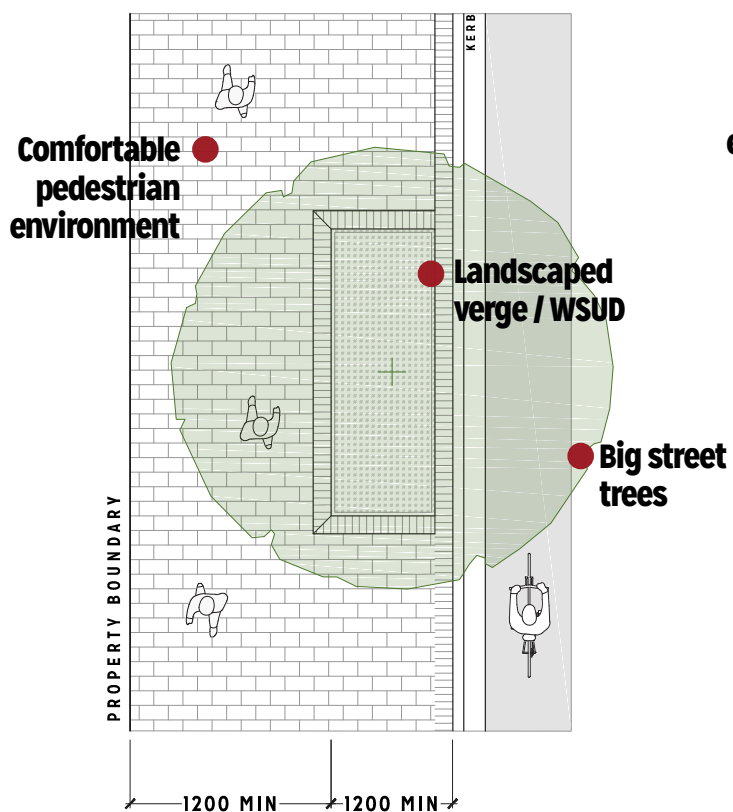
- > Local and collector roads with minimal verge width, indented car parking and slower traffic speeds and volumes
- > laneways (where road width allows)



### Where to apply

- > Local and collector roads with minimal verge width and slower traffic speeds and volumes
- > Roads where rain gardens can be connected to stormwater

## High use streets



### Where to apply

Typical verge treatment for:

- > Arterial
- > Sub-arterial
- > Distributor roads at key nodes and activity centres

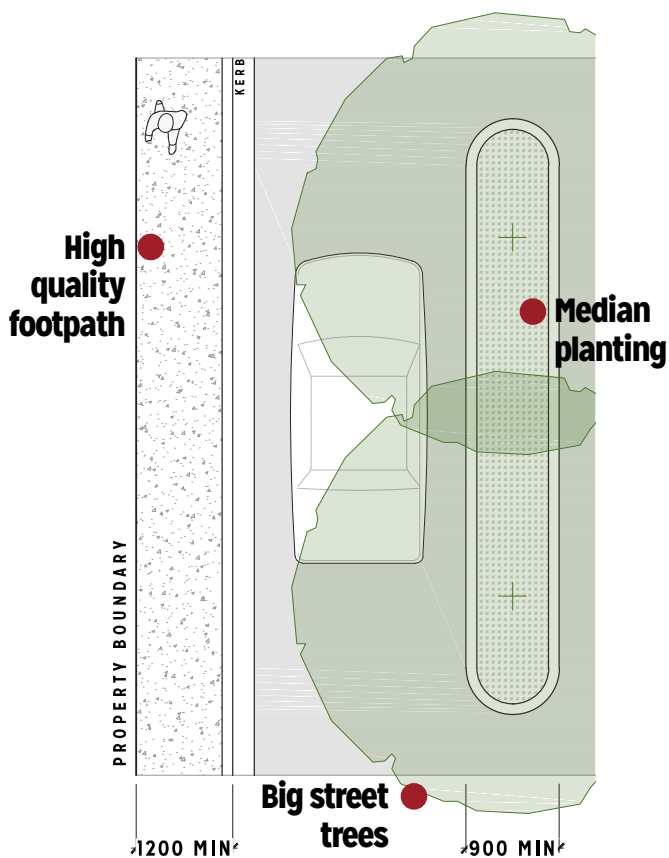
### Where to apply

High quality verge treatment for use at:

