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introduction
Purpose
The Glenroy Activity Centre Streetscape Masterplan (SSMP) has been developed to provide a coordinated and consistent approach to the streetscape of Glenroy. It consists of principles and objectives to be used when designing and constructing streetscape improvements within the centre. Technical information is provided to inform engineering and design resolution of future works. An implementation plan will guide these streetscape improvements and will aid in coordinating the works across Council. The implementation plan prioritises streetscape works for the purpose of planning for and securing adequate funding.

Scope
The SSMP applies to all streets within the Glenroy Major Activity Centre. The Masterplan has taken into consideration streets leading to and connecting into the centre. However the master planning and design of connecting streets will be largely guided by Moreland Street Landscape Strategy, which is expected to be finalised early 2012.

The SSMP further develops the urban design strategies and streetscape principles identified in the Glenroy Structure Plan. Specifically these are:

- Define and target improvement to the ‘active movement network’
- Revitalise and reinforce the centre’s traditional ‘Main Streets’
- Develop the centre as a series of distinct but well connected precincts. Each precinct offering a unique urban quality with a particular function, ambience and scale.
- Prioritise coordinated improvements to the streetscape along the “Active Movement Network”
- Reduce visual clutter and achieve consistency of street infrastructure to improve pedestrian/cycling amenity and legibility.
- Prioritise detailed landscape concepts for the two key east-west movement corridors of Belair Avenue to Murrell Street, and Glenroy Road.

Output
The output of the SSMP will be a number of projects of various scales including:

- place activation projects;
- centre wide projects coordinating elements such as:
  - surface materials;
  - street trees;
  - drainage;
  - furniture;
  - signage;
  - bicycle movement;
  - public art;
  - lighting;
  - maintenance;
- streetscape improvements; and
- tech-notes [technical information relating to streetscape details, fixings and furniture] for the Glenroy Activity Centre.

These projects are further outlined in the implementation plan. This plan prioritises and guides future streetscape works. An evaluation process has also been developed to assist in the prioritisation of the works and as a way of reviewing the effectiveness of the improvements in terms of implementation, value and community acceptance.
**policy context**

This masterplan sits within a framework of planning and strategic documents which together will guide the revitalisation of the Glenroy Activity Centre. This masterplan should be read in conjunction with other Moreland policies and strategies.

Other policies that should be considered include:

- Arts & Culture Strategy 2011-2016
- Art in Public Places Moreland City Council Public Art Guidelines 2012

* yet to be developed
Who should use the SSMP

The Glenroy SSMP provides advice to various stakeholders within the Glenroy Activity Centre. They include:

- Glenroy Place Manager, to assist with the coordination of work across Council.
- Moreland City Council’s Place Design & Strategy branch, to guide streetscape improvement works within the Glenroy Activity Centre.
- Moreland City Council’s Capital Works Planning and Delivery Branch, to guide construction and maintenance works within the Glenroy Activity Centre.
- Moreland City Council’s Urban Development Branch, to assist planning officers to understand the future character of the centre in relation to assessment of development applications.
- Applicants and consultants who have a responsibility to meet the requirements for streetscape upgrades as defined by the SSMP and who will provide a clear vision and guidance for the Centre’s future streetscape character.

Structure of the SSMP

The SSMP is divided into 2 parts:

- **Masterplan Framework**
  - Introduction
  - Background Research & Review
  - The Masterplan
- **Design & Implementation**
  - Centre Wide Design Strategies
  - Streetscape Design
  - Implementation

Masterplan Framework

This section outlines the purpose of the masterplan, who should refer to it and how. More importantly it establishes a unified and informed approach to Glenroy’s streetscapes. This is done through a review of the existing conditions and research into streetscape design which is considered best practice. Finally this section presents the masterplan and the underlying key principles which form the basis of future capital works projects.

Design & Implementation

This section provides design guidance for centre wide strategies and for each of the streets within the centre. Centre wide strategies will assist in the coordination of those elements which operate both at a specific street scale but also at the broader scale across the centre. More specific guidance is provided for individual streets. Each street is defined and described in terms of its current condition and its preferred character.

An implementation plan is also provided to prioritise the projects which come about subsequent to the SSMP. This includes a discussion regarding ongoing maintenance, asset renewal and evaluation techniques.
background research & review
Glenroy Streetscape Character

The Glenroy Activity Centre is characterised by a mix of residential and commercial streets. The core of the Activity Centre consists of the three key shopping strips, Pascoe Vale Road, Wheatsheaf Road, and Post Office Place.

Wheatsheaf Road was the first strip in Glenroy established in the late 1800’s with the development of a butcher, baker, and a general store. The 1950’s saw a significant growth in the area which saw further commercial development on Wheatsheaf Road and the establishment of the Pascoe Vale Road shopping strip. Beyond the commercial area, the residential streets are relatively wide, featuring concrete footpaths and wide nature strips. The area consists of detached houses with significant front setback gardens.

First impressions of Glenroy can be overwhelming, an appearance of city centre decline with serious traffic congestion. However there are a number of smaller spaces, experiences, and opportunities within a relatively coherent urban structure which will be the basis for the centres regeneration. The streets are well proportioned. However they offer little in terms of pedestrian comfort and informal gathering. There is significant pedestrian movement throughout the centre but not without constraints.

There is a definite sense of community and within the community there is significant diversity and vibrancy which should inspire the redevelopment of Glenroy. The purpose of the SSMP is not to attract people to the centre as there is already significant pedestrian movement in the centre, but to create a high quality environment and valued experience for those pedestrians.

Among the most significant urban design challenges in Glenroy is the perception a ‘Centre’ and how people use it. The major constraint is vehicle traffic through the centre and the provision of parking to accommodate a growing number of rail commuters. This has resulted in a diminished public realm and a relatively poor pedestrian amenity. Glenroy has become a place to park and pass through rather than a destination to enjoy.
background research & review

People coming and going through Glenroy frequently, the challenge is to create high quality urban spaces for them.
Glenroy’s Public Realm Design Aesthetic

A background review undertaken during the development of the SSMP included individual street assessment. The purpose of the review was to understand the existing conditions and evaluate the quality of Glenroy’s streetscapes. The review considered the availability, aesthetic, and condition of elements such as:

- Street trees;
- Street Furniture;
- Footpaths;
- Parking;
- Signage;
- Ease of pedestrian movement; and
- Land Use.

The review highlighted the current wide range and lack of coordination of Glenroy’s public realm. A key aim of this SSMP is to provide a coordinated approach to the public realm that will achieve a coherent and legible character and enhance the Glenroy ‘look’, positively affecting the community’s perceptions and the local identity.

Key considerations include developing a design aesthetic that is:

- Contemporary and elegant;
- Robust;
- Displays a consistent design language through the use of colour, form, and detailing; and
- Sustainable in material selection including embodied energy, life cycle costs, work labour practices, and provenance.
streets beyond moreland

Bleecker Street
Greenwich Village, New York

Bleecker Street is a small residential street that runs east west through Greenwich Village. Its attractiveness and diversity comes from a mix of activity, informality, and creative storefronts. This enables the street to function both as a destination and as a neighbourhood street where residents can still go about their daily tasks. The presence of people makes the street feel safe and maintains a constant level of energy and use.

George Parade
Melbourne, Victoria

The Melbourne laneway system, whilst not serving the primary functions of the street networks, has become a vital network contributing to the broader city form. The combination of scale, activation, and clever management of movement patterns provides unique spaces within the central city. The intimate scale of these lanes offers exciting social, retail and recreational opportunities for pedestrians throughout the city. The lanes are used primarily for services, however they still provide a level of pedestrian amenity through narrow footpath, high quality surface treatments, and traffic management measure to ensure that pedestrian movement throughout the city is sustained in conjunction with essential vehicular movements.

High Street
Northcote, Victoria

High Street is one of Melbourne’s oldest shopping strips. Recent upgrades to Tram route 86, has resulted in improvements to pedestrian amenity within a relatively constrained street. They include widening portions of the footpath which replaces some parking spaces, landscape planting at intersections, and bicycle lanes. The project integrates traffic calming, and pedestrian amenity.
Importance of Streets

Streets are the most important element of the public domain and are fundamental to the form and function of the urban environment. They provide a setting for people, buildings and activities and more importantly are an exchange between these elements.

Traditionally streets were shared spaces with a diverse set of vehicular and pedestrian uses, however in recent time the focus has predominately been on facilitating vehicle movement and parking, resulting in a decline in the social and civic activity on streets. Certain physical qualities are required to create effective and relevant street environment and affect the programs of a street including; accessibility, publicness, liveability, safety, comfort, participation, and landowner responsibilities.

The Glenroy SSMP promotes a more balanced approach to street design that recognises the need to accommodate public life and amenity as well as cater for traditional linking and transport corridor functions.

Main Street extension
Broadmeadows, Victoria

The project comprises of kerb and no kerb arrangements, its visible water sensitive urban design, accessible pavements, and open ended gestures toward adjacent sites makes provision for significant integration and public realm opportunities in the future. The result of the project is a street that is primarily a public space that accommodates vehicular movement. The street has become a connecting element to a number of civic uses that bleed into a street that prioritises the pedestrian.

Residential street
Glenroy, Victoria

The Glenroy Activity Centre includes a number of residential streets. These streets are strong pedestrian links to key community facilities and the commercial centre. The streets have a traditional profile including a concrete footpath, deep nature strip, and informal on-street parking. Streets such as Melbourne Avenue and the south end of Wheatsheaf Road have a strong consistent landscape character. The balance between footpath and naturestrip width is the key to creating similar walkable streets.
the masterplan

Opportunities & Constraints
- strengthen street landscape
- highlight key gateways
- widen footpath
- corner treatments
- integrate park edge with street
- green linear plaza
- urban plaza
- shared space
- activate frontages
- upgrade footpath
- improve pedestrian connection
- activate laneways
- possible bike path
- improve east west connections
- improve intersection
An analysis of the centre was undertaken which identified the following characteristics of the centre and the opportunities that exist.

**Access & Movement**

**Pedestrian movement** is constrained by ever present traffic, combined with limited pedestrian crossings along the major roads. Movement within the parking areas and to the shops is awkward due to lack of legibility of these areas. The footpaths are generally cluttered, narrow, and adhoc in appearance.

The centre is dissected by the Craigieburn Rail Line. A signalised level crossing on Glenroy Road is a significant barrier to pedestrian and bicycle movement. The rail line further separates the centre of Glenroy effectively separating Wheatsheaf Road from the activity in Post Office Place and Pascoe Vale Road.

There are significant issues with anti-social behaviour in and around the station which detracts from the area and at times contributes to an unsafe pedestrian environment. The existing pedestrian underpass does not meet current standards for disability access. This is an important pedestrian connection along the key east west pedestrian spine.

The **transport interchange** area both east and west of the train station is surrounded by car parks, creating a space which is isolated from the centre of Glenroy. The reconfiguring and design of the transport interchange has the potential to invigorate the centre of Glenroy and substantially ameliorate the otherwise hostile environment, essentially transforming it into a central public space which is coordinated with public transport.

**Opportunity:**

- Improve the pedestrian environment generally by widening footpaths where possible, and develop a standard surface treatment to improve legibility of the pedestrian environment.
- Improve pedestrian movement between parking areas and the shops through the transformation of the laneways behind the shops.

- Integrate the public realm through and into the station environs to create a legible free flowing pedestrian environment. This will include advocating for the upgrade of the underpass through a coordinated approach between Council and the Department of Transport.
- Provide bicycle lanes, both on and off road, to encourage alternative modes of transport.

**Landscape & Environment**

The presence of **street trees** is limited due to overhead powerlines, narrow footpaths, and shop awnings. There remains very little space for trees to be planted and grow to their full potential. The lack of street trees results in a hard urban environment with minimal relief.

The most significant landscape treatments exist in and around the **carpark areas**. This goes some way to ameliorating the impacts of such large areas of parking within the centre. Whilst there are some significant trees around these areas, the pedestrian environment is still relatively challenging due to poor legibility and safety for pedestrian moving in and around these areas.

Glenroy has large areas of **impermeable surfaces**. This result in large amounts of valuable water entering into the stormwater system untreated. The opportunity exists to use this water for passive watering which will reduce the amount of pollutants entering the stormwater systems and assist in the establishment of street landscapes.

**Opportunity:**

- Street corners and parking boundaries offer opportunities to ‘green’ the centre of Glenroy and mitigate the over abundance of asphalt and hard surfaces.
- Incorporate water sensitive urban design as part of streetscape improvements as a way of providing passive watering and reduce pollutants entering the stormwater system.
- Underground powerlines particularly on the primary pedestrian streets to allow for street tree planting.

**Identity & Sense of Place**

Within the Activity Centre public space is limited. Mott Reserve and Morgan Court are the main gathering spaces. It is important to recognise streets as public spaces where people can experience public life, participate informally, and feel part of a broader community. These spaces are the foundation to the urban identity, community life and sense of place. Streets are experienced as part of many people’s daily routine, and are often appreciated only from a utilitarian point of view. The SSMP aims to have more people spending time and socializing in these public spaces as a way of increasing the vitality of the centre.

**Opportunity:**

- Develop a design language for the streets so there is consistency and so that the identity of Glenroy is reinforced in all future public realm upgrades.
- A concentration of such things as trees and seats on the corners will create a strong identity and clear demarcation of the intersections providing space to rest along the busy streets.
- Create an integrated public realm through a consistent design language that allows multiple streets to read as a continuous space. Connecting Morgan Court, Post Office Place, the station forecourt, the underpass, and bus interchange will provide a coherent pedestrian priority zone in the centre of Glenroy.
- Connect the more isolated spaces to the main streets to encourage pedestrian movement and activate these spaces. This includes a connection between Morgan Court and Glenroy Road and Pascoe Vale Road, and the IGA carpark and Wheatsheaf Road.
Principle 1: Identity

Improve the perception of the Glenroy Activity Centre through the development of legible themes and a coherent palette of materials and finishes that help to create a strong sense of place. This will be achieved by:

- Strengthening the identity of the Glenroy Activity Centre with consistent elements including furniture, signage and surface treatments.
- Inserting gateway markers to enforce the identity of the Glenroy Activity Centre.
- Integrating public art into streetscape improvements to ensure a coordinated approach.
- Allowing design flexibility within the materials palette to express and reinforce the sense of place and local identity.
- Providing high quality spaces for rest, interaction, and display of public life.

Principle 2: Amenity

Streets are critical to the liveability and sustainability of urban environments. They are important places for people to meet and socialise. The SSMP will provide high quality public environments that improve pedestrian amenity within the centre by:

- Creating unified streetscapes that are of high quality, durable, timeless in design, and form a significant part of the public realm of Glenroy.
- Creating green corridors with increased tree planting and landscape treatments to reduce the extent of hard surfaces and improve canopy cover, biodiversity, microclimate and the pedestrian environment.
- Undergrounding power to improve the character and amenity of key streets.
- Providing amenities such as seats, water fountains, and bike hoops to support pedestrian and bicycle use.
- Identify main pedestrian routes to the centre and prioritise works to improve amenity through tree planting and seating that will encourage people to walk to the centre.

Principle 3: Connectivity

Prioritise pedestrian movement throughout the centre by ensuring a high level of connectivity and legibility and minimising pedestrian/vehicular conflicts where possible by:

- Implementing a wayfinding strategy to aid vehicle, bike and pedestrian circulation.
- Providing alternate routes for pedestrians who wish to avoid busy main streets.
- Acknowledging the station/bus interchange as the heart of the Activity Centre and work with VicTrack and Metro Trains to improve the safety, amenity and visual aesthetics of the station precinct.
- Providing a connected and legible pedestrian and bicycle network that facilitates safe, accessible, and convenient connections to desirable destinations.
- Ensure universal design and accessibility for ease of use and access to destination for all people particular those with visual or mobility impairments.
Principle 4: Sustainability

Streets occupy a large part of the Activity Centre. This provides a significant opportunity to contribute to sustainability outcomes. This will be achieved by:

- Identifying opportunities to install bio-filtration or ‘rain gardens’ at key locations. This will assist in self-sufficient street greening, water treatment and improved streetscapes.
- Ensure the ongoing use of materials and designs that are hard wearing, low maintenance and long lived.
- Selecting materials with low embodied energy, high recycled content local provenance, and high durability.
- Encouraging and design for pedestrian, bicycling, and transit use to minimise contribution to greenhouse gas emissions and reduce local air pollution.
- Utilise protective coatings for timber and painted steel to mitigate graffiti and ageing of street furniture assets.

Principle 5: Safety

Create safe and accessible public spaces that are active both day and night by:

- Implementing traffic calming measures including raised pedestrian crossings, signalised crossings at appropriate locations, bike lanes, outstands and speed humps.
- Increase and improve street lighting strategy to provide better safety and legibility of streets and pedestrian connections.
- Improve the safety and accessibility of the existing pedestrian underpass at Glenroy Train Station. Encourage the development of a new underpass which meets current standards for disability access and provides a more direct connection between Post Office Place and Marlborough Street.
the masterplan

Station Environs Precinct
- Integrated public realm including Morgan Court, Post Office Place, and Dowd Place
- New station plaza
- Glenroy Road linear reserve
- Improved link between Pascoe Vale Road and Morgan Court

East-West Pedestrian Spine
- Maribyrnong Street shared space
- Improved underpass connection
- Post Office Place shared space
- Bike lane on Belair Avenue
- New urban park integrated Belair Avenue

Wheatstone Road Precinct
- Widen footpath to the north of Sturges Street
- New urban plaza and link to ISA carpark
- Activate laneways through Peaceful Pathways project
- Improved intersection at Wheatstone Road and Glenroy Road
The SSMP proposes a number of initiatives of various scales across the whole Activity Centre.

- Centre Wide Projects: are envisaged as instrumental in re-configuring and reprogramming the character and use of public open space and primary active movement networks within Glenroy.
- Streetscape Improvements: focus on upgrades to streets that will directly benefit the local community through better pedestrian access and amenity.

The diagram on the opposite page outlines the components of the masterplan and how they are presented in this document.
centre wide strategies

Existing
- Brick paving inserts
- Brick pattern edging
- Feature inlays in asphalt
- Concrete
- Concrete pavers
- Feature brick paver in asphalt

Proposed Standard
- Concrete paving units
- Asphalt footpaths and concrete kerbs
- Exposed aggregate

Feature
- Steel inlays
- Imprint graphics into surface
- Feature paving as a visual and audible indicated to drivers they are crossing into a pedestrian area.

Project Examples
- Asphalt footpaths with stone edges continues the continuity of the kerb to demarcate the intersection.
- Use of similar materials with different textured finishes.
- Consider how the surface can be extruded to be more than a surface - Peel Street Park Collingwood (Convic Design)
- Selection of materials is important in creating shared spaces with a continuous surfaces.
- Opportunities to use bold supergraphics to add a sense of play to key public spaces.
- Retail concrete footpaths in residential streets.
Surface treatments provide a unifying effect to the streetscape and can create a distinct identity for a centre. It can give a sense of continuity between different areas and/or act as a neutral backdrop.

The SSMP will establish a consistent palette of paving materials that creates a clear, coherent public domain structure which provides a unified recognisable character. The Glenroy Activity Centre will have a basic surface treatment for the residential streets and one for the commercial street. Residential streets will continue the tradition of concrete footpaths, and nature strips. Commercial streets will consist of asphalt footpaths and concrete kerb and channels.

Feature surface treatments can be added to allow for local variations and reflect and celebrate the diversity of the centre.

**Design Principles**

Council will establish a standard paving treatment for both commercial and residential streets within the centre. A technote will be prepared to ensure ongoing consistency. The paving treatment will:

- Create a high quality pedestrian environment through the use of robust, durable and easy to maintain materials;
- Reinforce the streetscape character of Glenroy, provide a simple, durable, manageable and consistent palette that is appropriate to the different street types;
- Consider sustainability objectives in material selections including embodied energy, life cycle costing and provenance; and
- With cross fall designed to be self cleaning, 1:80 gradient channels can be incorporated.

**Primary Commercials Streets**

Mid-dark grey concrete paver. (see technote A110.08)
- Pascoe Vale Road
- Wheatsheaf Road

**Shared Streets**

These streets are seen as key public spaces as well as streets. The surface treatment will be similar to the primary commercial street but will be subtly different through alignment, size, colour, or include feature paving that responds to the design of the public space.
- Post Office Place
- Morgan Court
- Marlborough Street

**Secondary Streets**

Asphalt footpath with concrete kerb and channel. (see technote A110.02)
- Glenroy Road
- Hartington Street
- Dowd Place (south of Post Office Place)
- Waterloo Road

**Residential Streets**

Standard concrete footpath with concrete kerb and channel. (see technote A110.01)
- Murrell Street*
- Wheatsheaf Road (south Plumpton Avenue)*
- Blenheim Street
- Finchley Street
- Belair Avenue*
- Lytton Street
- Gladstone Parade*
- Cromwell Street
- Plumpston Avenue
- Argyle Street
- Acacia Street
- Nelson Street

* Indicate Streets where footpaths can be widen to 2.0 metres without effecting the road width or parking allocation.

**Recommendations**

- Further investigation into the possibility of widening the residential street footpaths is required following the Parking Precinct Plan and Integrated Transport Strategy. The streets that are currently unable to be widen are so due to the limited width of the naturestrip therefore limiting the potential to increase tree planting.
- Supergraphics on road and footpath surfaces will be used as part of a wayfinding system, and tactical inititaives. There is also opportunity to look at public art and surface painting to encourage bike use particualry to the local schools.
RESIDENTIAL TREES

- Acer campestre (Hedge Maple)
- Eucalyptus platypus (Moort)
- Eucalyptus torquata (Coral Gum)
- Gingko biloba (Maidenhair Tree)

Legend:
- Residential street tree
- East west pedestrian spine tree
- Commercial centre tree
- Urban public space trees
- Green open space trees
- Carpark trees

centre wide strategies
Most cost effective expenditure to improve the quality of a street is tree planting. Street Trees perform a number of very important functions when planted in the urban environment. These positive attributes include the ability to:

- positively influence the micro-climate in streets, by reducing glare and reflection from built structures, intercepting and reflecting strong sunlight, producing shade areas as relief from the sun, controlling temperature extremes and helping to absorb and control wind flows in streets;
- emphasise the direction of roads, and influence vehicle speed and driver comfort;
- create habitat sites for birds, mammals and other fauna;
- act as environmental indicators of seasonal change, for example spring flowering and autumn foliage colours;
- act as air purifiers in the often more polluted atmosphere of suburbia;
- provide a natural scale within manmade environments; and
- they move and modulate the light, and generally improve the aesthetic of an area, affecting both perceived quality of life and property values.