- > Arterial, sub arterial and distributor roads that incorporate space for outdoor activity
- > Key nodes and civic centres

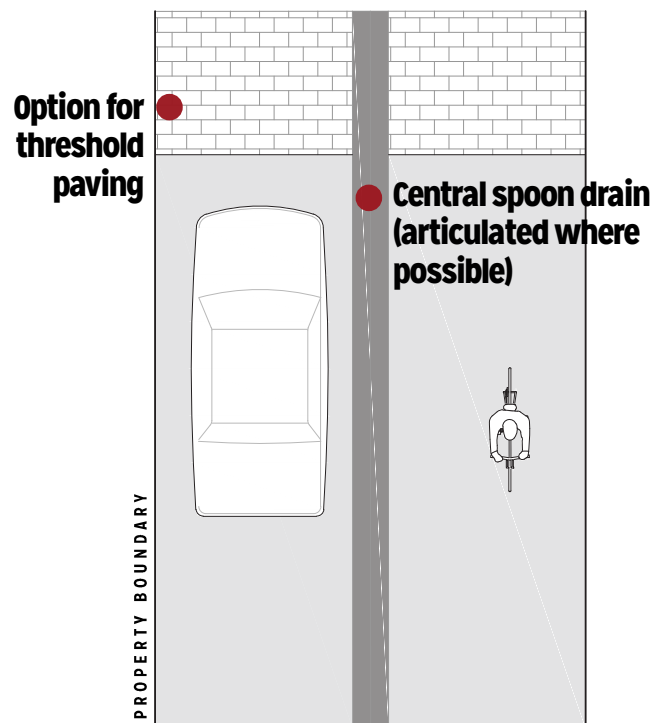
# Verges

## Alternative streets and laneways



### Where to apply

- > Local and collector roads that incorporate minimal verge width and slower traffic speeds and volumes
- > Roads with prominent overhead infrastructure
- > Laneways (where road width allows)