**Design Principles**

- **Tree Species Selection:** appropriate tree selection, location and installation treatment will ensure the healthy growth and long term benefit for the streetscape. Selection of tree species will be in accordance with the Moreland Street Landscape Strategy.
  
  The selected species are a guide. Tree specie selection needs to consider both underground and overhead infrastructure, space available for successful growth of the tree, the importance of widening the footpath, soil condition, and maintenance regimes.
  
  The option of larger trees should be considered along the side of the street where there are no overhead powerlines.

- **Tree Pits and Guards:** should be optimised to ensure tree health, minimise root interference and consider providing trafficable area around the base of the tree through the use of porous pavements and grills to capture stormwater runoff. Tree base treatments that provide a trafficable surface should be used in areas of high pedestrian activity.

- **Tree guards:** are to be used only in situation where the protection of the tree is necessary and is a temporary measure only until the tree is established.

**Further Considerations**

- Moreland Street Landscape Strategy 2012
- Moreland Landscaoe Guidelines and Technical Notes
centre wide strategies

**PRIMARY COMMERCIAL STREETS**

*Robinia pseudocacia: Mop Top Robinia*

Landscape value: A very tough 'globe-headed' standard that makes a formal specimen that can be clipped to shape. Can be planted alone or in groups in difficult areas such as small gardens, streets, malls and parks where space is restricted.

**SECONDARY STREETS**

*Acer rubrum ‘October Glory’: Red Maple*

An upright, uniformly shaped tree with dense canopy with excellent late autumn foliage colour. Leaves are glossy dark green becoming pinkish-red in autumn. Can be planted under powerlines.

**RESIDENTIAL STREET**

*Acer campestre: Hedge Maple*

A small growing maple which adapts to trimming as a hedge or screen. Suitable for street tree planting, particularly where a small tree is required or for general garden use.

**Evergreen/deciduous:**
- **Maintenance:** moderate
- **Pest & disease:** none known
- **Height:** 5 metres
- **Width:** 5 metres
- **Growth rate:** Slow to moderate.
- **Canopy density:** medium
- **Drought tolerance:** moderate
- **Water-logging tolerance:** moderate
- **Wind tolerance:** low
- **Frost tolerance:** low
- **Pollution tolerance:** moderate

**Evergreen/deciduous:** deciduous
- **Maintenance:** low
- **Pest & disease:** none known
- **Height:** 12 metres
- **Width:** 9 metres
- **Growth rate:** moderate
- **Canopy density:** high
- **Drought tolerance:** moderate
- **Water-logging tolerance:** average
- **Wind tolerance:** average
- **Frost tolerance:** high
- **Pollution tolerance:** moderate

**Evergreen/deciduous:** deciduous
- **Maintenance:** low
- **Pest & disease:** none known
- **Height:** 7 metres
- **Width:** 6 metres
- **Growth rate:** Slow to moderate.
- **Canopy density:** high
- **Drought tolerance:** moderate
- **Water-logging tolerance:** moderate
- **Wind tolerance:** average
- **Frost tolerance:** high
- **Pollution tolerance:** moderate
EAST-WEST PEDESTRIAN SPINE

Malus ioensis ‘Plena’: Ornamental Apple

A commonly planted Crab Apples, predominantly for its excellent spring floral display, this small growing tree also features very good autumn colour. The Bechtel Crab Apple is a good choice for small to medium landscape projects or where space is limited. Can be planted under powerlines.

Evergreen/deciduous: deciduous
Maintenance: moderate
Pest & disease: apple scab
Height: 6 metres
Width: 4.5 metres
Growth rate: slow to moderate
Canopy density: high
Drought tolerance: moderate
Water-logging tolerance: average
Wind tolerance: average
Frost tolerance: average
Pollution tolerance: moderate

CARPARKS

Acer buergerianum: Trident Maple

A small, handsome species that is tolerant of a wide range of site conditions including air pollution. Adaptable to urban environments, it makes an excellent, small, shade and autumn colour tree. Good for confined spaces.

Evergreen/deciduous: deciduous
Maintenance: low
Pest & disease: none known
Height: 6 metres
Width: 6 metres
Growth rate: Slow to moderate.
Canopy density: high
Drought tolerance: moderate
Water-logging tolerance: moderate
Wind tolerance: average to high
Frost tolerance: high
Pollution tolerance: high

Primary Commercials Streets
- Pascoe Vale Road
- Wheatsheaf Road

Secondary Streets
- Glenroy Road
- Hartington Street
- Dowd Place (south of Post Office Place)
- Waterloo Road

Residential Streets
- Murrall Street
- Wheatsheaf Road (south Plumpton Avenue)*
- Blenheim Street
- Finchley Street
- Belair Avenue
- Lytton Street
- Gladstone Parade
- Cromwell Street*
- Plumpton Avenue
- Argyle Street
- Acacia Street
- Nelson Street

* Indicate streets with strong existing street tree character. In these streets the existing street tree character will be retained and strengthened.

East-West Pedestrian Spine
- Murrall Street
- Marlborough Street *
- Post Office Place*
- Belair Avenue

* Indicate streets that will also be shared streets. The street landscape character should include Malus ioensis ‘Plena’ but can also include other species to enhance these streets as key public spaces.
Gingko biloba: Maidenhair Tree

Known for its attractive fan shaped foliage with butter-yellow autumn colour and a distinctive winter branch silhouette. The clonal male variety should be chosen to avoid fruit mess.

Evergreen/deciduous: deciduous
Maintenance: moderate
Pest & disease: none known
Height: 9 metres
Width: 5 metres
Growth rate: Slow to moderate.
Canopy density: medium
Drought tolerance: moderate
Water-logging tolerance: moderate
Wind tolerance: moderate
Frost tolerance: moderate
Pollution tolerance: high

Allocasuarina verticillata: Drooping She-Oak

A small to medium sized tree with a mide and moderately dense canopy. In winter the ‘drooping’ foliage becomes golden-brown in colour.

Evergreen/deciduous: deciduous
Maintenance: low
Pest & disease: none known
Height: 9 metres
Width: 6 metres
Growth rate: moderate - fast
Canopy density: moderate
Drought tolerance: moderate
Water-logging tolerance: average
Wind tolerance: high
Frost tolerance: moderate
Pollution tolerance: moderate

Eucalyptus sideroxylon ‘Rosea’: Red Ironbark

A medium to large-sized tree with attractive pinky-red flowers.

Evergreen/deciduous: evergreen
Maintenance: low
Pest & disease: none known
Height: 18 metres
Width: 15 metres
Growth rate: Moderate.
Canopy density: moderate
Drought tolerance: moderate
Water-logging tolerance: moderate
Wind tolerance: average
Frost tolerance: moderate
Pollution tolerance: moderate
**Shared Streets**
- Post Office Place
- Morgan Court
- Marlborough Street

The selected species are to be used as a guide only as the above shared street will require further design detail. The species have been chosen based on interesting characteristics that mean they contribute more than shade and environmental benefits, but also contribute to the overall identity and character of Glenroy’s public space. Similar trees will be sort in the key urban public spaces such as the Station Plaza, the link between Wheatsheaf Road and the IGA carpark, and the triangle site at the end of Marlborough Street.

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**Koelreuteria paniculata: Golden Rain Tree**

Golden-rain Tree will give multi-season interest to streetscapes. Eventually, it will grow to 10m tall, with an irregular, intricately-branched canopy, elegant pinnately-compounded foliage and chains of yellow flowers in the summer. The bark is finely-fissured, and becomes very interesting on mature trees.

**Evergreen/deciduous:** deciduous  
**Maintenance:** moderate  
**Pest & disease:** none known  
**Height:** 10 metres  
**Width:** 7 metres  
**Growth rate:** Slow to moderate.  
**Canopy density:** high  
**Drought tolerance:** moderate  
**Water-logging tolerance:** moderate  
**Wind tolerance:** moderate  
**Frost tolerance:** moderate  
**Pollution tolerance:** moderate

**Quercus palustris: Pin Oak**

This tree will create a very interesting feature in larger landscapes. Ideal for use in areas where lateral space is restricted but a stately tree is required including streets, avenues, promenades and car parks.

**Evergreen/deciduous:** deciduous  
**Maintenance:** low  
**Pest & disease:** none known  
**Height:** 15 metres  
**Width:** 8 metres  
**Growth rate:** moderate  
**Canopy density:** moderate  
**Drought tolerance:** moderate  
**Water-logging tolerance:** average  
**Wind tolerance:** moderate  
**Frost tolerance:** moderate  
**Pollution tolerance:** moderate
centre wide strategies

Water Sensitive Urban Design
- public open space
- raingardens integrated in public open space
- raingardens integrated in nature strips
- kerb raingardens
- potential to harvest stormwater from commercial and industrial rooftops for use in streets and public landscapes
- western stream (enclosed underground)
- kerb raingardens - Otter Street Collingwood
- kerb inlets
- permeable aggregate at the base of trees - Collins Street Melbourne

kerb raingardens - Otter Street Collingwood
permeable aggregate at the base of trees - Collins Street Melbourne
kerb inlets
Use of water sensitive urban design (WSUD) devices will be assessed on a case by case basis to ensure appropriateness and that they are fit for purpose. In addition to the stormwater management role, all of these systems should be designed to be an integral, aesthetic parts of the streetscape.

There are several devices and means that can be used to integrate WSUD principles. Examples of WSUD devices include:

- permeable pavers;
- tree pits; and
- raingardens.

Raingardens are one of the simplest forms of a bio-retention unit. The use of raingardens and other devices in streetscape projects wherever practicable will help achieve the multiple objectives of improving stormwater quality, greening and enhancing biodiversity as outlined in Moreland’s Stormwater Quality Targets.

**Design Principles**

- **Protect natural systems** - protect and enhance natural water systems within urban developments. Promoting and protecting natural waterway assets allows them to function more effectively and supports the ecosystems that rely on them.

- **Protect water quality** - improve the quality of water draining from urban environments through filtration and retention. This approach reduces the effect that polluted water can have upon the environment and protects the natural waterways.

- **WSUD tree pits** should be used where appropriate to receive water runoff from surrounding roads, properties and footpaths and to treat stormwater for reuse and/or discharge to receiving waters.

**Recommendations**

- Prepare a water plan for the activity centre that identifies water catchments and how to meet best practice in the Centre.

**Further Considerations**

- Moreland Stormwater Quality Targets 2011
- Moreland Landscape Guidelines and Technical Notes
centre wide strategies

Integration of various purposes into a single element reduces clutter on the street and presents as a cohesive design proposition. Integrating wayfinding into a gateway marker, could be developed through a collaboration between multiple disciplines. These elements work well when it is considered as part of a larger space rather than an object in space.

Integration of technology into structure and shelters provides the opportunity to share real time information with the community or allow interactive communication ie send message from a phone to the screen.
Wayfinding is the way in which people orient themselves in space through the use of cues from the environment around them. Successful wayfinding allows people to determine and develop a plan to take them from their location to their destination. Wayfinding includes identifying and marking spaces, grouping spaces and linking and organising spaces both through graphic and spatial design.

Graphic information is the most direct way for people to find their location. It includes elements of orientation, directional information, and destination identification. Typical graphic wayfinding information includes systems made up of text, maps, photographs, and diagrams.

Spatial wayfinding systems use the design and organization of landscape treatments, urban amenities, and buildings as spatial indicators. Spatial wayfinding elements include circulation, markers, nodes, edges, and zones. These, along with visual accessibility, are the design criteria for highly legible and comprehensible urban environments.

The SSMP has considered gateways and signage within the Activity Centre. There is an opportunity to further develop a wayfinding strategy for the centre.
centre wide strategies

Wayfinding
- proposed gateway precincts
- proposed banner鹈鹕
- remove Glenroy entry sign
- upgrade Moreland facility sign
- remove Moreland shopping strip
- retain public toilets
- retain directionals
- existing community information board
- new location for interactive information screen

Existing
- gateway entrance sign
- supergraphics used at the Glenroy Library
- council facility signage without Moreland logo
- retail precinct marker signs

Feature to be used at key pedestrian moments as landmarks and wayfinding devices
- supergraphics on key pedestrian corridors
- identifying markers
- interactive displays
Pedestrian wayfinding signage systems are acknowledged as integral infrastructure for communities. The benefits of implementing such a system are:

- they encourage people to make better decisions when planning their travel;
- they encourage people to walk or ride rather than make small car trips;
- they produce greater foot traffic for retail and leisure;
- they acquaint the community to relevant community and government services; and
- that as a consequence they improve the environment and the health of the community.

**Gateways**

Opportunity exists in several key locations to create gateways treatments. Surfaces, and interpretations. During the day, these elements will provide strong visual wayfinding cues and help to build a sense of place in Glenroy. Lighting and illumination of surfaces and structures will create a temporal and transformative effect at night and provide improved perceptions of safety, activity and interest. Gateway elements will help to brand the Activity Centre and demarcate its periphery, providing a sense of arrival.

**Design Principles**

- Create a unique perceptual identity on each of the commercial street within the centre so that pedestrians can associate with their immediate surroundings.
- Place signs, when necessary, at decision points. Decision points are where the navigator must make a wayfinding decision.
- Theming opportunities could arise through the adoption of elements or materials from the Glenroy expanded palette or east-west pedestrian spine concept rationale. These themes could manifest via:
  - the use of colour; and
  - perforated steel mesh, as used in the Dowd Place concept.
- Install high quality map-based signage at key locations within Glenroy, detailing the range of transport, business, leisure, recreational, cultural, education, civic and retail destinations available within the area.

**Recommendations**

- Develop and install additional wayfinding signage elements that will fit within the current Moreland Signage Strategy and which will contain directional, time and distance information to aid pedestrians and cyclists.
- Upgrade signage at gateways and along commercial streets as part of the scope of works when upgrading the street.

**Further Considerations**

- Moreland Signage Guidelines (draft)
centre wide strategies

ramped footpaths into shops

raised pedestrian crossings - Peel Street, Collingwood

pedestrian scramble intersections - Oxford Circus, London (UK)

shared streets - New Street, Brighton (UK)

risk management and inclusive design considered in the design and material selection.
Inclusive design aims to remove barriers that create unnecessary effort and separation in public space. It will ensure that everyone can participate equally and independently in everyday activities.

Key considerations for inclusive access in the streetscape are:

- the provision of clear lines at the building edge
- the provision of tactile paving treatments
- the provision for pram ramps or raised pedestrian crossings
- the alignment of footpaths
- shared traffic zone treatments

**Raised pedestrian crossings**

Raised pedestrian crossings prioritise pedestrian movement. They make crossing easier and safer especially when used in combination with kerb extensions which reduces the crossing width. They provide a consistent and uninterrupted crossing for pedestrians, are highly visible, and force vehicles to slow down.

**Recommendations**

- Construct raised pedestrian crossings across side streets particularly along Pascoe Vale Road and Glenroy Road.
- Consolidate surface treatments, services and tactile indicators at raised crossings to improve legibility (both visual and tactile) and safety.
- Ensure all streetscape improvements allow for various levels of accessibility.

**Further Considerations**

- Integrate the findings from the Access and Mobility Audit currently being prepared for the Glenroy Activity Centre by Visionary Design Development.
- Moreland Pedestrian Strategy 2010

It is acknowledged that the experience within Glenroy’s city centre is dominated by cars; vehicle movement, parking and road infrastructure. The SSMP is largely focused on prioritising pedestrian movement. In order to achieve this there needs to be a gradual shift in transport choices. This can be achieved by creating a more attractive pedestrian environment but also by providing alternative transport options such as making public transport more convenient and attractive and encouraging cycling. Council’s Bicycle Strategy, 2011 aims to create Moreland as a great place to ride a bicycle - a place that is:

- attractive and inviting for people riding for the first time; and
- offers an effective bicycle network and infrastructure suitable for daily commuting.

**Recommendations**

- Create an onroad bike lane along the key bicycle routes in Glenroy.
- Consider possibility of shared spaces or separate bike lanes on key street such as Glenroy Road if space permits.
- Improve the bicycle network will improve the cycling experience, address safety concerns and encourage more people to ride around and through Glenroy and more broadly through Moreland.
- Design a bicycle path network linked to off-street paths with urban design features, such as lighting in key locations that increase rider safety and visibility.

**Further Considerations**

- Moreland Integrated Transport Strategy 2011
- Moreland Bicycle Strategy 2011
centre wide strategies
The Moreland Arts Strategy 2006 – 2010 articulates Council’s belief that the arts are integral to the life of our community. Public art is an important aspect of major streetscape design projects. On a large scale public art has the ability to unify an area with a theme or identify a gateway. At a pedestrian scale it can assist in wayfinding and provide visual interest for pedestrians.

The Moreland Arts Strategy 2011 – 2016 articulates Council’s role as a key facilitator and provider of arts and cultural opportunities for its community and acknowledges that people increasingly engage in the arts, which play a powerful role in the building of culture and the enhancement of individual and community wellbeing.

**Design Principles**

- Develop arts projects that have relevance to the various life stages, i.e. young people, adults and older adults.
- Deliver a program of ephemeral public art projects that engages with communities in their local neighbourhoods.

**Recommendations**

- Consider the integration of public art in the design of the key streets particular around the station environs and Wheatsheaf Road.

**Further Considerations**

- Arts & Culture Strategy 2011-2016
- Art in Public Space Guidelines 2012
centre wide strategies

**Existing**

- **SEATING**
  - Semi circular seats around trees.
  - Powdercoated steel slatted seats.
  - Timber and steel slatted seats.

- **BARRIERS**
  - Pedestrian safety barriers.
  - Powdercoated steel bollards.
  - Stainless steel bollards.

- **HOOPS**
  - Stainless steel bike hoop.
  - Powdercoated steel bike hoop.
  - Galvanised steel bike hoop.

**Proposed Standard**

- **SEATING**
  - Semi circular seats around trees.
  - Powdercoated steel slatted seats.
  - Timber and steel slatted seats.

- **BARRIERS**
  - Pedestrian safety barriers.
  - Powdercoated steel bollards.

- **HOOPS**
  - Stainless steel bike hoop.

**Street Palette**

Currently Glenroy’s street furniture palette consists of:

**Bench Seats**

Steel slatted seats powder coated in Pommel Blue. These seats are located along the primary pedestrian streets and at key public spaces such as bus stops, and parks.

**Rubbish Bins**

Rubbish bins should be visible, conveniently located but not obtrusive.

**Bollards**

Bollards are barriers for vehicles and at times substitute for kerbs. They need to be carefully located to avoid unnecessary street clutter and obstruction.

**Bicycle Hoops**

Bicycle hoops should be located conveniently along the primary movement network. Particularly at destinations that attract cyclists.

**Pit Covers**

Where possible the design and location of pit covers should be integrated into the footpath treatment.

**Drinking Fountains**

Where required the type and location of drinking fountains will be agreed on a site by site basis. Generally they will be located in key public spaces rather than along the streets.

**Bus Shelters**

There are bus shelters along nominated public transport routes within the city. Most of these shelters are owned and maintained by private operators. The council liaises with these operators on an ongoing basis to determine and review the upkeep of these shelters.
Street furniture form an integral part of the public domain identity. They can reinforce the public domain character, provide important amenities for pedestrians and add functionality and vitality to the public realm. They include seats, drinking fountains, bicycle hoops, bollards, shelters, rubbish bins, and signage. The SSMP ensures Glenroy's street furniture reads as a coordinated suite of elements and achieves coherent streetscape character.

Street furniture needs to be coordinated in its siting and consistent in its design language including colour, form, and detailing. The adjoining plan identifies the current location of street furniture in Glenroy. It is considered that the current supply of furniture is adequate. Future needs will be considered during individual streetscape upgrades.

Design Principles

- **Setout and Clearances:** to avoid conflict with traffic, all furniture must be located a minimum of 600mm from the face of the kerb. Additional, adjacent items must be spaced 2.5m apart to allow for east of movement between them, particularly for the street sweepers.

- **Colour & Finishes:** All standard furniture within the activity centre should be powder coated in Dulux 'Pommel Blue' 51034.

- **Fixings:** All items shall be surface mounted to allow for flexibility in the locations of furniture, ease of replacement and installation after completion of other civil works.

- **Non-standard furniture:** Non standard furniture will be considered when integrated with a larger public space project, with adequate reasoning. The following should be considered before using non standard furniture:
  - fit for its purpose
  - comfortable and safe
  - easy to maintain
  - durability in surrounding environment
  - simple design, simple to use/operate and repair
  - reinforce local identity of the city
  - difficult to steal or vandalise
  - reflect the council's commitment to provide services in a planned and efficient manner.
  - ensuring the requirements of Australian Standards and local government practices and specifications are met.

- **Maintenance:** a key action from this masterplan is to establish a set of technotes for the Glenroy Activity Centre to ensure cohesive ongoing maintenance, this will include information on street furniture.

**Recommendations**

- Develop technotes for specific furniture and fixings for the Glenroy Activity Centre.
- When undertaking streetscape improvements consider possible decluttering through the redistribution of furniture.
centre wide strategies

A combination of ground patterning, dispersed and embedded lighting and stencilled poetic texts to create a sense of animation and interconnectivity across place and time.

Golden Grove is located on the boardwalk at the western exit of Maze Green, a redevelopment project at the University of Sydney. ‘Golden Grove’ Prof. Paul Carter and Taylor, Cullity and Lethlean.

Interactive lighting inside public seating that glows, dims, flashes and changes colour in response to people’s presence and actions. ‘Glowing Places’ (Philips and Royal College of Art).

Light installation ‘The Light in Winter’ Federation Square.

Art installation consisting of a field of columns that create a light and sound array that shifts with viewers movements through the space. Yamaguchi Center for the Arts and Media.