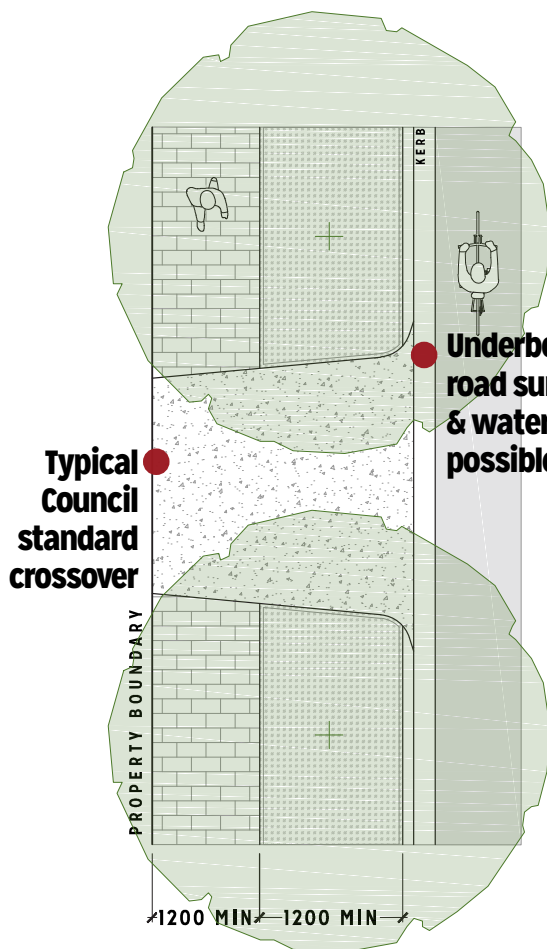


### Where to apply

Laneways



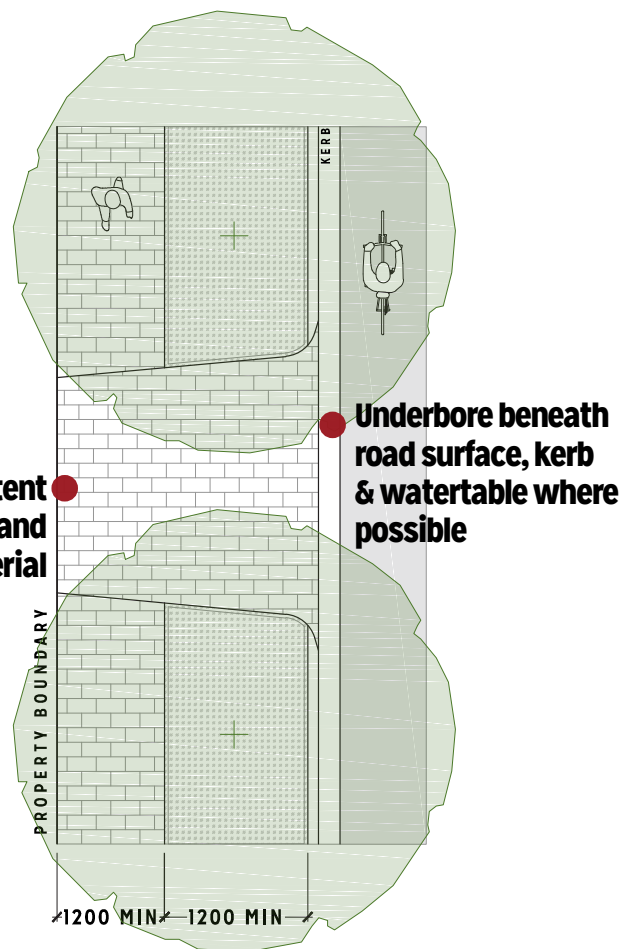
## Crossovers



**Typical Council standard crossover**

**Underbore beneath road surface, kerb & watertable where