LED strip lighting used to highlight public spaces at night - Geelong Youth Activities Area (Convic Design)
Street lighting works in conjunction with street trees as an organising element to establish the rhythm of the streetscape. Street lighting helps define a positive urban character and supports night time activities. The primary objective is to improve the quality, consistency and efficiency of night lighting in the Glenroy Activity Centre. Level and type should express the function and character of an area. Street lighting can be broadly put into two categories functional and feature.

**Design Principles**

- The provision of cost-effective lighting systems which are energy efficient, incorporate whole-life costs, and recycling initiatives, whilst promoting the purchase of energy derived from renewable resources.
- Improve the illumination of Glenroy at night to ensure public safety, public enjoyment, architectural appreciation, and night-time entertainment.
- Implement high environmental lighting standards, including the use of sustainable energy where feasible, in order to
  - prevent an increase in ‘sky glow’, which affects the clarity of astronomical observations, and
  - conserve energy and minimise the unnecessary emission of greenhouse gases
- Comply with Australian Standards for footpath lighting

**Recommendations**

- Consider lighting as part of the key design projects within the centre such as; Morgan Court, Station Plaza, Wheatsheaf Road (the link to the IGA carpark), Post Office Place.
centre wide strategies

Aerial Bundling of Powerlines

Aerial bundling is an alternative to undergrounding. It is more cost effective and can be safer near trees however can only be used on low voltage lines.

Clearance requirement around powerlines has a significant impact on street trees both visually and structurally.
Utilities in the streetscape consist of utility poles, overhead powerlines, surface pits, and electricity meters. Power poles take up valuable footpath space and together with overhead powerlines influence the placement of planting and tree varieties. Visual clutter diminishes the quality of the streetscape. A reduction of service infrastructure would have a significant positive impact to the overall character of these streets.

Ideally utilities should be efficiently located to minimise impacts on other existing or potential streetscape elements, maintain basic access and minimize maintenance requirements. Undergrounding of overhead powerlines should be carried out where feasible especially on main streets to reduce visual intrusion and provide optimum conditions for street trees. Aerial bundling of cables is also appropriate for streets other main streets (refer point above) to reduce impact on tree canopy.

Under-grounding Powerlines

**BEFORE**

Undergrounding of powerlines allows for additional planting of large shade trees.

**AFTER**

Under-grounding of powerlines would profoundly improve the amenity and character of key streets along the proposed east-west pedestrian spine as well as Glenroy Road and Pascoe Vale Road. When proposing undergrounding it is important to consider:

- the costs, both for undergrounding the services and those that are avoided as a result of undergrounding the overhead electrical distribution network.
- maintaining the current distribution network compared to undergrounding.
- an analysis of the distribution and timing of benefits, including an understanding of the public benefit to the community.

**Recommendations**

- Consideration should be made to creating conduits for future undergrounding of services in the future if the cost and timing of works doesn’t align with broader streetscape works.
- Surface treatment along the key streets should consider the location of underground services and attempt to align the general arrangement to reduce the ‘patch work’ effect that appears from access to and maintenance of services.
- Explore opportunities to integrate service pit lids into footpath design particularly along the primary streets.
Organised public events are fun ways to transform everyday spaces enabling people to experience and perceive them in new and exciting ways. Light and projection shows are relatively cost and time effective ways to transform space and create a level of activation at night.

Street festivals give the community an opportunity to come together and engage with one another. Encouraging the community to take a leading role in organising festivals also helps the sense of ownership they feel for their centre.

Pop-Up Parks are appearing all over the world, including one in Morgan Court during the summer of 2012. They are temporary transformations of space into a park. There are many other version of ‘pop-up’ including shops and bars.

Pavement to Parks projects seek to temporarily reclaim underutilised or small pockets of spaces and quickly and inexpensively turn them into new public plazas and parks. During the temporary closure, the success of these new spaces are evaluated to understand what adjustments need to be made in the short term, and ultimately, whether the temporary closure should be a long term community investment.
Improving the liveability of our cities can be seen in terms of making large significant changes to land use, built form, and movement patterns. Changing the infrastructure to realise the vision is only one part of the process. Significant change also requires change in perception and attitude to the urban environment.

Some of the most effective ways to improving the larger urban landscape is through small fluid interventions. The benefit of such projects is the temporary nature of them. This allows for experimentation and assessment. It is hard to appreciate what hasn’t been experienced before. Tactical initiatives is a form of engagement, it allows the public to experience spaces and provide feedback. This can lead to changes in Council’s aspirations for particularily spaces, or confirm that we are heading in the right direction.

**Recommendations**

- Incorporate tactical intitaive into the design process for projects as a way of public engagement and design feasibility.
- Maintain ongoing and open communication about possible projects so that a relatively quick response can occur if opportuities arise.
- Plan intitiaves around broader events such as PARK(day). This will help with the level of excitement and understanding about such projects and provide a level of attention to Glenroy.

**PARK(ing) Day**

PARK(ing) Day is an annual open-source global event that calls attention to the need for more urban open space, to generate critical debate around how public space is created and allocated, and to improve the quality of our urban environment.

**Parkmobile**

The Parkmobile is a ‘jumpstart’ project in an implementation plan for long terms change. They were a response to a desire for more green open space. They are created from rubbish skip bins that fit within a single parking bay. There are a number of parkmobiles that are periodically moved around the neighbourhood. They provide seating, add ‘green-ness’ to the street and at times hide blank walls.
centre wide strategies

Activate laneways through temporary and transient uses such as coffee carts.

Sites of great potential, the laneway to the rear of the Pascoe Vale Road shops (west side).

Peaceful Pathways
- activate laneways
- potentially integrate with
- consider supergraphics to create visible pedestrian links through carparking areas

Activate laneways through temporary and transient uses such as coffee carts.
Peaceful Pathways is envisaged as alternative pedestrian routes at the rear of shops fronting busy roads. This project could have immediate impact and improve the current conditions in and around Council operated carparks. The project will benefit from being run as an activation project where a temporary design could test out pedestrian and trader openness to the transformation of these spaces.

The Peaceful Pathway concept is to create pedestrian focused pathways through Glenroy that offer an alternative route along busy roads. The proposed pathways are situated along the threshold between back of house and carpark spaces and offer an opportunity to develop calmer zones for pedestrian movement that does not compete with vehicular traffic.

Currently these access lanes are a high conflict zone for pedestrians and vehicles, as vehicles have right of way. Altering this arrangement so that the both vehicles and pedestrians can travel harmoniously along these pathways will encourage a move toward a less car-dependent centre. By allowing only one-way traffic and a dedicated pedestrian ‘lane’, service and delivery vehicles can still attend to back of house functions and car park access is maintained while allowing shoppers to walk peacefully and safely around the centre.

Establishment of these pathways in a formal sense could be the catalyst for businesses to activate the rear of their tenancies and create a new street interface promoting alfresco or market style modes.

The Peaceful Pathway concept offers a number of benefits for pedestrians and travellers to Glenroy. The car parks situated west and to the rear of Pascoe Vale Road retail strip are well frequented by shoppers and day travellers. There are numerous well established trees around the edge of the carpark and positioned centrally offering good shade for parkers. Movement to and from the carparks would benefit from a well defined and delineated network of pedestrian paths linking with the proposed main north-south spine along the rear service lane.

Opportunities exist to insert ‘rain-garden’ edges between the carpark edge and the service lane. This would improve the visual amenity, help treat storm water from the carpark and create a buffer to the carpark for pedestrians. In addition, the pathways would function as branding or wayfinding elements, incorporating directional and locality information.

Recommendations

- Engage with both the traders and other groups within the community to seed excitement about the projects, clearly identifying them as temporary projects that have the potential to become more permanent if there is a desire.
- Explore physical changes such as surface treatments and landscape, but also look at alternatives to rubbish storage, collection, cleanliness, building presentation, entrances etc to start to shift perceptors as to how pedestrian could coexist in this service area.
- Identifying broader events that could tie into a peaceful pathways project, like the Melbourne Fringe Festival, this will broaden visibility of the project and also attract broader attention to Glenroy.

The Meeting Place - part architectural sculpture, part social experiment - was a playful installation encouraging participation and interaction whilst heightening the experience of moving through the urban surrounds of Little Hunter Street Sydney.

Temporary projects within Glenroy’s laneways can help activate these spaces and importantly discover their hidden value as movement links, or gathering spaces. These temporary installations are good ways to create dialogue between different groups in the community.

‘There are a few facts I think you ought to know…” Louisa Butardeci commissioned by the City of Melbourne for their Temporary Laneway Projects 2001 - 2002.

TRIM Ref: D12/181047
Raised pedestrian crossings to be constructed at:
- Finchley Avenue
- Belair Avenue
- Lytton Street
- Grandview Street

The intersection design will include:
- water sensitive urban design elements
- increased footpath area to allow for seating and possible trees
- incorporating text and graphics in the surface as part of a wayfinding system.

Upgrade footpaths with concrete pavers in shades of grey. Each street corner and intersection with the rear laneways will be highlighted to signify the crossing point. It will also assist with identifying the core commercial precinct.

The north and south ends of Pascoe Vale Road are significant entry points to the Activity Centre. These precincts will be marked through signage, banner poles, and sculptural elements to enhance the sense of arrival.
Street Context

Pascoe Vale Road is one of the primary streets within the Glenroy Activity Centre. It is a key north south transit road as well as one of the key commercial strips within the centre. Pascoe Vale Road is highly constrained in terms of high vehicular traffic, limited space to make significant changes to the street profile, awning, overhead powerlines etc. Safety barriers intended to protect pedestrians hinder circulation and are visually unappealing. A pedestrian crossing is located to the south of Post Office Place.

Other issues include narrow footpaths cluttered with traders’ display stands. New federal government policy requires traders to move all of their signage and displays to the road side of the footpath, which has the potential to cause conflicts with existing street furniture and signage.

Future Street Character

Pascoe Vale Road will be the key street in Glenroy. This street will balance its role as both a thoroughfare for vehicles and a primary shopping strip for pedestrians. Innovative and lateral thinking will be required to create a high quality pedestrian experience. This will include a focus on side street intersections to provide moments along the street for pausing and opportunity to green the centre.

Recommendations

Suggested interventions to improve the pedestrian experience include:

- Themed paving treatments to the corners of intersecting streets and laneways which will help to mark the east-west pedestrian spine.
- Install gateway elements at both ends of the commercial district to highlight the entry to the Activity Centre and encourage motorists to slow down.
- The relocation of signalised pedestrian crossing to the intersection with Post Office Place to encourage pedestrians to move across Glenroy via the east-west spine.
- Remove existing safety barriers.
- Upgrade footpath from standard concrete to a concrete paving mid grey in colour.

Improve connection from Pascoe Vale Road to Morgan Court.
**streetscape improvements**

Glenroy Road Linear Reserve

This project will have critical interfaces with the surrounding streets. It will provide an opportunity to link in with Morgan Court. There is also the opportunity to improve the presentation of the Coles carpark to Glenroy Road.

On road bike lane east of Wheatsheaf Road

On road bike lane north of Blucher Street.

On road bike lane north of Blucher Street.

Glenroy Road Linear Reserve

On road bike lane east of Wheatsheaf Road

Malus ioensis ‘Plena’

Banner Pole Entry Marker

On road bike lane north of Blucher Street.
Recommendations

- Create a linear reserve along the front of the Coles Carpark. This will be done in conjunction with Morgan Court upgrade so it forms part of the larger station environs public realm.
- Establish a strong avenue of trees east of Blenheim Street.
- Rationalise street furniture where possible.
- Ultimately it is desirable to underground the power along Glenroy Road, as the power poles are a major imposition visually and physically.
- Install scramble pedestrian crossing at intersection with Hartington and Wheatsheaf Roads.
- Collaborate with local groups particular school groups to utilise supergraphics to road surface to add interest and colour to the streetscape and aid in traffic calming. This could be done when looking at bike lanes or pedestrian movement to the schools.
- Install gateway element on the approach to the commercial district, entry signage at Widford Street intersections and banner poles at Argyle Street intersection.
- Add WSUD and/or other understorey planting wherever possible to treat stormwater, provide a ‘soft’ edge to the street and reduce the reflected heat conditions of the street. Possible locations for planting include:
  - Underneath existing trees at edge of Coles carpark.
  - At the corner of Station Street.
  - Along the south edge of the train station carpark (if space allows after installation of proposed new shared path). Along the north side of the street between Hartington and Blenheim Streets (if space allows after installation of proposed new shared path).

Further Considerations

- Negotiations with Coles required regarding linear reserve.
- Liaison with VicRoads regarding scramble pedestrian itnersection.
streetscape improvements

- Scramble pedestrian intersection
- Peaceful Pathways at the rear of shops on the western side of Wheatsheaf Road.
- Widen footpath and reorganise parking bays
- On road bike lane north of Blucher Street
- Widen footpath and reorganise parking bays
- Plaza link connects Wheatsheaf Road with uses to the west, creating an urban public space to be activated by adjacent uses.
- Widen footpath to minimise road crossing and create a larger space for pedestrians. This central area will incorporate seating, planting, and interactive structure.
- Scramble pedestrian intersection
- Concrete paving unit shades of grey
- Robinia pseudoacacia
- Current link to carpark.
- Peaceful Pathways at the rear of shops on the western side of Wheatsheaf Road.
- Widen footpath and reorganise parking bays
- On road bike lane north of Blucher Street
Street Context

The main shopping strip on Wheatsheaf Road has reasonably wide footpaths and almost continuous awnings which provide some shelter from sun and rain. Traffic is less intense than on the major arterials, but this road still takes a considerable number of traffic to and from Glenroy Road. The lack of pedestrian crossing points makes crossing the street difficult.

Pavements have been refurbished in recent years and street furniture updated. Uniform planting of small clipped Ficus at regular intervals helps to soften the streetscape, but offers little in terms of shade and is at a height that blocks views through to the shop windows.

Future Street Character

Wheatsheaf Road will provide for activity on the street and develop as a key gathering space in the centre. It will be a central point in the connection between the Glenroy Primary School Site and the core of Glenroy.

Recommendations

- Widen footpath in the middle of the street to create a small urban space on the street. This space will connect to the new link through to the IGA carpark. Shops adjacent to this space will be encouraged to activate the space.
- Use the concepts of tactical initiatives (page 41) to text concepts for a gathering space on Wheatsheaf Road.
- Create ‘Peaseful Pathways’ (page 43) to the rear of the shops to the west of Wheatsheaf Road. This concept should tie into the new urban plaza link.
- Align the link through to the IGA carpark with the plaza on Wheatsheaf Road. Use concepts from tactical initiatives to test the idea.
- De clutter footpaths by rationalising signage and furniture wherever possible.
- Incorporate structures with digital screens for the display of community information.
- Plant deciduous trees such as Mop Top Robinia to provide additional shade in summer and allow winter sun to penetrate.
- Upgrade footpaths in front of shops south of Argyle Street. This should include reconfigure parking spaces and widen footpath.
- Plant garden beds with deciduous trees and understorey planting in keeping with the northern shopping strip.
- Create an on road bike lane south of Argyle Street.

Further Considerations

- Land acquisition required to create link through to the IGA carpark.
- Structures should be designed and considered in light of other structures going into the centre.
Create a well lit, safe, family environment with night time activity streetscape improvements

New Urban Plaza that integrates seating, surfaces, and landscape planting together to create an high quality public space that can be used by various community groups, for planned events such as festivals, and for every day encounters.

Feature canopy extends through to Pascoe Vale Road and connects the two spaces through material and form.

Activate rear of tenancies.

Potential for a new community centre to be integrated with public realm.

High quality lighting to highlight design elements.

Activate Coles building, potentially consider a skin of small shops such as florist, newspaper stand.

Feature tree planting and seating.

Create a shared space connecting Post Office Place and Glenroy Road. Surface materials, furniture, and landscape details to be determined through design process.

Balloon Fountain
Street Context

The plaza at the north end of Morgan Court has been updated more recently than surrounding streets. It contains two large trees in contemporary raised concrete planters with incorporated seating as well as modern bins, bollards and bench seats. However some elements are already looking tired and in need of refurbishment. Paving is in red brick which is lifting/sinking in some places and patchy poured concrete along shop fronts and through the undercover arcade. Granitic sand surfacing in the centre of the plaza is in relatively good condition but is spilling out onto paving due to foot traffic in some spots.

Minor works such as new paving, refurbished planter edge seats, more planting and cladding/embellishing the blank face of the Coles building wall could significantly improve this space. The regeneration of this plaza should be viewed as Stage 1 of a larger project which would see shops to the north of this space demolished and a pedestrian mall created, linking Morgan Court to Post Office Place.

Future Street Character

Morgan Court will be a central urban public space in Glenroy. It will be linked to Post Office Place and the Station Plaza. The whole street will be transformed into a shared zone and connections will be made to Glenroy Road and Pascoe Vale Road to increase visibility.

Recommendations

- Continue the treatment of Pascoe Vale Road through the arcade as a minor element, and explore opportunities to create a new feature structure above the arcade that allows for more natural sunlight and a sense of openness.
- Incorporate public art into the design for Morgan Court. This could provide interesting opportunities for non standard seats, a structure for the arcade that weaves into the surface and up onto the Coles walls, or other playful interactions for the public.
- Explore opportunities to activate the Coles wall either by Coles opening up onto the court or by a cladding of uses such as cafes, shoes repairs etc.
- Negotiate with Coles and the land owners for an improved and more visible pedestrian walkway through the Coles carpark and between Morgan Court and Dowd Place.
- Activate the space at night by providing better safety through increased lighting and by encouraging retail businesses with afterhour’s activity to operate tenancies fronting onto the plaza.

Future Considerations

- Land acquisition required to create link through to the Post Office Place.
**streetscape improvements**

- Iconic screening element remediates brown brick facade and creates a strong address for Glenroy Station to the Plaza.
- Perforated metal screen elements add colour and visual interest to the streetscape. Repeated use of this material and colour gives a striking identity to the Station Environs.
- Feature planting of evergreen tree: *Olea europaea*
- Olive Tree feature planting adds colour and texture to railway screening.
- Low level planting including: *Eremophila subteretifolia* *Leucophyta brownii*

**Pedestrian footpath along eastern edge of carpark:**
- Creates a linkage between the station and precincts east of railway line and south of Glenroy Road (DDA compliance)
- Screening of railway visually improves the amenity of the public space and softens the eastern edge of Dowd Place

**Station Plaza:**
- Creates a continuous surface from the station to Post Office Place.
- Lighting creates a focal point.

**Biofiltration planting band:**
- Planted outstands offer potential to incorporate biofiltration planting, create shade and calm traffic movement through the carpark.

**New street tree with custom tree pits:**
- Adds visual interest to pathway.

**Existing large Eucalypt to be retained and underplanted:**

**Perforated metal screening element wraps around station facade to create dual focal points along movement corridors of Post Office Place and Dowd Place**

**Screening of railway visually improves the amenity of the public space and softens the eastern edge of Dowd Place**
Street Context

Dowd Place is owned by VicTrack and Council leases this land for the purpose of carparking particularly for commuters. It is essentially not a street however does provide a connection between Post Office Place and Glenroy Road. Considering it is effectively a carpark Dowd Place has a low level of pedestrian amenity, with narrow footpaths along an inactive frontage. A zebra crossing provides a connection to the station underpass all of which could be improved to provide a more pedestrian focus environment.

Future Street Character

Ideally Dowd Place between Post Office Place and Glenroy Road will be declared a public Road. This will allow the street to be restructured to function more like a street than a carpark. Once this is achieved Dowd Place can then become a street that provides active frontages to the station and the establishment of a station plaza. This plaza will be a pedestrian priority space that connects to Post Office Place, Morgan Court, and the Glenroy Linear Reserve. It will serve as a central public space that will also have connections to the east side of the train station.

Recommendations

- Potential to create pedestrian plaza in front of the station to improve amenity for pedestrians and create a stronger address for the station by re-interpreting the station building. Retain the existing mature tree and formalise planting at its base.
- Provide path with landscape buffer along the eastern side of the carpark to improve pedestrian movement between the station, cars and Wheatsheaf Road shops.
- Insert biofiltration landscaping to western edge of carpark.
- Provide landscaping through trees at key crossing points along Dowd Place to minimise impact of asphalt, calm traffic and provide shade for pedestrians and vehicles.
- Metro Trains and VicTrack should be encouraged to work together with Council in upgrading Glenroy Station, including the station buildings and pedestrian underpass, to create a Station Precinct which is sympathetic to the design proposals made by the SSMP for Dowd Place and the East-West Pedestrian Spine.
- Negotiate with Coles and the land owners for an improved and more visible pedestrian walkway through the Coles carpark and between Morgan Court and Dowd Place.
streetscape improvements

Improved street tree planting

New Urban Plaza
Integrates both soft and hard landscape elements

Marlborough Street shared space extends into the intersection and across into the transport interchange.

Create a bike lane that is integrated into the road profile.

Consider the possibility of incorporating structure with interactive screens near the transport interchange.

Widen footpath and encourage redevelopment of market site to create an active interface with Hartington Street.

Proposed Street Section
Street Context
The western side of Hartington Street consists of the train station carparking area. To the east is an eclectic mix of industry and commercial buildings, including the vacant Glenroy Market site. The street is inconsistent in its footpath alignment, on street parking arrangement, and landscape character. The northern section of the street has a more consistent street tree presentation. Pedestrian movement along this street is of a transitory nature, going to and from the station and bus interchange.

Future Street Character
Hartington Street will form part on a bicycle network through Glenroy. It will also become a key pedestrian street connecting the bus interchange with Wheatsheaf Road. It will be integrated with the triangle site on the corner of Marlborough Street that will provide a new urban public space. The bus interchange will also be integrated with the street character which will draw influence from the Post Office Place, the station forecourt, and Morgan Court.

Recommendations
 Provide a consistent footpath alignment and treatment, which will allow a wider pedestrian area in front of the market which could encourage an activation of the street.
 Negotiate with VicTrack for the widening of the footpath on the western side of the street.
 Create a streetscape character that integrates with the bus interchange and connects with a possible urban public space on the corner of Marlborough Street.
 Create highly visible intersection at the end of Marlborough Street to facilitate pedestrian movement coming from the east.
 Enhance the landscape treatment around the edge of the carparking area and how that could contribute to the street landscape character.
streetscape improvements

Include structure with interactive screens as a new way of spreading community information.