possible**

**Consistent crossover and footpath material**



**Underbore beneath road surface, kerb & watertable where possible**

### Where to apply

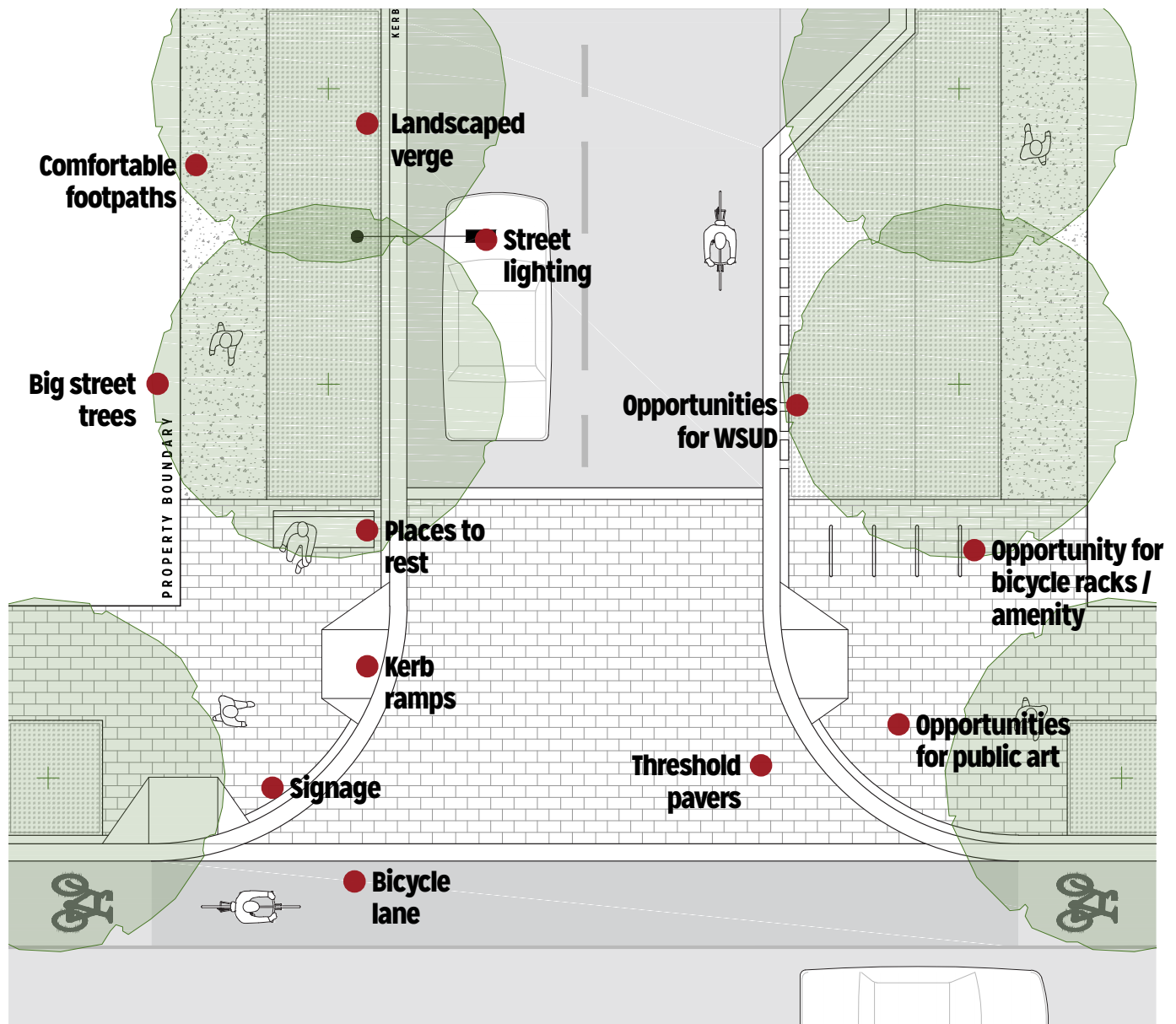
Standard crossover treatment within Council