Connect Post Office Place with both the Station Plaza and Morgan Court shared space.

Street palette of materials and finishes

Concrete with exposed aggregate adds a higher level of material finish to the Glenroy street palette.

Feature seating / tree surrounds add colour to the public space.

Illuminated bollards on the perimeter of the pocket park provide safety and wayfinding.

Deciduous Street Tree:
Honey Locust Gleditsia triacanthos
Provide a dense canopy of shade in summer to create an inviting place of rest and respite.

Tall Vertical timepiece acts as a wayfinding landmark.

Transform Post Office Place into a shared space.

Connect Post Office Place with both the Station Plaza and Morgan Court shared space.
Street Context

Post Office Place is a very contained street. It has a consistent street character of regular tree plantings, bench seats, and retail frontages with awnings. It has wider footpaths than some of the other commercial streets in the centre. It includes many daily conveniences such as a local medical clinic, post office, milk bar, and fruit and vegetable market among other retail occupancies.

Future Street Character

Post Office Place will be part of the station environs integrated public realm. It will be connected to both Morgan Court and the Station Forecourt, all of which will be pedestrian priority zones. This area will be a central civic area that could include basic day to day amenities such as the post office, medical centre, fruit and vegetable shop, alongside an integrated community centre.

Recommendations

- Create a shared space from Pascoe Vale Road through to the proposed Station Plaza on Dowd Place.
- Link Post Office Place to Morgan Court and explore opportunities of an integrated community facilitate that fronts both Post Office Place and the link through to Morgan Court.
- When the street becomes a shared space establish taller street trees that will grow to create a deciduous canopy across the street.
streetscape improvements

Feature tree planted in new urban plaza: *Gingko biloba*.

Create a new urban plaza to integrate with station environs.

Incorporate wsud into the urban plaza and the streetscape.

Develop Marlborough Street into a shared space.

When adjacent land use changes consider street furniture, awnings at building entries, and the upgrade of the overhead pass.

Feature stone inlays, act as visual and audible element to highlight the intersection.

Feature LED in-ground lights to highlight the shared space.
Street Context

The Marlborough Street art precinct could be a generator of an identifiable art district that encourages investment and start-up, arts focussed small business in underutilised warehouse space. This is dependent on negotiation with landowners and rezoning of properties neighbouring Marlborough Street.

Future Street Character

Marlborough Street will continue to be a primary pedestrian route to the bus interchange, train station, and core shopping area. It has the potential to provide a strong residential address/forecourt if the industrial area was to be redeveloped.

Recommendations

- Use the building surfaces, ground plane and overhead bridge as a canvas for art works, drawing attention to the historic value of the industrial heart of Glenroy and an appreciation of its older buildings.
- Provide opportunities for the articulation of cultural and heritage values and experiences that celebrate the people and places of Glenroy.
- Improve the safety and legibility of the street as part of the key east-west pedestrian spine with street tree planting, wider footpath, low level lighting, and street furniture.
- If the industry uses move from this area consider a change in the street section to allow for integration with the triangle site and the bus interchange.
- Activate the space through the installation of temporary, site-specific artworks.
- De-clutter street by considering aerial bundling of the overhead powerlines.

Marlborough Street

Create a shared space based on a typical inverted crown road profile. Inverting the crown allows for incorporation of wsud elements similar to that of the Main Street extention designed and constructed by Hume City Council.
streetscape improvements

- Improved intersection design to create improved pedestrian connections through to the train station.
- Create stronger street tree landscape.
- Collaborate with Open Space to upgrade Mott Reserve and integrate with the street landscape.
- Incorporate WSUD treatments within the street, Mott Reserve, and within the Scout Hall carpark.
- Look at the need for an improved pedestrian crossing at the Cromwell Street intersection.
- Improve interface with Mott Reserve.
- Create a strong street tree landscape.
Street Context

Murrell Street is a quiet residential street that has experienced a number of recent townhouse and unit redevelopments. Mott Reserve is located on the south side of the street with the Scout Hall next to the park on the corner of Cromwell and Murrell Street. On the opposite corner is the Town Hall and the Neighbourhood Learning Centre fronting Cromwell Street.

Future Street Character

Murrell Street will provide the link between the Neighbourhood Learning Centre and the core of the centre. It will be integrated with Mott Reserve and will have a largely residential character whilst also drawing subtle influence from Marlborough Street and the Station Environs.

Recommendations

- Emphasise Murrell Street as a continuation of the pedestrian spine, linking Mott Reserve and community facilities to the centre.
- Create a shadier and more beautiful streetscape through the implementation of a unified planting palette including additional tree planting and WSUD elements.
- Widen the footpath on the north side of the street.
- Treat stormwater runoff from the scout hall, carpark and Murrell Street through WSUD planting beds around the edge of the Mott Reserve carpark and nature strips at the east end of the street.
- Improve legibility of the east-west pedestrian spine through an introduction of identifiable landmarks.
- Underground power to improve character of street and allow taller species of trees to be planted.
- Integrate Mott Reserve design with streetscape design.
streetscape improvements

Potential to strengthen street landscape character in residential street such as Gladstone Parade.
other streets

Street Context
These streets are general streets that are either residential in nature or mixed use and provide connection between the residential areas and the core commercial area. The following streets are included in these category:

- Gladstone Parade
- Waterloo Street
- Station Road
- Grandview Street
- Finchley Street
- Anselm Street
- Lytton Street
- Nelson Street
- Cromwell Street
- Blenheim Street
- Blenheim Street
- Plumpton Avenue

Future Street Character
These streets will remain as primarily residential streets that will include increased tree planting and wider footpaths where space provides. Near intersections of primary streets such as Pascoe Vale Road, Glenroy, and Wheatsheaf Road the design approach will consider integrating the two street character to create a transition zone.

Opportunities
- Increase tree planting and widen footpaths.
- At the approach to main street intersections explore opportunities to create a transition through surface treatment and tree planting to ensure integration between streets.

Further Considerations
- Moreland’s Street Landscape Strategy will assist in guiding tree planting (see Residential Street Tree Planting guide left)
- Tree specie selection should be determined based on current character and strength of street landscape.
streetscape improvements
The SSMP establishes the future character of the streets within the activity centre.

The streets highlighted are considered to be the primary and secondary streets leading to the centre. Their character will be largely determined by Moreland’s Street Landscape Strategy however there will need to be careful integration and collaboration when future streetscape works are undertaken.

Along the primary streets leading to the centre, bus shelters and seats should be considered. These are priority streets for tree planting and potentially footpath widening after which the secondary streets should be considered.

**Recommendations**

- The street tree infill program will manage future planting of these streets. This will be guided by Council’s Street Landscape Strategy.
- Streets classified as primary street should be prioritised in terms of tree planting.
- Align works on the streets leading to the centre with the broader Principal Pedestrian Movement Network projects.
Street Cleaning

- **Current Routines**
  - footpath sweeper (daily)
  - street sweeper
  - shop cleaning (daily)

- **Future Considerations**
  - streets requiring future consider
Street Maintenance is routine work performed to keep streets in a condition as close as possible to its original condition. This provides maximum benefit to the public by enhancing safety of the streets and improving the quality of the public realm. Street maintenance is a result of effective use of limited available funds.

In developing the SSMP the Street Cleaning Unit has been consulted. Maintenance regimes are required to be a key consideration in choosing materials, plant species, and designing street infrastructure such as drainage.

The current maintenance regime for the streets of Glenroy has been mapped future regimes will be considered on a street by street basis. Increased maintenance needs may be required and this may require increased budget allowance to the Street Cleaning Unit. During the costing phase of streetscape improvements ongoing maintenance will be outlined to ensure the longevity of the works.
## Implementation

<table>
<thead>
<tr>
<th>YEAR 1</th>
<th>PROJECT</th>
<th>SCOPE</th>
<th>DEPENDENCY</th>
<th>COST</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tactical Initiative</td>
<td>Morgan Court</td>
<td>Place Activation Project. Explore opportunities for temporary elements and public art to activate the public space.</td>
<td></td>
<td>$10,000</td>
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<tr>
<td>Design Feasibility</td>
<td>Murrell Street &amp; Mott Reserve</td>
<td>Collaboration with Open Space to explore possible design concepts for upgrade of Mott Reserve and Murrell Street improvements with a focus on integrating the two spaces.</td>
<td></td>
<td>$5,000</td>
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<tr>
<td></td>
<td>Pascoe Vale Road Stage 1</td>
<td>Develop design concept for streetscape improvements including footpath upgrades and raised pedestrian crossings.</td>
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<td>$30,000</td>
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<tr>
<td>Construction</td>
<td>Pascoe Vale Road Stage 1</td>
<td>Construction of design concept for Pascoe Vale Road including footpath upgrades and pedestrian crossings. Belair Avenue to Lytton Street.</td>
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<td>$180,000</td>
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<tr>
<td></td>
<td>Blenheim &amp; Marlborough Street Intersection</td>
<td>Design and construction of pedestrian crossing on north side of intersection.</td>
<td></td>
<td>$120,000</td>
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<tr>
<td>YEAR 2</td>
<td>Tactical Initiative</td>
<td>Peaceful Pathways</td>
<td>Install a temporary design and liaise with traders regarding use and activation of the laneway at the rear of the Wheatsheaf Road shops (west side).</td>
<td>$20,000</td>
</tr>
<tr>
<td></td>
<td>Wheatsheaf Road</td>
<td>Partake in PARK(ing) day to test the concept of widening the footpath.</td>
<td>$5,000</td>
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<tr>
<td>Design Feasibility</td>
<td>Morgan Court</td>
<td>Develop a design for the redevelopment of Morgan Court.</td>
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<td>$30,000</td>
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<tr>
<td></td>
<td>Belair Avenue including new public open space</td>
<td>Collaboration with Open Space to develop a design for a new open space from Belair Avenue and integration with streetscape improvements.</td>
<td></td>
<td>$10,000</td>
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<tr>
<td>Construction</td>
<td>Pascoe Vale Road Stage 2</td>
<td>Continue delivery of footpath upgrades and pedestrian crossings. Post Office Place to Glenroy Road.</td>
<td></td>
<td>$350,000</td>
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<tr>
<td></td>
<td>Murrell Street &amp; Mott Reserve</td>
<td>Collaboration with Open Space to upgrade Mott Reserve and increase street trees Murrell Street.</td>
<td>Mott Reserve upgrade will be funded through the Open Space Branch.</td>
<td>$120,000</td>
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<tr>
<td>YEAR 3</td>
<td>Tactical Initiative</td>
<td>Peaceful Pathways</td>
<td>Install a temporary design and liaise with traders regarding use and activation of the laneway at the rear of the Pascoe Vale Road shops (west side).</td>
<td>$20,000</td>
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<tr>
<td>Design Feasibility</td>
<td>Wheatsheaf Road</td>
<td>Develop design concept for streetscape improvements.</td>
<td></td>
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<tr>
<td>Construction</td>
<td>Pascoe Vale Road Stage 3</td>
<td>Continue delivery of footpath upgrades and pedestrian crossings. Lytton Street to Gladstone Parade.</td>
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<tr>
<td></td>
<td>Belair Avenue including new public open space</td>
<td>Collaboration with Open Space to develop a design for a new open space from Belair Avenue and integration with streetscape improvements.</td>
<td>Funding to be combined from Open Space and Economic Development.</td>
<td>$250,000</td>
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<tr>
<td></td>
<td>Morgan Court</td>
<td>Construction of streetscape improvements for both the whole Morgan Court streetscape.</td>
<td>Project scope and cost dependant on the possibility of creating a pedestrian link to Post Office Place.</td>
<td>$350,000</td>
</tr>
</tbody>
</table>
The Implementation Plan outlines the project priorities, their dependencies, and a cost estimate. This table will inform the Place Design & Strategy Work Program and Council's 5 Year Capital Works Budget.

### YEAR 4

<table>
<thead>
<tr>
<th>Tactical Initiative</th>
<th>Install temporary installations in and around train station.</th>
<th>$30,000</th>
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<tbody>
<tr>
<td><strong>Design Feasibility</strong></td>
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<tr>
<td>Harrington Street</td>
<td>Develop design for streetscape improvements including the relationship between any future redevelopment proposals of the market site and the street.</td>
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<tr>
<td><strong>Construction</strong></td>
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<tr>
<td>Pascoe Vale Road Stage 4</td>
<td>Continue delivery of footpath upgrades and pedestrian crossings. Belair to Finchley Avenue and to the north of Post Office Place.</td>
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<tr>
<td>Wheatsheet Road</td>
<td>Construction of design concept including footpath upgrades, community information structures, and link through to IGA carpark. Project scope and cost dependent on the possibility of creating a pedestrian link to IGA carpark.</td>
<td>$500,000</td>
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### YEAR 5

<table>
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<tr>
<th>Tactical Initiative</th>
<th>Test community reaction to the transformation of this street into a shared space.</th>
<th>$20,000</th>
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</thead>
<tbody>
<tr>
<td><strong>Design Feasibility</strong></td>
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<tr>
<td>Glenroy Road</td>
<td>Develop design concept for streetscape improvements including additional street trees and concept for the Glenroy Road Linear Reserve.</td>
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</tr>
<tr>
<td><strong>Construction</strong></td>
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<tr>
<td>Harrington Street</td>
<td>Construction of streetscape improvements for Harrington Street.</td>
<td>$300,000</td>
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</tbody>
</table>

### Beyond 5 Years

| Post Office Place  | Design and construct of design concept. | $500,000 |
| Marlborough Street | Construction of design concept. Concept delivery is reliant on change of adjacent land use. | $500,000 |
| Glenroy Road  | Construction of design concept. | $400,000 |

The Works Program is for the delivery of the streetscape masterplan. It will need to be reviewed once the Public Realm & Infrastructure Strategy is developed to incorporate other capital works projects outside the scope of this masterplan.
### Glenroy Activity Centre Technotes– Implementation table

<table>
<thead>
<tr>
<th>Contents</th>
<th>Section</th>
<th>Description</th>
<th>Tech note that applies to</th>
<th>Glenroy Specific</th>
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<td>A100.02 – Typical pavement structure for collector road</td>
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<td>A100.04 – Concrete right of ways</td>
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<tr>
<td></td>
<td></td>
<td>A140.06 – Grated pit for dish channel</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>A140.07 – Grated pit (600x600)</td>
<td>✓</td>
<td></td>
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<tr>
<td></td>
<td></td>
<td>A140.08 – Grated pit (600x900)</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>A140.09 – Spoon drain pit</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>A140.10 – Modification of SEP into GP vehicle crossing</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>A140.11 – Mild steel step iron</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>A140.12 – Drain Bedding and backfill requirements</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>A140.13 – Pipe connection to existing main pipe</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>A140.14 – Pipe and/or block</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>A140.15 – Sun-surface (e.g.) drain</td>
<td>✓</td>
<td></td>
</tr>
</tbody>
</table>
### Glenroy Activity Centre Technotes – Implementation table

| A140.16 | House drain connection details ✓ |
| A140.17 | Property inlet for easement drain ✓ |
| A140.18 | WQUD – detail of a treatment cell ✓ |

**A150 Crossings**
- A150.02 – Concrete pram crossing ✓
- A150.03 – Mid block concrete pram crossing ✓
- A150.04 – Concrete vehicle crossing type 2 ✓
- A150.05 – Concrete vehicle crossing type 2 reverse fall ✓
- A150.06 – Concrete vehicle crossing type 3 ✓
- A150.07 – Concrete vehicle crossing type 3 reverse fall ✓
- A150.10 – Alternative concrete vehicle crossing ✓
- A150.11 – Pedestrian Raised Crossing ✓

**A151 Reinstatement of crossings**
- A151.01 – Reinstatement of concrete crossing type 2 ✓

**A160 Miscellaneous Road**
- A160.01 – Road hump Watt Profile ✓
- A160.02 – Road hump sinusoidal ✓
- A160.03 – Road hump flat top ✓
- A160.04 – Road hump pavement markings and signs ✓
- A160.05 – Conduits under pavement ✓
- A160.06 – Concrete pavement joints ✓

**B110 Bollards/Fences**
- B110.03 – Glenroy bollard ✓

**B120 Seats and benches**
- B120.01 – Glenroy Seat ✓

**B130 Bicycle rails**
- B130.02 – Bicycle hoops ✓

**B140 Miscellaneous**
- B140.02 – Drinking Fountain ✓
- B140.03 – Standard Toilet ✓
- B140.04 – Fixings ✓
- B140.05 – Sleeve for sign post ✓
- B140.06 – Rubbish Bins ✓
- B140.07 – Water Fountains ✓
- B140.08 – Public Lighting ✓
- B140.09 – Way finding signs ✓
- B140.10 – Shelters & Kiosks ✓
- B140.11 – Glenroy Banner Poles ✓

**C100 Planting**
- C100.04 – Advanced tree planting in grassed nature strip ✓
- C100.05 – Advanced tree planting in islands ✓
- C100.06 – Advanced tree planting in pavement / footpath cut-out ✓
- C100.07 – Garden bed planting ✓
- C100.08 – Tree Guard ✓
Concrete pavements are the standard footpath paving treatment used in the residential streets in Glenroy Activity Centre.

Concrete paving provides a very durable, neutral, and smooth pavement treatment.

The standard size is a 2 metre wide path for dual use.

The paving should be consistent in finish, level and slush with existing pavement surfaces. Proves construction, expansion and isolation joints according to Engineers detail.

Asphalt paving is the standard footpath treatment for the secondary streets in the Glenroy Activity Centre.

Asphalt finish should be consistent finish, level, and flush with existing pavement surfaces.
A110.08
Glenroy commercial street

Precast mid dark grey concrete pavers are the standard footpath paving treatment used in the commercial street of the Glenroy Activity Centre.

Precast concrete pavers provide a very durable, neutral, high quality finished paving treatment.

The standard size paving unit is 745x495 x 50mm shot blast finish and is laid in a stretcher bond pattern. The surface pattern is 20mm ribbing that adds texture to the paver.

The paving should be consistent finish, level, and flush with existing pavement surfaces. Provides construction, expansion, and isolation joints according to Engineer’s detail.

Date of Issue: April 2012

B140.11
Glenroy Banner Pole

Banners are used to introduce colour, movement, animation, scale, and definition to public spaces. Use in strategic locations will maximise their impact.

Banner poles are 8.0 metres high and fabricated from aluminium alloy secured by a galvanised steel spigot. All steel components in contact with aluminium surfaces are to be protected from dissimilar metal corrosion.
The Glenroy seat is used within the Glenroy Activity Centre, where people can sit for long periods with a back rest. Seats should be positioned to take advantage of summer shade, winter sun, and any interesting views or activities.

The stainless steel slate seat is fabricated from 316 stainless steel and powdercoated Pomeel Blue.

Bicycle hoops are located along cycle routes or cycle destination points or public attractors.

Bicycle hoops should be installed in groups of 2, 3, or more. They should be spaced one metre apart and offset a minimum of 800mm from the face of the kerb, building, or wall. The rails can be placed parallel so as not to impede pedestrian access along the footpath.

They are fabricated from 316 grade stainless steel and polished to a bright satin finish.
The stainless steel pedestal drinking fountain is placed within the activity centre at regular intervals along footpaths and in other urban public spaces to provide refreshment. The drinking bowl is a perforated polished stainless steel. The drinking fountain is fabricated from 316 stainless steel.
# Existing Street Data Capture Sheet

## Identification
- **Street Name:**
- **Section (if applicable):**
- **Urban Character Precinct:**
- **Road Category:**
- **VicRoads:**

## Spatial Configuration
- **Street Orientation:**
  - NS
  - EW
  - NESW
  - NWSE
  - CL
- **Road Reserve Width:**
- **Street Length:**
- **Average Height:**
- **Min. Height:**
- **Max Height:**

## Built Form & Land Use
- **Zone:**
- **Overlays:**
- **Predominant Land Use:**
  - □ Retail
  - □ Residential
  - □ Food
  - □ Cafe
  - □ Office
  - □ Industry
- **Active frontages:**
  - □ 25%
  - □ 50%
  - □ 75%
  - □ 100%

## Ground Surface
- **Footpath material:**
  - Concrete:
  - Asphalt:
  - Modular:
  - Other:
  - Consistent: Yes / No
- **K&C Material:**
  - Concrete:
  - Bluestone:
  - Other:
  - Consistent: Yes / No

## Street Furniture
- **Bins:**
- **Seats:**
- **Barriers:**
- **Signage:**

## Underground
- **Water Infrastructure:**

## Overhead
- **Awnings:**
- **Powerlines:**
  - Voltage: High / Low
  - Side:
  - Consistent: Yes / No

## Traffic Condition
- **Speed Limit:**
- **On Street Parking:**
- **No. Of Crossovers:**

## Landscape Condition
- **Species Composition**
- **Side:**
  - E / D
  - Maturity: Y / M / O
  - Disfigurement: Pruning/Traffic/HML
  - Health (GFP)
- **Nature Strip:**
  - Width:
  - Canopy %:
  - Tree Pattern:
- **Private Garden Contribution:**
  - □ H □ M □ L
  - Landscape Amenity of Street Trees:
    - □ 1 □ 2 □ 3 □ 4 □ 5
  - Comment:

## Evaluation
- **Clutter:**
- **Street Type:**
- **Landscape Character:**
- **Pedestrian Amenity:**
- **Opportunity to Change:**
The Existing Street Data Capture Sheet provides Council an opportunity to collect quantifiable data so that the quality of these streets can be better understood. The data will be translated into data sheets for each street which provides the benchmark against which future works will be assessed against to understand what has been achieved through the streetscape improvement works.

This information also acts as an inventory, a central location where data regarding Glenroy streetscape is contained. This will include street furniture, tree species and numbers, and footpath materials.

The data sheets will be ‘live’ documents that are reviewed on a regular basis to ensure the information is current. They could also be adapted so as to assist in the capital works planning process by including criteria that ranks the need for intervention.

**Recommendations**

- Produce a data sheet, including guidelines, dependencies, and synergies for each of the streets in the Glenroy Activity Centre based on the streetscape survey.