### Where to apply

Significant streetscapes

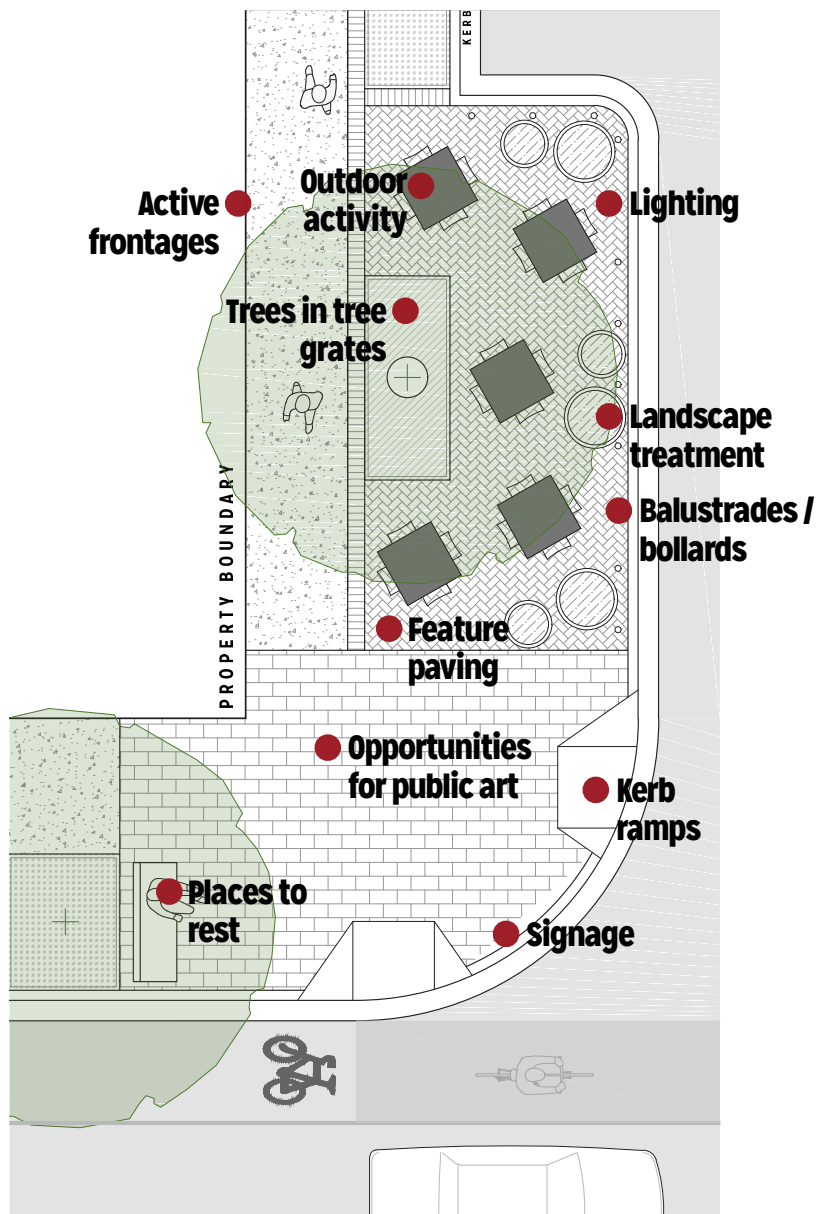
# Intersections

## Thresholds



Example of traffic control device to complement streetscapes

## Protuberances



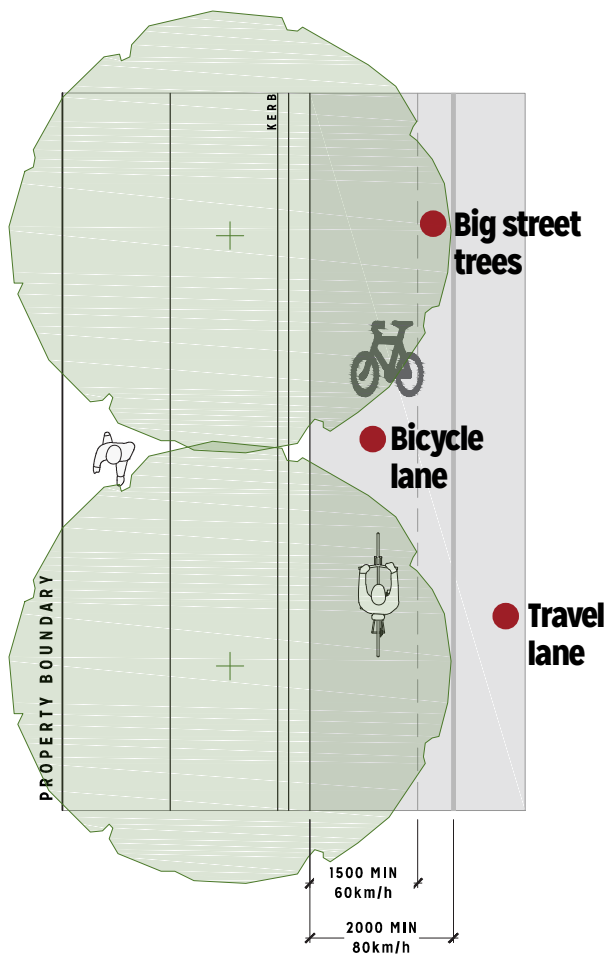
### Where to apply

Key activity areas adjacent 'corner shops', local and neighbourhood centres (typically located on local, collector and distributor roads).



# Bicycle lanes

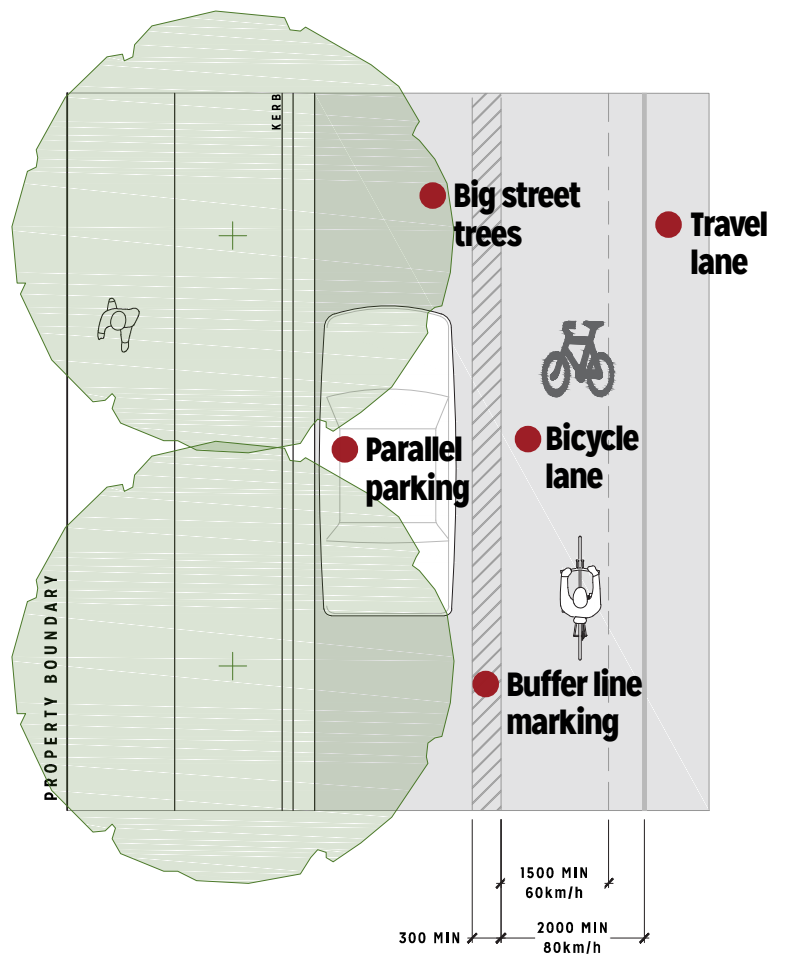
## On-road bicycle lanes



### Where to apply

Standard bicycle lane for:

- > Arterial roads
- > Sub-arterial roads
- > Distributor roads
- > Collector roads



### Where to apply

Typical bicycle lane for roads incorporating designated on-road parking including:

- > Arterial roads
- > Sub-arterial roads
- > Distributor roads
- > Collector roads









Part F

# Implementation

# Implementation

## Overview

**The City of Marion Streetscapes Design Guidelines establishes a long term vision for streetscapes in the city. The guidelines are a significant first step in developing high quality, recognisable streets that enhance the character and amenity of the city and balance the needs of vehicles, pedestrians and cyclists.**

**Implementation of the guidelines will occur over a number of years and will occur as standalone projects and concurrently with other streetscape improvement in the city including infrastructure and service upgrades.**

## Delivery

As a guiding document, it is intended that the guidelines will be used as a reference manual by Council staff to inform capital works budgets, staging, funding opportunities and delivery mechanisms.

The preferred approach to the delivery of guidelines is to adopt an integrated approach that aims to embed streetscape strategies within existing Council processes and enhance efficient delivery of the vision.

## Staging

### Transformational Projects

Significant high cost projects that change the nature, amenity and environment of the street and often relate to other initiatives and projects, such as walking and cycling.

### Renewal Programs

Projects that may consist of street tree planting, footpath upgrades, water sensitive urban design,







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